

# Capacity building

## Fisheries decision-making

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# Understanding learning needs

Key considerations must be addressed when developing training programs for technical and non-technical audiences. Participants aim to acquire skills they can apply immediately, prefer efficient strategies, and are motivated by clear, practical outcomes. Therefore, training should be designed to be both effective and relevant.

## LEARNING PRINCIPLES

### ACHIEVE GOALS

Participants focus on achieving goals: Clearly explain the benefits of learning the topic.



### SELF-DIRECTION AND MOTIVATION

Participants possess a strong sense of self-direction and motivation (provide them with a clear purpose for being there).



### CHOOSE HOW TO LEARN

Audiences want to choose how they learn (freedom to explore on their own terms)



### USE LIFE EXPERIENCES

Participants use their life experiences to help them learn (share relevant examples).



### HELP AND MENTORSHIP

Participants proactively look for help and mentorship (provide support).



# Key factors when developing training

To connect with their audience, facilitators should focus on five key factors when developing training content.



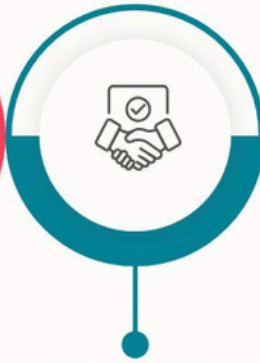
## Immediate Usefulness

Present material that learners can immediately apply



## Relevance

Connect the material to the learner's lived experiences



## Welcoming Environment

Foster a safe and inclusive learning space for all participants



## Engaging Presentation

Use interactive methods and real-world examples to maintain learner interest



## Respectful Approach

Value learner's experiences and create opportunities for sharing

# Learning theories

There are several learning theories or approaches facilitators may want to use for teaching participants.

This guide will focus on those more relevant to teaching fisheries science to technical and non-technical audiences and provide some practical techniques that can be applied to some relevant theories. The most recognized theory is Andragogy. However, it can be combined with other theories and approaches to boost the learning/teaching process.

## ANDRAGOGY

Participants learn when they understand why the subject is relevant to them, when they engage in hands-on problem-solving, and when they can apply the content immediately.

### Approach:

- Conduct a needs assessment (identify challenges, needs, and goals).
- Use case studies (connect learning with practical application).
- Treat participants as co-creators of the learning process.
- Focus on personal development and self-actualization.

## EXPERIENTIAL LEARNING

Learning occurs through experience and reflection, emphasizing the importance of real experiences in the learning process (a learn-by-doing approach).

### Approach:

- Introduce real-world scenarios or case studies.
- Facilitate group discussions to share challenges and insights.
- Provide additional resources to deepen understanding.

## PROJECT-BASED LEARNING

Learning happens through real-world projects, producing tangible projects and solutions.

### **Approach:**

- Group participants based on shared interests or fisheries characteristics.
- Each group develops a project tailored to their specific fisheries.
- Groups share their projects, fostering cross-learning among participants.
- Participants take insights back to their own fisheries for practical implementation.

## COGNITIVISM

Focuses on mental processes (e.g., thinking, memory, problem-solving). It emphasizes understanding, diagnosing, and solving problems.

### **Approach:**

- Link new information to what participants already know.
- Use real examples to stimulate critical thinking.
- Provide tools like visual aids and step-wise frameworks to structure information.
- Encourage participants to connect new insights with past experiences.
- Promote discussions to deepen understanding.

## ARCS MODEL

The model addresses Attention (capture and maintain focus), Relevance (connect to goals and experiences), Confidence (build belief in their ability to succeed), and Satisfaction (ensure the process is rewarding).

### **Approach:**

- Present clear, concise, and informative content.
- Include relevant examples (real-life case studies).
- Simplify complex theories into easy-to-follow steps to build confidence.
- Offer tutorials, templates, and materials for continued learning post-workshop.

# Preparing for effective training

The initial steps in developing participant training involve the following steps:



## STEP 1: IDENTIFY THE TARGET AUDIENCE

- Facilitators should identify the target audience (names, titles, and places of employment) and their prior training experiences.
- A clear understanding of their backgrounds helps determine the depth of information and the required training level.
- A needs assessment before the workshop is recommended to pinpoint learning gaps (e.g., identify differences in skill levels) and tailor the training accordingly.

## STEP 2: DEVELOPING LEARNING OBJECTIVES

- Clear learning objectives serve as a contract with the audience, specifying desired outcomes.
- Objectives should address participants' needs, skills, and knowledge gaps, focusing on what they should be able to do, understand, or value after the course. They should also align with the type of learning targeted:
- **Knowledge-based:** Retention and intellectual skills (e.g., lectures, case studies).
- **Skills-based:** Practical abilities and techniques (e.g., demonstrations, simulations).
- **Attitudes-based:** Shaping opinions, values, and motivation (e.g., group discussions).

When creating learning objectives, write them from the participant's perspective, specifying what they should value, understand, or do with the skills or knowledge gained.

## THE SMART MODEL MAY BE CONSIDERED TO DEFINE OBJECTIVES

- S Specific:** Clearly defined to ensure a shared understanding of the objective's terms.
- M Measurable:** Definable in relation to a standard scale.
- A Achievable:** Practical and appropriate within the project's context.
- R Result - oriented:** Represents the necessary changes to achieve the desired outcomes.
- T Time-limited:** It must be achievable within a specific timeframe.

## FOUR FACTORS FOR DEVELOPING LEARNING OBJECTIVES

<b>The action verb</b> Describing what the learner will do after instruction. For example: After the workshop participants will develop/ apply/construct/ qualify/ demonstrate, etc.	<b>Conditions</b> Specify the context or situation in which the learner will perform the task.
<b>Standards or criteria</b> Define how well the learner must perform (e.g., accuracy, compliance).	<b>The audience</b> Clearly define the target audience to ensure the training is relevant and tailored.

## AN EXAMPLE:

**Objective:** After attending the Management Strategy Evaluation (MSE) workshop, participants will explain the core steps of the MSE process, run their own MSE for a provided case study, and present their findings.

- Action verb: Explain the core steps, run their own MSE; present their findings.
- Condition: For a provided case study.
- Standards: Run their own MSE and present their findings.
- Audience: Participants.

## STEP 3: DEVELOPING TRAINING CONTENT

- Creating training materials involves developing written content, designing presentations, developing exercises and activities, and asking experts and other facilitators for feedback.
- This phase is time-intensive but crucial for the success of the training. Ensure materials are well-designed and align with the learning objectives.
- The following process can be followed for each learning objective when creating training materials:

### **Determine the type of learning targeted**

What kind of learning targeted the outcome involves  
(e.g., knowledge-based or skills-based)



### **Choose the instructional methods**

Selecting teaching methods given the objectives  
(e.g., case studies, lectures)



### **Connecting learning to objectives**

Consider how this learning experience will help participants  
meet the learning objective





## STEP 4: STRUCTURING THE TRAINING COURSE

Structuring a training course is a critical step in ensuring effective learning. The following steps outline a general structure when designing a training program.

**1** Create an outline focusing on what needs to be learned, align it with objectives, and organize it from simple to complex.

Identify the professional skills, competencies, or standards that the training course aims to address.

**2**

**3** Plan how the course will be evaluated (e.g., final project, presentation, case study).

Create and share an instruction sheet with goals, activities, timing, and a syllabus in advance

**4**

**5** Include some warm-up exercises for engagement and set up activities that promote inclusion.

Plan for open-ended questions to encourage discussion.

**6**

**7** Make your design flexible; for example, offer project/assignment options.

Prepare follow-up resources to reinforce learning.

**8**

# Effective facilitation

## EFFECTIVE FACILITATION OF THE TRAINING COURSE

- The effectiveness of a training course depends largely on the environment the facilitator creates. Facilitators should foster trust, maintain a positive and inclusive attitude, and provide constructive feedback.
- It is important to acknowledge participants' contributions with comments like, "That is a very good example," or "This question is very relevant to the situation/topic."
- Creating an engaging and supportive environment encourages active participation and helps participants feel valued.
- If a question is unclear, rephrase it to ensure you understand the context.
- Facilitators must cover all the topics outlined in the syllabus. This means staying on schedule and addressing everything promised in the training.
- For off-topic discussions, create a "parking lot" to note these ideas and arrange a time outside the training (e.g., during coffee breaks) to discuss them further.



Some important facilitation tips include:

- Build trust
- Maintain a positive attitude
- Provide constructive feedback by respecting different perspectives and contributions
- Stick to the schedule
- Create a "parking lot" for off-topic situations
- Ask open-ended question

## REFERENCES

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