

### The Rufford Small Grants Foundation

### **Final Report**

Congratulations on the completion of your project that was supported by The Rufford Small Grants Foundation.

We ask all grant recipients to complete a Final Report Form that helps us to gauge the success of our grant giving. The Final Report must be sent in **word format** and not PDF format or any other format. We understand that projects often do not follow the predicted course but knowledge of your experiences is valuable to us and others who may be undertaking similar work. Please be as honest as you can in answering the questions – remember that negative experiences are just as valuable as positive ones if they help others to learn from them.

Please complete the form in English and be as clear and concise as you can. Please note that the information may be edited for clarity. We will ask for further information if required. If you have any other materials produced by the project, particularly a few relevant photographs, please send these to us separately.

Please submit your final report to jane@rufford.org.

Thank you for your help.

#### Josh Cole, Grants Director

| Grant Recipient Details |   |
|-------------------------|---|
| Your name               | Abebe Getahun   |
| Project title           | Enhancing conservation of the <i>Labeobarbus</i> species flock of Lake<br>Tana, Ethiopia, through better understanding of their ecology and<br>active participation of the community. |
| RSG reference           | 61.08.09  |
| Reporting period        | June 2010 to December 2010  |
| Amount of grant         | £6000   |
| Your email address      | abebeg@bio.aau.edu.et and abebe12002@yahoo.com  |
| Date of this report     | 20 December 2010  |



# **1.** Please indicate the level of achievement of the project's original objectives and include any relevant comments on factors affecting this.

| Objective           | Not      | Partially | Fully    | Comments                                 |
|---------------------|----------|-----------|----------|--|
|                     | achieved | achieved  | achieved |  |
| Creating awareness  |          |           |          | The effectiveness of the awareness       |
| about the threats   |          |           |          | depends on socio-economic factors        |
| and conservation    |          | V         |          | (availability of alternative livelihoods |
| status of           |          |           |          | for the fishermen and farmers,           |
| Labeobarbus spp.    |          |           |          | development of aquaculture               |
| flock of Lake Tana, |          |           |          | practices, etc.) and the extent of       |
| especially of those |          |           |          | implementation of management             |
| fishes that use     |          |           |          | measures all around Lake Tana. Follow    |
| Arno-Garno River    |          |           |          | up workshops may also be required.       |
| Determining the     |          |           |          | It is believed that the sampling is      |
| diversity of the    |          |           |          | extensive and exhaustive not to miss     |
| Labeobarbus spp.    |          |           | V        | any of the Labeobarbus spp. that         |
| that use Arno-      |          |           |          | aggregate at the Arno-Garno River        |
| Garno River as      |          |           |          | mouth and use the river and its          |
| breeding ground or  |          |           |          | tributaries as breeding grounds.         |
| as a route to other |          |           |          |  |
| tributaries         |          |           |          |  |
| Determining the     |          |           |          | We have determined which of the          |
| relative abundance  |          |           | V        | species are abundantly found at the      |
| of each of the      |          |           |          | Arno-Garno River and its tributaries     |
| Labeobarbus spp.    |          |           |          |  |
| Determining the     |          |           |          | We have determined that the species      |
| reproductive status |          |           | V        | that aggregate at the river mouth and    |
| of the fishes by    |          |           |          | also migrate upstream to tributary       |
| examining gonad     |          |           |          | rivers are for spawning purposes (with   |
| maturity stages     |          |           |          | mature and ripe gonads)                  |

## **2.** Please explain any unforeseen difficulties that arose during the project and how these were tackled (if relevant).

• The sampling sites were remote and difficult to reach especially during rainy season (time of migration of the fishes). However, use of animals and unreserved cooperation of the local fishermen has helped to solve this problem

#### 3. Briefly describe the three most important outcomes of your project.

- Awareness creation among the fishermen of the locality as well as development workers and experts of related ministries (Agriculture, Environment, Water Resources).
- Basic data on the identity, abundance and gonad maturity of the fish species that use Arno-Garno River for migration and spawning.
- A graduate student is associated in the study and an MSc thesis is being produced by the results obtained from this investigation.



# 4. Briefly describe the involvement of local communities and how they have benefitted from the project (if relevant).

• The local community, especially the fisher community, was actively involved in collecting samples from the river mouth as well as the main river and its tributaries.

#### 5. Are there any plans to continue this work?

• Yes, there are plans to continue similar work on all the feeder rivers and then proceed to radio telemetric studies of the migratory behaviour of the fishes. The awareness creation workshop will also continue with fishers, development workers and decision makers.

#### 6. How do you plan to share the results of your work with others?

• An MSc thesis will come out soon and there will, hopefully, be a scientific publication in a locally reputable journal. The project and its achievements will also be announced through a newsletter of the College of Natural Sciences, Addis Ababa University.

## 7. Timescale: Over what period was the RSG used? How does this compare to the anticipated or actual length of the project?

• The project actual work started in June 2010 and went up to December 2010. This was also the proposed length of the project.

| 8. Budget: Please provide a breakdown of budgeted versus actual expenditure and the reasons for      |
|--|
| any differences. All figures should be in ${f t}$ sterling, indicating the local exchange rate used. |

| Item  | Budgeted<br>Amount | Actual<br>Amount | Difference | Comments   |
|---|--------------------|------------------|------------|--|
| Workshop at Maksegnit<br>(Transport)                    | 100                | 80               | 20         | The number of<br>participants was a little<br>less than expected                 |
| Workshop at Maksegnit<br>(poster preparation)           | 50                 | 60               | 10         | Price of materials and services has increased.                                   |
| Workshop at Maksegnit<br>(Lunch/Tea/Coffee)             | 200                | 150              | 50         | The number of<br>participants was a little<br>less than expected                 |
| Workshop at Maksegnit<br>(per diem for<br>participants) | 500                | 400              | 100        | The number of<br>participants was a little<br>less than expected                 |
| Public transport  | 340                | 250              | 90         | The place was remote,<br>and some distance was<br>covered on foot and<br>animals |
| Vehicle rental  | 400                | 450              | 50         | Price of materials and services has increased.                                   |



| Total                  | 6000 | 6000 |     |                                 |
|------------------------|------|------|-----|---------------------------------|
| <b>T</b> I             | 6000 | 6000 |     | increased.                      |
| and fishermen          |      |      |     | subsistence expenses            |
| Per diem of associates | 3360 | 3410 | 50  | Some additions as               |
| investigator           |      |      |     | utilized the proposed<br>amount |
| investigator           |      |      |     | anticipated trips and           |
| Per diem of principal  | 500  | 500  | 0   | Has participated in the         |
| •                      |      |      |     | very much                       |
| Fuel expense           | 350  | 450  | 100 | Price of fuel has increased     |
|                        |      |      |     | services has increased.         |
| Boat rental            | 200  | 250  | 50  | Price of materials and          |

#### 9. Looking ahead, what do you feel are the important next steps?

• Survey of all feeder rivers that are potential breeding areas and passage ways for the migratory fishes. We need to establish the pattern of the migration of the different species of *Labeobarbus* through radio telemetric methods. The awareness creation workshops should also continue and focus on discussing alternative livelihoods, management measures, especially closing season during migration of the fishes, licensing legal fishermen and controlling illegal fishermen, avoiding harmful fishing gears, etc..

## **10.** Did you use the RSGF logo in any materials produced in relation to this project? Did the RSGF receive any publicity during the course of your work?

• Yes, it has been displayed and properly acknowledged during the workshop that took place on 29th October 2010, in Maksegnit, Ethiopia. It is also now ready to be published in the newsletter of the College of Natural Sciences. The RSGF will also be properly acknowledged in the production of an MSc thesis and anticipated peer reviewed publication that will emerge from this work.

#### 11. Any other comments?

• We are very much grateful to this very timely support as a contribution to save the unique and only surviving species flock of *Labeobarbus* spp. of Lake Tana as the lake and its biota are, currently, highly threatened by human pressure.