

How Activate is Building a More Inclusive Fellowship

Activate is a non-profit which supports entrepreneurial scientists and engineers through a paid, two-year fellowship. In this case study, Activate reflects on its work with AWIS to improve its fellow recruitment outreach.

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Launching a business is a difficult endeavor. It requires time, resources, and capital that many scientists lack. That is why [Activate](#) supports early-stage founders with two-year, paid fellowships that include intensive training, mentorship, and laboratory access.

As Dr. Sarah Richardson, CEO of MicroByre and a Cohort 2017 Fellow, put it, "The transition from academic scientist to entrepreneur is neither easy nor generalizable."

But it should be equitable. And a quick scan of our fellowship community reveals profound gender and race/ethnicity disparities. After running a number of experiments to attract a diverse pool of applicants, Activate decided to reach out for expert help. Last year, as we were about to start recruiting our sixth cohort, we asked AWIS to audit our outreach efforts with an eye toward helping us foster a more diverse applicant pool.

By looking critically at our past recruitment efforts and speaking with potential applicants who had decided against applying for the fellowship, AWIS uncovered a few key areas in which we had failed to align our messaging with our mission, and places where inconsistency might have undermined our ability to connect with women scientists and engineers with a strong inclination toward entrepreneurship. While we were able to reach some of our short-term goals—namely to attract more women to apply and ultimately improve the gender disparity in our next cohort—we are still early in our journey toward becoming the deeply inclusive program we envision.

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The 30,000-Foot View

While the United States is a leader in higher education—our universities produce 40,000 science and engineering doctorates each year—women are severely under-represented in some engineering fields. For example, the National Science Foundation’s Survey of Graduate Students and Postdoctorates in Science and Engineering 2018 data shows that women account for around 16 percent of electrical, mechanical engineering, and industrial and manufacturing engineering students, and these are engineering sub-disciplines that are well aligned with the types of hard technology development that Activate supports.

Yet, we can’t realistically blame the disparity in our cohort community on a “pipeline problem.” We know that there is a pipeline—one we need to better tap into. To wit: The robust participation AWIS sees into its STEM to Market (S2M) program indicates that there are women scientists and engineers who are eager to commercialize their research. The S2M program has supported 50 women across four cohorts, 62 percent of them women color.

Knowing we have not effectively connected with that vibrant pipeline, we got to work. Our main objective was to

get guidance on how to improve our outreach and answer these questions:

- What are we doing right?
- What are we doing wrong?
- How should we reorient our recruitment strategy to attract more diverse applicants and what are some tactics we should deploy?

Over the spring and summer of 2019, Activate worked closely with AWIS’ chief research officer, Dr. Heather Metcalf, as well as her STEM to Market colleague Erin Kelley and AWIS research assistant Aspen Russell, to answer those questions and chart a path toward improvement. We provided a wide range of data and source material, including demographic data about applicants versus fellows accepted into past cohorts and information on how applicants heard about the program. We shared recordings of webinars, emails, social media posts and other collateral from past recruitment cycles. The AWIS team also conducted interviews with individuals who had shown interest in the fellowship but had ultimately decided not to apply.

What AWIS Found and How We Responded

The audit framed our recruitment outreach around four key considerations: network; words and images; fellowship experience; and values.

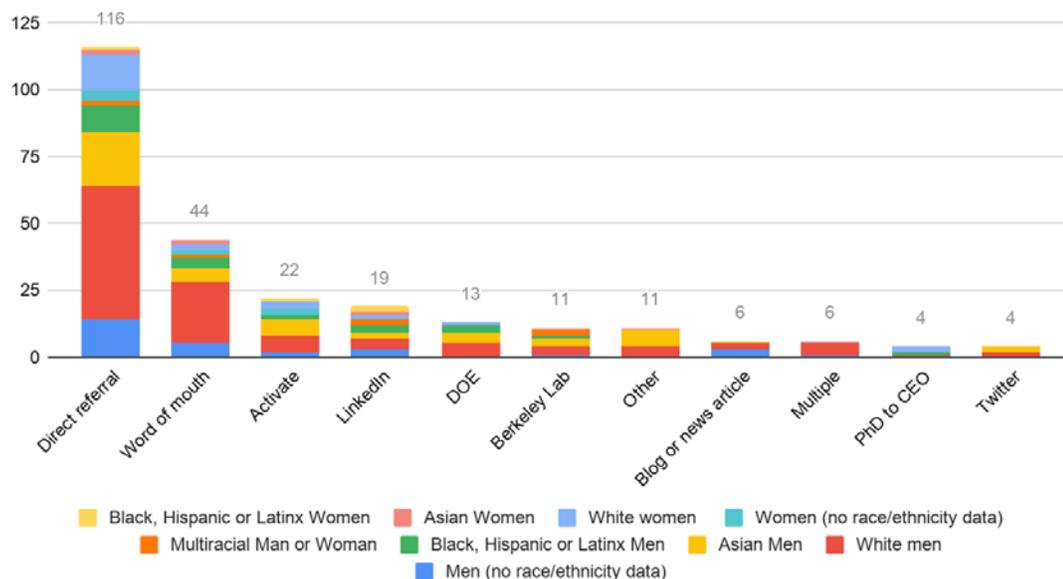
NETWORK

Do our outreach channels connect us to diverse audiences? Or do they reinforce or perpetuate the lack of diversity we are trying to combat?

FINDING: Direct referral and word of mouth are top sources of applicant referrals. However, the majority of applicants who come through those channels are white men.

Direct referrals are powerful, and we have relied heavily on them since the beginning of the fellowship program. But those who are referred to or hear of us through others have been overwhelmingly white men. Therefore, AWIS

Audience & Outreach Data – Referral Sources - 2020 Recruitment



suggested that examining and expanding our outreach channels could be an effective means of attracting more applicants who are women, transgender, non-binary, Black, Indigenous or people of color (BIPOC).

Course Correction: The audit included very clear advice: Build relationships, don't just send emails.

Expanding our network is a work in progress. We have made some progress in reaching out to organizations and affinity groups that have clear mandates to improve equity and inclusion in both STEM and the industrial sectors we target—including forging a partnership with AWIS—but building trust with these groups takes time.

We have also used bespoke webinars to reach women in a graduate group at a prominent university. We provided details about the program and a safe place to ask candid questions about the fellowship experience. This effort paid off, netting a female fellow in Cohort 2020.

Another promising approach is asking our existing connections for warm introductions to women in their networks. Among Cohort 2020 applicants, Black, Hispanic or Latinx women were the least directly referred. Only one out of 116 applicants who had been directly referred to the program identified as a Black, Hispanic or Latinx woman.

WORDS AND IMAGES

These are, of course, intensely powerful and persuasive and it is essential to get them right in any recruitment context. They can attract or repel.

FINDING: The audit showed a mix bag in terms of the language, themes, and images we were using.

We do not use stock imagery, which AWIS praised as an authentic approach. However, the audit found we often show women in public speaking contexts and seldom actually doing science. In terms of language, the review focused on key and sometimes gendered phrases, such as “no man’s land” and concepts, such as “all-in commitment” that might make some women feel as though they do have the bandwidth needed to devote to the fellowship due to, for example, family obligations.

Course Correction: We have worked to present a more balanced view of the women in our program by better balancing views of them in the lab with images of them speaking at events.

This is part of a larger initiative to grow our image bank. We have made notable adjustments to the ways we visually convey fellows, with more images of them at the bench and fewer of them in social settings or at a podium. In terms of language, we are more mindful of perception and more careful to avoid gendered words.

One means of attracting more women candidates with families could be to highlight examples of women fellows who successfully balance the demands of family with the demands of being a technical founder.

In recent interviews with applicants or people who considered applying for Cohort 2020, feedback was mixed. “There wasn’t a lot of racial diversity but there were a few women, which is good since there are so few women in engineering,” said a Black man who attended a recruitment event in 2018. “On the website, I did see a good amount of diversity and that was encouraging,” he added.

FELLOWSHIP EXPERIENCE

What do potential applicants hear about purpose and path? How openly or narrowly do we set expectations and how do we define success?

FINDING: The image and concept of “the entrepreneur” was the focus of AWIS’ feedback, which suggested we examine how we deliver information, what we ask of applicants, and how we interact with them.

In interviews with past potential applicants, many of the individuals that AWIS interviewed—particularly women—said that the framing of our fellows as entrepreneurs had turned them off because they did not identify as entrepreneurs, at least not in the conventional sense.

AWIS also suggested that we curb our use of happy hour events at bars. We have traditionally used these venues to provide an informal setting to answer candidates’ questions. But this approach was likely unappealing to some people uncomfortable in bars and/or women with family obligations that would keep them otherwise occupied during happy hour events, they told us.

AWIS also examined our application language and process and strongly advised that we clarify the specific information we sought and how we ran the selection process. Lack of transparency may have kept some candidates from applying.

Course Correction: We have reframed entrepreneurship in our outreach. We overhauled our application process, infusing it with clarity and directness. We are counteracting the notion that we only support freshly-minted Ph.D.s.

Processing the feedback on entrepreneurship was tough. Activate exists to support founders, and an enterprising, entrepreneurial spirit is an essential attribute, and something we need to see proof of before deciding to support any applicant. So our task, based on the feedback from AWIS, has been to frame entrepreneurship—through language, imagery, and impact stories—in a way that disproves the negative connotations that often color the term. It does not help, of course, that the Silicon Valley entrepreneur

archetype is generally young, masculine, boorish, and aggressive. We work hard, by using our current and alumni fellows as examples, to counter that image.

We are also putting more emphasis on the fact that we are a people-centered organization that works very hard to support and mentor each fellow, first and foremost, rather than focusing on the companies they start. Activate does not take any equity stake in our fellows' companies, and this is a feature of the program that we are promoting more aggressively.

VALUES

Activate's mission- and people-orientation are powerful recruitment tools. Are they conveyed clearly and backed up by the experiences of our fellows?

FINDING: Activate talks a lot about social impact, so why isn't that more central to your recruitment outreach?

Our recruitment messaging frames Activate as an organization that supports fellows who want to bring their technological innovations to market explicitly to address pervasive social problems, ranging from climate change to the need for more secure and accessible computing and communications systems. But AWIS found a disconnect between that top-line objective and the way we convey our selection process, which has focused more on ensuring that the proposed technology is feasible and marketable.

Course Correction: We are devising a framework for telling our impact story in a way that resonates with and reflects our fellows' and partners' goals and missions, in addition to asking fellows to convey their own impact stories.

Our intent is to use this framework to inform our recruitment, application, and selection process—that is, candidates will be given opportunities to indicate the ways in which their vision for commercialization connects with one or more of these missions. We believe this will make more clear the values we hold central as an organization and fellowship community—and how we put those values into practice through the fellowship.

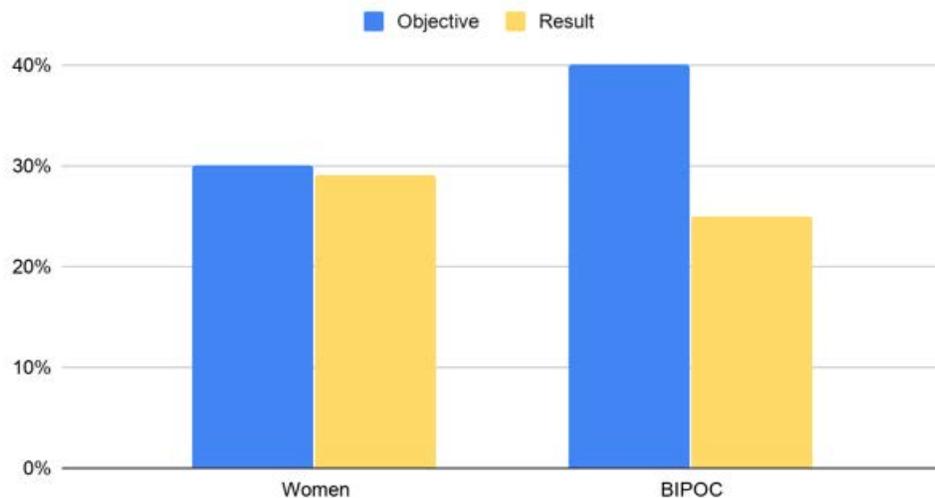
Cohort 2020: Objectives & Results

Each year we set various goals around the types and number of candidates we want to apply for the fellowship. For Cohort 2020, based on a review of the 2017 NSF survey data of graduate school enrollment in science and engineering, we hoped to reach:

25 - 30% women, transgender, or non-binary applicants

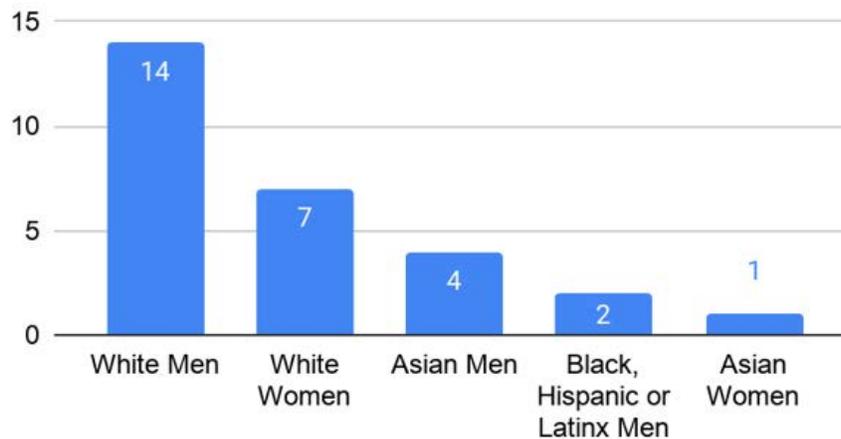
40% BIPOC applicants

We failed to reach our recruitment goals, both in terms of gender and race/ethnicity, in our applicant pool. However, the final cohort includes 29 percent women or non-binary and 25 percent non-white individuals.



Cohort 2020 Diversity Objectives & Results

Cohort 2020 Demographic Breakdown



The Horizon

Some important caveats are worth noting. One is that both gender and race disparities, with regard to representation, access, and success, in both STEM and entrepreneurship are systemic problems. We could never eliminate them just by improving our recruitment efforts. A holistic, longer-term approach to leveling the playing field for all scientists and engineers will include examining and dismantling bias and encoded language and imagery that are introduced in childhood and manifest all the way through higher education systems and into the institutions that support entrepreneurship, from research citations and technology transfer offices to support systems such as incubators and accelerators.

“At AWIS, we know that barriers to women’s full participation in STEM are systemic and cultural in nature. Without addressing these root causes, organizational and programmatic efforts to recruit women will result in attrition rather than retention and advancement. Partners like Activate are great to work with because they approach equity issues from a growth mindset, a willingness to take a hard look at the root causes of inequity, and a commitment to meaningful and evidence-based organizational change,” said Heather Metcalf, AWIS chief research officer.

AWIS is dedicated to addressing these systemic disparities through its outreach and advocacy work, talent development, research efforts, and partnerships. Activate is working to understand how we can confront bias and become a more equitable and inclusive organization and improving the diversity of our fellow cohorts is just one important step

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– Heather Metcalf, AWIS chief research officer

toward those goals. As an organization, Activate is charting a path toward understanding the best use of our privilege. Among our networks, sponsors, partners are some of the most important companies, agencies and individuals in the innovation ecosystem. To really create change in the world of STEM entrepreneurship, we need their participation and help.

“We have not internalized everything from the feedback, but we did make changes to how we recruit fellows,” said Brenna Teigler, Activate’s chief fellowship officer. “And as we continue to consider any new approach to recruitment we are always asking: Is this going to help or hurt our efforts around DEI?”

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