



LETTERS

Edited by Jennifer Sills

Migration today: Displaced scientists

How can scientists help fellow scientists who have been forced by political upheaval and war to leave their homes? We asked four displaced scientists to share their stories and suggest ways that other scientists could help. Some of them requested that we withhold their names to ensure their safety. Although these scientists came from different countries and ended up in different places, they revealed common goals and challenges: They prioritized education, struggled to stay current in their fields, and yearned to find positions that would allow them to continue their work and contribute to society. In the Outside the Tower feature (see box), German scientist Carmen Bachmann describes her efforts to help refugee scientists regain a part of their identity by connecting them with German scientists.

NEVER IN MY LIFE did I think that I would have to leave my country of Albania and move to another place in the world. I could not be a part of the government's corruption, and no judicial bodies would protect me from retribution. Unlike those who face long, difficult journeys, I only traveled 90 minutes to get to Germany. After a year in my new home, I am very grateful to the German people and government for helping refugees. But despite the geographic proximity and warm welcome, I still feel lonely and far from my country and my people. I am an economist, focused on management. I am also a displaced scientist.

I have always believed that scientific researchers do their work with the goal of serving society. Before I left Albania, my scientific research—in collaboration with colleagues at University Ismail Qemali, the European University for Tourism in Tirana, and the Albanian Academy of Sciences—served as the basis for economic reforms by the Albanian government. I would like to continue doing research in my field and contribute to German society.

Scientists who would like to help refugees should try to create opportunities for joint scientific work with refugees in their field, and where possible, help refugee scientists continue to publish work. I am now in

touch with members of the University of Leipzig's Chance-for-Science project, which provides a good model for scientists who would like to start such an effort.

Name withheld, Germany

My husband and I are from Iran, a country we could neither stay in nor return to. Today, Germany is our home. My husband is a journalist and political activist against the Iranian government. Iran's intelligence service tried to arrest him and pressured his employer to fire him. Because we had to leave Iran immediately, we went to Malaysia, which did not require a visa. In Malaysia, we each earned a Ph.D.—his in the field of political economy and mine in nanotechnology. After that, we could not renew our student visas. Because my husband could not go back to Iran, he applied to a few universities in Germany. Once he was admitted, he traveled to Germany. I joined him a few months later. Finally, we submitted our asylum application in September 2016.

At first, we lived in a very small flat in a crowded and very noisy apartment building, and we could not work because we did not have permission during the first 3 months of our asylum application process. Now, we have moved to a more comfortable flat and we are searching for jobs. We look forward to returning to academic work. We have had good discussions with the University of Leipzig and several other local institutes, and now we are looking for financial support. Despite not working, we try to keep ourselves up-to-date with the progress in our fields by reading academic articles.

To help refugee scientists, other scientists should trust them and facilitate their integration into their new scientific com-

munity. Because refugees may not have all of the required qualifications, universities and institutions should provide opportunities for them to complete some training that brings them up to the required level of expertise.

Name withheld, Germany

It was my credentials and the skills I learned through my science education that saved my life. I came directly from Syria to Canada to escape the war and to save the lives of my two children. I was an associate professor at Al-Baath University, Homs, in Syria. As a female scientist in the middle of a war, I knew I had to leave. I have a Ph.D. from France in biotechnology and food processes. My knowledge of English and French helped me make connections within my field and find a new position in a new country. Since February 2016, I have been a visiting scholar at the University of Saskatchewan, Saska-

toon, Canada. I came with a work permit to conduct research in my field. Although my scientific goals include both teaching and research, my current position allows me to do only research.

Scientists can help displaced scientists by giving them the opportunity to work and prove their capacity. My career was interrupted for 5 years because of the war, which means I have published fewer papers than I would have in better circumstances. This has put me at a disadvantage in Canada's competitive academic job market. Many available research positions are 1- or 2-year contracts, which is not enough time to complete experiments and publish results.

Employers should give refugees and displaced scientists more time. The first year is challenging when you are starting a new life, exploring a new area of research, and making new connections with other scientists. As a woman and single mother,

I would have appreciated a way to connect and share experiences with other refugee scientists, even through a webinar or social media group. I also would have liked more training in my field, once in Canada. I could not afford the training programs that would have helped me find a position that includes teaching.

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We lost everything. In 1989, I was a 2-year-old in Afghanistan. As the Soviet army withdrew from my country, the mujahideen who had fought the Soviets began to fight each other. My family had to migrate from one part of Kabul to another to escape the frontlines between various warlords fighting for power. We were finally compelled to migrate to Pakistan.

Today, I am finishing my dissertation at the Oregon Health and Science University, but the journey here was hardly straightforward. I finished middle school in Pakistan and then attended free schools run by charities. I could not afford to take the local bus, so I walked miles through dangerous areas to attend a 1-hour lesson in English. Meanwhile, I worked at a pharmacy, first mopping floors, then, as my English improved, ordering supplies and reading prescriptions. After obtaining a first-aid certification, I was allowed to start patients' IVs under the supervision of the pharmacist.

My family returned to Afghanistan in 2002, after the invasion of the U.S. Army. When I was 17, I became an interpreter and translator for the U.S. Army in Afghanistan. During the last 2 years of high school in Afghanistan, I became interested in science. I came to the United States in 2006 and had earned my B.S. and M.S. degrees by 2013.

When I began my Ph.D. program, I faced stereotyping and discrimination for the first time in my academic life. I was told repeatedly by my first-year advisor that I was destined to fail, an assumption based solely on her experiences with previous students of color. I did not give up, worked hard, and passed my exams.

Scientists who would like to help people like me should understand that we have an unshakable conviction and motivation to contribute to science. We have struggled to change the lives of others for the better. Treat us equally regardless of our skin color or background. Act based on evidence and facts, not stereotypes and assumptions.

Name withheld, USA

OUTSIDE THE TOWER

Giving refugees a chance

I am walking through a refugee camp in my city of Leipzig, Germany. The camp is a temporary home to more than 1000 people who are seeking asylum from countries such as Syria, Iraq, Afghanistan, and Albania. The people in the camp spend their days waiting, hoping something will happen that allows them to move forward with their lives. The hall I walk through feels like an overcrowded waiting room, except instead of chairs, it has hundreds of beds, one next to the other. I am searching for refugees with an academic background. Scientists who are kept away from their work can easily fall behind in their fields, and I would like to help.

I am a professor of taxation, trained not to save lives but to save money for companies. But when Germany was flooded with refugees, among them scientists and professors, I decided to create a platform that connects refugee and German academics (www.chance-for-science.de). The site was incredibly popular—with volunteers. Yet not a single academic refugee registered. So I decided to visit the camp and search for refugee scientists myself.

As I walk through the crowds, I meet craftsmen, farmers, and families who have lost their homes. Most of them do not speak any German or English. People are confused about why I am here, and I begin to feel helpless. But then, I finally find a Syrian man who understands me. He is a polite, inconspicuously dressed, middle-aged man. His wife stands next to him. When I explain the purpose of my visit, he says, "Help me, I have nothing left but my diploma." I am bewildered and touched. He could bring only essentials on his journey, and his diploma was among them. I talk with him and tell him about the website. Then I move on to meet others.

With the help of personal outreach, the Chance-for-Science site now has more than 150 refugee users who have a way to connect with fellow scientists. I hope more scientists will open their arms to refugee academics. We can make extraordinary contributions at a personal level by recognizing refugee professors and scientists as professionals and thereby giving back at least a small part of their identity. Treat them like colleagues: Invite them to your institution, give them access to scientific material, and exchange research ideas. If you can't reach them in person, use Skype or write letters. It is easy. It does not cost money, just a little time. You only need to do it.

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Giving refugees a chance

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