

# INSIVUMEH

GUATEMALA

# LOCATION





# OCEANOGRAPHIC STATIONS IN GUATEMALA

- Puerto Quetzal
- Puerto santo tomas de castilla
- Project Ronmac

# Location of the Ports



# Oceanographic Parameters

- Waves
- Tides
- Density
- Salinity
- Sea temperature (am)
- Sea temperature ( pm)

# Puerto Quetzal

## Located at south



# making some adjustments





Santo tomas de  
Castilla

located in the caribbean



# WHY ARE SO IMPORTANT TO OUR COUNTRY?

- Weather forecast
- Daily tide prediction
- Wheather information during Hurricanes seasons
- Wave height
- Early warnings
- Tsunamis Warnings

# Oceanographic Parameters

## Puerto Quetzal

- Waves
- Tides
- Density
- Salinity
- Sea temperature

# Meteorological parameters

## Puerto Quetzal

- Temperatures
- Atmospheric pressure
- Humidity
- Vapor tension
- Dew point
- wind

# Oceanographic Parameters

## Puerto Santo Tomas de Castilla

TIDES ( only)

Meteorological Parameters

NONE

# STATUS OF THE STATIONS

- Project Ronmac no longer exists.
- No communication with other ports in the Atlantic and Pacific Oceans
- No Communication to the Forecast Office .

# NEEDS

- Communication to a central regional or global information.
- Communication with the Atlantic and Pacific ports.
- Dissemination of oceanographic information to vessels.
- Installation of other oceanographic station in Punta the Manabique Izabal.
- Installation of buoys .

# NEEDS

- New equipment
- Personal Training
- Buoys on each coast





**THANKS**