

How and why an inclusive strategy is critical to closing the STEM talent gap

Key Global Workforce Insights from Kelly Services.

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Women in STEM – Closing the talent gap

The STEM fields are projected to be short 230,000 employees as early as 2018.

To begin closing the talent gap, we must create an inclusive environment that facilitates greater engagement and retention of females in STEM. We must make it a priority to eliminate bias and barriers, to deliver top-down support and institutional accountability.

How to attract STEM women in APAC

Even with work-life balance being a top priority, STEM women in APAC are primarily attracted to employers that will develop them and their careers, as indicated by the pink shading of attraction factors.

STEM Women in APAC rate top 8 attraction factors by level of position, by percentage

Factors that are career development-based

Factors that are values-based

	STEM WOMEN APAC AVERAGE		ENTRY LEVEL		SPECIALIST		MID-MANAGER	
1	Salary/benefits	86%	Salary/benefits	87%	Salary/benefits	87%	Salary/benefits	82%
2	Work/life balance	78%	Career advancement	77%	Work/life balance	85%	Work/life balance	80%
3	Flexible work arrangements	69%	Training/dev. programs	66%	Flexible work arrangements	70%	Flexible work arrangements	68%
4	Career advancement	68%	Work/life balance	64%	Career advancement	67%	Training/dev. programs	67%
5	Training/dev. programs	66%	Flexible work arrangements	65%	Training/dev. programs	65%	Leadership development	62%
6	Knowledgeable colleagues	55%	Knowledgeable colleagues	54%	Knowledgeable colleagues	56%	Career advancement	60%
7	Environmentally friendly practices	53%	Environmentally friendly practices	55%	Environmentally friendly practices	56%	Global/international opportunities	58%
8	Innovative projects	52%	Exposure to latest technology	50%	Innovative projects	51%	Innovative projects	54%

Breaking down the confidence gap

Data from the most recent KGWI research confirms a startling confidence gap: women in STEM APAC jobs are not as confident as their male counterparts.



45%



of STEM men in APAC agree/strongly agree they are in a position

STEM women respondent ratings compared to their male counterparts.

lower on par				
Compared to male counterparts, women STEM workers in APAC feel*	APAC STEM WOMEN	ENTRY LEVEL	SPECIALIST	MIDDLE
They are in a position of high demand in the marketplace	•	•	•	
Their employment experience to date has allowed them to develop skills that are in demand	•			
Whenever they've tried, they've been able to find a new or better position	•			
If they were to consider changing jobs, they're in a good position to secure a similar or better position	•		•	
Their skill set & experience put them in a position to compete effectively with other job seekers	•	•	•	
They've sought career-related coaching and feedback from mentors and/or close associates	•	•	•	

*Table represents relative % who strongly agree/agree with the statement

In addition to analyzing worker preferences and psychographic insights based on survey data from the 2015 and 2014 Kelly Global Workforce Index™ (KGWI), this study pulls insights from Kelly® Free Agent Research (2015) survey data and other research sources.

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Introduction

If we're going to make a dent in the massive talent gap in the STEM fields, we have to start engaging more women now, and we have to work together to do so.

Tipping the scale towards a more optimized and gender diverse STEM talent pool takes more than just ramping up recruitment efforts—it requires commitment and effort from all parties involved, from parents and teachers all the way up to executive leadership in the world's leading STEM companies.

To begin closing the talent gap, we must create an inclusive environment that facilitates greater engagement and retention of females in STEM. We must make it a priority to eliminate bias and barriers, to deliver top-down support and institutional accountability. We have to focus on providing greater mentorship for women in STEM, and increasingly raise diversity scores—because there's a lot at stake—not just for your company, but for the future of the STEM industry.

As a pioneer in the staffing industry, and in the study of workforce preferences, Kelly Services takes a high-level look at the need to address women in STEM, as well as the factors that play a role in successfully engaging them for long term benefit to your organization.

In addition to analyzing worker preferences and psychographic insights based on survey data from the 2015 and 2014 Kelly Global Workforce Index™ (KGWI), this report pulls insights from Kelly Free Agent Research (2015) survey data as well as secondary research sources. Unless otherwise noted, all statistics come from recent Kelly workforce research data.

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The STEM fields are projected to be short 230,000 employees as early as 2018.¹ But, by simply reducing female attrition in the U.S. by 25 percent, that shortage could be decreased to just 10,000 employees.²

The need for STEM talent is massive.

Retention numbers for women in STEM fields aren't pretty, but improving them offers multiple opportunities and benefits to employers.

Preventing or filling key skill gaps

Simply reducing attrition in the U.S. by one quarter would add 220,000 workers to the STEM talent pool.² In this virtuous circle, retention drives recruitment, which creates momentum and scale—boosting further retention.



Increasing innovation and new product development

In a study of more than 100 teams at 21 companies, teams with an equal number of women and men were more likely than teams of any other composition to experiment, be creative, share knowledge, and fulfill tasks.⁴

Women influence more than 85 percent of brand decisions, on average. In those industries that rely heavily on STEM talent—such as automotive, pharmaceuticals and consumer-packaged goods industries—female purchasers exert even greater influence. For instance, women make 93 percent of over-the-counter pharmaceutical purchases.⁵ Forward-looking firms are the ones actively involving women in product design—and thought leaders have noted that re-balancing the male-dominated professions of design and engineering would go a long way toward creating products and services that resonate with women.^{6,7}

"If women and members of other traditionally underrepresented groups joined the STEM workforce in proportion to their representation in the overall labor force, the shortage of STEM professionals would disappear." 116%

The projected increase between 2010 and 2020 of STEM-related employment to more than 8.5 million jobs⁸



80%

of the fastest growing U.S. occupations require mastery of mathematics, and scientific knowledge and skills⁹

230,000

The number of STEM employees the U.S. will be short as early as 2018¹



25%

of STEM-related jobs are held by women, though they represent roughly half of the U.S. workforce.⁸

Retention numbers for women in STEM

Improving financial performance by reducing turnover and absenteeism

Hidden biases and barriers cost corporations \$64 billion per year in turnover, by one estimate.² Studies correlate the presence of women in higher management to both higher return on equity and total return to shareholders.^{2, 10} Intangible benefits of having more women in leadership include an enhanced company reputation, which in turn lowers the cost of recruiting new talent.

Enhancing corporate reputation

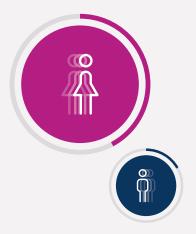
Corporations are under increasing pressure to regularly report on, and improve, their diversity statistics. Tech firms are under particular pressure. These firms can generate positive press and enhance their employer brand by clearly communicating that they value diversity, creating stretch goals, and by demonstrating continuous progress towards meeting these goals.

Those who are lackadaisical about diversity can face a PR nightmare; just one verbal slip by an executive can create enormous damage, both externally and internally. In Fall 2014, a storm of criticism was heaped upon Microsoft® Chief Executive Satya Nadella when he said women should not ask for raises and instead rely on "karma" for advancement.^{11, 12}

"There is ample research showing that diversity in leadership leads to better results ranging from creativity and innovation, to the bottom line."

 Trish Foster, program director for The Center for Women and Business at Bentley University.¹³

Note: While all statistics in this section are for the U.S., the gender gap exists, to varying degrees, globally. See global insights on p.11



41%
of women leave tech
companies after 10
years of experience,
compared to only
17% of men.²



of women in technology leave at the mid-level point (10 – 20 years into their careers), twice the rate of men.²





From a lack of support to feelings of exclusion, women in STEM face an abundance of challenges across the career arc, making them more at risk for dropping out of the field.

A lack of female role models and mentoring, gender stereotyping, less family-friendly flexibility in the STEM fields and an overwhelmingly male-centered culture are all barriers to women in STEM careers that organizations will need to address.

All along their STEM career spectrum, women continue to face feelings of inadequacy and not fitting in. They often experience:

"Social identity threat" – feeling isolated or like a misfit, as if they don't belong because of their gender.

"Imposter syndrome" – feeling as if their success is a fluke and not driven by real ability, despite their objectively good performance.¹⁴

Nilanjana Dasgupta, PhD, Director of Faculty Equity and Inclusion at the University of Massachusetts, Amherst has called for more exposure to female peers, mentors, and executive leaders as a "social vaccine" against these self-limiting beliefs. "Women who are talented in math and science may drop out of STEM because they believe, either consciously or unconsciously, that they don't belong in it," she said.¹⁴

Where women face challenges along the STEM career arc

High school and college

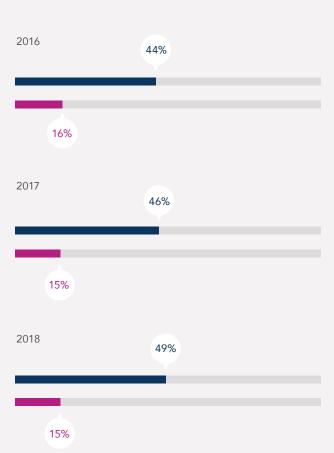
At risk due to mindset and lack of role models

Among high school students, a fewer percentage of girls are interested in pursuing STEM careers than boys.¹⁵

And in college, the trend continues. Women hold a disproportionately low share of most STEM undergraduate degrees, earning just 20 percent of engineering degrees in 2014.¹⁶ One study found that 40 percent of female chemists and chemical engineers were discouraged from pursuing science, most by their college professors.¹⁷

High school students interested in pursuing STEM careers, by percent of graduating class:¹⁵





Early career

At risk due to lack of support

Women with STEM degrees are less likely than their male counterparts to work in a STEM occupation; they are more likely to work in education or healthcare. ¹⁸ In fact, only 11 percent of practicing engineers are women, and of all professional computing occupations in the U.S., only 26 percent are held by women. ^{19,20}

Mid-career

At risk following motherhood and/or due to lack of career growth expectations

Women tend to drop out of the workforce at key life phases, most notably around childbearing years and then again at mid-management levels, where their networks and peer ranks start to thin. In the U.S., 50 percent of women drop out of STEM positions in the first 10 years.²¹

Established career

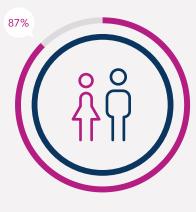
At risk due to isolation and exclusion

Women find themselves with few female peers in high-level leadership positions. Technology firms, in particular, have come under fire for lack of gender diversity, especially at the top.

- 6% of CIOs are women²⁰
- 12% of CEOs in biotech/pharma are women²²
- 4% of CEOs in healthcare are women²²

NOTE: While all statistics in this section are for the United States, the gender gap exists, to varying degrees, globally. See global insights on p. 11.

Women who stay in STEM jobs will face a pay gap, albeit smaller than the pay gap in non-STEM jobs.



Computing



Engineering

Women in computing make 87 percent of what their male counterparts earn, while women in engineering roles make 82 percent of their male counterparts' earnings.²³



The gender gap isn't limited to the United States. Whether due to gender bias or a feeling of "being stalled," women across the world are more likely to leave their STEM career than men.

Globally, women in STEM jobs are highly ambitious and driven, but gender bias and hostile work cultures are leading them to feel stalled in their careers and more likely than their male peers to leave their positions within the coming year.

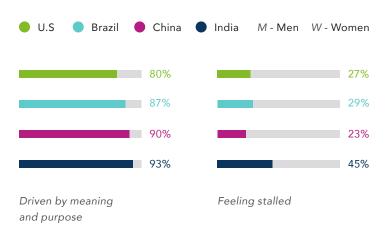
Likely to quit

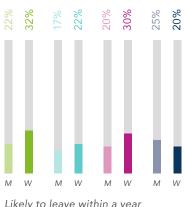
In the U.S., women in STEM fields are 45 percent more likely than their male peers to quit their jobs within the year; and similar gaps exist in other countries. This is despite the vast majority of these women reporting that they are driven by meaning and purpose in their careers, and would love to continue doing what they're doing.24

Feel excluded and unwelcome

Male-dominated cultures are a primary driver of dissatisfaction, making women feel left out and unwelcome. The cultural issues vary by STEM discipline: a "lab-coat culture" in science glorifies extreme hours spent toiling over experiments and penalizes people who need flexibility around childcare; the pervasive maleness of engineering's "hard-hat culture" causes women to dress to avoid harassment; and tech's "geek workplace culture" has been compared to a super competitive nerd fraternity.²⁴

STEM women are driven, but often feel stalled.

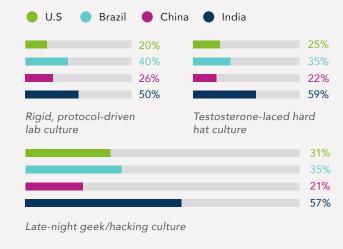




Likely to leave within a year

NOTE: The data and graphics presented on this page are from Center for Talent Innovation, as reported in the Harvard Business Review.

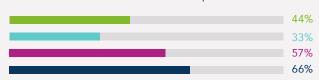
STEM women report having experienced:



Women in STEM feel gender bias is pervasive



Even senior-level women are pessimistic



A female at my company would never get a top position no matter how able or high-performing

Female engineers in the European Union

These findings deliver insights into the talent gap for women in STEM in the Asia-Pacific (APAC) region and in Europe, the Middle East, and Africa (EMEA).

European Union

According to BUSINESSEUROPE, "The lack of STEM-skilled labor will be one of the main obstacles to economic growth in the coming years."²⁵

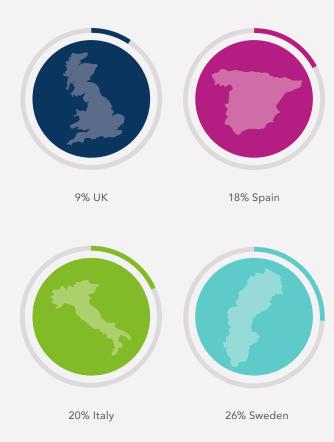
The EU Commission says that by 2020, Europe will lack 900,000 IT professionals—the equivalent of Stockholm's population.²⁶ More than 10,100 ICT (information and communication technology) practitioners are currently lacking in Italy, 18,300 in Poland, 41,800 in Spain, and 87,800 in Germany.²⁵

In 2012, 12.6 percent of female university graduates majored in STEM-related subjects versus 37.5 percent of male graduates.²⁷

Only 24 percent of science and engineering professionals are women, and only 15 percent of science and engineering associate professionals are women.²⁷

In 2013, women made up only seven percent of the UK's Royal Society fellows, a body for the most eminent scientists, engineers, and technologists.²⁸ As of October 2014, the average share of women on the boards of the largest publicly listed companies across the EU had reached 20.2 percent—an increase of more than eight percentage points since October 2010, when the European Commission first put the issue of women on boards high on the political agenda.²⁹

Since 2013, the European Commission has been considering a directive that would force publicly listed companies to allocate 40 percent of their board seats to women. In early 2015, Germany passed a law mandating that its biggest public companies, including Bayer®, BMW, Merck, and Volkswagen®, give 30 percent of their board seats to women by the beginning of 2016.³⁰



At nine percent, the UK has the lowest percentage of female engineers in the EU, versus 18 percent in Spain, 20 percent in Italy, and 26 percent in Sweden,³¹ forcing the country to rely on immigration to fill around 20 percent of skilled roles.³² The UK is in great need of more engineers: an additional 87,000 graduate-level engineers will be needed each year between now and 2020.³³

China

With a high percentage of women in leadership, e-commerce giant Alibaba.com is an anomaly. Alibaba Group boasts nine female partners out of 27, including its CFO, Chief Customer Officer, and COO of its logistics business. Credit has been given to the company's culture, which stressed diversity and showcased female leaders from the start—with six of these women having been present at the company's inception or joining within the first two years.³⁴

For STEM women overall, the numbers are less rosy. Even though 90 percent of STEM women feel "driven by meaning and purpose" in their work, 30 percent say they are likely to leave their job within the year.³⁴

India

Women have been closing the higher education STEM gap in IT (40.2 percent of IT and computer degrees in 2012 – 2013), but still lag in engineering (28.5 percent). Women represent 46 percent of all enrolled undergraduate students.³⁵

India faces a sharp drop-off of women at mid-career level. The most significant driver is the "double-burden syndrome" of women struggling to balance work and family in a culture where both women and men feel family and household duties are primarily the woman's responsibility.³⁶

As a result, there are few women left to fill roles at the top. Despite a six-month extension, as of early 2015, 12 percent of publicly traded companies failed to meet a mandate that they have at least one woman on their board, while 53 percent met the directive by appointing directors that could not be considered independent (many were wives or sisters of executives). Of the 50 companies in the NIFTY index, only five had two female directors—and five had three female directors on boards that varied in size from seven to 17 members.³⁷

Australia

Approximately 44 percent of employers continue to experience difficulties recruiting STEM talent, and the gap will likely widen as STEM-related jobs are the fastest-growing, yet enrollment in STEM-related disciplines in higher education is in decline for both genders in absolute terms and in comparison with other comparable nations.³⁸

In 2011, only 33 percent of higher education STEM-related degrees went to women.³⁹

Only 28 percent of workers in STEM fields requiring a higher education degree were women, compared to 55 percent of the overall higher education workforce. The ratio was much lower in engineering (15 percent) and information technology (25 percent). With 47 percent of positions held by women, the gender gap was the smallest in the natural and physical sciences.⁴⁰

Gender gap by the numbers



30% of STEM women in China say they are likely to leave their job within the year.³⁴



of publicly traded companies in India failed to meet a mandate that they have at least one woman on their board.³⁷



33% of higher education STEM-related degrees in Australia went to women.³⁹



ADDRESSING THE CHALLENGE OF RETAINING WOMEN IN STEM

To increase female retention numbers, STEM employers must take a top-down, multi-pronged approach in creating a more attractive and supportive environment for women. It takes a multi-pronged approach to create meaningful, lasting changes in the retention of women in STEM fields. One-off programs are insufficient.

A study referenced by the National Center for Women & Information Technology of 700 corporations found that the most effective strategy for increasing diversity was to create diversity councils and hold executive leadership responsible for meeting specific goals.⁴¹ This strategy increased the odds of holding a leadership position by 19 percent for white women and 27 percent for black women. McKinsey & Company research found a positive correlation at Fortune 1000® firms between representation of women on boards and women in executive roles.⁴²

Supervisors exert the greatest direct influence on initiatives for change, so critical training is focused on improving the supervisory relationship by fostering understanding, acceptance, and genuine support.

CORE COMPONENTS OF RETENTION:

- Top leadership support/institutional accountability
- Emphasis on supervisory relationships

Ongoing evaluation of change efforts

As with any corporate priority, create measures of accountability and track progress versus goals. Gather feedback on a regular basis—and listen to it. Tweak programs based on input from STEM talent.

Support for competing responsibilities

Flex-time and other family-friendly policies are critical, but must be offered to all employees, not just women. And, most critically, taking advantage of flexible arrangements must be actively encouraged and even modeled by both direct managers and senior leadership.

Initiatives that support only women or other underrepresented groups can be counterproductive, as those employees may hesitate to participate for fear of being further marginalized.

- Make work-life design elements, such as flexible schedules, the norm
- Make it easier for employees to take time off from work and to return
- Provide extended parental leave options to both women and men

NOTE: Baseline framework was created by NCWIT; framework updated and expanded with KGWI data and other insight gathered by market intelligence. https://www.ncwit.org/resources/women-it-facts-infographic-2015-update

Globally, a greater percentage women value flextime than men.



58% of women in STEM fields are attracted to a company that offers flextime.



50% of men in STEM fields are attracted to a company that offers flextime.

Formal peer support programs

Employee resource groups (ERGs) such as a Women's Forum or Working Parents Connection are valuable tools to help women feel they truly belong in STEM fields. Best practices include an executive sponsor for each ERG. Learning communities around patenting or innovation can also provide networks, support, role models, and professional development.

Performance evaluation and promotion

- Clearly articulate measurable steps for promotion
- Value mentoring and employee development as a performance evaluation or promotion criteria
- Educate others about how bias affects who gets assigned to what tasks and teams
- Identify and work to close any gender pay gaps that exist

Reduce subtle biases/barriers

Subtle biases include tokenism, gender/color "blindness," and within-group competitiveness versus collaboration. Provide sensitivity training around these biases, and offer ways to reduce them across the board—beginning with recruitment, and continuing through employee development, and performance evaluation and promotion.

Cultivate executive sponsors

Mentors are invaluable for helping women understand the unwritten rules and to prepare entry to mid-career talent for promotion. Sponsors are necessary for then moving this groomed talent into senior leadership roles. Individuals with sponsors are most satisfied with their rate of advancement.

"Mentors advise; sponsors act."

Sylvia Ann Hewlett, PhD,
 Gender and Workplace Issues Expert⁴³

Compared to 57 percent of their unsponsored peers, 70 percent of sponsored men and 68 percent of sponsored women feel they are progressing through the ranks at a satisfactory pace. That translates to a "sponsor effect" of 19 percent for women.⁴³

Mentoring and employee development

The majority of mid-career STEM women (56 percent of specialists; 58 percent of mid-level managers) have sought mentors, a higher percentage than their male peers (53 percent and 56 percent, respectively). While the majority of women in STEM want mentors, there are few women in the upper ranks of STEM fields to serve in this role, which can be a source of frustration and attrition.

Recruitment/selection practices

Job postings should be worded to encourage women to apply. For example, use phrases such as: "ability to work on diverse teams." Job posting language should not reflect stereotypical masculine or feminine behaviors. Interviewers and/or search committees should be educated on reducing unconscious attitudes of bias.

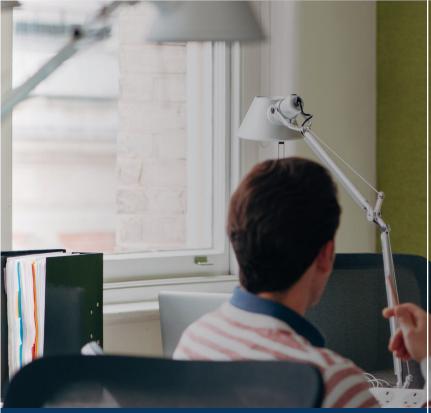
NOTE: Baseline framework was created by NCWIT; framework updated and expanded with KGWI data and other insight gathered by market intelligence. https://www.ncwit.org/resources/women-it-facts-infographic-2015-update

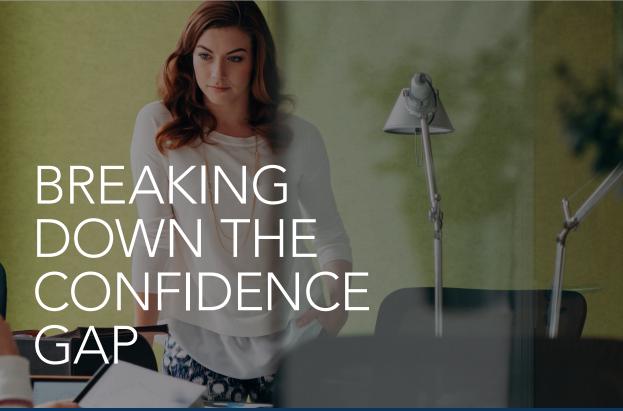
The sponsor effect:



70% / 68%

70 percent of sponsored men and 68 percent of sponsored women feel they are progressing through the ranks at a satisfactory pace.





Globally, women feel less confident in their roles than their male counterparts—and this confidence gap extends across all key STEM skill sets and career stages.

Data from the most recent KGWI research confirms a startling confidence gap: women in STEM jobs are not as confident as their male counterparts—and this confidence gap exists all the way up the career ladder.

59% of women in STEM agree/strongly agree they are in a position of high demand.

67% of men in STEM agree/strongly agree they are in a position of high demand.

STEM women respondent ratings compared to their male counterparts.

higher	lower	on par

Compared to male counterparts, women STEM workers feel*	ALL STEM WOMEN	ENTRY LEVEL	SPECIALIST	MIDDLE MANAGER	SENIOR EXECUTIVE
They are in a position of high demand in the marketplace		•	•		
Their employment experience to date has allowed them to develop skills that are in demand	•	•	•		•
Whenever they've tried, they've been able to find a new or better position		•			
If they were to consider changing jobs, they're in a good position to secure a similar or better position	•	•	•		•
Their skill set & experience put them in a position to compete effectively with other job seekers	•	•	•	•	
They've sought career-related coaching and feedback from mentors and/or close associates	•	•			•

^{*}Table represents relative % who strongly agree/agree with the statement

Without support in the early stages of her career, a female STEM worker is at risk of dropping out of a STEM-related industry or field of work. Research has demonstrated that mentoring or sponsorship greatly improves talent mobility and compensation—key levers in retaining top talent.⁴³

Weighing confidence and competence

A May 2014 article in The Atlantic declared: "Evidence shows that women are less self-assured than men—and that to succeed, confidence matters as much as competence." 44

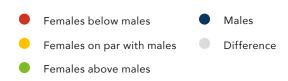
Yet, even women at the top lack confidence. A year before *Lean In* was published Facebook® COO Sheryl Sandberg said: "There are still days I wake up feeling like a fraud, not sure I should be where I am."

Other highlights quoted in the article:

- Men overestimate their abilities and performance, and women underestimate both. Their performances do not differ in quality.
- A Hewlett Packard internal report found that women applied for a promotion only when they met 100 percent of the qualifications.
 Men applied when they met 60 percent.⁴⁵

Confidence: Women versus men in key STEM skill sets

The confidence gap exists across all key STEM skill sets. Among men and women with STEM skill sets, the confidence gap is most pronounced in engineering, followed by science. Compared to males in their skill set, female IT talent, while relatively confident compared to other STEM women, still have areas where they are less confident of their market value and ability to compete than male peers.



ENGINEERING STEM TALENT SCIENCE STEM TALENT 74% 81% 69% 75% My skill set and experience puts me in a position to My skill set and experience puts me in a position to compete effectively with other job seekers. compete effectively with other job seekers. 68% 53% 56% 63% 3% If I were to consider changing jobs, I feel I am in a If I were to consider changing jobs, I feel I am in a good position to secure a similar or better position. good position to secure a similar or better position. 42% 53% 53% 2% 44% Whenever I have tried. I have been able to find a new Whenever I have tried, I have been able to find a new or better position. or better position. 68% 71% 72% 3% 75% 3% My employment experience to date has allowed me My employment experience to date has allowed me to develop skills that are in demand. to develop skills that are in demand. 59% 53% 58% 6% 65% 5% I feel I am in a position of high demand in I feel I am in a position of high demand in

the marketplace.



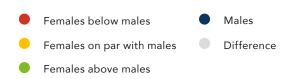
the marketplace.

Note: The KGWI sample size for Math skill sets was too small to be included here.

the marketplace.

Confidence: Women versus men in key STEM skill sets, by industry

The confidence gap also exists across industries reliant on STEM talent. Compared to men in their industry, women in STEM are least confident across key measures in Life Sciences, slightly more confident in Natural Resources, and most confident in High Tech.



the marketplace.

NATURAL RESOURCES STEM TALENT LIFE SCIENCES STEM TALENT HIGH-TECH STEM TALENT 73% 71% 78% 76% 80% 81% My skill set and experience puts me in a position to My skill set and experience puts me in a position to My skill set and experience puts me in a position to compete effectively with other job seekers. compete effectively with other job seekers. compete effectively with other job seekers. 56% 66% 55% 4% 59% 68% 70% 10% If I were to consider changing jobs, I feel I am in a If I were to consider changing jobs, I feel I am in a If I were to consider changing jobs, I feel I am in a good position to secure a similar or better position. good position to secure a similar or better position. good position to secure a similar or better position. 48% 5% 44% 47% 58% 53% 3% 56% Whenever I have tried. I have been able to find a new Whenever I have tried. I have been able to find a new Whenever I have tried. I have been able to find a new or better position. or better position. or better position. 69% 75% 1% 76% 75% 76% 76% My employment experience to date has allowed me My employment experience to date has allowed me My employment experience to date has allowed me to develop skills that are in demand. to develop skills that are in demand. to develop skills that are in demand. 61% 64% 55% 63% 70% 74% 3% I feel I am in a position of high demand in I feel I am in a position of high demand in I feel I am in a position of high demand in

the marketplace.

Note: The KGWI sample size for Math skill sets was too small to be included here.

the marketplace.

What drives the confidence gap in STEM women?

The confidence gap in STEM women is driven by a number of factors, ranging from too many "lack of" situations, to bias, to isolation.

Lack of knowledge about hiring and advancement processes

One study⁴⁶ found that women who weren't applying for open positions or advancement believed the qualifications listed were mandatory minimums for hiring.

"They didn't see the hiring process as one where advocacy, relationships, or a creative approach to framing one's expertise could overcome not having the skills and experiences outlined in the job qualifications."

— Tara Sophia Mohr, Harvard Business Review⁴⁶

Cultured mindset barriers

One driver of women not applying for "stretch" assignments is that they are socialized to be rule-followers—women do not apply if they don't meet all of the requirements. Men, on the other hand, are socialized to be risk-takers.⁴⁶

Bias in (some) workplaces

A McKinsey report found that men are often hired or promoted based on their potential, while women are selected based on their experience and track record. If women perceive this bias in their own workplace, they would be less likely to apply for a job for which they did not meet the full list of qualifications.⁴⁷

Lack of peers and informal support networks/social isolation

Women often lack peers in their work environments, and even informal support networks. In work teams, female peers enhance women's motivation, verbal participation, and career aspirations—in engineering, specifically.⁴⁸

The need exists and may even be greater at the very top, hence the existence of groups like the New England Women in Science Executives Club where C-suite level women and entrepreneurs in Life Sciences and academia—who are often the only women in leadership positions within their organization—can meet informally to develop support networks and discuss their work-life challenges and potential solutions.⁴⁹

Lack of formal support networks

While many firms now have formal mentoring and/or peer support networks in place, the ideal mentor for a STEM woman is another woman,^{13, 15} but due to simple numbers and dropout rates for women in STEM, this isn't always possible.

In many industries, women have formed local, regional, or national women's organizations that are focused largely on mentoring. The national organization Women In Bio, whose core program MAPs (Mentors, Advisors, and Peers), is one example.⁵⁰

Direct managers have a role to play here, too. In 2015, only 31 percent of women said they believed their direct manager prioritized gender diversity.⁵¹

Closing the confidence gap

To date, no one has discovered the secret sauce for closing the confidence gap. Cross-industry solutions recommended by experts include more female role models, executive sponsors, and open discussion/education regarding the confidence gap. Key measures for solving the confidence gap include:

Share the statistics and encourage open discussion

Just publishing some key stats and encouraging open discussion can help change behaviors.

"For those women who have not been applying for jobs because they believe all of the stated qualifications must be met, the {Hewlett Packard} statistic is a wake-up call that not everyone is playing the game the same way. When those women know others are giving it a shot when they don't meet the job criteria, they feel free to do the same."

— Tara Sophia Mohr, Harvard Business Review⁴⁶

But talking alone isn't enough. In particular, senior executives need to "walk the talk". While 74 percent of companies say gender diversity is a priority for their CEO, only 37 percent of women and 49 percent of men believe it.⁵¹ It's critical that senior executives set the tone by being active participants at women's events and publicly sponsoring high-potential women.

Encourage executives to identify and actively sponsor high-potential future women leaders

There are key differences between mentors and sponsors. Sponsors are senior individuals with power and influence; mentors can be at any level in hierarchy. Sponsors are visible supporters; mentors are often behind the scenes supporters.⁴³

For Lynne Doughtie, her sponsor John Veihmeyer, KPMG's global chairman, pushed to name Ms. Doughtie the managing partner of KPMG's United States advisory business 10 years ago, when others felt she was too young for such responsibility.⁵²

"Having sponsors that put their own capital and credibility on the line for me helped me move into a number of leadership roles."

— Dalynn J. Hoch, CFO at Zurich North America, Zurich Insurance Company⁵³

It may also be beneficial for those in leadership positions to reach out to high-potential candidates and encourage them to apply for open positions.

Ensure job descriptions focus on the need-to-haves for any role, and aren't a quest for "purple unicorns"

Unrealistic job descriptions may be part of the problem. Make sure you aren't providing a wish list of qualifications no one person could possibly have – if you send a message that you're looking for a "purple unicorn" that doesn't exist, you could be scaring off potential candidates that have the most important skills of all – the drive and intelligence to learn new technical skills in an era of constantly-evolving technologies.⁵⁴

Make it easier/more accessible for women to be mentors and role models

Two-thirds of women in a KPMG study felt they had learned their most important lessons about leadership from other women, and 82 percent believed that networking with female leaders would help them advance their careers. Even so, four out of five women did not feel comfortable asking for mentors.⁵³

Receiving praise from mentors and leaders was the single biggest factor influencing women's perceptions of themselves in the KPMG study, more even than receiving raises and promotions.⁵³

Lynne Doughtie, who was recently appointed KPMG's first woman CEO, plans to constantly retell her story and build a network of mentors for young women, both to help them navigate their career paths and to encourage them to believe more in themselves.⁵²

Investigate gender pay gaps and invest in closing them

Money talks, and women listen. CEOs who are serious about gender equality must review employee compensation at all levels and close pay gaps.⁵¹



While offering an attractive work-life balance is critical for retaining both men and women across all career stages, it's important to take into consideration the types of support that women value most at various points in their lives and careers.

Women in STEM are clearly ambitious, and place a high value on career advancement opportunities when evaluating potential work opportunities. But, at various stages in their lives – including the critical mid-career times when they often drop out of the work force – STEM women value work-life design elements more than career advancement.

Even with work-life balance being a top priority, women in STEM are primarily attracted to employers that will develop them and their careers, as indicated by the pink shading of attraction factors.

- Factors that are career development-based
- Factors that are values-based

Women in STEM rate top 8 attraction factors by level of position, by percent

		STEM WOMEN GLOBAL AVERAGE	-	ENTRY LEVEL		SPECIALIST		MID-MANAGER		EXECUTIVE	
	1	Salary/benefits	88%	Salary/benefits	88%	Salary/benefits	90%	Salary/benefits	86%	Salary/benefits	85%
	2	Career advancement	71%	Career advancement	76%	Work/life balance	73%	Work/life balance	70%	Career advancement	70%
	3	Work/life balance	71%	Training/dev. programs	69%	Career advancement	70%	Career advancement	68%	Work/life balance	68%
¥ :	4	Training/dev. programs	67%	Work/life balance	69%	Training/dev. programs	68%	Training/dev. programs	64%	Innovative projects	66%
R A	5	Knowledgeable colleagues	59%	Knowledgeable colleagues	56%	Flexible work arrangements	63%	Innovative projects	59%	Training/dev. programs	61%
	6	Flexible work arrangements	58%	Innovative projects	56%	Knowledgeable colleagues	61%	Knowledgeable colleagues	59%	Knowledgeable colleagues	61%
	7	Innovative projects	55%	Flexible work arrangements	53%	Innovative projects	53%	Flexible work arrangements	56%	Corporate values	51%
	8	Exposure to latest technology	58%	Environmentally friendly practices	46%	Exposure to latest technology	46%	Corporate values	46%	Leadership development	50%

What STEM women value in supporting work-life balance along the career spectrum

STEM women value the benefits shown below that help support a positive work-life balance, and for many of the benefits, they typically value them far more than men in the same career stage do. STEM women value different types of support at different life and career stages. While offering flexible work arrangements is important to women of all ages/levels, it is especially critical for mid-career women who are typically in their prime child-bearing and family-raising years. In a different way, STEM women in executive roles are looking for limits on work hours more than male counterparts, perhaps because they are seeking employer support that demonstrates they do not have to continue to prove themselves in typically maledominated STEM cultures.

- Women value more than men
- Women and men value equally
- Women value less than men

Women value meaningfully more than men	Paid time off (55%) Childcare support (18%)	Flexible work arrangements (72%) Paid time off (54%) Volunteer during work hours (25%) Childcare support (17%)	Flexible work arrangements (71%) Paid time off (49%) Limits on email (21%) Childcare support (21%)	Limits on hours (42%) Cafeteria style amenities (28%)
Women value somewhat more than men	Flexible work arrangements (63%)			Childcare support (23%)
Women and men value equally	Wellness Programs (46%) Fostered Environment of Friendships at Work (43%) Limits on work hours (41%) Volunteer during work hours (27%) Cafeteria style amenities (22%)	Wellness Programs (43%) Limits on work hours (37%) Encouragement to use all vacation time (24%) Cafeteria style amenities (18%) Limits on email (17%)	Wellness Programs (43%) Limits on work hours (38%) Cafeteria style amenities (19%) Volunteer during work hours (19%)	Flexible work arrangements (68 Wellness Programs (42%) Paid time off (34%) Encouragement to use all vacation time (26%) Volunteer during work hours (20 Limits on work email (19%)
Woman value somewhat less than men				Fostered Environment of Friendships at Work (42%)
Women value meaningfully less than men	Encouragement to use all vacation time (23%) Limits on email (17%)	Fostered Environment of Friendships at Work (37%)	Fostered Environment of Friendships at Work (40%) Encouragement to use all vacation time (22%)	

RELATIVE VALU

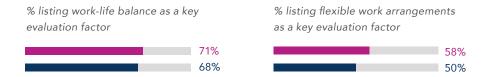
CAREER STAGE Entry level Specialist Mid-Manager Executive

STEM women rate their employers higher than male peers do on work-life balance

Since women give more weight to work-life design support when evaluating potential employers/positions, it makes sense that they would end up working for employers who offer more support and, in turn, rate their current employer more highly on the work-life support offered than their male peers do. But, some are also open to alternative means (e.g. freelancing) to ensure they have the work-life balance they need.

Women Mer

A meaningfully higher percentage of women in STEM careers over men in STEM careers consider work-life balance and flexible work arrangements to be key decision drivers when evaluating one position over another.



And STEM women in traditional employment rate their employers significantly higher than men do on work-life balance programs offered. The majority of STEM women give their current employer a 4 or 5 out of 5 rating; most STEM men do not.

% giving current employer a work-life
balance satisfaction rating of 4 or 5 on
scale of 5

While still a distinct minority, a meaningfully higher percentage of women in STEM than men in STEM, in traditional employment, say they are highly likely to work as a free agent or freelancer in the future.

% "very likely to consider" working
as a "free agent" or "freelancer"

in the future

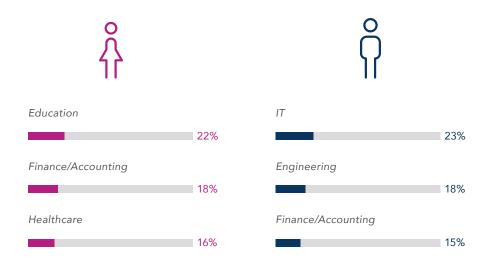
And the drivers of pursuing other employment are slightly different for women in traditional employment than men, with the opportunity for teleworking (working from home or remotely) a significantly more influential driver for women.

% listing teleworking as a "very influential" driver to decision to remain with current employer or pursue other employment



The confidence gap for women in STEM may play into their low current representation in the free agent population. (Women may have historically considered it too challenging to have to sell their services in a male-dominated field.) For male free agents, STEM skill sets represent two of the three top skill sets, for a combined 41 percent of free agents. For female free agents, none of the three top skill sets are STEM skill sets. IT skill sets represent just 13 percent of female free agents, Engineering 9 percent, Science 3 percent and Math 1 percent. All STEM skill sets combined total only 26 percent of female free agents, compared to 44 percent of male free agents.

Top three skill sets of free agents by gender, by percent





Companies across all STEM-intensive verticals are under pressure to close the gender gap and increase the number of women in leadership positions.

Women in leadership

Tech companies are coming under pressure to improve their diversity statistics, and a number of news sources now publish annual rankings on women in tech roles and women in senior leadership. Both matter. And even if your company's industry isn't publicly ranked, you can still benefit from setting, and tracking, gender diversity goals.

Company	Year	Employees	Percentage of leadership roles held by women
LINKEDIN	2015	4,235	30%
EBAY	2015	21,353	29%
APPLE	2015	59,869	28%
AMAZON	2014	77,179	25%
ҮАНОО	2015	6,138	24%
FACEBOOK	2015	5,479	23%
GOOGLE	2015	32,527	22%
TWITTER	2015	2,910	22%
INTEL	2015	53,732	17%
MICROSOFT	2015	59,796	17%

Other STEM-intensive verticals fare just as poorly as, or worse than, tech companies. Only 12 percent of biotech/pharma CEOs are women, only 4 percent of healthcare CEOs are.⁵⁵

Why it matters

- Helps recruitment by sending highly visible signal to potential talent that women are valued in the company
- Boosts employee morale and engagement
- Supports leadership development efforts when women in leadership serve as role models, executive sponsors and/or mentors for less experienced STEM women

NOTE: The data and graphics presented on this page are from The Wall Street Journal. ⁵⁶ Rankings from other sources may differ based on the definition of leadership as well as the quality/extent of data provided by tech companies.

Women in technology jobs

Company	Year	Employees	Percentage of technology jobs held by women
EBAY	2015	21,353	24%
APPLE	2015	59,869	22%
INTEL	2015	53,732	20%
LINKEDIN	2015	4,235	18%
GOOGLE	2015	32,527	18%
MICROSOFT	2015	59,796	17%
YAHOO	2015	6,138	16%
FACEBOOK	2015	5,479	16%
TWITTER	2015	2,910	13%

Women executives can sometimes overlook/underestimate the power of being a role model. Mary Barra, named GM's first female CEO two years ago, said one of the biggest things she's learned is how important it is to other people that she's a woman. "I think I missed it early on." But she's come to understand that some people need role models who they can identify with to help them see a path to success, a concept she said was foreign to her at first. She noted that at a recent GM town hall meeting, an engineer came up to her and thanked her for being in her role because it meant his 1-year-old daughter would never live in a world where having a woman CEO of an automaker would be considered newsworthy.⁵⁷

Why it matters

- Helps recruitment by sending a message that women find the corporate culture supportive and attractive
- Boosts employee morale and engagement
- Provides broader pool of talent to draw from when considering filling open leadership positions

NOTE: The data and graphics presented on this page are from The Wall Street Journal.⁵⁶ Rankings from other sources may differ based on the definition of leadership as well as the quality/extent of data provided by tech companies.

Diversity scorecards: tracking progress toward gender diversity through metrics

While published rankings focus on the HR outcomes (women in technical roles, women in leadership), internal progress toward diversity (in all forms, not just gender) is measured and tracked based on key metrics that drive these outcomes:

Internal and external talent pipeline⁵⁸

The ability to successfully recruit and to develop a sustainable group of STEM women to lead the company.

- New hire demographics versus workforce
- Recruitment versus involuntary turnover
- New hires into top three levels versus current top three levels
- Representation, by age group

CEO/leadership commitment⁵⁸

- Representation at top three levels, and on board
- Percentage of executives on boards of women's organizations
- Accountability metrics such as the percentage of total compensation tied to diversity metrics
- Percentage of CEO direct reports who sponsor women

Equitable talent development58

- Percentage of managers in mentoring programs
- Promotion into management versus workforce percentage
- Promotions within top three levels versus current top three levels
- Management promotions versus voluntary turnover

Talent's perceptions of opportunity⁵¹

- Satisfaction with opportunities for growth and advancement, management, etc.
- Perception of meritocracy
- Perception of work-life balance

Best Practices⁵⁹

- Pick a small number of metrics that tie directly into strategy. Measure sparingly, tracking only those measures that tie directly to desired outcomes.
- Provide managers with the tools for success, including coaching and education, so they can attain the goals against which they are measured.
- Discuss metrics at least once a quarter. Some companies send out monthly status reports in between quarterly meetings.
- Use external benchmarks to gauge the competitive value of your progress. Tracking and regularly reporting on progress is a baseline, but the greatest value comes from putting the metrics in context. For example, BASF compares itself to others in the chemical industry as well as those in the DiversityInc Top 50.
- Link a significant portion of executive pay to meeting diversity targets. At Sodexo, for example, more than 15 percent of discretionary bonuses of all senior executives are linked to diversity goals, and for some it's 25 percent.

The goal should not be to set up the perfect tool but to create meaningful dialogue based on data that help top leaders and their direct reports make the best decisions, especially around hiring and promotions.

"We started out spending too much time building the perfect mousetrap. We had too many bells and whistles, too many places to hide and argue over whether that decimal place is in the right place."

— Patricia Rossman, Chief Diversity Officer at BASF⁵⁹



HOLISTIC APPROACHES TO CLOSING THE GENDER GAP

The STEM companies that are leading the charge towards a more gender-diverse workforce have one thing in common—they take a strategic, holistic approach to closing the gender gap.

DiversityInc's survey of more than 1,600 companies, leads to a detailed, empirically driven ranking of the top 50 companies in diversity, assessing organizational performance based on four key areas of diversity management:

- 1) Talent Pipeline
- 2) Equitable Talent Development
- 3) CEO/Leadership Commitment
- 4) Supplier Diversity

Following are the top companies in Kelly's key industries that are on the list.60

Novartis

Novartis is ranked #1 in overall diversity by DiversityInc, and has the best track record for retaining and promoting senior-level women of any firm DiversityInc has tracked. Since 2010, the percentage of women at the top level (CEO and direct reports) has tripled, while the percentage of women at levels two and three has increased by 42 percent and 31 percent, respectively.

Key elements to success include:

- Deep, visible CEO commitment, and an executive diversity council focused on business goals and metrics
- Diversity and Inclusion Councils self-organized groups of employees who have assumed responsibility for infusing diversity and inclusion within their functional areas and/or business organizations. These groups regularly plan and execute events that help to reshape their departments' cultures by encouraging employees to understand and appreciate the climate of an inclusive workplace.

• 19 employee resource groups (ERGs) (voluntary, employee-led affinity groups with shared characteristics, interests or life experiences) are used for market development and recruitment/ talent enhancement. More than half (52 percent) of employees participate in ERGs, an increase of 13 percent over last year. Stated goals for the ERGs include: support of recruitment, retention and career development strategies and initiatives; networking and mentoring activities; creating greater multicultural awareness and respect among all employees; sharing of broader perspectives and more creative solutions for the business and its customers; and support for the company's community outreach and philanthropic efforts. Groups include: Empowering Women to Act Now, Women in Leadership and Working Parents Connection (WPC). WPC specifically addresses work-life design issues and helped shape Novartis' flexible work program.

Novartis is ranked #1 in overall diversity by DiversityInc.

Since 2010, the percentage of women at the top level has tripled.

Since 2010, the percentage of women at level two has increased

131% Since 2010, the percentage of women at level three has increased by 31 percent.

NOTE: Diversity stats in this section are from DiversityInc. Details of diversity programs come from DiversityInc as well as company websites and blogs.

Lilly

Ranked #27 in overall diversity by DiversityInc, Lilly has an impressive number of women on its board (four women, or 29 percent, versus the Fortune 500 average of 17 percent). The company also has four women on its Executive Committee, or 29 percent.

Key elements to success include:

- The Lilly Women's Network celebrated its 20th anniversary in 2015, and has added chapters in countries where women are often underrepresented, such as Saudi Arabia, to help grow the ranks of female employees and female leadership.
- An online network, Women@Lilly (lillypad.lilly.com/women) includes blogs, infographics, videos and other materials featuring Lilly women from all over the world. Network initiatives include: quarterly speaker events focused on key leadership topics identified by Lilly women; mentoring programs to assist in the retention and development of women; and an annual recognition event to celebrate women promoted in the last year.
- Eli Lilly has a focus on formal, cross-cultural mentoring and sponsorship. Diversity goals are part of executive-performance reviews and senior executives are evaluated for their roles as crosscultural mentors and their involvement with external multicultural organizations.
- The company also uses employee resource groups to identify and train talent to increase retention and engagement of women. Almost half of top-level executives (CEO and direct reports) sponsor a resource group.
- On-site child care is viewed as a valuable recruitment and retention tool, especially at certain geographic locations:

- In addition to on-site childcare for infants through age five, the company hosts spring, winter and summer camp programs for 5-12 year olds to support parents during school vacation times.
- Other offerings that support work-life balance include telecommuting, adoption assistance, paternity leave, floating religious holidays, on-site medical services and dependent-care referrals and leaves of absence. To help retain mid-career women, Eli Lilly showcases female leaders on its global intranet and promotes its development programs for women.

"Women often make that decision not to come back to work after having a first child – especially since most of our talent is recruited from outside of Indianapolis, so employees don't have that family support to help care for the child. We know that several of our participant employees have turned down other jobs where they wouldn't have had the benefit of onsite childcare."

Charlotte Hawthorne, Consultant,
 Global Diversity at Eli Lilly

#27

Lilly is ranked #27 in overall diversity by DiversityInc.



Lilly has an impressive number of women on its board (four women, or 29 percent, versus the Fortune 500 average of 17 percent).

NOTE: Diversity stats in this section are from DiversityInc. Details of diversity programs come from DiversityInc as well as company websites and blogs.

Rockwell Collins

Rockwell Collins has made DiversityInc Top 50 for five years running.

Key elements to success include:

- Employee Resource Groups are critical to Rockwell Collins' diversity success. ERGs partnering with internal recruiters on sourcing and retention efforts, support on-site cultural awareness activities, host ongoing speaker series and educational presentations, offer mentoring, networking and career development opportunities, and support volunteer and fundraising needs within the community. ERGs include: Women's Forum, Latino Employee Network and The African American Professional's Forum.
- Executive Diversity Council, led by Chairman, President and CEO Kelly Ortberg, supported by a Diversity Advisory Council, with representation from each toplevel organization, that functions as the "eyes and ears" of the company and meets biannually with the Executive Diversity Council.
- Executive-level board and committee involvement in groups including Women in Engineering Program Advocates Network (WEPAN), a non-profit educational organization to enhance the success of women in engineering professions.

Northrop Grumman

Awards include DiversityInc Top 50 (#35 in 2015); National Association for Female Executives (NAFE) – Top 50 Companies for Executive Women, based on female representation, especially the corporate officer and profitand-loss leadership ranks; and Woman Engineer Magazine 20th Annual – "Top 50 Employers (#32)."

Comprehensive programs include:

- Women's Conferences: In 2006, Northrop Grumman held its first Women's Conference, with more than 500 women attending from across the company. Since then, the conference has become a recurring event, including speakers from the company's senior leadership, panel discussions, and nationally known speakers addressing topics suchas leadership, development and work-life balance. See the 2014 agenda: http:// www.northropgrumman.com/CorporateResponsibility/ Diversity/Documents/2014WCAgenda.pdf
- Executive Diversity Council, with seven out of 17 members being women.
- Relies heavily on employee resource groups, and has rules in place to ensure their success, including that each of the 13 groups must have an executive sponsor.
- Northrup Grumman has had on-site child care at its Redondo Beach, CA location for 22 years and view it as a valuable tool in keeping women in the workforce.

Linkedin

LinkedIn says it is taking "a more holistic approach to recruiting efforts". The Women's Initiative within the company's Global Sales team and the Women in Technology initiative within their Engineering and Product organizations have built a framework to hire, retain, develop and advance women."

They have:

- Fostered a positive culture of inclusion through workshop learning sessions for all managers and above.
- Created recruitment strategies to attract women to senior leadership and technical roles.
- Provided an advancement architecture that empowers high potential women leaders to advance through sponsorship, coaching and leadership development.
- Supported the growth of technical women's careers through workshops, mentorship events and tech talks on gender issues.

NOTE: Diversity stats in this section are from DiversityInc. Details of diversity programs come from DiversityInc as well as company websites and blogs.



RECOMMENDATIONS FOR BOOSTING FEMALE STEM TALENT

To boost hiring and retention of female STEM talent, companies must start at the top.

Executives and those in leadership positions need to "walk the talk" to be successful.





A high-level look at workforce trends from the Kelly Global Workforce Index (KGWI) and other Kelly research.

39/ OVERVIEW AND METHODOLOGY

To better understand the motivations behind the empowered workforce, and how employers can best act and react to worker expectations, Kelly Services® developed the Kelly Global Workforce Index™ (KGWI), an annual global survey that is the largest study of its kind. In 2015, Kelly collected feedback from 164,000 workers across 28 countries and a multitude of industries and occupations. In 2014, nearly 230,000 were polled in 31 countries.

This study takes a high-level look at the talent gap that exists between men and women in science, technology, engineering, and math (STEM) fields. In addition to analyzing worker preferences and psychographic insights based on 2015 and 2014 KGWI survey data, this report pulls insights from Kelly Free Agent research (2015) and develops macro employer/employee trends using standard secondary research sources.

Skilled candidates are in short supply across the globe. Employers in most any industry in search of workers to support growth and innovation have to contend with an employee driven market, in which organizations face intense competition to secure and retain the best talent. Understanding the drivers to the gender gap in STEM fields and industries, as well as the key levers for how to attract and retain skilled female talent in those fields, can unlock much needed advantage for companies and workers alike.

KGWI Response Detail

By category	Number of res	oonses
	2015	2014
Global Workforce Total	164,021	229,794
Employment Status		
Employed full-time	57,908	66,216
Employed part-time	11,814	16,482
Temp/casual/contract work	16,299	23,680
Unemployed	12,754	21,451
Looking for work	22,425	22,161
Retired	1,060	1,262
Industry Breakout		
Engineering	11,942	10,792
Financial & Accounting	10,287	16,150
Information Technology	9,847	10,501
Science	5,694	6,920
Geographic Breakout		
The Americas	102,321	135,049
EMEA	50,107	71,134
APAC	11,593	21,080
Generational Breakout		
Millenials (1980-1995)	56,998	64,475
Gen X (1965-1979)	37,428	51,073
Baby Boomers (1946-1964)	20,382	28,789
Silent Gen. (1935-1945)	576	1,140

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