



**SPARK
CLEANTECH
ACCELERATOR**



UT Research Park at Cherokee Farm

2730 Cherokee Farm Way
Suite #203 Knoxville, TN 37920

www.tnresearchpark.org/spark/accelerator

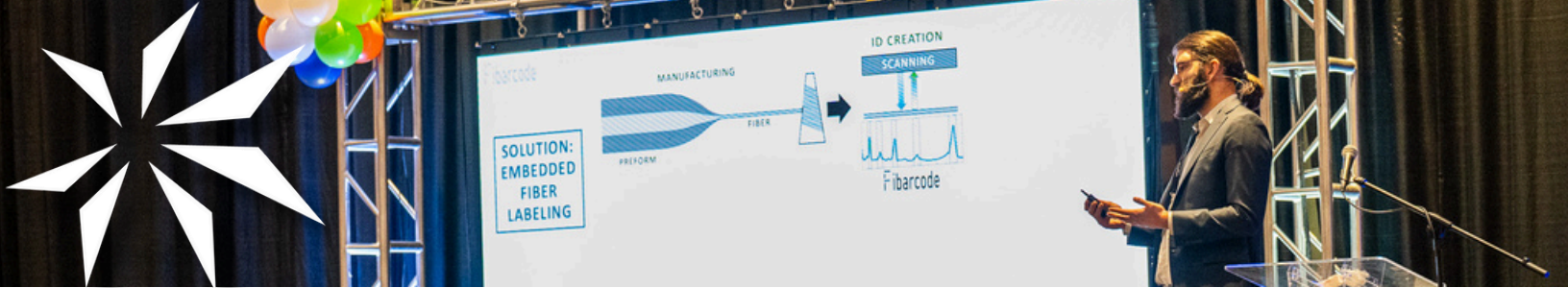
sparkcta@tnresearchpark.org

The Spark Innovation Center is an early-stage business incubator and accelerator that offers a comprehensive set of services to support promising technology companies



RESEARCH PARK AT
CHEROKEE FARM





01

Our Mission

To support early stage cleantech businesses and drive commercialization of their technologies by leveraging the unique science and technology resources of East Tennessee.

02

What We Do

Recruit the best in-class cleantech companies to invest and deploy their technologies in Tennessee.

Nurture the development and deployment of those companies and their products and/or services.

Ensure the inclusion of promising underserved entrepreneurs, including women, people of color, and veterans.

03

Eligibility

- Application from Tennessee, the Midwest, and beyond.
- Companies that show strong market potential and defensible intellectual property, with issued patents or pending patents filed.
- Those who demonstrate their technology can support the challenges and needs of Spark partners.
- Those that create software or hardware technologies including intelligent connected devices, advanced materials process, with a Technology Readiness Level (TRL) 2-6.
- Applicants who are open to Tennessee as a permanent business location.

04

Technology Interest Areas

- Renewable Energy Generation
- Energy Storage & Integration
- Energy Efficiency
- Advanced Nuclear Solutions
- Carbon Capture
- Alternative Fuels
- Grid reliability, resiliency and stability
- Future Mobility
- Circular Economy
- Sustainable Agriculture
- Built Environment

05

2025 Spark Cleantech Accelerator Schedule

- | | |
|----------------------|--------------------|
| • March 3rd | Applications Open |
| • May 16th | Applications Close |
| • August 25th | Accelerator Begins |
| • Nov. 19th | Demo Day |

06

Company Acceptance Criteria

- Evidence of customer discovery, market validation, and interest.
- Understanding of the competitive landscape and market forces.
- Dedicated founder and qualified advisors.
- A passion for developing and growing their business in Tennessee directly or through supply chain partners in the state.





WHAT WE OFFER

This is more than an accelerator; it's a launchpad for your cleantech vision, equipping you with the tools you need to succeed and differentiate yourself in a competitive market. Apply now to be part of a journey that transforms your innovative idea into a market-ready, investment-attractive cleantech venture.

1

Stipends

A \$15,000 equity-free stipend to help defray travel and living costs and to support business and technical milestones.

2

Prototyping support

Prototyping support through programming, and partnerships with the University of Tennessee.

3

Mentoring

One-on-one support from our experts in business, market analysis and positioning, IP/patent strategy, product design, engineering, prototyping, testing, materials selection, and manufacturing.

4

Connections

Connections with customers, investors, strategic partners, suppliers, universities, and national laboratories.

5

Training

Group trainings, workshops and on-on-one support.

6

Partnerships

Opportunities for strategic partnerships with organizations such as the [Tennessee Valley Authority](#), the [University of Tennessee](#), [Oak Ridge National Lab](#), the [City of Knoxville](#), and members of the [Tennessee Advanced Energy Business Council](#).





CURRICULUM

The Spark Cleantech Accelerator curriculum focuses on four key areas, with a tangible deliverable associated with each: **Product**, **Business Model**, **Finance**, and **Pitch**.



Product

What we sell



Business Model

How we make \$



Finance

How we raise and manage \$



Pitch

How to tell the story

01

Product

Deliverable: Minimum Viable Product (MVP) or outline a clear roadmap to MVP

- Focus on defining & creating basic product
- Quick testing & validation of business idea
- Rapid prototyping physically or virtually
- Mitigate capital intensity to prove the concept if applicable

02

Business Model

Deliverable: Business Model Canvas validated by customer discovery, Go-to-Market Plan

- Formalize vision, mission & strategy
- Value proposition to target customer
- Understand how to make money and generate ROI
- Customer discovery
- Pricing, channels, sales strategy & marketing

03

Finance

Deliverable: Basic Financial Model

- Understanding of costs, cost structure, and revenue streams
- Understanding of funding options (dilutive and non-dilutive)
- Funding strategy
- Learn to speak to financial projections & strategy

04

Pitch

Deliverable: Public pitch at Demo Day

- Story telling
- Pitching to customers
- Pitching to investors
- Public speaking
- Slide and graphic design
- Lots of practice!





Meet the Spark Innovation Center Team

Brett Malone

President and CEO

Cherokee Farms Development Corporation

<https://www.linkedin.com/in/brettmalone>

✉ brett@tnresearchpark.org

Before joining CFDC, Dr. Malone served as President and CEO of the Virginia Tech Corporate Research Center, where his visionary leadership transformed a 200-acre campus into a thriving research ecosystem. His leadership at the UT Research Park helps guide research innovations, key collaboration between academia and industry, and commercial tenants in the park.



Lilly Tench

Director of the Spark Innovation Center

<https://www.linkedin.com/in/lillytench>

✉ lilly@tnresearchpark.org

Over the past ten years Lilly has supported entrepreneurs working to develop solutions in key global industries from energy to agriculture. Lilly has a BA in Peace and Social Justice from Berea College, an MBA, and an MS in Agricultural and Natural Resource Economics from the University of Tennessee.

Carol Seamons

Spark Expert-in-Residence

<https://www.linkedin.com/in/carol-seamons-01bbab15>

✉ carol@tnresearchpark.org

Previously a private banker with FirstBank in both Knoxville and Memphis. Carol is a former investment banker whose financial work over the last 25 years has included capital markets origination and strategic consulting to non-profit organizations with Consilience Group.



Bill Malkes

Spark Expert-in-Residence

<https://www.linkedin.com/in/malkes>

✉ bill@tnresearchpark.org

Bill is a serial entrepreneur who has founded companies in industries such as integrated circuit design, mobility innovation and biotech, with several successful exits. He is currently the CEO of NellOne Therapeutics.





Aaron Stone

Marketing and Admin. Coordinator, UT Research Park

<https://www.linkedin.com/in/riedester>

✉ riede@tnresearchpark.org

Aaron joined the UT Research Park in February of 2024. He is currently the main handler of all UTRP social media accounts, and a marketing creative in support of Spark projects. Any administrative and logistical needs are facilitated through him.



Lillian Lovingood

Spark Program Manager, UT Research Park

<https://www.linkedin.com/in/lillianlovingood>

✉ lillian@tnresearchpark.org

With a BS in Environmental Science, an MA in Environmental Sociology, and 7+ years in non-profit work, Lillian brings expertise in project management and strategic planning. She currently supports Spark programming, focused on advancing clean tech startups, by managing events and program delivery to drive regional innovation and growth.



Mallory Jenkins

Strategic Partnerships Manager & Program Manager, Piper

Communications & Tennessee Advanced Energy Business Council

Mallory serves as the Energy Network Program Manager for the Tennessee Advanced Energy Business Council where she leads the execution and growth of the Energy Network to foster the growth of advanced energy companies and technologies and establish strategic partnerships with established, private sector advanced energy companies and research institutions.





FUNDING SUPPORT



U.S. DEPARTMENT OF
ENERGY



Launch
Tennessee



Truist Foundation



Appalachian
Regional
Commission



TAEBC



CITY OF KNOXVILLE



THE UNIVERSITY OF
TENNESSEE
KNOXVILLE

PROGRAMMING SUPPORT



T **TICKLE**
COLLEGE OF ENGINEERING
CENTER FOR MATERIALS
PROCESSING



HASLAM
COLLEGE OF BUSINESS
THE UNIVERSITY OF TENNESSEE, KNOXVILLE



TAEBC



SPARK
INNOVATION
CENTER

INNOVATION
CROSSROADS
OAK RIDGE NATIONAL LABORATORY



KNOXVILLE
CHAMBER

HEARTLAND
CLIMATE TECH PARTNERSHIP



PIPER
COMMUNICATIONS

MORRISON
FOERSTER

MARKET
SQUARE
VENTURES



KNOXVILLE
Entrepreneur
Center



THE UNIVERSITY OF
TENNESSEE
KNOXVILLE

INSTITUTE FOR
ADVANCED MATERIALS
AND MANUFACTURING



Highlighted Partnerships

Support from the University of Tennessee is crucial to the unique Spark value proposition. UT provides Spark entrepreneurs with access to student interns, select facilities, research expertise, and lab space for Spark Incubator members.



The Spark Innovation Center is proud to partner with the Tennessee Valley Authority (TVA), the largest public utility in the country. The partnership with TVA includes facilitated access to TVA experts, exploration of potential pilot opportunities, and connections with TVA industry partners.

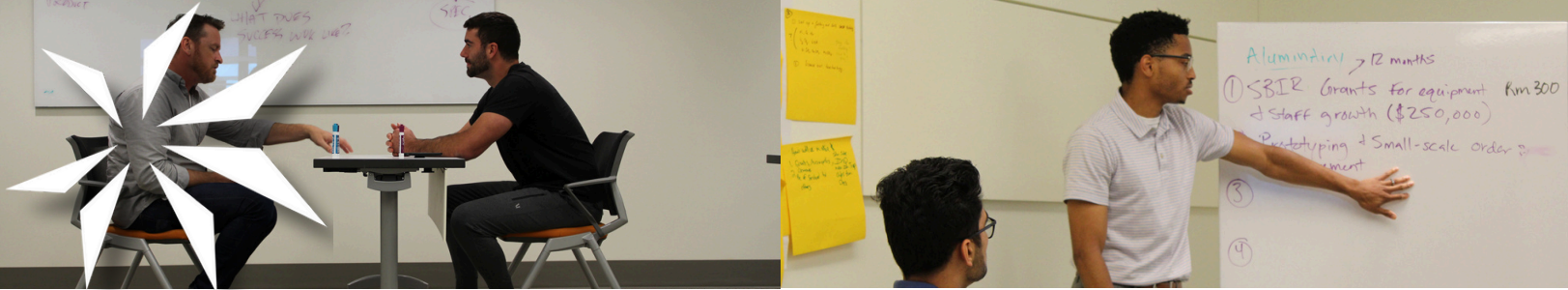
The Spark Innovation Center partners closely with Oak Ridge National Lab through engagement with the Innovation Crossroads Program. Innovation Crossroads innovators go through the Spark Cleantech Accelerator alongside the 6 selected Spark companies, creating a unique community of deeptech entrepreneurs.



The City of Knoxville generously provides stipends to Spark Cleantech Accelerator participants as well as connections and opportunities throughout the city.

The Tennessee Advanced Energy Business Council (TAEBC) provides invaluable industry mentorship to Accelerator participants through access to their statewide industry mentor network. Spark and TAEBBC also collaborate to combine the Accelerator Demo Day with the annual TAEBBC Opportunities in Energy event.





FREQUENTLY ASKED QUESTIONS

Refer below to the most commonly asked questions. Should you have questions in excess of those provided, please reach out to us!

Email: SparkCTA@tnresearchpark.org

Webpage: <https://www.tnresearchpark.org/spark/accelerator/>

Application: <https://www.f6s.com/spark-cleantech-accelerator-cohort-4>

What is the Spark Innovation Center?

The Spark Innovation Center is an initiative of the University of Tennessee Research Park that leverages the unique science and technology resources of the region to help high-tech, high-impact startups grow, succeed, and stay in East Tennessee. Spark offers promising technology companies access to top-quality lab space, expert mentoring, and support services from partner organizations in the region. Since 2020, Spark has supported 40 startup companies that have collectively raised \$107 million dollars and created 168 jobs.

Where is your facility located?

The Spark Innovation Center is located in the Innovation South building at the University of Tennessee Research Park, 2730 Cherokee Farm Way Suite #203 in Knoxville Tennessee.

Will the accelerator program be held in-person or virtually?

The accelerator is an in-person program.

Can you give some examples of eligible technologies?

Eligible technologies will primarily focus on solutions, preferably hardware, that address climate mitigation, resilience and natural resource conservation including but not limited to bioenergy, buildings, energy efficiency, vehicles, fuel cell, advanced manufacturing technologies, grid modernization technologies, carbon capture, and related fossil energy innovations.



**What investments does Spark make in its accelerator companies?**

A stipend will be provided to Spark Cleantech Accelerator companies to help defray the costs of travel, living, and other company expenses. The stipend amount will be \$15,000 and can be used at the participant's discretion. Funding will be provided in three tranches, \$5K upon your arrival in Knoxville, \$5K at the midpoint of the accelerator, and \$5K at the end based on satisfactory participation in the program.

Where will we live while we're in Knoxville?

You are responsible for arranging your own housing. Stipends can be used to offset housing costs.

What is the typical day/week like for a company during the accelerator?

A typical week will include three half-days of instruction from our staff of technology and business mentors and partners. The remainder of the week will be used for development of your business plans on the topic of that week's instruction, pitch practices, one-on-one mentoring, or other area(s) that are a priority for you.

Do I have to work on my company full-time?

We prefer that you work on your company full time during the accelerator program, but understand that there may be other unavoidable time commitments. In those instances, we'll try to work with you on an alternate schedule.

What is expected of me/our team during the Accelerator Program?

We expect you and your team to be productively engaged in every aspect of the program, and to support your company's development, your fellow cohort members where possible and the program in general.



**What happens at the end of the accelerator program?**

The accelerator program will end with a “demonstration day” where participants will present their business, in a pitch format, to our network of institutional and corporate partners and investors.

Am I expected to stay in Knoxville after the program ends?

One of our selection criteria will be the applicant’s plans to bring their business, or a portion of their business (e.g., partners, supply chain companies, etc.) to Knoxville or the Tennessee region. We would love to have companies locate or relocate in this area.

How many companies will be selected to participate?

Up to six (6).

What will happen to my confidential information when I apply?

Please do not include confidential or trade secret information in your application, even if it is marked as such.

What is the role of corporate partners in the program?

We will make introductions to corporate partners of the Spark Cleantech Accelerator for technical and business mentorship both in cohort and individual instruction, pilot project development, and follow-on working relationships where appropriate.

Where do the mentors come from?

The Spark Innovation Center works with the Tennessee Advanced Energy Business Council to provide mentors through its network of industry experts. In addition, Spark engages Experts in Residence who have extensive planning, engineering, startup formation, business development, financial, successful exit, investment and incubator/accelerator experience.

