



## Darwin Initiative/Darwin Plus Projects Half Year Report (due 31<sup>st</sup> October 2021)

<b>Project reference</b>	DPLUS106
<b>Project title</b>	A Marine Turtle Action Plan for Montserrat
<b>Country(ies)/territory(ies)</b>	Montserrat
<b>Lead organisation</b>	Government of Montserrat (GoM) and University of Exeter (UoE)
<b>Partner(s)</b>	Marine Conservation Society (MCS)
<b>Project leader</b>	Dr Nicola Weber
<b>Report date and number (e.g. HYR1)</b>	HYR2
<b>Project website/blog/social media</b>	<a href="http://www.mcsuk.org/ocean-emergency/marine-protected-areas/projects-in-uk-overseas-territories/montserrat">www.mcsuk.org/ocean-emergency/marine-protected-areas/projects-in-uk-overseas-territories/montserrat</a> and also through @ExeterMarine

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

Reporting period: April 2021 – 30<sup>th</sup> September 2021

#### Output 1:

- 1.1: Mr Jack Wiggins was appointed by the University of Exeter as the Darwin Fellow (DF) for the 3-month fieldwork period between August – October in Y2. Additionally, Mr John Jeffers - former Chief Fisheries and Ocean Governance Officer for the Government of Montserrat - was appointed as the Project Officer (PO) and Mr Gerard Cassell, Montserratian, was appointed as the Assistant Project Officer (APO) by the Government of Montserrat to carry out turtle monitoring between July – November 2021, alongside their permanent Fisheries Data Collectors.
- 1.2: A user friendly Microsoft Access database was created by UoE project leads and sent to the GoM Project Leader. Virtual training was provided on its use in Y1 when international travel was not permitted. During Y2Q4 the appointed DF conducted a face-to-face Microsoft Access database training session with seven GoM personnel. During this training session, the GoM personnel were trained in how to input nesting, tagging and nest productivity assessment data into the Access database. The database is now housed on a GoM server so access to the database will be available on all GoM computers in the Fisheries and Ocean Governance Unit office. Additionally, the DF also trained two GoM personnel (Fisheries Data Collector and Fisheries Intern) how to set up, launch and download data from TinyTag data loggers using the software TinyTag Explorer; this software was installed on a GoM computer in the Fisheries and Ocean Governance Unit Office, using a UoE licence code to enable continued use of TinyTag data loggers. At the beginning of the 2021 nesting season the local Project Leader, PO and Assistant PO were also shown how to safely insert TinyTag data loggers within turtle nests and how to safely remove them. Refresher training for all of this will be provided again in Y3 of the project.

- 1.3: Due to restrictions imposed by the COVID-19 pandemic, the UoE and MCS teams were unable to travel to Montserrat until Y2Q3. The UoE teams arrived on Montserrat in August 2021 (Y2Q3) and worked alongside the local PL and PO to conduct face-to-face training sessions with the Assistant PO, Fisheries Data Collectors, and volunteers to consolidate correct survey methodologies and ensure the appropriate data were being recorded. Again, refresher and consolidation training will be provided in Y3.
- 1.4: Following local COVID-19 guidelines, during Y2Q3/Q4 the UoE team along with the GoM team conducted a full turtle nesting survey which consisted of both day and night surveys. Day surveys were systematically performed on all accessible beaches around the island (n = 13) and night surveys were conducted on more easily accessible beaches (n = 6) throughout the turtle nesting season. All data collected were inputted into the Access database by the DF and GoM personnel during the Access Database training session in Y2Q4.
- 1.5: All nests translocated into the hatchery facility by the PO have been and continue to be monitored daily by the local PL, PO and GoM team. The GoM team have been trained by the DF in nest excavations and productivity assessments throughout Y2Q3/Q4. Therefore, the GoM team are continuing to monitor all nests within the hatchery facility and will continue to perform nest productivity assessments for all hatchery nests for the rest of Y2 to enable an evaluation of the hatchery facility for Y2. All data will be inputted into the Access database and a full assessment of the hatchery facility will be conducted at the end of Y2 to inform plans for the Y3 season.
- 1.6: All nesting turtles encountered during nocturnal surveys were marked by the field team with two metal flipper tags on the trailing edge of the fore flippers, and a passive integrated transponder (PIT) was inserted into the right shoulder muscle of individuals to enable long-term population studies. A total of 10 nesting females (9 green and 1 hawksbill) were also fitted with remote tracking devices to identify key inter-nesting habitats and regional migratory connectivity (tracks can be viewed here: <https://my.wildlifecomputers.com/data/map/?id=61196a7b2c72b03780432020>).
- 1.7: Planned for Y3 nesting season.
- 1.8: A preliminary assessment of the mortality of turtle nests related to inundation, predation and illegal take has been carried out throughout Y2; the GoM team are continuing to assess all remaining in-situ and hatchery nests until the end of Y2. Results of the preliminary assessment will then be evaluated by the UoE and GoM teams at the end of Y2 and effective protective measures for the 2022 nesting season will be agreed and implemented during Y3 with the aim of reducing nest mortality caused by inundation, predation, and poaching by at least 50%. The implemented measures will then be re-evaluated and refined, if necessary, at the end of Y3 and incorporated into the Species Action Plan to ensure future practices align with international best practice and are consistent with local capacity and management needs.
- 1.9: A total of 13 local individuals were trained in marine turtle research and monitoring methods through the DF conducting numerous daytime and night-time face-to-face training sessions during Y2Q3/Q4. Training sessions focused on training the GoM team and volunteers on how to identify different species using a variety of visual identification methods, how to conduct nesting surveys, how to PIT and flipper tag nesting females, how to take morphological measurements, and how to conduct nest excavations and productivity assessments. Five of the trained individuals were staff members of the GoM, two individuals were GoM interns from the Department of Environment and Department of Agriculture, four individuals were local volunteers, and two individuals were local staff members employed on the Darwin Plus project: Building Capacity to make Montserrat a Mountain Chicken Refuge (DPLUS105).

#### Output 2:

- 2.1: Planned for Y3.

- 2.2: During Y2Q3 a robust population monitoring protocol was developed by the UoE Project Leads and the DF and agreed by the local PL and PO. The Government of Montserrat Director of Agriculture was also sent a copy of the monitoring schedule. The monitoring protocol was implemented at the beginning of the 2021 nesting season and is continuing to be trailed by the local PL, PO and GoM team until the end of Y2. Following the completion of Y2, the monitoring protocols will be evaluated by the GoM and UoE teams and refined prior to the commencement of Y3. If necessary, monitoring protocols will be further adjusted and refined during Y3 so that they are consistent with local capacity and management needs. To ensure ease of data collection for the GoM team, the DF and UoE Project Leads created new data recording sheets for the GoM team to utilize during Y2 and Y3. These data sheets will also be evaluated and refined, if necessary, for future monitoring.
- 2.3: Following the completion of Y2, a thorough evaluation of the methods implemented by the UoE, MCS and GoM teams in Y2 will be completed and any necessary adaptations will be implemented and incorporated into Y3 and the evidence-based and SMART-aligned Marine Turtle SAP for Montserrat.

### Output 3:

- 3.1: Due to the COVID-19 restrictions and regulations on group sizes and gatherings during the period the UoE and MCS teams were in Montserrat, community engagement meetings were limited. However, following COVID-19 protocols during Y2Q3 the UoE and MCS teams conducted a face-to-face community meeting with members of the Montserrat Rotary Club. During this community engagement event, the MCS team explained the social science aspects of the project detailing how the community voice method will be implemented and delivered on island and how findings will be integrated into the SAP. The UoE team explained the biological aspects of the project, providing information on how the GoM team and volunteers would be trained and incorporated into the project, how diurnal and nocturnal surveys were going to be conducted, how and why remote tracking devices were being deployed, how the data collected during the project was going to be inputted, stored, and used for future publications, and how local people could get involved with the project. The UoE and MCS teams plan to conduct further community engagement events in Y3 to explain project needs, aims and current findings to a variety of local communities and stakeholders; such engagement events will be organised during Y3 to comply with COVID-19 protocols in place at the time.
- 3.2: Prior to the research expedition in Y2/Q3, a list was put together of key informants that the MCS team would like to interview to ensure an even demographic spread. The names of potential interviewees were then put forward by all members of the team and from interactions with Montserradians when in the field. Eight semi-structured interviews were conducted with these key informants to evaluate levels of current take of sea turtles, their eggs, socio-economic and consumptive aspects, along with trends in nesting and in-water populations. The results of these interviews informed 3.3 and will be used as a baseline for 3.7 the end-of-project attitudinal surveys and resulting analyses.
- 3.3: In Y2/Q3, as part of the Community Voice Method, 28 interviews were successfully conducted that included 32 participants and just over 30 hours of interview data. Interviewees were sensitively asked about attitudes towards turtles and their conservation, marine management, conservation and life on Montserrat more generally. A balanced gender and age spread was achieved amongst the interviewees. A clear theme arising from the CVM interview data is that while the scale of the turtle fishery is seen as a fraction of its historical past, it still has social and cultural importance for sections of the Montserradian community and warrants community deliberation in determining conservation measures. The MCS Community Voice Coordinator is currently processing files and extracting audio for transcription. The next output will be a high-level data summary which will inform the film narrative.



MONTSERRAT COMMUNITY VOICE PROJECT 2021

Permission for image use was given by all participants.

- 3.4: Planned for Y3.
- 3.5: Planned for Y3.
- 3.6: Planned for Y3.
- 3.7: Planned for Y3.
- 3.8: Communication between all team members remains strong with regular whole team meetings, part team meetings for specific/ specialised queries and a regularly used Whatsapp group to share information and brief updates quickly and effectively.

#### Output 4:

- 4.1: The design and creation of the signage boards continues as it was recognised that there was a need for more high-quality images for inclusion and the need for more specialised graphic design. Images were taken by the team during the field expedition and MCS are able to offer some time of their in-house graphic designer to help complete this so that the boards can be installed in Y3.
- 4.2: Planned for Y3.
- 4.3: The UoE, GoM and MCS teams conducted an educational workshop at the Davy Hill Summer School during Y2Q3. The workshop included a talk on sea turtle biology and ecology, a Q&A session with the students, and a practical hands-on component where students had the chance to interact with the field equipment used for turtle monitoring and practiced attaching flipper tags to pretend turtle flippers. Five radio interviews which included members from the UoE, MCS and GoM were also conducted during Y2Q3. Two of the interviews were broadcasted live on Radio Montserrat on the MAHLE Vibes radio show, and the other was recorded online with local media company 664 Media and broadcasted at a later date. All interviews discussed in detail the work the GoM, UoE and MCS teams were conducting on Montserrat and helped make the outputs of the project and current findings widely available to the local community. Engagement with the local

community during the interviews was high with many locals joining the live radio interviews via mobile phones.

**2a. Give details of any notable problems or unexpected developments/lessons learnt that the project has encountered over the last 6 months (for COVID-19 specific delays/problems, please use 2b). Explain what impact these could have on the project and whether the changes will affect the budget and timetable of project activities.**

See below.

**2b. Please outline any specific issues which your project has encountered as a result of COVID-19. Where you have adapted your project activities in response to the pandemic, please briefly outline how you have done so here. Explain what residual impact there may be on your project and whether the changes will affect the budget and timetable of project activities.**

Due to regulations and restrictions associated with the COVID-19 pandemic, the UoE and MCS teams were unable to conduct field work in Y1, however partial turtle nesting surveys were completed by the appointed local PO and Fisheries data collectors in Y1. Therefore, the first full island-wide nesting survey was conducted during Y2. Additionally, due to the limited data collected during Y1 and Y2Q2, the field season for the UoE team will be extended to cover the period between June – November 2022.

Due to the COVID-19 restrictions and regulations on group sizes and gatherings in Montserrat during the period the UoE and MCS teams were in Montserrat, conducting community engagements and public meetings were limited. However, during the beginning of Y2Q3 the UoE and MCS teams conducted a face-to-face community meeting with members of the Montserrat Rotary Club. The UoE and MCS teams plan to conduct further community engagement events throughout Y3 to explain project needs, aims and current findings to local communities and stakeholders; such engagement events will be organised during Y3 to comply with the COVID-19 protocols in place at the time.

**2c. 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

Formal change request submitted: Yes

Received confirmation of change acceptance Yes

**3a. Do you currently expect to have any significant (e.g. more than £5,000) underspend in your budget for this year?**

Yes  No  Estimated underspend: £

**3b. If yes, then you need to consider your project budget needs carefully.** Please remember that any funds agreed for this financial year are only available to the project in this financial year.

**If you anticipate a significant underspend because of justifiable changes within the project, please submit a rebudget Change Request as soon as possible. There is no guarantee that Defra will agree a rebudget so please ensure you have enough time to**

make appropriate changes if necessary. **Please DO NOT send these in the same email as your report.**

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

NA

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 planned modifications to your project schedule/workplan can be discussed in this report but **should also** be raised with LTS International through a Change Request. **Please DO NOT send these in the same email.**

Please send your **completed report by email** to [Darwin-Projects@ltsi.co.uk](mailto:Darwin-Projects@ltsi.co.uk). The report should be between 2-3 pages maximum. **Please state your project reference number in the header of your email message e.g. Subject: 25-001 Darwin Half Year Report**