



Steven Chybowski
Rhode Island Office of Energy Resources
One Capitol Hill, 4th floor
Providence, RI 02908

June 1, 2022

Subject: Technical Proposal for The Rhode Island Energy Efficiency and Resources Management Council (EERMC) K-12 Energy Curriculum Training RFP

Dear Mr. Chybowski,

Green Building Research Institute (GBRI) is pleased to provide EERMC with this technical proposal to provide K-12 Energy Curriculum Training as described under EERMC RFP Number EERMC-2022-01. GBRI is the premier sustainability education provider in the nation with a library of over 400 courses, over 50 expert instructors, and over 23,000 current students worldwide. In addition, through GBRI's Certified Instructor Training Program, we aim to train hundreds of K-12 Teachers and College Faculty members.

A. Overview

GBRI Understands EERMC's role in Rhode Island's energy efficiency and system reliability programs, and its position in promoting public understanding of energy issues and ways to effectuate energy efficiency, energy conservation, and energy resource diversification.

In accordance with the RFP scope of work, GBRI will utilize the existing energy curriculum, "Energy, Climate and You", developed by the National Energy Education Development (NEED) and the training materials and videos created and enhanced by GBRI in 2021-22 to train K-12 teachers in Rhode Island.

Under the current K-12 training contract with EERMC, GBRI has successfully created Energy Efficiency Training for K-12 Teachers in Rhode Island and hosted 3 online training events associated with it. GBRI's current marketing and outreach helped our team become familiar with Rhode Island's public school system, particularly in Providence County, the state's most densely populated county. GBRI Director of Community Outreach & Engagement, Peter G. Martin, visited 15 School Districts in Rhode Island the week of May 2nd, 2022, and made connections to schedule

and deliver three additional in-person trainings in the state of Rhode Island in July and August of 2022.

GBRI will utilize our current relationships in Rhode Island to collaborate with all stakeholders, including, but not limited to, NEED, EERMC's Public Education Working Group, EERMC's Consultant Team, and the Office of Energy Resources (OER) to fulfill this Scope of Work.

With our expertise in developing, training and curating educational content for in-person, online live, and online on-demand training, and our current successful outreach to Rhode Island's School Districts, GBRI is well positioned to successfully implement the energy training project for K-12 teachers with EERMC.

B. Work Plan

GBRI's work plan is largely guided by the lessons learned from our current K-12 Energy Curriculum Training, namely:

1. Familiarity with the NEED curriculum,
2. Relationship with EERMC stakeholders
3. Expertise from creating the Energy Curriculum in new Audio-Visual format
4. Outreach to 15 School Districts and K-12 Teachers
5. Knowledge of the school districts' use of Professional Development (PD) days

GBRI's project management team will utilize the lessons learned from our involvement with K-12 teachers in Rhode Island and our prior in-person visits to 15 School Districts in Rhode Island to devise and implement a life-cycle approach to successfully manage the training project. GBRI will continue to actively include and engage EERMC stakeholders throughout the project life cycle.

Phase 0: Initiation – Understanding the Scope

GBRI has utilized the RFP documents and current curriculum enhanced by GBRI team to understand the scope and prepare this detailed technical proposal and cost proposal that compliments it. Main deliverables under Phase 1 include the technical proposal, a cost proposal, and a preliminary schedule.

Phase 1: Planning and Refining Scope as Needed

Upon award of the project, the GBRI Project Manager will share a refined schedule, marketing strategy, and protocol for progress updates and reporting Key Performance Indicators (KPI). Simultaneously, the GBRI education team will re-evaluate current education materials based on feedback from 2022 training to analyze and identify gaps, if any, and include our recommendations along with an outline and draft agenda for hands-on training materials including "train the trainers" modules for EERMC stakeholder approval. Based on the current feedback from K-12 bilingual teachers in Rhode Island, GBRI will translate our current training materials into Spanish and offer a self-paced Audio-Visual Energy Training in Spanish that complements the existing materials for bi-lingual K-12 teachers. By refining current training

materials and utilizing our existing resources, GBRI is able to attain considerable cost savings by reducing the need for developing new training materials.

Frequency, format, and timing of trainings

GBRI proposes hosting three (3) half-day in-person training sessions in Rhode Island and two (2) half-day online/remote live training sessions. In addition to the in-person and virtual live trainings, GBRI will continue to provide access to the course content in an on-demand, self-paced video format (English and Spanish). Teachers would be able to utilize the on-demand courses if they cannot attend either the in-person or live virtual sessions; or teachers could use the on-demand courses to review the course material. Teachers would have access to the on-demand content via GBRI's online portal through December 2023. The on-demand self-paced courses can also be utilized by teachers who are unable to attend the training classes in person or online during the contract period. GBRI strongly believes on-demand access (English and Spanish) will tremendously enhance teacher participation.

Marketing and outreach strategy

As part GBRI's marketing strategy to reach more teachers in Rhode Island, our Director of Community Outreach & Engagement, Peter G. Martin, visited school districts in the Providence County area to introduce them to GBRI, inform them of our collaboration with EERMC, and share registration details to GBRI's K-12 online training. Every district warmly welcomed the opportunity to learn about our collaboration with EERMC. The following 15 districts were visited and the number in parenthesis indicates how many K-12 schools are in each district: Burrillville (5), Central Falls (6), Cranston (23), Cumberland (8), East Providence (11), Foster-Glocester (2), Johnston (6), Lincoln (6), Pawtucket (16), Providence (37), Scituate (6), Smithfield (5), Warwick (21), West Warwick (6), Woonsocket (11). During the visit, we established Points of Contact (POC) at each school district for future correspondence, specifically targeting Asst. Superintendents, Directors of Curriculum, Front Desk Staff, etc.

One of the lessons learned from our visit to Rhode Island is that a few of the school districts already had determined which Professional Development Courses would be offered to their teachers on the RI Professional Development (PD) day. We therefore learned that while it may not be common practice, some districts do limit the number of courses offered on Professional Development days. It is key for us to identify those school districts in order to ensure our courses aren't excluded for future sessions.

We have followed up with the fifteen districts we visited to strengthen the relationships we made and to thank them for their time. If given the opportunity, we look forward to continuing to strengthen those relationships while also building new ones.

When necessary, GBRI's education team was able to get approval from various school Superintendents and Directors, and promote our online sessions in May by distributing flyers and emailing the POC a PDF of the flyer to be circulated to the teachers via email. In addition, GBRI's outreach team has created a list of 2000 K-12 teachers in Rhode Island which we propose to

utilize for our upcoming in-person session in Rhode Island and future training resulting from the proposed work plan.

GBRI is thankful for the connections made through Rachel Sholly, and Karen Valencia such as the MET school in Rhode Island for potentially hosting an in-person training session, and The Rhode Island Environmental Education Association (RIEEA). In order to incentivize K-12 teachers in Rhode Island to attend energy training, GBRI will also support substitute teacher reimbursement as a new strategy that was not implemented in our current contract.

Marketing and outreach through these interpersonal connections, coupled with providing substitute teacher reimbursements, will ensure a robust backbone for enhanced participation for the future K-12 training contract. In addition to the aforementioned strategies, GBRI will:

1. Create Event Pages on GBRI's website, Facebook, and Eventbrite.
2. Create event flyers and marketing materials.
3. Utilize marketing materials to market energy training to specifically target K-12 teachers in Rhode Island on social media platforms and paid advertising.
4. Share progress metrics with stakeholders.

Proposed Timeline (schedule)

Reflected in Attachment B is a rough timeline, which includes time for stakeholder review of training content, agenda, and marketing materials. This rough outline will be refined to develop a detailed schedule by the end of Phase 1.

Main deliverables under Phase 1, developed on a consensus basis, will include a refined project schedule, marketing and outreach plan, and training materials.

Phase 2: Training

In this phase, the GBRI Training team will utilize the newly prepared materials to deliver online and in-person classroom trainings in Rhode Island. GBRI will also procure necessary materials from the NEED Kit for classroom demonstration. In addition to the core curriculum, GBRI training will include online live and on-demand modules specifically to "train the trainers" to effectively deliver content to their respective audience.

As mentioned under phase 1, GBRI proposes hosting three (3) half-day in-person trainings in Rhode Island spread across five (5) months and two (2) half-day online/remote training spread across five (5) months, from July 2022 through December 2022. Teachers who are unable to attend the training classes in person or online during the contract period will have access to self-paced courses on GBRI's on-demand portal through December 2023.

GBRI is also well positioned to conduct all training entirely online should there be any COVID-19 restrictions that might impact in-person event planning and execution.

Continuing Education, Certificates, Gamification and Socially Shareable Badges

GBRI's Energy Training Series (live and on-demand sessions) are approved by the American Institute of Architects (AIA) for Continuing Education (CE) credits. Not only will this enhance the value of the courses but also attract more professionals in Rhode Island seeking professional development (PD) and CE credits. In addition to the energy curriculum developed under this RFP, teachers will be granted access to existing GBRI sustainability courses until December 2023. This would allow interested teachers to expand their sustainability horizons beyond energy courses and earn GBRI certified sustainability teacher designation. GBRI will host the sessions on GBRI's gamified Learning Management System and award socially shareable certificates, and energy equity badges for all attendees and participants. Gamification and the awarding of badges will tremendously enhance participation beyond the live in-person events.

Main deliverables under Phase 2 include three (3) half-day in-person training in Rhode Island, two (2) half-day online/remote training and self-paced courses on GBRI's on-demand portal.

Phase 3: Monitoring

Throughout all the other phases, on a monthly basis, GBRI will share key performance indicator (KPI) metrics as it relates to marketing, course intake, online course usage, etc., with EERMC stakeholders. These metrics will allow GBRI and EERMC stakeholders to measure training and marketing progress, view user feedback on training, and gather course completion data.

The GBRI web development team will also continue to utilize the online teachers' Community of Practice (COP) on GBRI's platform. This will enable K-12 teachers to join a network of change makers, interact among like-minded individuals, and share ideas and lessons learned.

Phase 3 deliverables are the monthly progress reports with KPI metrics as it relates to marketing, course intake, online course usage, etc.

Phase 4: Closing

GBRI will celebrate success by hosting an online graduation event in December 2022 for all teachers who complete training in person, online or on demand before a date jointly decided by GBRI and EERMC. GBRI will share lessons learned with EERMC stakeholders and distribute certificates and e-badges to successful teachers.

Main deliverables under Phase 4 include a "lessons learned" document, an online graduation ceremony, distribution of certificates and e-badges.

C. Company Profile

Incorporated in 2010, GBRI is a minority-owned sustainability education provider approved by the United States Green Building Council (USGBC) and the American Institute of Architects (AIA). GBRI's instructor network consists of seasoned industry professionals that span the globe. A list of GBRI's instructors, course contributors and narrators is located at <https://www.gbrionline.org/gbri-instructors/>.

Leveraging industry and academic partnerships, GBRI conducts sustainability research and analysis and develops, delivers, and hosts sustainability educational courses in multiple formats, including print, digital flipbooks, and audio-visual courses. GBRI Course materials can also be accessed on desktops, laptops and mobile devices.

With hundreds of sustainability courses covering the topics of energy, water, climate change, Leadership in Energy and Environmental Design (LEED), net zero (energy consumption) buildings, green schools, energy modeling, day lighting, Building Information Modeling (BIM), health, and wellness, the learning hub at GBRI provides sustainability education which is affordable and accessible to everyone around the world. In addition, GBRI provides exam preparation for several green credentials such as LEED Green Associate, LEED AP for Building Design and Construction (BD+C), LEED AP Operations and Maintenance (O+M), and WELL AP. Since November 2020, GBRI has offered more than 4000 full scholarships for green credentialing exam preparations as our way of supporting individuals in the green building industry during the COVID-19 pandemic.

D. Relevant Experience

As a USGBC Education Partner and an AIA Education Provider, we currently have more than 23,000 active students and since 2010 have trained more than 100,000 green building professionals, including teachers and students, from around the world. In collaboration with our certified instructors and local partners, GBRI has implemented several in-person sustainability training classes in many U.S states and international cities such as Texas, California, New Hampshire, New York, Dubai (UAE), Doha (Qatar), New Delhi (India), Chennai (India), and Kochi (India).

GBRI is also a proud partner of the United Nations on its 2030 Agenda for Sustainable Development, for which we create free courses and social demonstration projects related to the 17 sustainable development goals identified as part of the 2030 Agenda.

E. Examples of Prior Work

Learning Hub at GBRI is a community-based Learning Management System (LMS) and home to more than 400 sustainability courses. Our LMS is capable of hosting thousands of students, storing certificates, issuing badges, and hosting community-based discussion groups and communities of practice for continued learner engagement. At present, we have more than 23,000 students on our platform. All of the courses currently hosted on our platform are available at <https://www.gbrionline.org/learning-hub>

In order to provide a few examples, we have created a demonstration account for your perusal with access to the course materials identified below. GBRI online courses can be viewed on desktop and laptop computers (chrome browser recommended), tablets, and mobile devices.

User credentials for the demo account is provided below:

URL- <https://www.gbrionline.org>

Username: EERMC

Password: EERMC@GBRI2021

1. **Example # 1 – GBRI EERMC K-12 Energy Training.** This is an example of an on-demand audio-visual course developed as part of GBRI's current commitment to provide energy training for K-12 teachers in Rhode Island. <https://www.gbrionline.org/courses/a-teachers-guide-to-energy/>
2. **Example #2 – Short Energy Videos.** This is an example of short educational videos created to complement GBRI's K-12 Energy Training. <https://www.gbrionline.org/courses/a-teachers-guide-to-energy/lessons/student-videos/>
3. **Example #3 – 2-Minute GBRI Climate Change Video.** This is an example of marketing video we created for our Climate Change Program. <https://youtu.be/V1BfjKQDvB4>.
4. **Example# 4 - How LEED, AIA and LBC are Changing the Built Environment to Protect Biodiversity.** This is an example of a digital flipbook that educates users on biodiversity and how it is incredibly important for maintaining the balance in our ecosystems. <https://www.gbrionline.org/courses/how-leed-aia-and-lbc-are-changing-the-built-environment-to-protect-biodiversity/>
5. **Example #5 – The HVAC Factor: COVID-19; Protecting Indoor Spaces From COVID-19.** This is an example of a recording from a live webinar with 1000 participants. The course was originally offered in Nov 2020 and looks at some HVAC operation strategies that help mitigate the transmission of respiratory infections such as COVID-19. <https://www.gbrionline.org/courses/the-hvac-factor-protecting-indoor-spaces-from-covid-19/>
6. **Example #6 – LEED Green Associate Exam Prep.** This is an example of a two-day training module with study guides, practice quizzes, flash cards, and simulated mock exams. <https://www.gbrionline.org/courses/leed-v4-green-associate-exam-prep/>

F. Reference Contact Information

1. Lynn Sullivan, M.S., LEED Green Associate
Continuing Lecturer
Department of Environmental Engineering
University of California Merced
Email: lsullivan3@ucmerced.edu
Phone: 209-761-3048

2. Prof. Ira Pierce, PE
Cooper Union College of Engineering
Email: ira.pierce@gmail.com
Phone: 917 838-1083
3. Divya Mallavarapu, Architect
Assistant Professor, Brick School of Architecture
Email: divyamallavarapu@brick.edu.in
Phone: +91 – 94459 50906 (India)

G. Staff

1. Michael Kaleda, PE, LEED AP, GBRI Climate Change Ambassador
2. Peter G. Martin, Director of Community Outreach & Engagement
3. Jeslin Varghese, USGBC Faculty, WELL Faculty, LEED AP, WELL AP, GBRI Climate Change Champion
4. Sean O'Brien, AIA, LEED AP BD+C
5. Paulina Marinkovic, LEED AP O+M
6. Mina Agarabi, PE, LEED AP O+M
7. Marissa Prizio, Research and Content Developer
8. Dr. Sreelekshmi S, Reviewer, Social Media Marketer, Marketing Lead
9. Felicia Fuller, LEED Green Associate, GBRI Climate Change Champion
10. Simran Mishra, Social Media Marketer, GBRI Climate Change Champion
11. Shafeeq Salman, LMS Management, Web development, GBRI Climate Change Champion
12. Syllet, Voiceover Artist

H. Staff Responsibilities

Leadership

- Michael Kaleda, Executive Director - will provide overall leadership, executive management, capacity building and networking. His role will be to ensure that all aspects of the project are realized, build new relationships and partnerships when gaps are identified, and guide the long-term vision of GBRI and EERMC.
- Peter G. Martin, Director of Community Outreach – will lead all outreach and marketing efforts related to K-12 training in Rhode Island. Pete will foster the relationships already built with the 15 School Districts in Rhode Island and continue to visit more school districts.
- Jeslin Varghese, Project Manager - will oversee the project throughout the life cycle. Jeslin will offer leadership and support, program coordination with stakeholders, trainers, development, marketing and outreach, and manage the general functionality of the project. Jeslin will also serve as the training development manager and an instructor

Training

- Sean O'Brien, Instructor and Trainer - will serve as the lead trainer. Sean has taught several training courses with GBRI in NY and Doha, Qatar for energy efficiency. Sean is also a teaching assistant for architectural design and theory at the University of Kentucky, College of Design and has been a visiting lecturer and Architecture Critic for Cornell University, School of Architecture, Art and Planning. He will coordinate all training, provide curriculum development, onboard new trainees, teach "train the trainers" module for other trainers, monitor NEED demonstration equipment and support the overall skills building of trainees.
- Paulina Marinkovic, Content Developer, Reviewer and Trainer – will lead the development of training materials for the project. In addition, Paulina will translate the current Energy training into Spanish. Paulina has taught energy efficiency courses with GBRI especially on district steam energy. Paulina has a degree on Environmental Management and Global Climate Change from Harvard University, volunteers with the USGBC for their Green Apple event and provides advisory on water crises and management to a non-for-profit group: Women and Water Crises in Latin America.
- Mina Agarabi, Reviewer and Trainer – will review course materials, provide expert advice and suggestions as it relates to energy. Mina is a Professional Engineer (PE), a Certified Energy Manager (CEM) and has been active in teaching, reviewing and developing energy related content for CUNY Building Operations Training, performing energy audits and executing energy efficiency projects in NYC.
- Marissa Prizio, Research and Content Developer will analyze current NEED curriculum, and perform research related to the project to develop content in PowerPoint. An avid animal lover, Marissa has developed several sustainability courses with GBRI and is passionate about teaching and the environment.

Marketing

- Dr. Sreelekshmi S, Reviewer, Social Media Marketer, Marketing Lead – will review course content and offer pedagogical suggestions to improve course delivery. In addition, Lekshmi will lead the marketing team, set up social media campaigns on LinkedIn, Facebook, Instagram and GBRI website.
- Felicia Fuller, Operations Management and Compliance - will support the development and personalization of the virtual learning management system to facilitate the virtual components and additional tutorials for EERMC program. Additionally, Felicia will provide email marketing support using Zoho campaigns and Mailchimp to promote free webinars to promote the energy training events. Felicia will also work with AIA to get the training courses approved for Continuing Education.
- Simran Mishra, Search Engine Optimization, Social Media Marketer – will provide support in optimizing new web pages related to energy training for K-12 teachers for enhanced visibility on search engine networks including Google, Bing, Yahoo, etc.

- Shafeeq Salman, LMS Management, Web development, Social Media Marketer- will create secured community of practice (COP) groups on GBRI platform for Rhode Island teachers. In addition, Shafeeq will create on-demand accounts for all teachers participating in the training program. Shafeeq is GBRI web developer and LMS manager since 2012.

Attachment C lists GBRI Project Responsibility Matrix organized project phase, area of concentration and project tasks.

I. Staff Experience

Attachment D lists an organizational chart showing roles. Attachment E lists resumes of all team members.

J. Conflicts of Interests

None

K. Litigation

None

L. Investigation

None

With our expertise in developing, training and curating educational content for in-person, online live, and online on-demand training, and our current presence and successful outreach to Rhode Island's School Districts, GBRI is committed to fulfill our responsibilities under the current K-12 Energy Curriculum training in Rhode Island and well positioned to successfully implement future trainings as required by the RFP.

As a sustainability education provider, we believe the proposed K-12 training program will not only help create awareness among teachers, students and parents on sustainability and energy efficiency, but also create a more equitable society.



Sincerely,

Jeslin Varghese
President, GBRI