GOING FURTHER TOGETHER

How the Black River Innovation Campus (BRIC) Is Building Partnerships to Inspire Technology and Entrepreneurship in Rural Vermont

PRESENTED BY

Siegel Family Endowment

We are a foundation focused on understanding and shaping the impact of technology on society.

About Siegel
Siegel Family Endowment employs an inquiry-driven approach to grantmaking that is informed by the scientific method and predicated on the belief that philanthropy is uniquely positioned to address some of the most pressing and complex issues facing society today. Our grantmaking strategy positions us to be society’s risk capital. We support high quality work that will help us derive insights to timely questions and has high potential for future scale. Our focus is on organizations doing work at the intersection of learning, workforce, and infrastructure. We aim to help build a world in which all people have the tools, skills, and context necessary to engage meaningfully in a rapidly changing society. Siegel Family Endowment was founded in 2011 by David Siegel, co-founder and co-chairman of financial sciences company Two Sigma.

Our Focus on Equitable Innovation Economy
We believe that innovation—whether it is technologically or organizationally driven—can happen anywhere, in any industry, region, or community. However, the foundations that support innovation are not accessible to everyone. We’re asking how to bring innovative capacity closer to those who are now left out and make the rewards of innovative ideas accessible to everyone. As such, our vision is to promote an equitable innovation economy, one that enables all people and their communities to achieve prosperity.

Community-Driven Innovation
Many communities have systems in place to generate growth: skilled workers, high quality universities, entrepreneurial spirit, quality of life, ample infrastructure, and a base of venture capital that can turn new ideas into profitable companies. However, not everyone within these communities participates in or benefits from rapidly growing, innovative sectors. Not all communities become high-performance hubs, and not every hub emerges organically. Creating more equitable innovation in these communities would mean changing the systems that support innovation, so that more people are included in, and benefit from, rapidly growing and innovating sectors.
ABOUT BRIC

The Black River Innovation Campus (BRIC) in Springfield, Vermont is the hub of an emerging tech ecosystem in the heart of Vermont’s “Precision Valley,” named for the engineering and design prowess in the machine tool industry that once dominated the area.

BRIC features a physical co-working space that offers support for emerging tech-related businesses including “coffee and bagels Wednesdays,” a state of the art recording studio, conference rooms, an auditorium, and a 10G fiber connection—far faster than regions whose populations dwarf this rural community. BRIC also offers a business incubator that supports emerging entrepreneurs through training, partnerships, and access to early stage investment. BRIC works with governmental entities, nonprofits, businesses, and educational institutions to usher in a new era of innovation and sustainable growth in the Precision Valley and serves as a visible example of “placemaking” for Springfield’s Downtown.

At the heart of these activities is a commitment to lifting up a once economically vibrant community that has struggled with the exit of manufacturing operations and jobs over the last four decades. BRIC does that through its focus on people and commitment to inclusivity:

- Tech entrepreneurs compose BRIC’s Actuator, a program that features a homegrown business and lifestyle curriculum and that seeks to connect entrepreneurs with partners in the Springfield region who can advance their work.

- BRIC community members benefit from the water cooler conversations they have as members of BRIC’s co-working space. Game nights, networking events, battle of the bands, and other gatherings strengthen social infrastructure in Springfield and the tech ecosystem that is being developed in the community.

- Local institutions—including institutions of higher learning and K-12 schools—partner with BRIC to develop opportunities for emerging tech entrepreneurs as well as creating programs to train students and area residents on skills needed to succeed in the 21st century economy.
ABOUT GRANTEE

The Black River Innovation Campus (BRIC) is a non-profit designed to empower, inspire, and support rural Vermont through technology and entrepreneurship. To do so, it relies on a network of partners—many of them situated in institutions of higher education throughout the region. BRIC’s relationship with the Center for Entrepreneurship at Dartmouth College’s Tuck School of Business has extended in both directions, with BRIC staff sharing their expertise with students on-campus, students developing businesses through the Actuator program, and Center staff serving as advisors to BRIC. The Vermont Manufacturing Collaborative, a public-private partnership housed within Vermont State University at Randolph, offers entrepreneurs in the Actuator program training and access to materials and tools for advanced manufacturing techniques and technologies. Actuator sessions are sometimes hosted at the Vermont Manufacturing Collaborative and staff is on hand to offer technical help to the participants.

EXECUTIVE SUMMARY

A tech entrepreneur in BRIC’s Actuator program is developing a product that could benefit from access to a variety of manufacturing processes including high-end 3D printing technology. A BRIC staff member reaches out to Barry Hulce, the executive director at Vermont Manufacturing Collaborative (VT-MC), and before long, the Actuator member is working with VT-MC engineers and technicians at the Advanced Manufacturing Center to design, construct, and test the new product. As Hulce puts it, “BRIC finds people that want to turn their idea into something physical and VT-MC helps with that.” In assisting with that process, Hulce is helping his advanced manufacturing staff develop valuable skills and employer networks that will improve career options.

An MBA student at Dartmouth College’s Tuck School of Business has never heard of Springfield, Vermont—let alone thought of establishing a business there. But the student is intrigued after meeting a BRIC staff member who serves as a judge for a business plan competition at Tuck’s Center for Entrepreneurship. The staff member describes ultra high-speed internet, hip co-working spaces, and a cutting-edge curriculum for tech entrepreneurs. The student ultimately participates in BRIC’s Actuator program. While the student isn’t sure how long she’ll call Springfield her home, she tells her peers about the amazing opportunities there and considers talent from the region for her emerging business.

These are both examples of how BRIC is cultivating relationships with partners who can help advance its mission of empowering, inspiring, and supporting rural Vermont through technology and entrepreneurship. Local partnerships can add tremendous value by offering material resources, expertise, facilities, and other elements. They are located nearby and have their own physical infrastructure, offering opportunities to build connections and joint programming, and to pursue funding opportunities together. And their staff have particular areas of expertise that can be leveraged to improve BRIC programming and reach, solidifying the organization as a cornerstone to the economic revitalization of the Springfield area.
CORE ELEMENTS: WHAT MAKES THE PROGRAM WORK?

BRIC PURSUES NUMEROUS partnerships with a myriad of groups, from the local K-12 public school system, to NASA Goddard, to the U.S. Department of Labor. Close, two-way partnerships with groups housed within institutions of higher learning have been among the most impactful for BRIC. While partners such as Vermont Manufacturing Collaborative (VT-MC) and Tuck’s Center for Entrepreneurship at Dartmouth College don’t typically offer funding for BRIC’s work, they provide resources that are just as—if not more—important: people who are committed to BRIC’s goals and who have valuable skills and relationships to offer; tools, technologies, and other resources that can be leveraged for the benefit of BRIC’s cadre of emerging entrepreneurs; and equal commitment to improving the quality of life and economic vitality of the Springfield region.

ALIGNING GOALS BETWEEN PARTNERS

VT-MC AND TUCK’S Center for Entrepreneurship don’t always have the same exact goals as BRIC. VT-MC focuses on advancing technology-enabled manufacturing and associated workforce readiness, whereas BRIC’s entrepreneurs embrace a range of technologies and approaches. For its part, Tuck’s Center for Entrepreneurship aims to support Tuck business students who are interested in learning more about or are actively pursuing entrepreneurial ventures—regardless of where those entrepreneurs ultimately set the physical location for their businesses. Meanwhile, BRIC focuses on building a vibrant ecosystem for entrepreneurship in Vermont’s Precision Valley, in particular.

Yet, even though they don’t have the same exact goals or support the same exact groups, BRIC, VT-MC, and Tuck’s Center for Entrepreneurship are all unified in a singular vision: promoting entrepreneurship in ways that lift up the larger community and promote economic growth. That unified vision has allowed BRIC and its partners to be strategic in identifying specific ways of working together that benefit both parties.

For example, Eileen O’Toole, director of Tuck’s Center for Entrepreneurship, often urges students who are a part of Tuck’s own incubator program to apply to BRIC’s Actuator program. She says, “BRIC offers a different pool of mentors and advisors than students would necessarily see through us. It’s a good opportunity for students to grow that network and grow access.” The value is mutually reinforcing, with students adding their expertise and skills to the Actuator community, and students receiving valuable experience and learning in-between. O’Toole says that the Center for Entrepreneurship’s connection to BRIC “shows the resources that are here locally.”

There are also clear benefits to BRIC as it promotes investment in rural communities. While not every entrepreneur will decide to stay in the region, they are primed to consider settling in parts of the country they might not have previously considered. O’Toole reflects, “I see more students looking at smaller to mid-size cities; eventually that growth can continue into rural areas.”

BUILDING AND LEVERAGING PERSONAL RELATIONSHIPS

PARTNERS AND BRIC STAFF agree that one of the reasons why their work together is successful is because they have close personal relationships with one another. Relationships have been built over time, and continue to deepen and evolve. Crucially, these

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- Eileen O’Toole, director of Tuck’s Center for Entrepreneurship
relationships can be tapped in different ways, at different moments, in order to fulfill evolving needs. At times, collaboration might be intense, and at other times less-so. But what remains constant is the relationship itself.

Hulce says that the fact that he knows BRIC’s mission and staff well, has made it easy to offer suggestions about where his expertise can be useful. For example, apart from his current work at VT-MC, Hulce has a graduate degree in technology entrepreneurship and has years of industry experience in manufacturing and as a tech entrepreneur himself. Because BRIC staff are aware of his background, they are able to engage Hulce as a presenter and mentor in the Actuator program. Hulce says, “It just happens that some of the work I’ve done in the past is exactly what BRIC is helping businesses to go through now. Because I have some personal experience, I’m happy to offer insights to those now on that journey.”

O’Toole says that the close personal relationships that she has built with BRIC staff have also allowed them to build better programming and to consider more innovative ways of working together than otherwise would have been possible. “They’re just genuinely good people. They’re experienced, they’re motivated, and they really want to have an impact for the people that they’re trying to help,” O’Toole says. “That makes all the difference in the world when you’re trying to partner.” O’Toole says that she’s able to lay out some of the goals that she’d like to achieve, run them by BRIC staff, and see if there are possible ways to work together to achieve them. Alternatively, O’Toole might hear about a new initiative—such as BRIC’s program with NASA Goddard—and ask if there are ways that the Center for Entrepreneurship might be involved. Because their relationship is so strong, O’Toole can count on BRIC staff to be honest about whether a partnership might work, and to brainstorm multiple approaches if a partnership is worth considering further.

BUILDING AN EFFECTIVE ECOSYSTEM MODEL FOR RURAL COMMUNITIES

BRIC STAFF AND LEADERS of its partner organizations agree that rural regions are particularly well-positioned to benefit from partnerships. In communities like Springfield, resources are typically spread over a wide swath of physical space. That presents a challenge for organizations that aim to revitalize a region using an ecosystem approach. But it also presents an opportunity to involve more stakeholders who are engaged with different parts of that ecosystem.

For example, Hulce explains that VT-MC utilized a federal contract to implement a manufacturing workforce development model that made sense for the unique conditions of rural communities. Hulce says that the funding was designed to answer the following two questions: “(1) What would it take to build a highly functioning manufacturing ecosystem in a small rural location? (2) Can the model be duplicated around the country?” To answer those questions, Hulce says that VT-MC has focused on developing a host of partnerships that aim to support the full needs of workforce development that VT-MC cannot deliver, such as childcare and transportation initiatives uniquely built for rural locations.

Hulce explains that BRIC is part of this uniquely rural ecosystem. It offers opportunities for community members to work remotely with high-speed internet. At the same time, it creates opportunities for community gatherings that bring together stakeholders across a wide swath of physical space. And the businesses developed through BRIC’s Actuator program draw on a range of partners and services that are cultivated by BRIC staff. Eileen O’Toole says that BRIC’s impact in developing a sustainable, rural technology and entrepreneurship ecosystem and community cannot be overstated. “BRIC is the glue,” O’Toole explains.
IMPACT

THE VALUE OF PARTNERSHIPS is notoriously difficult to measure. It involves guessing what impact an organization would have had without the partnership and identifying the amount of time and resources spent on the partnership. It also involves simultaneously looking across multiple areas of impact across multiple organizations in both the short- and long-term.

As just one example of this challenge, consider the partnership between BRIC and the Tuck School of Business’ Center for Entrepreneurship. Examining impact would involve answering many questions: Did the students from Tuck’s Center for Entrepreneurship who participated in BRIC’s Actuator benefit from the experience? In what ways? Were they able to bring what they learned back to campus? How did it benefit other students whom the participating students touched? Did the presence of these students enrich the Actuator cohort? Did the businesses that those cohort members create generate value for the Springfield region? Did BRIC benefit from sending its staff members to serve as mentors or competition judges for Center for Entrepreneurship-sponsored programs on the Tuck campus? In what ways? Did students benefit from these experiences? In what ways? Are there easier ways such that outcomes could have been achieved? Were these results dependent on the partnership? The list goes on and on.

Because the value is so challenging to measure, BRIC and its partners look for impact in subtler ways. O’Toole says that she often tries to parse “non-metric metrics.” By that term, O’Toole means informal conversations that she has with students where she can understand how a program or approach touched a student. “Those types of data points are quite valuable,” O’Toole reflects. She sometimes hears students say that they didn’t know anything about the Springfield location before their engagement with BRIC. But perhaps they are considering Springfield or another community like Springfield for starting or continuing their business after graduation.

Hulce says that he, too, looks for ways of measuring the engagement’s full value, including the longer-term impacts that aren’t obvious during a project. When businesses use VT-MC’s services and tools, Hulce evaluates whether VT-MC was able to create or improve designs, make products more efficient, or reduce a manufacturer’s production costs. He also looks for benefits to the workforce itself as he aims to offer exciting learning opportunities to people who haven’t envisioned themselves in advanced manufacturing. Hulce says that BRIC is a critical resource for advancing those impacts by helping aspiring entrepreneurs explore their business ideas and by cultivating community among those involved in the tech sector, in the greater Springfield area and beyond.

For its part, BRIC sees the impact of its partnerships with VT-MC and Tuck’s Center for Entrepreneurship as invaluable. Chris Maggiolo, BRIC’s director of development, operations, and finance, says, “BRIC’s mission is to empower, inspire, and support rural Vermont through technology and entrepreneurship, but we can’t do this alone. We must listen to and engage the community to create events, further economic growth, and strengthen a sustainable, rural ecosystem.”

According to Maggiolo, Hulce and O’Toole have been critical advisors to BRIC and have collaborated on a range of programs that wouldn’t have been possible without their partnership. Maggiolo reflects, “Working with Eileen and Barry, with Tuck and VT-MC, we begin to see what a thriving entrepreneurial ecosystem looks like for our rural region.”

NEXT STEPS

BRIC IS SEEKING TO EXPAND and deepen its partnerships, particularly with organizations that are similarly committed to pursuing an ecosystem approach to technology and entrepreneurship in rural communities:

- **Individuals** in the Springfield area can [apply](#) to be part of the Actuator program to develop a business idea and launch a business.
- **Businesses** who are interested in being a part of the BRIC community by drawing on local talent, offering remote working options to Springfield-area employees, or locating their offices in Springfield can reach out to BRIC at [chris@bricvt.org](mailto:chris@bricvt.org).
- **Prospective mentors** from any location who would like to serve as advisors to BRIC’s Actuator participants should contact BRIC at [actuator@bricvt.org](mailto:actuator@bricvt.org).
- **Interested institutions of higher learning and other potential partners** should reach out to BRIC to see how they can get involved at [chris@bricvt.org](mailto:chris@bricvt.org).
- **Communities** looking to apply some of the best practices from BRIC to their own hometown endeavors can contact [innovate@bricvt.org](mailto:innovate@bricvt.org).
- Learn more about BRIC’s work on their website: [www.bricvt.org](http://www.bricvt.org)

To learn more and contact Siegel Family Endowment, visit [www.siegelendowment.org](http://www.siegelendowment.org)