



## 2020 Plan Vivo Annual Report

### KHASI HILLS COMMUNITY REDD+ PROJECT

Submitted by

**Ka Synjuk Ki Hima Arliang Wah Umiam  
Mawphlang Welfare Society**



| <b>Table of Contents</b>                                | <b>Page</b> |
|---|-------------|
| Summary of Project                                      | 3           |
| Part A: Project updates                                 | 4           |
| Part B: Project activities                              | 8           |
| Part C: Plan Vivo certificates issuance submission      | 11          |
| Part D: Sale of Plan Vivo certificates                  | 12          |
| Part E: Monitoring results                              | 14          |
| Part F: Impacts   | 16          |
| Part G: Payments for ecosystem services                 | 17          |
| Part H: Ongoing participation                           | 18          |
| Part I: Project operating costs                         | 19          |
| <br>Annex   |             |
| Annex 1: Community impacts                              | 21          |
| Annex 2: Conservation monitoring results                | 26          |
| Annex 3: Carbon monitoring results for issuance request | 27          |
| Annex 4: Fuelwood reduction analysis                    | 31          |
| Annex 5: Incentive awards                               | 32          |

**Title of Project: Khasi Community REDD+ Project****Annual Report Year: 2020****Summary of Project**

| Project overview                |                              |  |  |
|---------------------------------|------------------------------|--|--|
| Reporting period                | 1 January – 31 December 2020 |  |  |
| Geographical areas              | East Khasi Hills, India      |  |  |
| Technical specifications in use | REDD+ and ANR                |  |  |

| Project indicators  | Historical<br>(2012 - 2019)       | Added/ Issued<br>this period (2020) | Total                          |
|---|-----------------------------------|-------------------------------------|--------------------------------|
| No. of smallholder households with PES agreements                           | 0                                 | 0                                   | 0                              |
| No. of community groups with PES agreements (where applicable)              | 62                                | 0                                   | 62                             |
| Approximate number of households (or individuals) in these community groups | 5,470<br>(ca. 28,454 individuals) | 493<br>(7,281)                      | 5,963<br>(35,735)              |
| Area under management (ha) where PES agreements are in place                | 9,270 ha REDD<br>1,618 ha ANR     | 200 ha ANR                          | 9,270 ha REDD<br>1,818 ha ANR  |
| Total PES payments made to participants (USD)                               | \$132,649.32                      | \$103,956.50                        | \$236,605.82                   |
| Investment in forest conservation and management                            | \$127,126.26                      | \$82,152.70                         | \$209,278.96                   |
| Total community benefit   | \$259,805.58                      | \$186,109.20                        | \$445,914.78                   |
| Total sum held in trust for future PES payments (USD)                       |                                   | \$290,137.08                        | \$290,137.08                   |
| Allocation to Plan Vivo buffer (tCO <sub>2</sub> )                          | 72,667 tCO <sub>2</sub>           | 8,472                               | 81,139                         |
| Saleable emissions reductions achieved (tCO <sub>2</sub> )                  | 290,664 tCO <sub>2</sub>          | 33,888                              | 324,552                        |
| Unsold stock at time of submission (PVC)                                    |                                   |                                     | 4,685                          |
| 2017  |                                   |                                     | 3,017                          |
| 2019  |                                   |                                     | 1,668                          |
| Total   |                                   |                                     | 4,685                          |
| <b>Plan Vivo Certificates (PVCs) issued to date</b>                         |                                   |                                     | <b>290,518 tCO<sub>2</sub></b> |
| <b>Plan Vivo Certificates requested for issuance</b>                        |                                   |                                     | <b>33,888</b>                  |
| <b>Plan Vivo Certificates available for future issuance</b>                 |                                   |                                     | <b>0</b>                       |
| <b>Total PVCs issued (including this report)</b>                            |                                   |                                     | <b>324,406 tCO<sub>2</sub></b> |

## PART A: PROJECT UPDATES

- The Project's Socio-economic Team has intensified support to the network of women's micro-finance groups and the farmers' clubs. Representatives from the Self-help Groups (SHGs) in the project area gathered on the 12 December 2020. Due to Covid-19 restrictions in the state, the size of the gathering was reduced to the recipients of the awards for best performing SHG, LWC, animal rescuers, and fire fighters. In total 88 participants attended the programme. The SHGs are mobilizing funds from small grants to develop entrepreneurial activities including pig raising, fruit tree cultivation, and high value vegetable and flower production. In 2021, the project is planning to support the establishment of a women's SHG Federation and to help capitalize with carbon offset revenues.
- The team has moved forward with extension plans for the coming year and has approached communities in the Garo Hills and in the state of Manipur to explore the development of new REDD+ projects among the Kuki and Garo tribal communities. The team will also extend to nearby villages in the Project area through awareness programmes.
  - Community Development Grants (CDG): An important benefit sharing mechanism is the project's Community Development Grant programme. Each year 59 villages are provided with small grants of \$500 for activities that benefit the entire community. As carbon offset sales increased substantially in 2020 generating additional funds the Project's Socio-economic Team has designed and funded three new initiatives to benefit participating villages. These include: Eco-Tourism Infrastructure project for each of the 10 Hima. Activities supported under this new initiative include small parks, trekking sites, extensions of footpaths, and facilities to accompany the eco-tourism sites. See Annex 1 for more information.
  - Special Village Grants that range from \$2000 to \$5000 and are being used by 14 communities primarily for the development of water resources by building check dams, reservoirs, and bathing places. See Annex 1 for more information.
  - School Solar Lighting for the ten schools in the Hima were installed in 2020. As power outages continue to disrupt livelihoods throughout the state of Meghalaya, the Project is working to provide alternative and environmentally friendly solutions to everyday issues.
- Improved marketing of the project's carbon offset credits has allowed the additional community benefit programme expenditure to increase from \$18,871 in 2019 to \$103,956.50 in 2020.
- Liquid Petroleum Gas Cooktop programme accelerates reaching 1271 households in 2020.

## A1: Key events and impact

**1) Mitigating Forest Fires:** The Project continued its community-based effort to control forest fires. Awareness raising and rapid mobilization to halt outbreaks has been extremely effective in reducing forest fires. Unfortunately, the Project saw multiple fires in 2020 as charcoal production on private land was unchecked and fire moved into Project land. The strong winds during the spring of 2020 also contributed to the spread. Communities have worked hard in the end of the year to build fire lines as a preventive measure for the 2021 fire season. Any potential impact will be assessed at verification. However, the Project is confident that due to its fire mitigation measures the overall impact fires may have had on carbon stocks compared to the baseline has been minimized due to the work of the communities and prompt emergency measures to contain fires.

**2) Community Development Grant Programme:** The annual community grants are one of the major benefits provided by the Project to the participating communities and households. In 2020, nearly 4345 families benefited from 59 village grants. Each village determines what type of project will benefit the most families and have the greatest impact. In 2020, the communities primarily selected public health improvement activities including safe drinking water systems, improving bathing and washing facilities, purchasing cooking materials for the community, and renovating public facilities. In 2020, the Community Development Grant programme budget increased from \$18,871 to \$29,383. See Annex 1 for details. The Community Development Grant is one of different support mechanisms that sit under the overall PES to communities.

**3) Eco-Tourism Infrastructure Programme:** The Project area has seen a steady increase in visitors for over a decade, though it has declined somewhat during the pandemic. It is clear, however, that there will be a rapid growth in domestic and international visitors in the next decade and the Project team is working with communities and the state government to prepare the infrastructure to handle the increasing tourist volume. This programme provides each of the ten Hima with funds to establish viewing sites, hiking trials, and restroom facilities, while assisting the women's SHG and Hima government to generate revenues and employment opportunities. The Project's investment in 2020 of \$35,714 was in addition to funds from the state government. The goal is to create opportunities for tourism while protecting the natural environment and culture of the region.

**4) Special Village Grants:** In addition to the Community Development Grants, this larger grant programme is designed to cover the costs of bigger village projects, particularly the improvement of water resources. Dams, check dams, pumps to lift drinking water, and reservoirs were included in the first grant round in 2020. The total cost of the programme was \$39,857. The villages that benefit from this are chosen annually by participating Hima of the Synjuk. This was the first year of offering this special grant to villages and it will be offered in the years to come on a rotational basis along with the consensus with the Synjuk and screening of the proposals in order to avoid risks of elite capture.

**5) Liquid Petroleum Gas (LPG) Cooktop Project:** The LPG cooktop project was initiated in 2019, but has accelerated dramatically in 2020 covering 1271 households. The goal of this project is to distribute LPG cooktops to all participating households in the area. The cooktop project is part of a long-term energy transition strategy to allow village families to shift away from a heavy dependence on fuelwood. The benefits include reduced pressure on local forests and forest habitat, improved household air quality, and a 50% reduction in carbon emissions. The cooktops also save families substantial time in the cutting and transport of firewood. This incentive is especially popular among village families and has increased the recognition of the Federation service to the communities.

**6) School Solar Lighting Project:** The solar street lighting project around the 10 village schools was undertaken to address problems with chronic electrical grid failures that disrupt activities in the village. The Project team intends to continue to explore how solar lighting can benefit Project communities.

**7) Biodiversity Rehabilitation:** The Project undertook rehabilitation programmes for threatened fauna, like owls, turtles, and wild cats, that were reported to the office by the field staff. The intervention encourages the inhabitants of the Project area to cease hunting threatened species and release the stray fauna to a more protected environment. Field staff report increasing frequencies of sighting key species including leopard and civet cats, several bird species, and rare plant species. This is directly linked to the rehabilitation of forest habitat as well as the linking of forest fragments to create larger wildlife corridors. A number of species were also reported this year as animals moved more freely into occupied areas during the lockdown period. Those animals which were found injured or in danger were rescued and handed over to the wildlife department for rehabilitation and release. See Annex 2.

**8) Self-help Groups and Farmer's Clubs:** The Project is distributing temperate fruit saplings, piglets, and chicks through subsidies from the Synjuk and convergence with Government departments of Meghalaya and Central Government, while also providing training programmes (with appropriate Covid measures in place). Seventy-five SHGs are continuously being supported and provided advice on building their capital assets to finance micro-loans to their members allowing a proliferation of small income generating businesses.

**9) Fruit Tree Plantations:** The Project has been working to meet the needs of the interested participants for horticulture by procuring tree saplings from Social Forestry of the Government of Meghalaya to carry out a plantation programme. The Project distributed 1231 fruit tree saplings to 70 interested beneficiaries in February 2020. Another 1500 fruit trees were distributed to 134 beneficiaries in June 2020. The types of fruit available included peach, chestnut, pear, plum, and kiwi.

## A2: Successes and challenges

### Successes:

- The forest inventory completed in December 2020 has shown a dramatic increase in the growth rate of the Project's reforestation areas. The area under community restoration increased by 200 hectares in 2020 as well.
- The Project continues to experience improved community participation by youth volunteers and villagers to protect and manage their forests as the Project was able to provide direct financial and technical assistance to all villages to improve the land management system of community forests.
- The Project has contributed to the empowerment of the traditional resource management institutions and leadership. Especially important in 2020 as India saw a very restrictive lockdown period, community facilitators were able to continue data collection in their localities, monitor SHGs, and report back to team members on their findings. Community-based resource managers play an important role in helping strengthen and improve resource management plans, rules, and institutions, as well as conduct regular forest management activities such as protection, fire control, replanting, and monitoring.
- An increasing number of women involved in micro-finance and entrepreneurial activities are actively participating in Synjuk activities. The SHGs and Farmers' Clubs (FCs) are key organizations for mobilising the activities in the Project. The collective participation and involvement of various SHGs and FCs has broadened the mind-set of the people in the community about the Project regarding its unique approach on conservation and preservation of forest. Several SHGs have come forward with voluntary participation in tree plantation. The Project has been able to adopt several new SHGs in 2020 after providing information and guidance in awareness programmes.
- The SHGs involved with rearing chicken through the Project were able to sell their chicken at a high rate and earned up to Rs.14,750 per group this year raising their economic status and encouraging community members to participate in high-value activities.
- During the lockdown period communities saw a large increase in wildlife species both in forests and in villages. There was a high rate of biodiversity sightings and wildlife rehabilitation throughout the Project in 2020. It was a great joy to see many animals returning to local forests during this time and communities took pride in trying to protect them from hunting. Those who took part in rescuing and rehabilitating species were awarded during the 5<sup>th</sup> Annual SHG Meet and Fest held in December (See Annex 5).
- The Project has been able to accommodate new villages adjacent to the Project area. Nine villages adjacent to the Project area have had a consensus for the extension programme.

### Challenges:

- The Project was challenged by the pandemic as many activities were postponed or cancelled. The Project was also concerned that the lockdown restrictions triggered many unlawful

activities like poaching and incessant timber collection. The Project played its part in voicing its concern through the Headman and the village council and has implemented mitigation measures. Any impact of poaching and timber collection will be assessed at verification; however, the Project believes that any negative impacts caused by responses to Covid-19, have been mitigated through Project activities and overall have a minimal impact considering the overall Project achievements over the Project period. The Project believes that the pressure will ease once lockdown measures end.

- Forest fire occurrence has been reduced by timely human intervention, but the issue remains a threat during the dry season. Charcoal production, strong winds, sparking transformers, accidents by humans, and agricultural burns that lose containment contribute to forest fire incidents. In 2020, an overall area of 60.35 ha burned, which is over the annual threshold, but still within overall targets over the Project period.
- The Project seeks to limit and reduce the amount of land used for quarrying. It has been successful working with participating local governments responsible for community lands; however, private quarry owners are reluctant to meet with the Project staff as they fear they will lose income if they shut down their sites.

### **A3: Project developments**

As the Project approaches its 10<sup>th</sup> year of operation it is currently in the process of preparing to reset its carbon baseline, update its Technical Specification and Project Design Document to position it for a second, ten-year phase (2022-2031). The Project has contracted Landscapes and Livelihoods, an Edinburgh-based company to assess its past performance in storing and sequestering forest carbon as well as to model future carbon benefits. During 2020 the Project team has prepared maps for the reference area of the Project. These reference areas will also be studied through remote sensing data to compare the change in landscape. The team continues to pursue extension areas of the Project and has spent time with contacts interested in the programme in the Garo Hills and other parts of the state.

The Project is partnering with the Khasi Hills Ecosystem Private Limited to assist with the marketing and management of its carbon offset credits. This includes shifting the credits to a new Market Registry account under the name of the Khasi Hills Ecosystem Private Limited. This change will facilitate the flow of funds from the sale of offsets to the Project. The Project retains all authority over the planning, implementation, and budgeting of Project revenues.

### **A4: Future developments**

The Project will continue to develop the relationship with those in the Garo Hills with the goal to assist in implementing REDD+ activities there. The second initiative involves planning for the Project's second phase (2021-2030). The Project team is working with Landscapes and Livelihoods to create a

workplan for revising the technical specifications for this next phase which will include resetting the carbon baseline through the use of updated remote sensing images and forest inventory data.

## PART B: PROJECT ACTIVITIES

### B1: Project activities generating Plan Vivo Certificates

Project activities to generate Plan Vivo certificates continued as planned in 2020. An additional 200 hectares were taken up for advance closure and silvicultural treatment bringing the total ANR to 1,818 ha. The most recent forest plot monitoring has shown that these young regenerating forests were sequestering carbon at an annual rate of 1.3 tC/ha between 2019 and 2020. This rate is higher than the sequestration rate measured during the early years of the project due to the accelerating maturation of the young secondary growth.

Avoided forest degradation and deforestation (REDD+) in dense forests is succeeding through strict community fire control, reduced firewood consumption, and raising community awareness through the preparation of village forest plans and maps. Fire control efforts by communities in 2020, including the maintenance of 66 km of fire lines, limited the total burn area to 60.35 hectares. Not only are the older dense forest areas being protected from deforestation and degradation ensuring carbon stored is not lost, these dense forests are also increasing their carbon stocks with the annual sequestration rate averaging 4.4 tC per hectare.

**Table 1: Project activity summary**

| Name of technical specification | Area (Ha) | No. Smallholder Households | No. Community Groups |
|---------------------------------|-----------|----------------------------|----------------------|
| Advance Closure for ANR         | 1,818     | 3,290                      | 47                   |
| REDD+                           | 9,270     | 4,357                      | 75                   |

**Table 2: Area protected for natural regeneration and enrichment planting  
2014-2020 in Hectares**

| Hima/LWC  | ANR area added 2014 | ANR area added 2015 | ANR area added 2016 | ANR area added 2017 | ANR area added 2018 | ANR area added 2019 | ANR area added 2020 | Total ANR to date |
|-----------|---------------------|---------------------|---------------------|---------------------|---------------------|---------------------|---------------------|-------------------|
| Mawphlang | 24                  | 86                  | 22                  | 8.3                 | 0                   | 0                   | 20                  | 160               |
| Laitkroh  | 7                   | 41                  | 30                  | 0                   | 100                 | 0                   | 20                  | 198               |

|              |            |            |            |            |            |           |            |              |
|--------------|------------|------------|------------|------------|------------|-----------|------------|--------------|
| Nonglwai     | 8          | 0          | 0          | 0          | 0          | 0         | 5          | 13           |
| Lyngiong     | 11         | 271        | 68         | 0          | 20         | 0         | 30         | 400          |
| Mylliem      | 95         | 12         | 20         | 0          | 20         | 0         | 40         | 187          |
| Pamsanngut   | 118        | 21         | 116        | 0          | 0          | 0         | 15         | 270          |
| Nongskhlaw   | 0          | 20         | 39         | 0          | 10         | 0         | 5          | 74           |
| Nongspung    | 9          | 4          | 0          | 0          | 0          | 0         | 10         | 23           |
| Sohra        | 20         | 16         | 200        | 0          | 20         | 19        | 20         | 295          |
| Mawbeh       | 100        | 30         | 7          | 0          | 20         | 6         | 35         | 198          |
| <b>Total</b> | <b>392</b> | <b>501</b> | <b>502</b> | <b>8.3</b> | <b>190</b> | <b>25</b> | <b>200</b> | <b>1,818</b> |

## B2: Project activities in addition to those generating Plan Vivo Certificates

The Project strategy in generating additional social and economic benefits depends on the involvement of members of the 62 participating villages. In order to engage over 25,000 people scattered over 270 square kilometres, the Project has hired and trained a growth staff of community organizers. Table 3 illustrates the steady growth in Project staff over the past four years, with the number of female staff members increasing from 10 percent to 50 percent over the same period. Over 90 percent of the Project staff are members of the participating communities and include both men and women, young and old. The allocation of Project resources for socio-economic activities is guided by the input from the Project participants themselves.

The governance of the Federation or Synjuk that oversees the Project is comprised of the leaders of the ten participating indigenous governments, representatives from the SHGs and FCs, and members of the staff including youth volunteers. This approach to bottom-up planning and local management allows the Project to be grounded in and owned by the participating communities providing it with greater sustainability. The Project's efforts to engage school students in conservation activities directly links these young Khasis to their traditional environmental values as well as motivates them to engage in ongoing and future forest and land stewardship projects.

**Table 3: Project Staff Engaged in Community Development and Resource Management**

| Year | Office Staff | Male Community Facilitators | Special Task Community Facilitators | Assistant Community Facilitators | Female Community Facilitators | Male Local Youth Volunteer | Female Local Youth Volunteer | Total |
|------|--------------|-----------------------------|-------------------------------------|----------------------------------|-------------------------------|----------------------------|------------------------------|-------|
| 2016 | 9            | 5                           | 1                                   | 0                                | 0                             | 62                         | 0                            | 77    |
| 2017 | 12           | 6                           | 1                                   | 3                                | 4                             | 62                         | 62                           | 150   |

|      |    |   |   |   |    |    |    |     |
|------|----|---|---|---|----|----|----|-----|
| 2018 | 8  | 5 | 1 | 4 | 6  | 62 | 62 | 148 |
| 2019 | 14 | 9 | 0 | 6 | 10 | 62 | 62 | 163 |
| 2020 | 15 | 9 | 0 | 6 | 10 | 62 | 62 | 164 |

- **Community Health Camp:** Due to Covid-19 restrictions, the free health camp which was planned for 2020 was unable to take place. The Synjuk is looking forward to providing a health camp for the community in the future when it is safe for all to attend.
- **Training Programmes:** An important component of the Project strategy is capacity building. The team conducted a series of vocational training sessions on bookkeeping, Farmer Producer Organization, charcoal monitoring, tree plantation, and nursery management to both refresh knowledge of those who were already involved in the Project and to orient those who are new to the Project activities. Due to the Covid-19 pandemic, several of the planned training programmes were postponed or cancelled. However, an opportunity was presented that allowed for the Synjuk to conduct a special workshop for those involved in eco-tourism. It was an interactive workshop with discussions on tourism post-Covid, sustainability, and biodiversity.
- **SHG Meet and Fest:** Each year the Project holds a festival for all the participating SHGs. In 2020, due to Covid restrictions there were only 88 attendees present to take part in the 5<sup>th</sup> Annual SHG Meet and Fest. The team highlighted the success stories of the SHGs through the interviews done by the team. Speeches were also given by the Block Development Officer, the Lyngdoh of Hima Mawphlang Lyngdohship, and the President of the Synjuk. A video presentation was given by the District Forest Officer, Wild Life Division East Khasi Hills, who gave an inspiring speech on the value of community in preserving and conserving the forest. The best performing SHGs, Lower Working Committee, forest fighters and biodiversity rescuers were awarded (See Annex 5).

## PART C: PLAN VIVO CERTIFICATE ISSUANCE SUBMISSION

### C1: Contractual statement

The Federation (Synjuk) has signed PES (Payment for Ecological Services) agreements with 62 participating villages in the Project area.

**Table 4: Statement of tCO2 reductions available for issuance as Plan Vivo Certificates based on activity for reporting period 1/20 – 12/20**

| Total area (ha) | Tech. Spec | Saleable ERs available (tCO2) available from previous periods. | Total ER's (tCO2) achieved this period (2020) | No. of PVCs allocated to buffer from ER's (2020) | Saleable ERs available (2020) | Issuance request (PVCs) Vintage | ER's (tCO2) available for future issuances |
|-----------------|------------|--|---|--|-------------------------------|---------------------------------|--|
| 9,270           | REDD+      |  | 36,429  | 7,286  | 29,143                        | 29,143                          | 0  |
| 1,818           | ANR        |  | 5,931   | 1,186  | 4,745                         | 4,745                           | 0  |
| <b>Total</b>    |            |  | 42,360  | 8,472  | 33,888                        | 33,888                          | 0  |

**C2: Allocation of issuance request**

**Table 5: Allocation of issuance request**

| Buyer name/ Unsold Stock            | No. PVCs transacted | Registry ID (if available) or Project ID if destined for Unsold Stock | Tech spec(s) associated with issuance |
|-------------------------------------|---------------------|---|---------------------------------------|
| Khasi Hills Community REDD+ Project | 33,888              | 10300000000432  | REDD+/AR                              |
| <b>TOTAL</b>                        | <b>33,888</b>       |   |                                       |

**C3: Data to support issuance request**

See monitoring results Annex 3.

**PART D: SALES OF PLAN VIVO CERTIFICATES**

**Table 6: Summary of sales 2012-2020**

| Vintage | Sale Date | Buyer                | No of PVCs | Total \$ |
|---------|-----------|----------------------|------------|----------|
| 2012    | 6/15/2013 | Zeromission          | 2,463      |          |
| 2012    | 7/31/2013 | C-Level              | 200        |          |
| 2012    | 8/9/2013  | Bioclimate           | 1,306      |          |
| 2012    | 9/2/2013  | CeramicaSantogostino | 1,225      |          |
| 2012    | 9/25/2013 | Zeromission          | 501        |          |
| 2012    | 4/30/2014 | Zeromission          | 4,474      |          |
| 2012    | 6/10/2014 | COTAP                | 283        |          |

|                       |            |                      |                |  |
|-----------------------|------------|----------------------|----------------|--|
| 2012                  | 7/15/2014  | CeramicaSantogostino | 360            |  |
| 2012                  | 5/15/2014  | C-Level              | 200            |  |
| 2012                  | 3/16/2015  | COTAP                | 674            |  |
| 2012                  | 6/12/2015  | CeramicaSantogostino | 340            |  |
| 2012                  | 6/15/2015  | C-Level              | 500            |  |
| 2012                  | 7/3/2015   | Zeromission          | 251            |  |
| 2012                  | 7/11/2016  | ShaikaRakshi         | 1              |  |
| 2014                  | 11/4/2015  | COTAP                | 269            |  |
| 2014                  | 10/15/2015 | Zeromission          | 15,000         |  |
| 2014                  | 12/10/2015 | WeForest             | 2,132          |  |
| 2014                  | 3/2/2016   | Zeromission          | 6,500          |  |
| 2014                  | 6/9/2016   | CeramicaSantogostino | 350            |  |
| 2014                  | 9/14/2016  | COTAP                | 660            |  |
| 2015                  | 7/8/2016   | WeForest             | 2,102          |  |
| 2015                  | 11/24/2016 | WeForest             | 2,075          |  |
| 2015                  | 11/10/2016 | Anima Impreza        | 20             |  |
| 2015                  | 12/6/2016  | Zeromission          | 8,099          |  |
| 2015                  | 5/5/2017   | Zeromission          | 9,727          |  |
| 2015                  | 6/2/2017   | C-Level              | 850            |  |
| 2016                  | 9/13/2017  | COTAP                | 1,467          |  |
| 2016                  | 10/25/2017 | Zeromission          | 250            |  |
| 2016                  | 12/27/2017 | Zeromission          | 9,718          |  |
| 2016                  | 3/9/2018   | WeForest             | 1,876          |  |
| 2016                  | 05/14/2018 | Zero Mission         | 300            |  |
| 2016                  | 07/21/2018 | Zero mission         | 10,530         |  |
| 2016                  | 9/1/2018   | COTAP                | 1912           |  |
| 2016                  | 11/28/2018 | Zero Mission         | 5700           |  |
| 2016                  | 12/31/2018 | Zero Mission         | 403            |  |
| 2016                  | 03/31/2019 | Zero Mission         | 600            |  |
| 2016                  | 04/30/2019 | Zero Mission         | 1500           |  |
| 2012                  | 05/13/2019 | COTAP                | 1644           |  |
| 2014                  | 05/12/2019 | COTAP                | 573            |  |
| 2016                  | 06/14/2019 | Weforest             | 2565           |  |
| 2016                  | 08/16/2019 | Zero Mission         | 5,500          |  |
| 2016                  | 09/03/2019 | Zero Mission         | 5,146          |  |
| 2016                  | 09/30/2019 | Zero Mission         | 530            |  |
| 2018                  | 10/31/2019 | Zero Mission         | 10,000         |  |
| 2016                  | 1/13/2020  | COTAP                | 5,299          |  |
| 2016                  | 3/31/2020  | Zero Mission         | 5,000          |  |
| 2016                  | 5/26/2020  | Climate Seed         | 1,000          |  |
| 2019                  | 7/2/2020   | Zero Mission         | 7,001          |  |
| 2012-2016             | 6/2/2020   | Lund Fund            | 24,000         |  |
| 2012-2016             | 6/2/2020   | Lund Fund            | 22,000         |  |
| 2012-2016             | 6/2/2020   | Lund Fund            | 22,000         |  |
| 2017                  | 6/18/2020  | C-Level              | 2,000          |  |
| 2019                  | 6/18/2020  | C-Level              | 2,000          |  |
| 2017                  | 7/8/2020   | We Forest            | 2,475          |  |
| 2018                  | 7/30/2020  | Zero Mission         | 5,313          |  |
| 2019                  | 8/28/2020  | Zero Mission         | 5,738          |  |
| 2018                  | 9/22/2020  | Zero Mission         | 2,565          |  |
| 2019                  | 12/8/2020  | Zero Mission         | 20,000         |  |
| <b>Total for 2020</b> |            |                      | <b>126,391</b> |  |

## PART E: MONITORING RESULTS

The Project monitors the impact of activities, which directly benefit forest ecology. The key indicators fall into two categories: 1) forest conservation linked to REDD+, and 2) forest growth linked to ANR. Forest fire control is critical to both strategies as fires destroy older growth and dense forests, while restricting regeneration in open forests. These targets from the Technical Specification Table 20 were revised during the annual report process in 2020 based on more realistic assumptions.

Moreover, indicators and targets for a revised monitoring framework were devised in 2017. Some targets mentioned below have been missed as the monitoring framework was revised after the end of the monitoring period for this annual report. The Project will report against these targets going forwards. These targets from the Technical Specification Table 21 were revised during the annual report process in 2020 based on more realistic assumptions.

This table is divided into two sections, 1) benefit sharing and participation and 2) institutional capacity. The baseline and monitoring targets for socio-economic monitoring from Table 22 in the Technical Specifications were revised in 2017 and revised during the annual report process in 2020 based on more realistic assumptions.

**Table 7: Monitoring targets**

| 2020                | Activity                      | Indicator   | Target Achieved |         |        | Target |
|---------------------|-------------------------------|---|-----------------|---------|--------|--------|
|                     |                               |   | Full            | Partial | Missed |        |
| Forest fire         | a. Fire control               | No. of hectares burned                                    |                 | 60 ha   |        | <50    |
|                     |                               | Length of fire lines constructed                          | 66 km           |         |        | >60    |
| Firewood collection | b. Fuelwood reduction         | Smokeless <i>Chulas</i> <sup>1</sup>                      |                 |         |        |        |
|                     |                               | LPG cooktops  | 1271            |         |        |        |
|                     |                               | Reduction in fuelwood use at household level <sup>2</sup> | 2.5 kg          |         |        | >2 kg  |
|                     | c. Forest plan                | No. of plans produced                                     |                 | 2       |        | >2     |
| Charcoal-making     | d. Charcoal-making retraining | No. of families   | 298             |         |        | >200   |

<sup>1</sup> Participating communities have found this activity to be less effective and have therefore focused on LPG cookstove distribution

<sup>2</sup> See Annex 4

|                                    |                                    |  |                         |                |                |               |  |
|------------------------------------|------------------------------------|--|-------------------------|----------------|----------------|---------------|--|
| Agricultural land-clearing         | e. Planning & mapping              | No. of village maps produced               |                         |                | 0 <sup>3</sup> | >3            |  |
|                                    | f. Forest land cleared             | No. of ha. cleared                         | 0                       |                |                | 0             |  |
| Grazing                            | g. Stall-fed livestock             | No. of pigs and poultry                    | 53 pigs<br>1100 poultry |                |                | No target set |  |
|                                    | h. Forest closure                  | No. of ANR ha. closed                      | 200                     |                |                | >100          |  |
| Quarrying                          | i. Outreach                        | No. of new mining licenses granted         | 0                       |                |                | 0             |  |
| <b>2. Forest Restoration (ANR)</b> |                                    |  |                         |                |                |               |  |
|                                    | a. Silvicultural operations        | No. of ha. under silvicultural treatment   | 1,818 ha                |                |                | 1500          |  |
|                                    | b. Trainings                       | No. of trainees                            | 60                      |                |                | >50           |  |
|                                    | c. Meetings                        | No. of meetings                            | 6                       |                |                | >5            |  |
|                                    | d. Incentive awards                | No. of awards                              | 9                       |                |                | >2            |  |
| <b>3. Socio-economic</b>           |                                    |  |                         |                |                |               |  |
|                                    | a. Benefit sharing & participation | No. of CDGs                                | 59                      |                |                | 59            |  |
|                                    |                                    | No. of Shade nets                          | 2                       |                |                |               |  |
|                                    | b. Agricultural /Horticulture      | No. of fruit trees                         | 2731                    |                |                | >1000         |  |
|                                    |                                    | No. of trainings                           | 7                       |                |                | >5            |  |
|                                    | c. Institutional capacity          |  | 150                     |                |                | >200          |  |
|                                    | Meetings                           | Meetings                                   |                         |                |                |               |  |
|                                    |                                    | 1. Synjuk meeting                          | 4                       |                |                |               |  |
|                                    |                                    | 2. Team meeting                            | 31                      |                |                |               |  |
|                                    |                                    | d. Meetings                                |                         | 3. CF meeting  | 12             |               |  |
|                                    |                                    |  |                         | 4. LWC meeting | 38             |               |  |
|                                    |                                    |  |                         |                |                |               |  |
|                                    | e. Incentive awards                | No. of awards                              | 7                       |                |                | >5            |  |
|                                    | f. Eco-tourism                     | No. of visitors walking DST                |                         |                | 200            | >1000         |  |
|                                    |                                    | No. of guided tours                        |                         |                | 10             | >60           |  |
|                                    |                                    | No. of tea shops                           | 10                      |                |                | >5            |  |
|                                    |                                    | No. of overnight guests at Resource Centre |                         | 15             |                | >25           |  |

<sup>3</sup> This is an aid to implementing Project activities but the creation of maps does not directly impact on the implementation of Project activities. Due to Covid-19, this activity was restricted in 2020 but has since resumed.

| <b>4. Biodiversity</b> |                     |                                   |    |  |  |    |
|------------------------|---------------------|-----------------------------------|----|--|--|----|
|                        | a. Surveys          | No. of surveys                    | 10 |  |  | >5 |
|                        | b. Keystone species | No. of keystone species sightings | 7  |  |  | >5 |

## PART F: IMPACTS

### F1: Evidence of outcomes

The Project has demonstrated a variety of impacts that are directly or indirectly linked to Project activities. Information and other evidence that document these outcomes are included in the Annex. Forest cover and conditions are improving throughout the 27,000-hectare Umiam Watershed as community awareness has heightened village forest protection activities. This, in turn, has resulted in improving hydrological function with increased stream and spring flow through the dry season. Biodiversity is also increasing as habitat improves reflected by the growing number of sightings of endangered species.

The Project achieved or exceeded its targets in 2020. While forest fire impact area increased over 2019 due to the onset of an early dry season, the Project has still reduced the annual burn area from an average of 86 ha per year during the from 2011 to 2014 to an average of 28 ha per year from 2015 to 2020, a 68 percent reduction. The Project has also accelerated household transition to LPG from fuelwood by increasing the distribution of propane cooktops from 27 units in 2019 to 1,271 units in 2020. The addition of 202 hectares of degraded forest for assisted natural regeneration represents a 12.5 percent increase.

Co-benefits reflecting the Sustainable Development Goals can also be seen as household incomes increase as a result of Project supported entrepreneurial and innovative farming systems including organic agriculture. The use of community development grant funds by participating villages to improve village forests in 59 communities demonstrates that the Project is having an impact on improving environmental conditions. More than 5,963 households have benefited from access to the mature forest for fuelwood, support for livelihood, support for the poor families, and as a watershed source for drinking water. An important impact from the Project is the increasing participation rates and interest of the 35,735 people in the watershed. From the outset, the Khasi Hills Community REDD+ Project was ambitious in taking on 62 communities with a population of 25,000. The continued success of the Project is reflected in its steady growth adding an additional 10 villages and 1606 families as neighbouring communities requested to be included in the forest conservation and restoration activities. The Project has been contacted by other tribal communities in northeast India

in the past few years further demonstrating its impact as a model for a successful approach to village resource management.

An additional Project impact has been the adoption of Project innovations by the World Bank funded Meghalaya Community Watershed Project that draws on the Khasi Hills experience. The Project is thereby shaping national and state-level policy regarding how communities can be empowered to address climate change through REDD+ and afforestation and reforestation projects.

## **PART G: PAYMENTS FOR ECOSYSTEM SERVICES**

### **G1: Summary of Community Development Grants by year**

Payments for Ecosystem Services (PES) include all socio-economic activities, restoration, and environmental services. The breakdown for these funds can be found in Table 9, Part I. The primary mode of PES distribution is through the annual Community Development Grant Programme. Payments were made to 4,345 households in 59 villages. All payments to communities through the CDG programme were paid at the end of the reporting period. See Annex 1, Table 4. Distributions through this mechanism are summarized in Table 8 below:

**Table 8: Summary of payments made and held in trust**

| Reporting year  |                              | Total previous payments (previous reporting periods) \$ | Total ongoing payments (in this reporting period) \$ | Total payments made (2+3) \$ | Total payments held in trust \$ | Total payments withheld \$ |
|-----------------|------------------------------|---|--|------------------------------|---------------------------------|----------------------------|
| 01/2020-12/2020 | Community Development Grants | 692.31  | 28,690.25  | 29,382.56                    | 2,357.00                        | 0                          |
|                 | Small Livelihood Grants      | 0   | 1,221.64   | 1,221.64                     | 0                               | 0                          |
| 01/2019-12/2019 | Community Development Grants | 952.38  | 17,111.40  | 18,063.78                    | 14,307.69                       | 692.31                     |
|                 | Small Livelihood Grants      | 0   | 808.00   | 808.00                       | 1,769.00                        | 0                          |
| 01/2018-12/2018 | Community Development Grants | 1,563.00  | 14,523.80  | 16,086.80                    | 0                               | 952.38                     |

|                 |                              |           |                   |                   |           |          |
|-----------------|------------------------------|-----------|-------------------|-------------------|-----------|----------|
|                 | Small Livelihood Grants      | 0         | 785.00            | 785.00            | 0         | 0        |
| 01/2017-12/2017 | Community Development Grants | 19,762.00 | 19,762.00         | 39,524.00         | 1,563.00  | 1,563.00 |
|                 | Small Livelihood Grants      | 0         | 2,018.00          | 2,018.00          | 0         | 0        |
| 01/2016-12/2016 | Community Development Grants | 0         | 18,102.00         | 18,102.00         | 19,200.00 | 0        |
|                 | Small Livelihood Grants      | 0         | 2,759.00          | 2,759.00          | 0         | 0        |
| 01/2015-12/2015 | Community Development Grants | 0         | 17,970.41         | 17,970.41         | 0         | 0        |
|                 | Small Livelihood Grants      | 0         | 2,124.00          | 2,124.00          | 0         | 0        |
| 01/2014-12/2014 | Community Development Grants | 0         | 12,750.00         | 12,750.00         | 0         | 0        |
|                 | Small Livelihood Grants      | 0         | 1,658.33          | 1,658.33          | 0         | 0        |
| <b>TOTAL</b>    |                              |           | <b>140,283.83</b> | <b>163,253.52</b> |           |          |

Please note that this is only comparing Community Development Grants throughout the years. The Community benefit extends to other services which are summarised in Table 9.

## PART H: ON-GOING PARTICIPATION

### H1: Project potential

The Project leaders are meeting with village leaders in neighbouring Ri-Bhoi District, Garo Hills, adjacent villages to the Project area and Manipur areas to assess potential interest in expanding the Project into their areas.

### H2: Community participation

The Project strategy is based on the intensive participation of the communities. In 2020, this was more difficult and challenging given the tight restrictions on travel during the lockdown due to Covid-19. However, when possible, meetings and field activities took place with the proper precautions throughout the Project area. The community facilitators roles were heightened during this period as they were able to work more closely with their communities and report back to the team on activities that were taking place. Annex 1, Table 4 documents a sample of diverse modes of community participation that occurred in 2020. Additionally, the Project employed 164 individuals drawn from the 62 participating villages, an increase from 77 staff in 2016. The Project strategy relies on local

people to both manage and implement the Project both to strengthen the sense of ownership, utilize local knowledge regarding development priorities and environmental problems, and to reduce overhead costs. The Project has emphasized the involvement of women and youth in order to create an age and gender balance that reflects the larger community, while drawing on the experience and authority of traditional leaders.

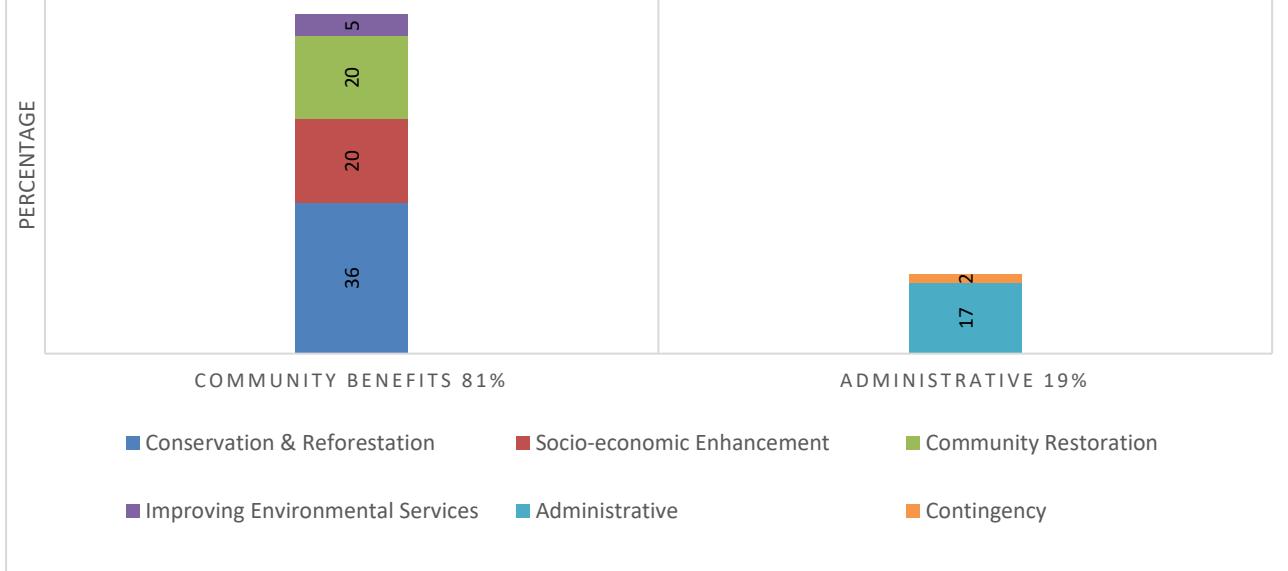
## **PART I: PROJECT OPERATING COSTS**

Village Development Grants were utilized for Forest Assisted Natural Regeneration and Conservation.

**Table 9: Allocation of costs 2020**

| <b>COMMUNITY BENEFITS</b>   | <b>INR</b>            | <b>USD</b>        | <b>%</b>    |
|---|-----------------------|-------------------|-------------|
| <b>Conservation &amp; Reforestation</b>   |                       |                   |             |
| Conservation & Reforestation: LPG Distribution, plantation, training, silviculture, site selection, capacity building   | 57,50,689.00          | 82,152.70         | 36%         |
| <b>PES Payments</b>   |                       |                   |             |
| Socio-economic enhancement: Temperate fruit trees, livestock, vermi-composting, mushroom cultivation, SHGs, LWCs, FCs, training, Community Development Grant, Special Village Grant, solar streetlights, income generating activities | 32,63,331.00          | 46,619.01         | 20%         |
| Assist community with restoration: CFs, Training, Tree Adoption Programme, Fireline   | 32,79,447.00          | 46,849.24         | 20%         |
| Improving Environmental Services: Eco-tourism grants, Biodiversity monitoring, Advocacy and Networking  | 7,34,178.00           | 10,488.26         | 5%          |
| <b>Total</b>  | <b>1,30,27,645.00</b> | <b>186,109.21</b> | <b>81%</b>  |
|   |                       |                   |             |
| <b>ADMINISTRATIVE OVERHEADS</b>   | <b>INR</b>            | <b>USD</b>        | <b>%</b>    |
| <b>Administrative</b>   | 27,61,165.82          | 39,445.23         | 17%         |
| <b>Contingency</b>  | 2,52,321.00           | 3,604.59          | 2%          |
| <b>Total</b>  | <b>30,13,486.82</b>   | <b>43,049.82</b>  | <b>19%</b>  |
|   |                       |                   |             |
| <b>TOTAL COSTS</b>  | <b>1,60,41,131.82</b> | <b>229,159.03</b> | <b>100%</b> |

## ALLOCATION OF COSTS PLAN VIVO 2020



See Annex 1, Table 5 for a complete list of community benefits provided by the Project.

## ANNEX

### Annex 1: Community Impacts

**Table 1: Special grants 2020**

| Special Grant 2020 |            |                |   |                        |                        |
|--------------------|------------|----------------|---|------------------------|------------------------|
| Sl.No.             | Hima       | Village        | Activity  | Amount Estimated (INR) | Amount Disbursed (INR) |
| 1                  | Sohra      | Laitlyndop     | Water storage tank at Urwan   | 5,00,000.00            | 2,50,000.00            |
| 2                  | Sohra      | Mawmihthied    | Construction of washing shed at Wah Pdemdieng                       | 2,20,000.00            | 1,20,000.00            |
| 3                  | Sohra      | Mawstep        | Construction of public toilet at Wahumsohphlang                     | 3,36,550.00            | 1,50,000.00            |
| 4                  | Nongkhlaw  | Sohrarim       | Construction of spring chamber at Wah-Lyngdoh Tariang (two places)  | 2,00,800.00            | 1,50,000.00            |
| 5                  | Laitkroh   | Laitkynsew     | Construction of fencing the monolith at Law Adong/Sacred Grove      | 3,55,500.00            | 3,00,000.00            |
| 6                  | Nongspung  | Umlangmar      | Construction of community hall                                      | 1,57,000.00            | 1,20,000.00            |
| 7                  | Nongspung  | Mawrohroh      | Construction of check dam & buying of PA system                     | 1,09,800.00            | 90,000.00              |
| 8                  | Pamsanngut | Nongmadan      | Construction of check dam-cum-mini lake at Rampna                   | 3,50,000.00            | 3,00,000.00            |
| 9                  | Lyngieng   | Lyngieng       | Renovation of the office Hima at Lyngieng.                          | 3,00,000.00            | 3,00,000.00            |
| 11                 | Nonglwai   | Nonglwai       | Construction of small dam for preservation of water at Madan Mawser | 3,09,250.00            | 2,00,000.00            |
| 12                 | Mawbeh     | Synrangshohnoh | Check Dam   | 1,50,000.00            | 1,20,000.00            |
| 13                 | Mawphlang  | Mawphlang      | Footpath at Sacred Grove  | 3,40,000.00            | 3,40,000.00            |
| 14                 | Mylliem    | Kyprhei        | Water supply through pumping  | 3,50,000.00            | 3,50,000.00            |
| <b>Total</b>       |            |                |   | 35,21,900.00           | 27,90,000.00           |

**Table 2: Eco-tourism initiatives**

| Sl. No.      | Tourist Spot        | Village                      | Hima       | Activities                                | Amount to be disbursed (INR) |
|--------------|---------------------|------------------------------|------------|---|------------------------------|
| <b>1</b>     | Lumlaitsohphoh      | Wahlyngkien Ramklang Cluster | Mawphlang  | Viewpoint                                 | 2,50,000.00                  |
| <b>2</b>     | Nonglwai            | Nonglwai Cluster             | Nonglwai   | Multi-purpose Park                        | 2,50,000.00                  |
| <b>3</b>     | Iew luri lura       | Lyngdoh Phanblang            | Lyngiong   | Multi-purpose Park                        | 2,50,000.00                  |
| <b>4</b>     | Phod Lawkhla        | Mawlum Tysrad                | Mylliem    | Multi-purpose Park                        | 2,50,000.00                  |
| <b>5</b>     | Lawbasa             | Umlangmar N                  | Nongspung  | Multi-purpose Park                        | 2,50,000.00                  |
| <b>6</b>     | Nongwah             | Nongwah                      | Pamsanngut | Children Park                             | 2,50,000.00                  |
| <b>7</b>     | Mawstep sha Jathang | Mawstep Jathang Cluster      | Sohra      | Trekking and toilet                       | 2,50,000.00                  |
| <b>8</b>     | Mawnguidbriew       | Mawbeh Cluster               | Mawbeh     | Viewpoint and cooking site                | 2,50,000.00                  |
| <b>9</b>     | Sohrarin            | Sohrarin                     | Nongkhlaw  | Viewpoint and footpath to Khsaid Urka Mih | 2,50,000.00                  |
| <b>10</b>    | Kshaid Iew          | Nongthymmai / Laitkynsew     | Laikroh    | Viewpoint and footpath to Kshaidlew       | 2,50,000.00                  |
| <b>Total</b> |                     |                              |            |   | <b>25,00,000.00</b>          |

**Table 3: Distribution of solar streetlights**

| Sl No. | Hima      | Village/School                                  |
|--------|-----------|---|
| 1      | Mawphlang | Mawphlang Secondary School                      |
| 2      | Mawphlang | Kyiem   |
| 3      | Lyngiong  | Lyngiong Secondary School                       |
| 5      | Mylliem   | Kyrphei Lower Primary School                    |
| 6      | Mylliem   | Mawlum Tysrad Lower Primary school              |
| 7      | Sohra     | Holy Family Roman Catholic Lower Primary School |
| 9      | Nongkhlaw | Tirot Singh Secondary School                    |
| 10     | Mawbeh    | Mawbeh Government Lower Primary School          |

**Table 4: Community Development Grants provided to 59 participating villages in 2020.**

| Community Development Grants for the year 2020 |                        |   |                      |                       |
|--|------------------------|---|----------------------|-----------------------|
| Sl. No   | Village                | Activity  | Number of Households | Benefitted Households |
| 1  | Mawkohmon              | Repair of Sohphie drinking well & construction of drainage system | 230                  | 100                   |
| 2  | Mission                | Buying of cooking materials                                       | 72                   | 72                    |
| 3  | Ladumrisain            | Buying of cooking materials                                       | 128                  | 128                   |
| 4  | Nongrum                | Making of wooden notice board, wooden rack & sound system         | 136                  | 136                   |
| 5  | Dongiewrim             | Repair of hearse  | 170                  | 170                   |
| 6  | Wahlyngkien Sunei      | Construction of dustbins  | 85                   | 85                    |
| 7  | Umtyrnuit              | Construction of hearse  | 90                   | 90                    |
| 8  | Mawmyrsiang            | Construction of Community Hall playground                         | 72                   | 72                    |
| 9  | Wahlyngkien Ramklang   | Buying of P.A. system   | 113                  | 113                   |
| 10   | Kyiem                  | Buying of cooking materials                                       | 131                  | 131                   |
| 11   | Lawshlem               | Furniture of benches  | 46                   | 46                    |
| 12   | Kyndong Laitmawbah     | Extension of footbridge   | 51                   | 51                    |
| 13   | Phanniewlah Neng       | Buying of cooking materials                                       | 115                  | 115                   |
| 14   | Phanniewlah Rum        | Washing place at Mawkhongoid                                      | 78                   | 78                    |
| 15   | Umkaber                | Cooking materials & tarpoline                                     | 82                   | 82                    |
| 16   | Thainthynroh           | Construction of fence for drinking well                           | 186                  | 115                   |
| 17   | Lait Mawpen            | Construction of drinking well                                     | 73                   | 73                    |
| 18   | Laitmawhing            | Construction washing place at Ummyndai                            | 62                   | 62                    |
| 19   | Lyngdoh Phanblang      | Construction of drinking well                                     | 108                  | 108                   |
| 20   | Perkseh                | Construction of furniture at Dorbar Hall                          | 80                   | 80                    |
| 21   | Laitsohphlang          | Purchasing tarpoline and coking materials                         | 35                   | 35                    |
| 22   | Umsawmat               | Toilet at Community Hall  | 138                  | 138                   |
| 23   | Kukon                  | Repair of Dorbar Hall   | 20                   | 20                    |
| 24   | Nonglwai               | Construction of washing place at Phudmaitlir                      | 190                  | 40                    |
| 25   | Mawlum Khongsit/Tyrsad | Silviculture at Khyllem forest                                    | 98                   | 98                    |
| 26   | Kyrphei                | Washing place at TihKyrphei                                       | 157                  | 45                    |
| 27   | Umlangmar (M)          | Washing place at Nongrum Umlangmar                                | 76                   | 76                    |
| 28   | Mawspong               | Cooking materials   | 24                   | 24                    |
| 29   | Nongmadan              | Water storage tank at Nongmadan Rampna                            | 106                  | 106                   |
| 30   | Nongwah                | Furniture making at ICDS Nongwah                                  | 148                  | 148                   |
| 31   | Pamsanngut             | Furniture making at ICDS Pamsanngut                               | 47                   | 47                    |

|               |                |   |             |             |
|---------------|----------------|---|-------------|-------------|
| 32            | Tyrsad Umkseh  | Construction of drinking well                                       | 198         | 90          |
| 33            | Mawsawrit      | Furniture making of chairs and drawers                              | 50          | 50          |
| 34            | Mawliehpoh     | Purchasing of plastic chairs  | 63          | 63          |
| 35            | Mawrohroh      | Construction of public washing place                                | 68          | 68          |
| 36            | Umlangmar (N)  | Purchasing of chairs at Umlangmar Nongspung                         | 33          | 33          |
| 37            | Mawmyrsiang    | Construction of water storage tank                                  | 110         | 110         |
| 38            | Laitkynsew     | Buying of monolith at Lawadong, Lum u Mong to be placed as souvenir | 190         | 190         |
| 39            | Laitkroh       | Drinking well   | 412         | 109         |
| 40            | Mawbeh         | Construction of water tank  | 138         | 138         |
| 41            | Mawkalang      | Washing place   | 21          | 21          |
| 42            | Laitsohma      | Repairing of drinking well and water storage tank                   | 31          | 31          |
| 43            | Steplakrai     | Repairing of school windows   | 32          | 32          |
| 44            | Synrangsohnoh  | Continuation of bus shed construction                               | 39          | 39          |
| 45            | Wahstew        | Silviculture at Lawadong  | 55          | 55          |
| 46            | Laitumiong     | Construction of viewpoint at Lumthwei                               | 14          | 14          |
| 47            | Laitthemlangsa | Construction of footpath at Lumthwei viewpoint                      | 22          | 22          |
| 48            | Jathang        | Purchasing of cooking materials                                     | 42          | 42          |
| 49            | Mawstep        | Construction of overhead water storage tank                         | 52          | 52          |
| 50            | Rngidiengsai   | Repair of Dorbar Hall   | 15          | 15          |
| 51            | Pyrda          | Purchasing of P.A. system   | 56          | 56          |
| 52            | Dympep         | Buying of P.A. system   | 76          | 76          |
| 53            | Laitsohpliah   | Construction of drinking well at WahPukri                           | 86          | 86          |
| 54            | Umdiengpoh     | Water storage tank at Dorbarshnong                                  | 78          | 78          |
| 55            | Ladmaophlang   | Construction of public toilet at David Scott Trail exit point       | 104         | 104         |
| 56            | Mawmihthied    | Washing place   | 114         | 60          |
| 57            | Mawkma         | Construction of drinking well                                       | 242         | 115         |
| 58            | Laitlyndop     | Construction of drinking well at Wahthwei                           | 120         | 60          |
| 59            | Sohrarin       | Repairing of Dakbangla drinking well at Sohrarin                    | 150         | 70          |
| <b>Totals</b> |                |   | <b>5757</b> | <b>4345</b> |

**Table 5: Structure of Community Benefits**

| Community Benefits             |   |
|--------------------------------|---|
| Conservation & Reforestation   | LPG Distribution                        |
|                                | Plantation                              |
|                                | Training                                |
|                                | Silviculture                            |
|                                | Site selection                          |
|                                | Capacity building                       |
| PES                            | Vermi-composting                        |
|                                | Temperate fruit trees                   |
|                                | Shade nets                              |
|                                | Livestock                               |
|                                | Mushroom cultivation                    |
|                                | SHGs/Farmers Clubs                      |
|                                | Income Generating Activities            |
|                                | Training                                |
|                                | LWC                                     |
|                                | Community Development Grants            |
|                                | Special Village Grants                  |
|                                | Rain harvesting                         |
|                                | Solar streetlights                      |
|                                | Assist Communities with Restoration     |
|                                | Fireline                                |
|                                | Tree adoption programme                 |
|                                | Community Facilitators                  |
|                                | Youth Volunteers                        |
|                                | Training                                |
|                                | Forest Conservation Extension Programme |
| Improve Environmental Services | Eco-tourism Grants                      |
|                                | Advocacy and networking                 |
|                                | Biodiversity documentation              |

## Annex 2: Conservation Monitoring Results

The biodiversity survey provides a record of sightings of flora and fauna in the Project area. The survey is kept by the community facilitators (CFs) to the best of their capability through the inputs of the youth volunteers and resident villagers to get a glimpse of the status of the faunal and floral diversity in the area.

| Sightings                       | Village          | Condition      |
|---------------------------------|------------------|----------------|
| Mud turtle                      | Laitsohphlang    | Rehabilitated  |
| <i>Nephenthes khasiana</i>      | Umsawmat         | Protected      |
| Leopard cat                     | WahLynkien Sunel | Rehabilitated  |
| Owl                             | Mawmihthied      | Protected      |
| <i>Anoectochilus roxburghii</i> | Sohraram         | Not threatened |
| Civet cat                       | Kyprhei          | Rehabilitated  |
| Nightjar                        | Ladmawphlang     | Protected      |
| Black bittern                   | Umtyrniut        | Rehabilitated  |
| Teal duck                       | Umtyrniut        | Rehabilitated  |
| Wild orchids                    | Various villages | Protected      |

### Annex 3: Carbon Monitoring Results for Issuance Request

**Table 1: Data on annual burn areas**

| Forest Fire Incidence in the Khasi Hills Project Area: 2010-2020 |            |                                  |      |      |      |       |      |       |      |      |      |       |       |
|--|------------|----------------------------------|------|------|------|-------|------|-------|------|------|------|-------|-------|
| Sl.no  | Hima       | Total Area Burned (in ha)        |      |      |      |       |      |       |      |      |      |       |       |
|  |            | Area in blue before REDD Project |      |      |      |       |      |       |      |      |      |       |       |
|  |            | 2010                             | 2011 | 2012 | 2013 | 2014  | 2015 | 2016  | 2017 | 2018 | 2019 | 2020  | Total |
| 1  | Mawphlang  | 20                               | 1.7  | 4    | 1.5  | 9.1   | 0.4  | 2.75  | 10   | 20   | 18   | 0     | 87.45 |
| 2  | Nonglhai   | 3                                | 0    | 0    | 0    | 0     | 0    | 0     | 0    | 5    | 0    | 0     | 8     |
| 3  | Lyngjiong  | 2.4                              | 6.8  | 2.3  | 1.6  | 1.9   | 0    | 8.2   | 0    | 2    | 17.5 | 28    | 70.7  |
| 4  | Mylliem    | 0                                | 0    | 0    | 5    | 0     | 0.8  | 0     | 0    | 5    | 2.7  | 5     | 18.5  |
| 5  | Pamsanngut | 0                                | 0    | 0    | 0    | 0     | 0    | 0     | 0    | 0    | 0    | .65   | .65   |
| 6  | Laitkroh   | 6                                | 7    | 9    | 0    | 1.6   | 4    | 2     | 0    | 6    | 0    | 13    | 48.6  |
| 7  | Sohra      | 0                                | 0    | 43   | 14   | 0     | 0    | 0.4   | 0    | 1    | 0    | 3     | 61.4  |
| 8  | Mawbeh     | 35                               | 75   | 30   | 40   | 107   | 0    | 0     | 0    | 0    | 0    | 10.7  | 297.7 |
| 9  | Nongspung  | 0                                | 3    | 0    | 0    | 0     | 0    | 0     | 0    | 1    | 0    | 0     | 4     |
| 10   | Nongkhlaw  | 0                                | 0    | 0    | 0    | 0     | 0    | 0     | 0    | 0    | 0    | 0     | 0     |
|  |            | 66.4                             | 93.5 | 88.3 | 62.1 | 119.6 | 5.2  | 13.35 | 10   | 40   | 38.2 | 60.35 | 597   |

Tables 2 and 3 show the changes in carbon stock in the open forest inventory plots that are monitored annually. A larger sample of expanded plots began in 2018. The new sample includes 41 randomly selected open forest plots and 65 dense forest plots.

**Table 2: Open forest plot carbon stock change for 2018, 2019, and 2020 in tC per hectare**

| Plot No. | 2018 Open<br>(tC/ha) | 2019 Open<br>(tC/ha) | 2020 Open<br>(tC/ha) |
|----------|----------------------|----------------------|----------------------|
| 1        | 10.431               | 11.082               | 14.675               |
| 2        | 1.993                | 2.160                | 2.605                |
| 3        | 10.376               | 10.811               | 11.792               |
| 4        | 13.867               | 14.363               | 17.871               |
| 5        | 10.026               | 10.589               | 11.624               |
| 6        | 12.865               | 13.940               | 15.471               |
| 7        | 9.577                | 10.003               | 10.883               |
| 8        | 6.330                | 6.510                | 6.853                |
| 9        | 12.367               | 12.979               | 13.841               |
| 10       | 1.226                | 1.238                | 1.301                |
| 11       | 12.573               | 12.917               | 14.317               |
| 12       | 8.124                | 8.516                | 9.147                |
| 13       | 13.885               | 14.275               | 14.666               |
| 14       | 11.609               | 11.952               | 12.923               |
| 15       | 10.576               | 11.301               | 13.333               |
| 16       | 9.743                | 10.087               | 9.892                |
| 17       | 6.723                | 7.070                | 7.417                |
| 18       | 11.067               | 11.946               | 13.494               |
| 19       | 7.861                | 8.194                | 9.141                |
| 20       | 11.917               | 12.403               | 12.428               |
| 21       | 11.056               | 11.424               | 12.437               |
| 22       | 6.328                | 6.697                | 6.824                |
| 23       | 9.357                | 9.793                | 10.430               |
| 24       | 5.974                | 6.266                | 7.053                |
| 25       | 14.190               | 15.392               | 17.218               |
| 26       | 7.080                | 7.117                | 7.506                |
| 27       | 14.517               | 15.115               | 18.384               |
| 28       | 5.450                | 6.010                | 8.369                |
| 29       | 7.314                | 7.693                | 8.567                |
| 30       | 2.697                | 2.818                | 3.126                |
| 31       | 11.409               | 11.761               | 12.755               |
| 32       | 4.930                | 5.208                | 5.903                |
| 33       | 9.402                | 9.799                | 10.606               |
| 34       | 13.262               | 13.790               | 15.316               |
| 35       | 12.045               | 12.513               | 17.372               |
| 36       | 5.906                | 6.229                | 9.588                |
| 37       | 3.035                | 3.335                | 6.769                |

|                         |                |                |                |
|-------------------------|----------------|----------------|----------------|
| 38                      | 14.161         | 14.472         | 16.193         |
| 39                      | 5.146          | 5.416          | 7.062          |
| 40                      | 7.416          | 7.717          | 9.125          |
| 41                      | 9.798          | 10.380         | 10.862         |
| <b>Total</b>            | <b>373.613</b> | <b>391.283</b> | <b>445.137</b> |
| <b>Mean<br/>(tC/ha)</b> | <b>9.113</b>   | <b>9.543</b>   | <b>10.857</b>  |
| <b>Std Dev</b>          | <b>3.59</b>    | <b>3.74</b>    | <b>4.19</b>    |

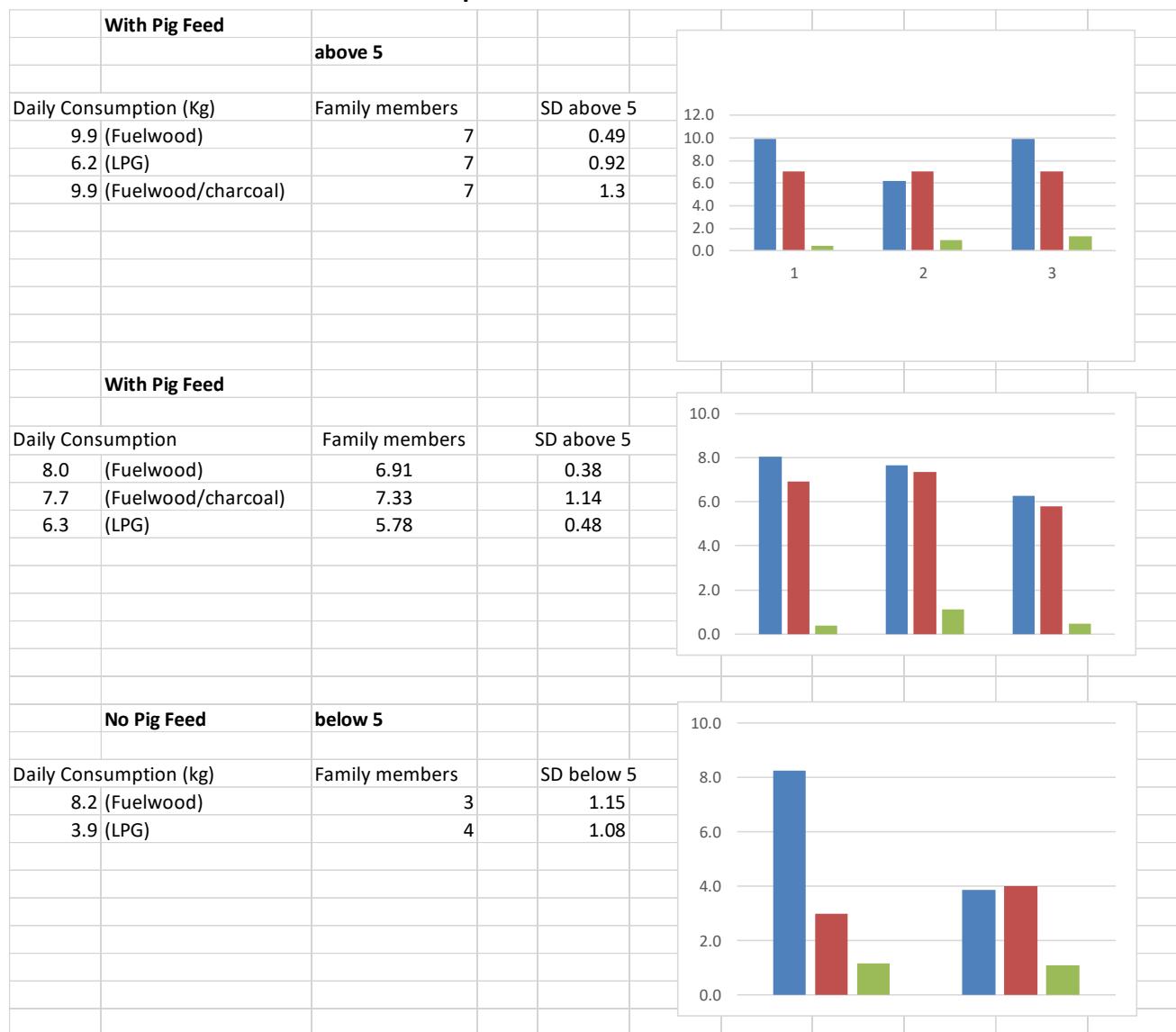
**Table 3: Dense forest plot carbon stock change for 2018, 2019, and 2020 in tC per hectare**

| <b>Plot No.</b> | <b>2018 Dense<br/>tC/ha</b> | <b>2019 Dense<br/>tC/ha</b> | <b>2020 Dense<br/>tC/ha</b> |
|-----------------|-----------------------------|-----------------------------|-----------------------------|
| 101             | 80.325                      | 80.985                      | 83.182                      |
| 102             | 90.301                      | 90.652                      | 92.374                      |
| 103             | 76.865                      | 77.484                      | 80.270                      |
| 104             | 124.088                     | 125.809                     | 127.939                     |
| 105             | 126.880                     | 127.612                     | 134.450                     |
| 106             | 107.716                     | 108.900                     | 116.454                     |
| 108             | 123.975                     | 124.991                     | 128.814                     |
| 109             | 64.394                      | 65.880                      | 68.613                      |
| 110             | 69.885                      | 70.559                      | 72.530                      |
| 111             | 134.670                     | 135.783                     | 136.040                     |
| 112             | 66.460                      | 67.997                      | 70.189                      |
| 113             | 69.431                      | 71.135                      | 74.565                      |
| 114             | 108.484                     | 109.505                     | 109.794                     |
| 115             | 126.821                     | 128.046                     | 125.905                     |
| 116             | 79.782                      | 81.776                      | 85.506                      |
| 117             | 65.045                      | 66.852                      | 70.752                      |
| 118             | 90.042                      | 91.265                      | 99.727                      |
| 119             | 109.408                     | 110.406                     | 112.918                     |
| 120             | 62.876                      | 64.808                      | 79.013                      |
| 121             | 75.810                      | 76.803                      | 84.015                      |
| 122             | 112.210                     | 113.317                     | 120.472                     |
| 123             | 154.102                     | 154.570                     | 157.695                     |
| 124             | 94.355                      | 95.192                      | 114.580                     |
| 125             | 102.083                     | 103.825                     | 109.872                     |
| 126             | 172.541                     | 173.502                     | 179.370                     |
| 127             | 136.509                     | 137.764                     | 143.430                     |
| 128             | 92.193                      | 93.786                      | 94.979                      |
| 129             | 148.434                     | 150.010                     | 153.051                     |
| 130             | 91.101                      | 93.090                      | 102.234                     |
| 131             | 88.367                      | 91.141                      | 95.420                      |
| 132             | 121.011                     | 123.165                     | 127.935                     |

|                         |                 |                 |                 |
|-------------------------|-----------------|-----------------|-----------------|
| 133                     | 117.292         | 119.090         | 123.191         |
| 134                     | 101.108         | 102.987         | 112.443         |
| 135                     | 170.654         | 172.473         | 176.031         |
| 136                     | 121.321         | 123.430         | 126.816         |
| 137                     | 145.216         | 146.128         | 150.960         |
| 138                     | 124.594         | 125.461         | 137.148         |
| 139                     | 156.411         | 157.098         | 166.716         |
| 140                     | 103.224         | 104.827         | 108.055         |
| 141                     | 135.743         | 138.119         | 143.498         |
| 142                     | 109.681         | 111.129         | 114.709         |
| 143                     | 118.622         | 121.083         |                 |
| 144                     | 120.923         | 122.477         | 132.110         |
| 145                     | 93.365          | 94.583          | 97.214          |
| 146                     | 65.209          | 66.850          | 70.546          |
| 147                     | 78.476          | 80.136          | 83.861          |
| 148                     | 79.937          | 81.157          | 86.251          |
| 149                     | 72.047          | 72.944          | 67.464          |
| 150                     | 89.999          | 91.794          |                 |
| 151                     | 90.872          | 92.282          | 97.385          |
| 152                     | 91.312          | 93.428          | 97.346          |
| 153                     | 124.080         | 125.491         | 127.995         |
| 154                     | 113.948         | 116.104         | 120.702         |
| 155                     | 84.516          | 85.819          | 84.327          |
| 156                     | 83.728          | 84.970          | 92.687          |
| 157                     | 79.755          | 80.668          | 81.962          |
| 158                     | 65.129          | 65.794          | 68.111          |
| 159                     | 67.122          | 68.342          | 71.843          |
| 160                     | 88.370          | 89.744          | 102.404         |
| 161                     | 63.346          | 63.712          | 68.582          |
| 162                     | 75.201          | 76.691          | 76.893          |
| 163                     | 95.980          | 98.265          | 101.835         |
| 164                     | 84.412          | 86.612          | 90.981          |
| 165                     | 132.488         | 134.253         | 137.800         |
| <b>Total</b>            | <b>6510.243</b> | <b>6600.554</b> | <b>6669.957</b> |
| <b>Mean<br/>(tC/ha)</b> | <b>101.723</b>  | <b>103.134</b>  | <b>107.580</b>  |
| <b>Std Dev.</b>         | <b>28.13</b>    | <b>28.13</b>    | <b>29.00</b>    |

## Annex 4: Fuelwood Reduction Analysis

Fuel usage surveys were conducted with 250 families in the Project area to determine the benefit of LPG distribution to communities dependent on wood and charcoal for fuel.



## **Annex 5: Incentive Awards 2020**

Each year the Federation gives incentive awards to the best performing Lower Working Committees (LWC) that are responsible for coordinating village natural resource management maps and planning, as well as to SHGs and women's microfinance associations, as well as FCs.

### **Forest Management**

Criteria: LWC

1. Regularity of meetings
2. Maintenance of records and financial management with pictorial documentation
3. Active participation of members towards conservation and preservation of forest and development in the community
4. Proper utilization of funds for Community Development Grants
5. Capability of spreading awareness through the meeting of Lower Working Committee in the Cluster level for availing ANR areas
6. Helping the community people to avail grants for alternative livelihood in reducing dependency on forest

### **Socio-Economic**

Criteria: SHG/Farmer's club

1. Active participation of the SHG/Farmer's club in the meeting and training programmes
2. Good maintenance in bookkeeping records and financial management
3. Activities implemented: regularity of meetings, monthly savings, group activity, individual activity and group interactions.
4. Flow of internal loaning and its repayment
5. A loan taken from the bank for group activity
6. Empowerment in social and economic aspects
7. Involvement within the Project area and with other organization
8. Active mobilisation / participation in the community in social development
9. Convergence with other Government Departments

**Awards were distributed to the best performing Lower working committee (LWC's), Self-help group (SHG), forest fire fighter and biodiversity rescuer. Below are the names:**

#### **1. Lower working committee (LWC's)**

- 1<sup>st</sup> Prize – Laitkynsew Cluster, Hima Laitkroh
- 2<sup>nd</sup> Prize – Mawlum Tysad Cluster, Hima Mawbeh
- 3<sup>rd</sup> Prize – Wahlyngkien Ramklang Cluster, Hima Mawphlang

## **2. Self-help group (SHG)**

- 1<sup>st</sup> Prize – Umpohliew SHG, Sohrarim, Hima Nongkhlaw
- 2<sup>nd</sup> Prize – Treilang 1 SHG, Nongwah, Hima Pamsangut
- 3<sup>rd</sup> Prize – Nangiaikyntiew SHG, Umdiengpoh, Hima Sohra
- Consolation Prize –Kyntiewjingshai SHG, Mawbeh, Hima Mawbeh

## **3. Forest fire fighters**

- Special awards were distributed to 66 members of the communities who have contributed in environmental services by controlling forest fire in Hima Laitkroh, Hima Pamsanngut, Hima Mawphlang, and Hima Nongspung.

## **4. Biodiversity Rescuer**

- Mr. Tonil Nongbet, Mawrohroh village, Hima Nongspung rescuing black bittern
- Mr. Jeking Kurbah, Umtyrniut village, Hima Mawphlang rescuing teal duck
- Mr. Bhina Kharshiing, Laitsohphlang village, Hima Lyngiong rescuing mud turtle
- Mr. Rivius Suting, Nongtyngur village rescuing slow lorises
- Mr. Kelstar Kharshandi, Kyrphei village, Hima Mylliem rescuing two civet cats
- Mr. Soben Kharphuli, Wahlynkien Sunei, Hima Mawphlang rescuing leopard cat
- Mr. Rockesh Star Nongrum, Ladmaophlang village, Hima Laitkroh rescuing Nightjar