

The Rufford Foundation
Final Report

Congratulations on the completion of your project that was supported by The Rufford 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	Arjun Thapa
Project title	Strengthening Community Participatory Red Panda Conservation and Monitoring Program in Gaurishankar Conservation Area, Central Nepal.
RSG reference	16594-2
Reporting period	December 2015
Amount of grant	£4950
Your email address	arjunsmcraf@gmail.com
Date of this report	April 2016

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

Objective	Not achieved	Partially achieved	Fully achieved	Comments
Develop and draft locally adapted “Community Participatory Red Panda Monitoring Protocol” in Nepali language			√	In order to implement at community level, “Community Participatory Red Panda Monitoring Protocol” was developed in local language. The protocol was developed based on review of existing literatures on red panda, consultations with biologist, field researchers, foresters, government authorities’ university professors, graduate students, freelance wildlife research, and local stakeholders.
Train and promote local community people as Local Citizen Scientist (LCSs)			√	The project was successful in organising field based training sessions for selected local peoples (N=9) in single sites of proposed study area. Local Citizen Scientists (LCS) were trained on handling GPS and compass, identifying animal signs in transects and to record information in pre-designed data sheet. At the same time, monitoring committees (member=11) were formed with local community people and trained selected LCS for regular monitoring.
Establishment of permanent monitoring transects		√		Based on sign survey (faecal pellets, pugmark on snow), distribution of red panda is concentrated in narrow elevation range (3100 m-3400 m). A pair of horizontal transects, which varied in length from 0.5 km to 1 km were established at different elevations (3000 m, 3200 m and 3400 m) of Kalinchok forest in Gaurishankar Conservation Area. Topographic steepness and rocky area were constraint in establishing equal length of transects at each elevation. Due to impact of earthquake, the project was able to establish transect in one site only, out of proposed two sites.

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

As location of second earthquake and other series of aftershocks were within the project sites, Nepal Earthquake 2015 had direct effects on this project. The effect was perceived, specifically to conduct field-based training and transect establishment in particular sites. In study sites, earthquake had damaged building/huts and people were homeless, which diverted local peoples' immediate concern towards fulfilment of basic needs; rather than conservation of wildlife. This delayed in initiation of project activities for few months.

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

Most important outcomes of project were:

a. Locally adapted "Community-based Red Panda Monitoring Protocol (CBRPMP)" drafted in Nepal

Community-based Red Panda Monitoring Protocol (CBRPM) was drafted in Nepali version based on review of existing literatures on red panda, consultations with biologist, field researchers, foresters, government authorities' university professors, graduate students, freelance wildlife research, and local stakeholders. Further suggestions and feedbacks on protocol were gleaned through national level consultation workshop, organised on the occasion of "International Red Panda Day". Attendees of the workshop were representatives from protected areas governing body, local communities, conservation concern non-governmental organisations, wildlife biologists, and academicians and graduate students. Similarly, feedback was collected through local stakeholder meetings with representatives of Kalinchok VDC, GCAP authority, RDTA-Dholka, forest guardians, school' teachers and mother groups of the project site. Major suggestions from workshops and local consultation meetings were noted and addressed in the protocol. The draft protocol consists of four chapters and includes brief ecological information about red panda, survey techniques and monitoring methodology, data collection and analysis techniques, sustainable monitoring mechanism flowchart, format of data collection sheet and relevant photographs.

b. Train local community people as Location Citizen Scientist (LCS)

Field based training was organized for nine people, from confirmed red panda presence sites, to capacitate them as citizen scientist for regular monitoring of the animal. Training comprised both lectures and practical sessions, which dealt with sharing information on ecology of red panda, habitats, major threats, conservation challenges, and local communities' responsibility in biodiversity conservation, and equipment handling/ recoding. Besides, practical session also included survey techniques of red panda (line transect and quadrat sampling), and they were trained on handling equipment (GPS, compass, measuring tape), and recording field data collection). Out of nine, six LCSs were directly involved in establishment of the permanent transect based on drafted protocol. All LCSs were capable to handle equipment, identify animal sign, and record information in predesigned field data sheet.

c. Establishment of Monitoring Transect

Based on preliminary survey and prior research outcomes, Kalinchok forest was selected for detail red panda monitoring block in Gaurishankar Conservation Area. These transects were laid based on drafted monitoring protocol. Six horizontal transects (5 km total length) in between elevation of 3000 - 3450 m and which were varied in length (0.5 - 1 km) were established. The transect length

were varied due to rigorous topographic features (steepness, rocky). Analysis of sign datasheet shows, high faeces (n=6) was recorded at elevation 3400 m; whereas other transect consist very few faecal record (less than 3). Beside faeces, we also recorded panda's pugmark in snow covered habitat.

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

As one of the goals of this project is to develop Local Community Scientists and train them in red panda monitoring in field, this project directly involves to local community. On the other hand, Red Panda Monitoring Protocol was developed with participation of local communities. Similarly, nine local people had direct benefited from the project as key LCS to monitoring red panda. They are capable of handling field equipment (GPS, compass) and data collection in field. They can implement these skills to other wildlife monitoring projects. They were also benefited with field gears. Overall, local people were thoroughly involved and benefited through this project.

5. Are there any plans to continue this work?

Yes, we have plan to extend this programme to other nine red panda habitat patches recorded within the conservation area. We are interested to implement this monitoring programme beyond protected areas where habitat play significant role in maintaining biological corridor. Furthermore, we will validate, update this monitoring protocol based on the output of this project and also other monitoring protocol design for other species.

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

We plan to disseminate the results by attending workshop and conferences through paper or poster presentation. The output and results will also be published in different printed and electronic journals. The project protocol draft discussion information is shortly available in online (<http://www.resourcehimalaya.org/rhf/index.php/18-activities/474-international-red-panda-day-celebrated>). We are drafting paper on community participatory wildlife conservation program in different protected area regime (national park, conservation area) in Nepal taking an examples of three threatened species - red panda, snow leopard and tiger. Project report will also be disseminated to Department of National Parks and Wildlife Conservation, Gaurishankar Conservation Area Office, National Trust for Nature Conservation, District Forest Office Dolkha, Tribhuvan University Central Library and other concerned conservation organisations for wide access of information.

7. Timescale: Over what period was The Rufford Foundation grant used? How does this compare to the anticipated or actual length of the project?

Monitoring protocol was developed in target time period, however field based training and field work were completed lately due to impact of earthquake.

8. Budget: Please provide a breakdown of budgeted versus actual expenditure and the reasons for any differences. All figures should be in £ sterling, indicating the local exchange rate used.

Item	Budgeted Amount	Actual Amount	Difference	Comments
Principal Investigator	270	270	0	
Research Associate	150	150	0	
Transportation	240	300	-60	
Accommodation	480	500	-20	
Training Logistics	1500	1500	0	
Training Tool kits	80	120	-40	
Workshop	500	500	0	
Equipment	280	300	-20	
Field gears	200	300	-100	Balanced from conservation programme
Conservation Awareness	300	200	+100	
Review	100	200	-100	Consulted two reviewers, balanced from seed money
Monitoring	300	330	0	
Seed money	400	300	+100	
Report	150	150	0	
Total	4950	5120	-120	Overhead cost requested from SMCRF

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

I feel there is essential of detail ecological habitat assessment in Gaurishankar CA, and adjacent Langtang National Park to build habitat suitability model, and identify connecting habitat patches to design potential corridor between protected areas.

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

Logo was used in programme banners (workshop/field based training).

11. Any other comments?

Nepal earthquake 2015 delayed in execution of project activities within estimated time frame. Two protected areas, Langtang National Park and Gaurishankar Conservation Area, which consist of prime habitats of red panda in the central part of country, were severely affected by the earthquake. Project sites were 75 km away from first epicentre, and very close to second one and many aftershocks are within the study area, thus making it a challenge for timely completion of the project.