

**Asociación de Desarrollo Comunal de Mujeres de Barra de Santiago**

**AMBAS**

**PROYECT:**

**Restoration of 1 Hectare of Mangrove Forest in the Zaité Sector in the Barra de Santiago**

**Ramsar Site**



## INTRODUCTION

Since the middle of the last century El Salvador has lost more than 50% of its mangrove forest, so conserving these spaces and restoring areas that have been lost is a priority as these spaces are of great importance both for the biota that use this ecosystem as well as the communities that directly or indirectly benefit from them.

The ecosystemic restoration of the mangrove is a process in which it is about giving the hydrological and biological conditions to a place that due to anthropogenic and/or natural causes has been lost, the sector of the zaite located in Barra de Santiago, is an area in the that its original vegetation has been lost, which was mostly mangrove forest, that is why the AMBAS Association is carrying out the intervention of 1 hectare, where restoration actions are being carried out, rehabilitating channels that help irrigate the area and planting seedlings of mangroves of different species to recover the vegetation that over the years has not been able to regenerate.

### **Project Objective**

Promote the process of restoring marine coastal ecosystems in the Barra de Santiago Impossible Conservation Area, with the application of different techniques for the restoration and recovery of the Mangrove Forest

## Justification

The Barra de Santiago mangrove is an important food source for fish, it is a spawning area, an area of development and growth and a migratory route on which the existence of fish inside and outside the wetland depends. This wetland is home to around 75% of the marine species of coastal fauna with commercial importance in El Salvador (FRBR, 2013). Regarding the analysis of the potential economic value of the mangroves, they indicate that the environmental services they offer are far superior to any productive activity that substitutes them. In El Salvador, it is estimated that the mangroves have a potential economic value of US\$ 18,505 per hectare. per year (MARN 2013)

For these reasons, the recovery of degraded mangrove areas is key to providing livelihoods for people in neighboring communities and for the environment. Restoration actions in the zaite sector in Barra de Santiago become necessary because the site has lost its capacity for natural regeneration, with this intervention around 60 families from the communities will be directly benefiting, which make use of firewood, wood, fish and crabs

Location of the site to restore.

The work will be carried out in the Mangrove Forest and the Barra de Santiago Complex Ramsar site, in the “zaite” sector, in the municipality of Jujutla, department of Ahuachapán, Western El Salvador in the coordinates N 13°40'42.74" W 89°57'47.78"O” (Map 1).



**Map 1** Location of the restaurant area on Barra de Santiago Street. El Zaite sector

## **Description of activities**

### **Activity 1 Diagnosis of our Site of interest**

Five visits to the site to be restored were made to collect information about the conditions in which our site of interest is found. During these visits, the water conditions of the canals were verified, analyzing the level of siltation, salinity, temperature, dissolved oxygen and PH of the water. The vegetation and fauna present in the study area were also taken into account, all this information was used to prepare the Intervention Plan in which all the current conditions were reflected, as well as the activities that were developed for the restoration of the site, this The document has already been sent to the Ministry of the Environment for its subsequent approval.

### **Activity 2 CARRY OUT WATER RESTORATION ACTIONS ON THE SITE.**

#### **Activity 2.1 Canal Superficial Cleaning.**

Surface cleaning of the canal has begun, a 4-meter-wide breach is being made so that the sediments extracted from the canal can be deposited, to date 176 m have been cleaned. in length, removing branches and trunks that may be on the channel, the plant species that has been cut the most during the section of channel cleaned is what is locally known as devil's rib (image 1), remaining to clean 224 meters, for later carry out in the desilting in the 400 m of channel cleaned.



### Activity 3 RECOVERY OF NATURAL VEGETATION

#### Activity 3.1: Cleaning of Invasive Vegetation (Devil's rib).

The clearing of undergrowth on the land has begun, cleaning approximately 7700 m<sup>2</sup> so far, during the cleaning process care is being taken not to cut native plant species that are under the undergrowth, until now The cleaning of approximately 14522 m<sup>2</sup> is missing.



#### 3.2 Implementation of temporary nursery for mangrove reproduction.



The nursery has been located in the zaite sector, with a capacity of 14,000 seedlings of the three most abundant mangrove species on the site: 7,000 Red mangrove seedlings, 6,000 white mangrove seedlings and 1,000 black mangrove seedlings, this seedling will serve for the restoration of the 1 Ha. that are being intervened in this project, as well as in other sites in restoration processes.



This action will make it possible to have a more developed plant available, which will have a greater probability of reaching adulthood, and plant it at the moment that is considered most appropriate.