

Working with the TAC

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Based on the work of many, many others.

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To Know:

- **the EWB mission**
- **the TAC**
- **your Responsibilities**
- **the review process**

What is the EWB Mission?

- Engineers without Borders – USA supports community-driven development programs worldwide through the design and implementation of sustainable engineering projects, while fostering responsible leadership

What is the TAC?

- The Technical Advisory Committee (TAC) is a group of volunteer professionals who meet once a month in several regions to review the technical, cultural and health aspects of a project prior to a chapter traveling on an implementation trip.
- The purpose of this review is to provide additional quality control on EWB-USA projects and to pass on lessons learned from previous experiences or projects to current projects.

Role of the TAC in Projects

- The EWB-USA project process has been developed for one purpose – to maximize the likelihood that the projects being implemented by EWB are high quality, sustainable, successful projects
- The Technical Advisory Committee (TAC) plays an essential role in this process:
REVIEW and AUTHORIZATION

Functions of the TAC

- TAC Members Responsibilities
 - Review Project Applications (525)
 - Technical Reviews of Projects: Approve Projects for (Site Assessment and) Implementation
- TAC Chairs Responsibility
 - Coordinate TAC functions including meetings
 - Review Projects of Student Chapters
 - Recruit and vet new TAC members

Goals of the TAC

- Ensure the safety of our volunteers and counterparts
- Ensure the quality of project going into the field
 - The project is technically sound
 - The chapter going into the field knows how to construct their project
 - The chapter is aware of the health and safety risks
- Ensure the Brand Name- “EWB-USA” is being protected
 - The community is involved
 - The project is sustainable
 - ‘Hand up- not a hand out’
- Share advice on the project
- Approve or decline the project for implementation

Who is on the TAC?

- Engineers with 5+ years of experience, usually having a PE or working towards it.
- International Experience: worked extensively in other countries either for work, Peace Corps, or some other related activity
- Knowledge of EWB-USA, the organization's values, and how work is performed
- Often professionals that have traveled on EWB-USA projects, or are planning to do so.

When is TAC review done?

- Project Application
- Pre-assessment
- Post-assessment
- Alternatives Analysis (new)
- Preliminary Design
- **Pre-Implementation**
- Post-Implementation
- Project Closeout

TAC review: process

- The EWB-USA Project Coordinator sends an email to all TAC members with the agenda for that month's call, with links to **525 and supporting documents**
- The agenda has a link for downloading the project reports
- Calls have a 'live meeting' address
- Chapters present for 20 minutes and then TAC members ask questions pertaining to the project
- After all the chapters present (normally 2 or 3 per call), the TAC members discuss and either approve, deny or place the project on hold

TAC live meeting

- (Before) Reviews the project documentation that your chapter has submitted – 525 pre-implementation report.
- Review (if necessary) other documentation that is pertinent to the project
- Listens to the chapter presentations to the TAC and asks questions
- **Makes a decision regarding project implementation**

What chapters must do:

- Assemble and organize all aspects of the project.
- Ensure it is **ONE** project developed **THOROUGHLY!**
- Ensure the 525 is properly filled out.
- Get all other documentation in order.
- **Give the TAC enough information to be able to make an assessment of your project!**



TAC Responsibilities: ARC

ARC: Overview

- **Project Intake:**
 - Project applications are submitted from communities, NGOs, Government organizations, student chapters and interested individuals.
- **Process:**
 - Application Received: Project Staff sends e-mail of receipt
 - ARC Review: An ARC (Application Review Committee) is assigned to evaluate the project application.
 - PMs assign classification of project based on project type & risk (see following slide)
 - See the “ARC Guidelines” for more information on ARC procedures
 - Send Application Decision Letter: A letter is sent informing the community and the chapter (if applicable) of the ARC’s decision.

ARC: Project Safety Levels

- Level 1
 - Failure of project may result in death, severe illness, injury, or significant damage of property. Example, Any building project that people will live or work in.
 - PE or University Faculty with direct experience in development of infrastructure similar to that proposed in project is required
- Level 2
 - Failure of project would not result in death, severe illness or injury. However, some damage to property is possible. Example, Mali, Zambougou; Water Storage Project
 - PE or University Faculty with experience in implementing related infrastructure projects or methods is required
- Level 3
 - Failure of project would not result in significant damage beyond limited economic loss. Example: Haiti, Bayonnais; Biomass Fuel Project, loss of capital investment
 - PE, University Faculty, or person approved by the TAC with appropriate qualifications.



TAC Responsibilities: Design Reviews

Design Reviews: General

- TAC Design reviews are to provide technical, cultural and sustainability information to chapters engineering projects.
 - *Sustainability*
 - *Technical Details*
 - *Community Interactions*
 - *Health and Safety Metrics*
- There are two types of reviews: Implementation & Assessment reviews
 - If an implementation is being used as an assessment for the next project phase, then this is still considered an implementation, and the implementation presentation should be submitted.

Preparing for Design Review

- TAC Meeting:
 - Chapter Members should plan presentations prior to the TAC meeting. The documentation will be posted for TAC members review.
 - Questions posed by the EWB National project staff during the preliminary review need to be addressed.
 - During the TAC Meeting:
 - The team should complete its presentation in entirety, and then respond to questions. TAC members will take notes, so be ready to go back to a certain slide if necessary.
 - TAC members will hold all questions until the end
 - Always consider the question carefully, tell what you know, and don't "blow off" any concerns.

Key elements (1)

- Provide background about the community*
 - Country, region, description of area
 - Provide background for the trip*
 - Travel dates, team
 - Provide summary information about previous trips to the site
 - **State precisely what is to be implemented**
- *If project is complex, keep these short in your presentation, but ensure they are in your documentation.

Key elements (2)

- Provide a summary of the alternatives that were considered for the project and why the chosen alternative was selected*
- Provide a summary of design criteria and calculations
- Design drawings
- Site mapping

Key elements (3)

- Discuss construction process including construction health and safety
- Discuss sustainability including ongoing operation and maintenance

Planning the presentation (1)

- Have a minimum of three persons – student presenter, backup presenter and technical assistant, faculty advisor or mentor
- Practice your presentation. You have 20 minutes to present. Make sure you hit this time.
- Log on and be ready to present 10 minutes before your scheduled time

Planning the presentation (2)

- You will receive an agenda one or two weeks prior to your meeting
- There will likely also be other chapters presenting during the same meeting
- Web based meeting. When it is your turn to present the meeting facilitator will have everyone see you screen

Possible Results:

- **Approved**
 - **Yeah!! But remember to read the entire TAC decision to see if the TAC had recommendations about your project**

Possible Results:

- Approved
- On Hold
 - The TAC believes that project is good in principle but requires additional information to give final approval.
 - Your chapter must respond to the Hold comments in order to gain approval

Possible Results:

- Approved
- On Hold
- Declined
 - The TAC believes that implementing the project is not in the best interest of the community

Possible Results:

- Approved
 - On Hold
 - Declined
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- The TAC decision is the best judgment of the committee about your project. Pay attention to it.



Questions