

Statement of Ali Behbahani
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before the U.S. Senate Small Business Committee on
“Searching for Capital: How Venture Capitalists and Angel Investors Fund Entrepreneurs
and Startup Companies”

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Chairman Vitter, Ranking Member Shaheen, good morning, and thank you for the opportunity to testify before the Senate Small Business Committee. My name is Ali Behbahani and I am a Partner at New Enterprise Associates, where I help build biopharmaceutical and medical device companies to solve our nation’s most serious health challenges.

My goal today is to give the committee an understanding of how the relatively small venture capital industry is making an outsized impact on American’s health and why it is critical that this industry be supported by policymakers so we can continue to help Americans live longer, happier lives.

It’s often said that there is “nothing new under the sun.” But to paraphrase venture pioneer Bill Draper, venture capitalists reject that sentiment out of hand. The essence of a venture capitalist is to *find* what’s new and work to deliver it to the country. The world’s first biotech company, Genentech, was created in 1976 by a venture capitalist and a professor at the University of California, San Francisco. Today, that connection between venture and scientists who want to commercialize their discoveries continues as we jointly take on lymphoma, multiple myeloma, sickle cell disease, cystic fibrosis, multiple sclerosis, and many other horrifying afflictions or diseases. Beyond medical innovation, venture capital is at work creating the industries of tomorrow, like 3D printing, nanotechnology, robotics, clean tech, virtual reality, and the Internet of Things.

Despite the success of so many venture-backed companies, some wrongly believe that venture capitalists merely write a bunch of checks and hope that one or two of their investments hit it big. But nothing could be further from the truth. As a life science VC, I partner with scientists and entrepreneurs at the earliest stages of an idea and am actively involved as the company grows and prospers. Great companies are built by a team that includes the startup leadership, scientific founders, advisors, industry partners, and venture capitalists. You need *all* of these key ingredients to build an innovative company.

The venture model is a true “Made in America” product and is intertwined with the success of countless companies and many industries. This tremendous economic impact is being shared across the country. Over the years, California, New York, and Massachusetts have received significant VC-funding, but from 2010 to 2015, 8 states have experienced faster growth rates in VC funding, including Nebraska and Michigan.¹ 133 Metropolitan Statistical Areas across 46

¹The eight states with the fastest growth rate are Nebraska (43%), Missouri (20%), Tennessee (18%), New Mexico (15%), the District of Columbia (13%), Utah (12%), Michigan (12%), and Maine (11%), whereas California had a

states received venture funding that backed more than 1,400 companies.² For example, when we started Arcellx, a next generation immune cell therapy company focused on cancer, we decided to base the company in the Maryland area to draw on vast scientific talent in this area. The venture industry is incredibly proud that entrepreneurial ecosystems are popping up nationwide and providing your constituents with high-paying and rewarding jobs.

What is really exciting is that when a venture capitalist succeeds, a few things happen: the country get the benefit of a new industry or company; your constituents get high-paying and rewarding jobs; and investors into venture funds gain a sizeable return on their investment. These investors include educational institutions, charitable organizations, and pensions in many of your states. And more significantly we help bring forth new drugs and devices that can transform how medicine is practiced.

Simply put, when venture capital does well, the United States does well too.

All of this innovation is made possible by the relatively small venture capital industry. Consider this: in 2015, the entire venture capital industry was composed of \$165 billion in assets under management and deployed \$59 billion in risk capital to startups in the United States. That is a lot of money, except when you compare it to other asset classes like hedge funds, which had approximately \$2.3 *trillion* under management in 2015. Venture packs a mighty punch for its weight, but it often gets overlooked.

In 2015, biotechnology companies raised \$7.6 billion in venture funding, which is the highest annual investment total for biotech ever. 121 biotech companies raised venture funding for the first time in 2015. As a result, today we have a level of science that is the strongest it has ever been and we are well positioned to continue to make transformative discoveries in the future. Advances in bringing forth and developing new cutting edge technologies like gene editing, immune cell therapy, and the microbiome, would not be possible without such investment.

However, we can't take our leadership position for granted. Venture was invented in America because we have the right blend of public policy priorities that enables capital to be tied up in risky startups for long periods of time. In the case of a new drug, that could be a decade or more. Let me take a few minutes to explain what policies Congress must support going forward in order to sustain U.S. leadership in biotechnology.

Basic research

A foundation to ensuring a prosperous life science industry is a strong federal commitment to basic research funding. Our nation's commitment to basic research is viewed as a precious jewel among other nations. Unfortunately, U.S. investment in basic research as a percentage of our federal budget has declined to levels not seen since the 1950s. I encourage Congress to include

growth rate of 4%, New York at 10%, and Massachusetts at 2%. Note: this ranking only includes those states that had at least 10 deals in 2015.

² "Yearbook 2016," National Venture Capital Association, *available at* [file:///C:/Users/jeff.farah/Downloads/NVCA-Yearbook-2016%20\(4\).pdf](file:///C:/Users/jeff.farah/Downloads/NVCA-Yearbook-2016%20(4).pdf).

robust funding for basic research that can keep the United States a leader in innovation in an increasingly competitive global economy.

Recently, the National Venture Capital Association (NVCA) supported the *American Innovation and Competitiveness Act*, which was introduced by Senators Gardner and Peters, two members of this committee. Their commitment to basic research funding and technology commercialization efforts is commendable. In addition, NVCA supported the *SBIR and STTR Reauthorization and Improvement Act*, introduced by Chairman Vitter and Ranking Member Shaheen. Venture-backed startups that received SBIR funding continue to make incredible contributions to our economy and I hope SBIR and STTR are reauthorized in the very near future.

Drug pricing

As I mentioned, new drug discovery is time-consuming and incredibly difficult work, which requires bringing together scientists, doctors, and researchers with significant financial investment in a high-risk endeavor to find a cure or treatment for previously intractable diseases. Development of new prescription drugs is also incredibly expensive. According to the Tufts Center for the Study of Drug Development, the cost of creating a single prescription drug that gains approval is pegged at \$2.6 billion, a 145 percent increase from 2003.³ It is also risky, as a mere 12 percent of drugs entering clinical trials receive approval after a more than ten-year process.

In most cases, truly transformational drugs are the result of early investment by venture capitalists in small firms with a big idea on how to revolutionize health. These small biotechnology companies accounted for 64 percent of newly approved drugs in 2015 and comprised more than half of all Food and Drug Administration (FDA) approvals since 2008.

Venture capitalists invest in these small startups understanding that it will take many years for a new drug to make its way through the complex maze of the government approval process. Even when the drug does make it out unscathed, the odds of success are extremely low. But in a small percentage of cases a drug is a real breakthrough and results in better care for patients. Successful drugs subsidize significant losses from other drugs and are a reality of new medicine discovery. This win-win formula has led to groundbreaking treatments and cures for the most deadly and costly diseases.

The cost of prescription drugs has been a focus of policymakers recently, due in large part to price gouging by some bad actors. Policymakers are right to work towards solutions to make drugs affordable for all Americans. But they must recognize that U.S. medical innovation is the envy of the world and should continue to be promoted.

As policymakers work to make medicine more affordable, I encourage you to distinguish the naked greed of some individuals from crucial, long-term investment by venture capital firms in life-saving drugs. Bad actors are providing no value for patients when they buy up the rights to

³ “Cost to Develop and Win Marketing Approval for a New Drug Is \$2.6 Billion,” Tufts Center for the Study of Drug Development, available at http://csdd.tufts.edu/news/complete_story/pr_tufts_csdd_2014_cost_study.

prescription drugs and then aggressively escalate prices. Venture capitalists, on the other hand, advance health care by identifying promising early-stage drugs and providing critical investment that funds research and the creation of life-saving medicines that may one day be available to patients.

Blunt policy instruments, such as price controls, should be avoided when dealing with drug pricing. A short-sighted response such as this would be disastrous to small companies who rely on private funding to develop lifesaving treatments and thus hamper new drug development.

Life science VCs are particularly sensitive to government action because our investment focus is considerably more regulated than other areas of the economy of which venture has traditionally invested. As you consider health care policy I hope you will understand that poor public policy choices can have the consequence of driving investment to other areas of the economy. In the case of life science, those policy choices will cause long-term harm to American's health as we will see capital investment flow away from medicine in the same way it's flowed away from medical device companies. This would be a disaster for medical innovation and the health of our citizenry.

Regulatory stability

The decision to deploy capital to life sciences startups is directly impacted by regulatory decisions and the behavior of regulatory bodies. For example, just five years ago, difficulties faced by U.S. companies trying to open new investigational clinical trials due to changes at the FDA drove many medical device companies to pursue clinical development and regulatory approvals outside of the United States. Thus, often people outside the U.S. had access to novel medical therapies many years before U.S. citizens did. Recent changes in tone at the FDA, led by Dr. Jeff Shuren, and new programs like the Expedited Access Program, aimed at bringing new therapies for life-threatening diseases to the U.S. market faster, have led to a dramatic shift in the desire of medical device companies to pursue clinical trials and approvals in the U.S. Government initiatives like the Orphan Drug Act, the GAIN Act, and accelerated approval pathways for oncology has not only helped bring new drugs for rare diseases, infectious diseases and oncology to the market faster, but it has led to a significant increase in venture investment in these therapeutic areas.

For the sake of future medical innovation, it is imperative that the FDA not retreat from the progress it has made. I encourage all of you to support the FDA in this regard.

Patent protection

For life science investors, strong patent protection is absolutely essential because it gives us confidence to know that the invention we are investing in will be protected. It is important to understand that in the life sciences our investment is tied up for a decade or longer in a technology where we must pour millions of dollars to get to FDA approval and which produces zero revenue. If investment is not protected through a strong patent protection system that acts as a deterrent on infringement, further investment in patent-reliant medical innovation and technology will decline.

I appreciate this committee's attention to how patent reform would affect startups, such as through your hearing on pending "patent troll" legislation in 2016. Unfortunately, the *Innovation Act* (H.R. 9) and the *Protecting American Talent and Entrepreneurship (PATENT) Act* (S. 1137) contained provisions that would raise the cost and risk of patent litigation for all companies, making it harder for startups to enforce their rights. Specifically, both bills contained an overly broad fee shifting standard that gives a significant advantage to entrenched incumbent companies and even large patent trolls that have the financial resources to engage in litigation in ways startups cannot match. Furthermore, the bills set an alarming precedent of putting not only startups on the hook for legal fees if they lose in patent litigation, but also their venture capital investors if the startup goes bankrupt. As I detailed earlier, venture is inherently a risky investment, and we understand that in many cases our investment will not pan out and we will lose all our invested capital. But the idea that the corporate veil would be pierced and we would lose *more* money above-and-beyond our investment is completely unacceptable. I strongly encourage Congress not to increase the risks of investing in patent reliant startups.

Should Congress return to patent troll legislation next year, I encourage you to consider strongly how proposed changes to patent law will affect medical innovation in this country.

Conclusion

Thank you again to Chairman Vitter and Ranking Member Shaheen for calling this important hearing. On behalf of our nation's venture capital investors and the entrepreneurs they support, I greatly appreciate your attention to how VCs are bringing the future to the lives of Americans. I am confident that with your support we can continue to improve health and well bring for generations to come.