## UNIVERSITY OF RUHUNA

# BACHELOR OF SCIENCE IN FISHERIES AND MARINE SCIENCES DEGREE

# Level III Semester II - Dec/Jan 2015/2016

# OCG 3241 - Hydrography of Coastal and Marine Environments

Time: 01 hour

#### Part 01

## Short answers: Answer all questions.

- 01. What do you understand by Tide? Briefly explain its relationship to the depth measurements obtained during a Hydrographic Survey.
- 02. Briefly explain the function of RTK.
- 03. List down various other disciplines associate with Hydrographic Surveys
- 04. What is the average speed of sound in the water? What are the factors that determine speed of sound in the water?
- 05. Write down names of seven equipment and their usage in Hydrographic Surveys.

## Part 02

## Long Answers: Answer any two (02) questions.

- 06. What is the principle of GPS? Explain how GPS determines position of a point on the Earth?
- 07. What do you understand by Bench Mark? Explain its relationship to Chart Datum and explain with a help of a diagram, how do you determine the height difference between Chart Datum and the zero of the tide pole?
- 08. Explain followings with the help of suitable diagrams.
  - a). Geoid
  - b). DGPS configuration
  - c). Latitude & Longitude