



*Hosted by Plymouth Marine Laboratory*

## **REPORT ON POGO-SCOR FELLOWSHIP PROGRAMME**

### **Trainee's Report**

**Name of Trainee:** Mr. Mario Felipe Vera Sierra **Supervisor (Parent Institution):** Dr. Danilo Calliari

**Supervisor (Host Institution):** Dr. Vassilis Kitidis **Dates of Training:** 1<sup>st</sup> Sept. 2008 to 31<sup>st</sup> Dec.

**Subject of Training:** Dissolved Oxygen and Plankton Community Production – Respiration in the Atlantic Ocean (research cruise AMT 18)

#### **1) Please provide a brief description of activities during the training period:**

Firstly the work in PML was reading about the subject (Plankton community Production/Respiration) and safety aspects, such as risk assessments, handling of hazardous substances. I attended a Maritime and Coast Guard Agency approved training course on 'Sea Survival and Safety'. I received training regarding to the methodology (Automated Winkler titrations) used to measure Oxygen (O<sub>2</sub>) in ocean water and helped with the organization, setting up and packing of the equipment and materials before the cruise started.

Once in the ship the work was about setting all the equipments into the ship's laboratories and the experiments over the ship's deck, then carrying out sampling/setting up incubations on deck. We used water from different depths and incubated this under natural sunlight using 'light-screens' to match the light during incubation to the light at which the samples were collected. The rest of the day was taken up by automated Winkler titrations for oxygen and at the end of the day we had to clean all the glassware for the same experiment the following day. I also helped with the work on nutrient analysis, aquatic photochemistry, marine optics and physical oceanography.

After the cruise I received training in data analysis. In the current stage I am formulating a plan for a research proposal to apply, in Uruguay, the techniques and knowledge obtained during the POGO fellowship.

#### **2) What applications of the training received do you envision at your parent institution?**

As I said in my application to the POGO fellowship, the research program in the parent institution Universidad de la República (UdelaR) for 2008-2009 will focus on organic carbon fluxes in the Río de la Plata. I'm going to link the topic of production /respiration ratio using a modified Winkler titrations method to the ongoing research activities in Oceanography department at UdelaR.

**3) Please provide your comments on the Fellowship Programme.**

In my opinion the Fellowship programme was more than I expected. Since I was in Colombia, Miss Liz Humphreys was always very kind and very helpful at the time to deal with my visa and travel process. When I arrived to Plymouth, I really had luck to find Dr. Annie Linley who works for PML and who let me stay in her house for free; I just had to contribute with some money for food. For that reason I did not have to spend so much money in accommodation during the first month (before the cruise).

During my time in PML, all the People make me felt welcomed. My supervisor, Dr. Vassilis Kitidis, spends the necessary time to explain and show me clearly how the work had to be done before, during and after the cruise; he also taught me about several concepts related with the main subject and answered patiently all my questions. Dr. Vassilis also introduced me to people as Dr. Gavin Tilstone, and Paul Mann: scientists, who work with nutrient analysis and aquatic photochemistry, so I had the opportunity to know, and often collaborate with their subjects of study during the cruise, hence my time in the ship was very enjoyable and useful for develop future science ideas. Mr. Malcolm Woodward was always very concern about how I felt during the whole fellowship, thanks to him and PML people (Ms. Humphreys and subsequently Mrs. Christine Wing) I had no problems because of logistic issues: travelling to Warsash Maritime Academy (survival course) or stay and coming back from the Falkland Islands etc.

In general terms I consider that the Fellowship Programme was excellent and I' am so pleased for that. The only thing I could suggest to the Programme be improved is related with the time I had to get my UK's visa. If I had had more time (i.e. 6 months), the process would have been easier for everyone in terms of time and money.

**4) Please provide details as to how your stipend was spent. Attach receipts for all major expenses.**

One month in Annie's house: .....£160  
Five weeks of Accommodation in Peter Miller's house: £350  
Money spent on the ship: .....£220  
Food: .....£380  
Entertainment: .....£250  
Clothes for the cruise (\*): .....£170  
Transport PML to Accommodation: .....£130

(\*): I was not informed about the smart clothes that everyone has to use during the meals on the James Clark Ross.

Please return completed form by facsimile to +44 1752 633 101

**OR** send by e-mail to: [pogoadmin@pml.ac.uk](mailto:pogoadmin@pml.ac.uk)

**IMPORTANT: Please also mail the completed form with attached receipts to:**

POGO Secretariat  
Attn Mrs Chris Wing  
Prospect Place  
The Hoe  
Plymouth  
PL1 3DH  
UNITED KINGDOM