Darwin Initiative: Half Year Report

(due 31 October 2013)

Project Ref No 19-008

Project Title Building biodiversity research capacity to protect PNG rainforest

from logging

Country(ies) Papua New Guinea (PNG)

Lead Organisation University of Sussex

Collaborator(s) Binatang Research Center, Madang, Papua New Guinea

Project Leader Dr Alan J A Stewart

Report date and number (eg HYR3)

27th October 2013 (HYR2)

Project website

1. Outline progress over the last 6 months (April – Sept) against the agreed baseline timetable for the project (if your project has started less than 6 months ago, please report on the period since start up).

The following account reports against the project implementation timetable (Table 18 in application form):

1.1-1.3: Wanang Conservation Area (WCA) management and infrastructure

- Binatang Research Center (BRC) progressed the organizing of the WCA declaration as a protected area with PNG Department of Environment and Conservation (DEC) and other stakeholders. There will be a meeting in late October between DEC officials, Wanang landowners and Forestry office to finalize the formal submission of WCA documents.
- BRC assisted with staff and technology (GPS) in the delineation and field clarification of borders between WCA and neighbouring logging areas

2.1-2.2: Training of WCA field assistants

- We have initiated long-term training and practical research for five Wanang villagers, two for the study of seed-eating insects, two for butterfly monitoring and one for bird monitoring.
 These are long-term monitoring projects based in WCA, and associated with the 50-ha CTFS plot, designed to build long-term base-line data for future research.
- 1 Wanang villager continued field research at Mt. Wilhelm, a PNG National Park, for 4 months

3.1: Training of Binatang Research Center (BRC) paraecologists at BRC

- 4 BRC paraecologists trained in insect sampling and rearing methods for 3 months by Conor Redmond (PhD student of V. Novotny)
- 3 BRC paraecologists and one MSc student (J. Moses) trained in ant sampling and identification for 2 months by Dr T. Fayle and N. Plowman (PhD student of V. Novotny)
- 5 BRC paraecologists trained in plant and insect sampling by L. Sam (a PhD student) along the Mt. Wilhelm altitudinal gradient, for 5 months
- BRC hired five new paraecologists who received introductory training by senior BRC staff led by Research Supervisor Pagi Toko.

3.2: Training of BRC paraecologists in UK

- Joseph Valeba and Bradley Gewa (both BRC paraecologists) visited UK, Australia, Singapore & Czech Republic for intensive training, including:
- Seminar given at the University of South Bohemia, Czech Republic, plus visits to protected areas and field study sites
- 1 week at Sussex University (training in forest carbon storage assessment for REDD, plus visits to protected areas and field study sites)
- 1 week training at Royal Botanic Gardens, Kew, Herbarium

- Basic Canopy Access course at Oxford (1 week)
- 1 week training in Entomology Department at Cardiff Museum
- One-day visits to Rothamsted Research and to RBG Millennium Seed bank at Wakehurst Place
- Seminar at the National University of Singapore
- Visit to research collaborators at Griffith University (Brisbane) and giving a seminar there

4.1: Honours & MSc student research

Darwin Initiative students continued in their research:

- Nigel Baro, Honours study in ethnobotany in WCA and 4 other village communities also completed an internet-based language survey and initiated a Facebook page on PNG languages (https://www.facebook.com/pnglanguages?ref=br_tf)
- Jimmy Moses, MSc student, finished field work on the altitudinal gradient in ant communities on Mt Wilhelm
- Clant Alok, MSc student, completed sampling of plant-soil interactions in Wanang (50 ha plot) and along Mt Wilhelm altitudinal transect
- Clementine Sesega. Honours student, continued in field work for plant-insect interactions between folivorous insects and their Ficus hosts
- A regular weekly programme of seminars for students and researchers at BRC initiated, discussing research papers

5.1-5.3: Biodiversity surveys

- A large-scale Mt Wilhelm altitudinal survey of ecological interactions between *Ficus* trees and their herbivorous insects sampling insects from *Ficus* foliage along 10 transects (500 x 5 m each) at 6 elevations: 200m, 700m, 1200m, 1700m, 2200m, and 2700m asl..
- Long-term surveys of seed-feeding insects and butterfly communities initiated in the WCA
- A bird survey in WCA
- A survey of vertical stratification of rainforest insects in collaboration with the Royal Belgium Institute of Natural Sciences, using a hot-air balloon to access the canopy in the WCA

6.1: Fund raising for WCA

budget for this year?

No 🖂

Yes

We have successfully bid for funding from the Waterloo Foundation, UK: *Creating sustainable livelihoods whilst protecting rainforest in Papua New Guinea from logging* (£22,450 over 2 years). This grant is to employ a full-time Papua New Guinean graduate as Business Development Officer to develop the WCA business model, launch the concept, and manage the relationships with the global research community and funders.

2a. Give details of any notable problems or unexpected developments that the project has encountered over the last 6 months. Explain what impact these could have on the project and whether the changes will affect the budget and timetable of project activities.	
No significant problems encountered.	
2b. Have any of these issues been discussed with LTS International and if so, have changes been made to the original agreement?	
Discussed with LTS:	Yes/No
Formal change request submitted:	Yes/No
Received confirmation of change acceptance	Yes/No
3a. Do you expect to have any significant (eg more than £5,000) underspend in your	

3b. If yes, and you wish to request a carryforward of funds, this should be done as soon as possible through the formal Change Request process. However, it would help Defra manage Darwin funds more efficiently if you could give an indication now of how much you expect this request might be for.

Estimated carryforward request: £

4. Are there any other issues you wish to raise relating to the project or to Darwin's management, monitoring, or financial procedures?

No.

If you were asked to provide a response to this year's annual report review with your next half year report, please attach your response to this document.

Please note: Any <u>planned</u> modifications to your project schedule/workplan or budget should <u>not</u> be discussed in this report but raised with LTS International through a Change Request.

Please send your **completed report by email** to Eilidh Young at <u>Darwin-Projects@ltsi.co.uk</u>. The report should be between 1-2 pages maximum. <u>Please state your project reference number in the header</u> of your email message eg Subject: 17-075 Darwin Half Year Report