

Your Project Concept

Project title: Northwest Sustainable Innovation Alliance

Lead organization (must be a public or nonprofit entity): Portland Innovation Quadrant Inc (Phase 1), Metro (Phase 2)

Partner organization(s): Infracenters LLC, OMSI, Portland Community College, Portland State University, Oregon Health Sciences University, Portland General Electric, TRIMET, Metro, SERA Architects, Long Haul Capital Group, Technology Association of Oregon, Autodesk, Intel, Microsoft, Cisco Systems, Urban Systems, Disability Rights Oregon, City of Portland, Oregon Association of Minority Entrepreneurs, Affiliated Tribes of Northwest Indians

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Which community/communities would this project serve? Click or tap here to enter text.

Which industry cluster(s) does your project align with? (check all that apply)

- ⊠Climate tech
- \boxtimes Computers & electronics
- ⊠ Software
- □ Food & beverage
- □ Metals & machinery
- □ Athletic & outdoor
- Design & media

Which climate tech solution(s) does your project align with? (check all that apply)

- ⊠Energy
- ⊠ Mobility/transportation
- □ Food/agriculture
- □ Heavy industry
- ⊠ Built environment
- ⊠ Circular economy
- ⊠ Water quality or availability
- □ Other Click or tap here to enter text.

Budget estimate (optional):

Describe the type of technical assistance you would require if awarded funds in Phase 1 to prepare for the Phase 2 full application: Develop integrated project scope, plan, deliverables, outcomes and budget to be integrated into overall EDA plan.



Is this a Construction¹ or Non-construction project? Non-Construction

The project isn't a construction project, but it involves a construction site.

<u>Is your organization confident it can secure match dollars for implementation before 2027?</u> *EDA* requires a 20% match from private, philanthropic, or other non-EDA funds for projects. To be an eligible project, applicants must have confidence that they can secure match dollars for implementation before the full funding is distributed in 2027. **Please select your answer below.** Yes

Project concept narrative (750 word max):

The Sustainable Oregon Innovation Lab or SOIL is a place-based, sustainability-oriented innovation hub, leveraging the 23-acre, 10+ year, 4-phase OMSI regenerative development project which re-imagines the OMSI property as a living lab identifying and implementing real-world solutions to our climate challenges. SOIL leverages the region's world-renowned sustainability, transportation, and urban planning experience and ground-breaking, community-led climate change, racial injustice, and economic insecurity initiatives, resulting in outcomes like the Portland Clean Energy Fund (PCEF). The lab helps identify, quantify, examine, and facilitate solutions and remove barriers in addressing more challenging problems, whether social, political, process, or technical, creating the space for initiatives like PCEF to emerge and be successful.

SOIL turns the development into a community and learning center, innovation hub, and showcase, connecting the community's current and future needs with operational, academic, public, and private partners, sustainable data collection/analysis, formal and informal learning activities, and measurable outcomes. SOIL continues the Innovation Quadrant and builds on Portland State University's Digital City Testbed Center (DCTC).

In 2014, four of the region's primary anchor institutions, PSU, OHSU, Portland Community College (PCC), and the Oregon Museum of Science and Industry (OMSI), initiated conversations to align priorities through joint research, entrepreneurship, and workforce development to support new facilities and physical infrastructure. What began as a series of informal meetings ultimately became a significant priority of the City of Portland's adopted 2035 Comprehensive Plan and is part of the region's Comprehensive Economic Development Strategy (CEDS).

DCTC, created in 2018, uses five campus testbeds in Portland, Seattle, and Vancouver, BC, to assess novel innovation ecosystems created by startup companies, major tech firms, city governments, community-based organizations, and universities. DCTC recently received a \$150K planning grant from the National Science Foundation to use this system to evaluate why diverse communities fail to get the benefits that digital technologies can offer to help ameliorate the effects of climate change. DCTC will use this funding to prepare a \$2.5M proposal to NSF in 2022.

¹ Construction projects must be fully permitted by September 2022



Key points:

- Provides opportunities to catalyze real-world solutions to climate change challenges.
- Seeks pathways for engaging the entire community equitably in all aspects of the OMSI redevelopment.
- Aligns with <u>Portland Metro CEDS Strategy</u> (1.2C, 2.1BE, 2.2AB, 2.3A, 3.1BEF, 3.2A)
- Aligns with the <u>Oregon Innovation Plan</u> (Strategy elements 1,2 & 4)
- Will educate/train a generation of sustainability workers, climate scientists, cleantech entrepreneurs, and others over the ten years, four-phased development through relationships with Portland Community College, Portland State, the Portland Metro STEM Partnership, Oregon CTE/STEM Employer Coalition
- Leverages innovation relationships with Built Oregon, Portland Incubator Experiment, and Autodesk
- Prototype for (4 other) labs around the region
- Provides, through OMSI, a P-20 knowledge/education platform and a national model for cleantech innovation in action.
- Will partner with Virtulab and for commercialization and building entrepreneurial pipelines.

The context for the SOIL is the 23-acre Oregon Museum of Science and Industry (OMSI) holdings—the largest contiguous waterfront redevelopment site in Portland Central City. This district, located in an enterprise zone, is being transformed into a mixed-use, transit-oriented, walkable, highly sustainable neighborhood. An InfraCenter will serve the district. An Infracenter is an integrated web of carbon positive and resilient utility systems comprising a microgrid, district heating, thermal systems, on-site ecological water treatment, careful attention to last-mile mobility, and circular economy-based materials sourcing and management. Vital to the success of the district will be the integration of The Center for Tribal Nations—a new partnership between OMSI, tribal, intertribal, and City of Portland organizations to restore the native community's presence on the Willamette River and address our shared challenges of sustainability, resilience, equity, and inclusion. OMSI, the Affiliated Tribes of Northwest Indians (ATNI), and Prosper Portland are the responsible partners on this project and will be supported by a range of stakeholder groups and consultants. The development will take place in four phases over 10+ years.

SOIL is another step toward creating an inclusive climate-focused cluster. Project priorities are:

- Developing trusted community relationships, disciplines, and practices while embedding equity into all aspects of the OMSI development
- Collaboratively building secure, open, trusted, digital platforms to collect, report, enhance and manage both climate and equity outcomes
- Developing an innovation pipeline of research, technologies, and processes serving the community and world market that facilitate regenerative ecosystems
- Put the region at the forefront in sustainable, honest, prosperous design and living

The region can emerge as the hub of human/climate-centered design and equitable development in the Pacific Northwest through this project.