

HCS Peer Review Panel Report for Calaro Extension - Nigeria

22 March 2017

Background information:

- a) Did a Registered Practitioner Organization lead the HCS assessment? If not, has the organization which led the assessment started the process of registration? Yes, TFT
- b) Was the HCS Team Leader a Registered Practitioner? No, Dominique Herman as TFT Lead Assessor, Forester and GIS Analyst.
- c) Were at least 2 HCS team members Registered Practitioners? No, Mr. Darumaya – GIS Team Leader for Calaro Estate and Ir. Asen Ako, Sustainability Manager, Biase Plantation Ltd are both from Wilmar but they are not registered practitioners.
- d) Was the HCV assessment judged 'satisfactory' (highest rating) by the HCV Resource Network (HCVRN) Assessor Licensing Scheme (ALS)? (See <https://www.hcvnetwork.org/als/public-summaries>). HCV assessment completed in September 2014, 3 months before the launch of the HCV ALS. The HCV assessors were RSPO Registered Assessors, which was the available standard at that time.

Questions for peer reviewers

(Peer Review Panel: Alex Thorpe, David Wilkie)

1. Peer Review Summary

- 1.1. What are the major findings and recommendations from the peer review?

Finding:

The Summary Report provides a clear representation of community engagement, the FPIC process and participatory resource and land use mapping (2.1).

The communities nominated their own representatives. Community views appear to have been addressed and are reflected in the concession management plan (2.4, 2.5).

High Carbon Stock Approach

The HCV area ... is too small to support viable, self-sustaining populations of Sitatunga and slenders-nouted crocodiles without a subsidy from adjacent forest reserves. Recommend to investigate the feasibility of extending the HCV management area to the south east to connect with the Oban Forest Reserve (see 3.4).

Need to review and revise area figures to ensure consistency between report tables and GIS data (see 4.1).

Imagery used for land cover assessment is 3 years old. Suggest to do a quick review of land cover using more recent images to see if there have been any major changes in the last 3 years. There is excellent high resolution data available on google earth (Dec 2015) and there is also a Landsat 8 image available for download from USGS dated Jan 2016 (see 4.2).

Average carbon per ha per strata reported (Summary Report Section 7.8) appears to have been calculated using the initial land cover stratification (Summary Report Section 7.2). Carbon stocks per ha per strata needs to be recalculated using the final land cover stratification. (see 5.4).

There are a total of 15 potential HCS patches identified, but the final patch list table (Section 9.1 Summary Report) only lists 9 patches. The other 6 patches have been recommended for development. As this area is assessed to be in a low forested landscape, under the toolkit these patches should go to Pre-RBA/RBA before release (see 6.3).

The proposed HCV/HCS Corridor design does not directly take into account areas recommended for conservation and/or RBA under the HCS patch analysis. The decision for conserve/develop has been made based solely on whether land is inside or outside the 2014 HCV management area. The toolkit does allow for rationalization of conservation area boundaries. The corridor area does represent a significant set aside, and the design is a solid defendable reserve area. However, the decision not to conserve HCS areas recommended for conservation / RBA needs further explanation/justification. No Pre RBA or RBA is planned to justify this exclusion. (see 6.4).

Reviewers Recommendation:

Wilmar has provided written responses to all recommendations, including additional data. Wilmar has revised the Summary Report where it felt revision was necessary based on the recommendations. In general, the responses from Wilmar were satisfactory.

High Carbon Stock Approach

Although the project team followed the patch analysis process rather loosely, the peer reviewers accept the HCS assessment report in its current state and do not have any issue with the final proposed conservation area. Wilmar has undertaken engagement with local communities. The residual forest areas are rather degraded.

No further action is needed.

1.2. Did the HCS assessment team include or have adequate access to relevant expertise to undertake the HCS assessment?

Finding:

Yes.

Reviewers Recommendation:

No further action needed.

1.3. What elements of the HCS Approach still need to be completed in order to create a final land use and conservation plan? Are there aspects which you feel need to be re-done?

Finding:

See above

Reviewers Recommendation:

No further action needed.

2. Social Issues

- 2.1. Does the summary provided in Section 3.1 adequately represent and explain the community engagement, FPIC processes, and participatory mapping activities carried out?

Finding:

Yes the summary does provide a clear representation of community engagement, the FPIC process and participatory resource and land use mapping. The report states that local communities are the land owners. However in reality all land is actually vested in the hands of the governor of the Cross River State (cf Landuse Act of 1978). Thus, though communities with traditional access and use claims are to be consulted and theoretically provide their consent before the governor signs the Certificate of Occupancy that confers a 99 year lease to the individual or firm, the governor retains the right of eminent domain and can “acquire lands for overriding purposes.” Thus the consultation appears to be more about compensation for an eminent domain taking than providing communities with the option to refuse the taking.

That said all communities (or their titular leaders) did provide consent (though youth groups were concerned about their loss of income from the sale of raffia products and other NTFPs) and did agree to a once-off compensation payment and annual rents from BPL (which appear to have been paid to the State after CRS and Wilmar signed a Deed of Grant that “specifies the conditions for the lease of the land”). BPL/Wilmar did consent to community stipulations about protecting certain community lands and the right to clean water from the Uwet, Calabar, Ababua rivers.

Interesting the social team noted that “A major challenge ..*they*... faced was the fact that the communities had high expectations for the proposed oil palm project and were extremely excited about the prospects. Hence, during our engagement with them, we noticed that they were exceptionally positive about the project and refused to even consider any potential negative impacts.”

Reviewers Recommendation:

No further action needed.

- 2.2. Has a tenure study been completed and has it been vetted by independent social experts?

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Finding:

The report acknowledges that prior to the 1978 Landuse Act communities were the customary land owners. Since 1978 all lands are vested in the State and governor is effectively the trustee of these lands. Under Nigerian law communities have no legal tenure, and the governor has the right to take communities lands by eminent domain and lease these lands for 99 years to individuals or firms such as BPL.

Reviewers Recommendation:

No further action needed.

- 2.3. Is there a participatory land use map and does it contain the key components of community land use including the minimum requirement of 0.5 ha per person for future garden areas?

Finding:

As a result of a participatory mapping exercise BPL agreed to set aside (i.e., exclude from the oil palm plantation) an area of 94.31 ha surrounding the Akpa Uwet enclave settlement. However as there is no census information on Akpa Uwet this reviewer is unable to determine if the area set aside meets or exceeds the 0.5 ha/person threshold for future garden areas. Similar it is not known whether the 102.35 ha (16.88ha inside and 85.47ha outside the concession) for the Efi-Efeum Uwet settlement or the 245.03ha (outside the concession) for the Okopedi Uwet settlement is sufficient as no census data are provide for these settlements.

Reviewers Recommendation:

The report needs to include census data to ensure that the review can assess whether Akpa Uwet and Efi-Efeum Uwet have sufficient land for future gardens.

Land cover estimated from sample plots (Table 1 in Calaro_Ext_HCV_Final2_with_HCVareas (final).pdf) indicates that active farms (208.30 ha) and fallow lands (617.40) cover 825.70ha within the concession. But as only 111.19ha are to be set aside for Akpa Uwet (94.31ha) and Efi-Efeum Uwet (16.88ha) this amounts to a loss of food production capacity of resident communities of 706.51 ha.

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RSPO NPP (effective 1/1/2010) states that all new oil palm plantations should preclude conversion of “local people’s land.” How is this stated principle reconciled by conservation of 706.51 of active farms and fallow lands? I assume that it is OK if the community land users provide their consent.

Assuming that communities consent to the conservation of farms and fallow lands, in the future the value of lost agricultural lands that should be compensated as the result of an eminent domain taking should be calculated based on their Net Present Value to the current land users.

Wilmar’s response: Based on results from different census (Effe fiom, Ekopodi) it indicated that for Akpa Uwet there was 320 people. They mostly do cassava, banana, plantain, vegetables, corn and yams. No tree crops. They use lots of wild palm to do their palm oil. Most of the palms are in the demarcated area. The initial area demarcated was about 68.52 ha. Wilmar has extended it to 94.31 ha. During the survey, it was also observed that the community there do lots of fishing. And the Calabar River is still available for fishing purpose. Beside that the members of the community who could really work (age between 21 and 50) was about 108 persons. The only concern here will be when the activities start. It is possible that the community members accepted that workers live in their village against a loan. This may increase rapidly the population of this village. Lot of sensitization will be needed here. Considering these facts, the area provided is viable.

For Efi-Efeum, and even Akpa Uwet, the Uwet community (who is the land owner but living far outside the concession area) has clearly stated that there is enough land outside where members of each of these communities could continue their farming. This area has been demarcated as well and Darumaya has the maps as well.

The responses from Wilmar were satisfactory and as a result – No further action needed.

2.4. Is there a record of consultation with affected communities and FPIC processes on the proposed development, the HCS Approach and issues/concerns they raised? Did the community nominate their own representatives?

Finding:

Yes there is a record of consultation with affected communities. Given the information provided it appears the communities did nominate their own representatives.

Reviewers Recommendation: No further action needed.

- 2.5. Were their views addressed and reflected in the plans and implementation of the plantation? Is there specific reference to the customary owners being made aware that they can say no to the development and they have the right to independent legal representation with regard to their agreements before they sign (to meet the 'prior informed' test)?

Finding:

Yes the communities views appear to have been addressed and are reflected in the concession management plan. Under Nigerian law (the Landuse Act of 1978) all lands are vested in the State which has the right to take any lands without consent and without compensation "except for economic crops and other betterments of the land". So communities are not the land owners and under Nigerian law cannot "say no the development."

Reviewers Recommendation: No further action needed.

- 2.6. What recommendations do you have for any improvements regarding community consultation and negotiation of Free, Prior and Informed Consent?

Finding:

When all lands are vested in the State and the when the State reserves the right of eminent domain to take lands for public utility without land-user consent or compensation, customary land owners have no legal recourse to the taking. In this situation community consent and FPIC are seriously circumscribed.

According to ProForest "The field survey in Atan Odot was conducted from 05-07 March 2014, in Ikot Eyidok family unit (of Etak Inoi community) from 10-12 March 2014, in Uwet from December 2011 to February 2012 & 18 March 2014 and finally on 22 July 2014 for all host communities & state-level stakeholders on 23 July 2014. For the Uwet community, a detailed field survey was undertaken between December 2011 and February 2012 prior to the development of the Calaro concession."

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Two days of consultation in Atan Odot and the Ikot Eyidok settlement of the Etak Inoi community seems exceedingly brief, and certainly insufficient time to gain the trust of the community and have an open and frank discussion. Engagement of community members in the survey team was a useful and sensible idea.

It is unclear how long was spent between December 2011 and February 2012 in the various Uwet settlements.

Though it makes sense to invest more time to assess the impact of the concession on the enclaved Akpa Uwet settlement the report does not say how long each Uwet consultation lasted.

Reviewers Recommendation:

To better understand the process of consultation and FPIC it is important to provide the reader with a calendar of activities within each community (i.e., what was done, for how long, over how many days). Table 5 in the full HCV report only provides vague start and end dates.

Wilmar's response: It is important to distinguish between time spent on each community for the independent SIA and the time spent on community engagement as part of the FPIC process. The days listed here are for the SIA. A team of experts visited each community to conduct focus group discussions, townhall meetings and administer questionnaires. Time allocated for this is certainly in keeping with normal practice for SIA.

The responses from Wilmar were satisfactory and as a result – No further action needed.

3. Ecological and Conservation Values

3.1. Does the summary provided in Section 4.1 of the Summary Report adequately represent the findings of the HCV study?

Finding:

The summary report directs the reader to the full HCV reported (Calaro_Ext_HCV_Final2_with_HCVareas (final).pdf). The current summary document does not summarize the findings of the HCV study.

Reviewers Recommendation:

The summary document should not simply point the reader to the full HCV report but should summarize the key findings as was done for the social assessment.

- 3.2. If the HCV assessment was not judged satisfactory (highest rating) by the ALS scheme of the HCVRN (as noted in the introductory information from the HCS Secretariat – please see page one of this document), please do a cursory review of the HCV report as it relates to HCVs 1-4. Do you have any general comments on the quality of the site description, the analysis of the landscape and national or regional context, or the methods used to undertake the HCV study? Were the determinations of the absence/presence and extent of HCVs 1-4 well-justified? Are the HCV management and monitoring maps accurate?

Finding:

As noted on the first page this “HCV assessment was completed in September 2014, 3 months before the launch of the HCV ALS.” Best practice wildlife survey methods typical are based on distance sampling along linear transects (Buckland, S.T., Anderson, D.R., Burnham, K.P. and Laake, J.L., 2005. Distance sampling. John Wiley & Sons, Ltd.) or Presence/Absence surveys within cells distributed across and representative of the survey area. The use of 10 (500x500m) plots suggests that the Proforest survey team chose the latter, possibly because faunal densities were too low to warrant use of distance sampling methods.

Reviewers Recommendation:

In the future HCV within a concession would be better assessed if it were compared to comparable lands outside the concession. Though this quasi experimental design with “controls” would, of course, be more expensive to implement.

- 3.3. Please review Section 9.2 of the Summary Report. Was the methodology used for the Pre-RBA and the Rapid Biodiversity Assessments (if any) satisfactory? Did the RBA(s) reveal any significant biodiversity values that should have been captured in either the HCV assessment but were not, or warrant protection?

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Finding:

RBA was not undertaken as a part of the BPL/Wilmar assessment by ProForest.

Reviewers Recommendation: No further action needed.

3.4. Are the forest conservation management and monitoring activities outlined in Section 10.3 adequate? Do they take into account forests and protected areas outside the concession?

Finding:

Section 10.3 in the summary report has not been completed. Section 7.3.3 and section 8 in the full HCV report provide suggestions to BPL on management practices and biodiversity monitoring within the set aside areas. These are appropriate though wildlife surveys in such a small area with very few species may not be able to detect changes in species presence/absence using a plot method.

It is unclear how and with what authority BPL would “avoid the depletion of fauna within the wider landscape” (see Section 7.3.4 page 88). BPL’s jurisdiction is limited to the concession area and has no authority to enforce either company rules or national wildlife laws outside the concession.

Youth groups noted that they were concerned about loss of access to NTFPs that they gathered within the concession area and used as their sole source of income (given high youth unemployment levels on local communities). Section 7.6.1.3 suggests no provisions for ensuring community youth are preferentially hired as BPL plantation workers as compensation for their lost NTFP enterprises.

Reviewers Recommendation:

On page 86 the report talks about maintaining connectivity between forest reserve but fail to suggest extending the HCV management area to the south east to connect with the Oban Forest Reserve.

Monitoring in the HCV management area maybe more costs effective using camera traps that may be better able to detect scarce fauna and to detect prohibited human incursions.

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I would advise against enrichment planting unless it is simply distributing seeds within the HCV management areas of native species gathered in adjacent forest reserves.

The HCV area (637 ha) and swamp area (260 ha) are even together too small to support viable, self-sustaining populations of Sitatunga and slenders-snouted crocodiles without a subsidy from adjacent forest reserves. Thus connectivity to the Uwet reserve in the NW and Oban reserve in the SE will be essential. That said there is a risk that these very small populations will go locally extinct as a result of unobserved factors even if their habitat remains and hunting in the HCV management areas of the concession is prohibited and effectively enforced.

BPL should strictly enforce a ban on hunting in the concession, and to fine or fire employees caught with hunting equipment or game regardless where these animals were hunted. The latter requires mobile patrols of law enforcement officers within the concession policing the roads and entry to the staff housing compound to detect unlawful transportation of hunting equipment and game.

Wilmar's response: We spoke about that point during meetings with the villagers. Wilmar will incorporate into conservation plan that NTFPs can be collected as long as no hunting takes place. Incorporate into community co-management plan for HCS set-aside.

Community also agreed to have a co-management of the corridor so that no hunting and farming will take place. But we agreed also that they continue their fishing activities in the swampy areas as well. These 6 patches presented no core area at all, they were also visited on the field (pre-RBA) and most of them had clear signs of agricultural activity or heavy degradation.

It is not that the swampy areas are limited to the concession area. They continue outside as well and join the Oban forest reserves. The only activity that happen there is mostly fishing.

The risk of deforestation is low and connectivity to Oban will likely be maintained. Wilmar will nonetheless aim to engage communities to protect this area if it starts to be under threat. These 6 patches presented no core area at all, they were also visited on the field (pre-RBA) and most of them had clear signs of agricultural activity or heavy degradation. Connectivity is achieved through the proposed conservation plan because Oban forest reserve is connected on the southern boundary of the concession. However, this "forest reserve" has almost no forest left at all, and very large and industrial scale mining and quarry operations are happening within the forest reserve. The issue of hunting in the concession is incorporated in the management plan. The HCV/HCS monitoring SOP already mentions it.

The responses from Wilmar were satisfactory and as a result – No further action needed.

4. Image Analysis

4.1. Please review Section 6.1 of the Summary Report. Was the Area of Interest correctly identified?

Finding:

Section 6.1 consists only of a map showing the license area boundary. AOI is therefore assumed to be the license area boundary. Text defining the license area boundary is in Section 1.

Area inside the license area boundary is 2,367.45 ha. Shp file is provided - we have checked and confirmed this total area figure. This area figure is also described in Section 1. However, there are a number of discrepancies in area figures between text, shape files and area tables in report.

1. Section 6.6 & 6.7: Initial vegetation cover stratification tables total 2292.1 ha (shp files not submitted so can't check this).
2. Section 7.8: Inventory results table refers to an area of 2273.5 ha.
3. Section 8.1: Final Vegetation Class Stratification. We have the shp file for this, with total area 2,344.21 ha. The discrepancy is due to a mixture of boundary differences (see north side village buffer) and a number of slivers/gaps in the data. (see map in word file sent- it's a GIS housekeeping issue)

Reviewers Recommendation:

The responses from Wilmar were satisfactory and as a result – No further action needed.

4.2. Please review Section 6.2 of the Summary Report. Were the images used of adequate quality, including resolution and date?

Finding:

1. Report indicates data used for stratification was WorldView-2 satellite image data (0.46m resolution) supplied by Wilmar. The image capture date was 14th January 2013.
2. Imagery resolution is good but its 3 yrs old so there is a strong likelihood of changes in land cover since then given proximity of villages.

Reviewers Recommendation:

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1. Suggest do a quick review of land cover using more recent images to see if there have been any changes in the last 3 years. There is excellent high resolution data available on google earth (Dec 2015) and there is also a Landsat 8 image available for download from USGS Jan 2016.
2. Wilmar commented that when the field study started in early 2014 the imagery was relatively new. That may be the case but if as they are submitting a report for review in late 2016 a quick review would have been logical.

- 4.3. Please do a quality check using the images provided in 6.3. Was the initial vegetation classification done properly? Do the land cover areas in the tables in Section 6 look reasonable? Are there any obvious errors in classification?

Finding:

1. There does not appear to be much land in the “forest” strata remaining in the AOI. Land Cover Area tables look reasonable in this regard.
2. Imagery supplied is in ecw format (heavily compressed) so it’s difficult for us to carry out a check of boundaries between YRF & scrub.

Reviewers Recommendation:

1. Suggest a recheck is done using newer data as recommended in 4.2. (See response to 4.2.)

5. Forest Inventory

- 5.1. Please review Sections 7.1 and 7.2 of the Summary Report. Were the sample plots selected, set up, and measured properly? Please check the inventory plot layout for adequacy.

Finding:

1. Distribution of plots across the AOI is adequate.
2. Number of plots measured is sufficient.
3. Waypoints of plots measured have been provided in shp form.
4. No inventory data set has been provided so it isn’t possible to comment on measurements themselves.
5. No problem with the inventory plan.

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Reviewers Recommendation:

The responses from Wilmar were satisfactory and as a result – No further action needed.

5.2. Please review Section 7.3 of the Summary Report. Was the forest inventory team qualified?

Finding:

1. Qualifications or experience of the team members not provided in the report. It appears the team consists of staff of Wilmar (?).
2. Inventory training was provided by TFT.
3. No tree heights or species data was collected (?). Therefore, the field measurement skills necessary are limited to locating the plot, measuring plot boundaries to ensure trees are correctly identified as in/out of the plot boundary and finally measuring diameters on “in” trees. A well-trained team of plantation technicians should be capable of doing this measurement.

Wilmar’s response: Dominique did the calculations and Wilmar did the measurements after the staff has been trained. Further information on the team member’s qualifications can be provided. Note that this HCS Assessment was completed prior to the establishment of the HCS Registered Assessor’s list.

Reviewers Recommendation: The responses from Wilmar were satisfactory and as a result – No further action needed.

5.3. Please review Section 7.4 of the Summary Report. Was the allometric chosen adequate?

Finding:

The allometric equation chosen is a recognized equation. The equation does not utilize species or height and as such utilization of this equation provides a broad estimate. As neither species or height were captured in the inventory the selection is reasonable.

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Reviewers Recommendation: No further action needed.

- 5.4. Please review Sections 7.5, 7.6, 7.7 and 7.8 of the Summary Report, and do a cursory review of the forestry data and statistical analysis. Are there any obvious errors in the raw forestry data? Are there any flags where a result does not seem consistent with your rough interpretation of the land cover image? Do the final carbon classes seem accurate given what is known about other forests in the region?

Finding:

1. No inventory data set has been provided so it isn't possible to comment on data and statistical analysis.
2. Average carbon per ha per strata reported (Section 7.8) appears to have been calculated using the initial land cover stratification (as in Section 7.2). Plots have not been re-allocated based on the final land cover stratification.
3. Results of the statistical analysis do seem consistent with the land cover strata and our knowledge of results in similar strata elsewhere.

Reviewers Recommendation: The responses from Wilmar were satisfactory and as a result – No further action needed.

6. Land use planning

- 6.1. Please review Section 8.1 of the Summary Report. Was the initial vegetation classification map adequately calibrated and adjusted to take into account forest inventory results?

Finding:

There is no explanation of the calibration. As there is no inventory data or explanation of the provided, it is not possible to comment on the calibration process.

Reviewers Recommendation: The responses from Wilmar were satisfactory and as a result – No further action needed.

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- 6.2. Please review Section 9 of the Summary Report. Was participatory mapping data used in step one to identify community lands that should be enclaved? Were patches merged correctly? Was the core area correctly identified? Was the connectivity analysis done correctly?

Finding:

1. Participatory mapping was carried out (Summary Report Section 3). Although community lands were not removed in the patch analysis process, they have been enclaved in the final land use plan map.
2. No shp files of patch analysis steps have been provided. There is no list of individual patches with patch ID and patch class to enable checking of patch analysis. Therefore it is not possible to do a review of the GIS based work (connectivity, risk etc).
3. The map image in the report (Section 8A) indicates that patches have been merged correctly and core areas calculated correctly.

Reviewers Recommendation: The responses from Wilmar were satisfactory and as a result – No further action needed.

- 6.3. Please review Section 9 of the Summary Report, and select a few sample patches to test that the Decision Tree was used correctly. Were the patches correctly identified as High, Medium, or Low Priority? Was the Patch Analysis done according to the HCS Approach Decision Tree?

Finding:

1. Patch analysis shp files were not provided so testing is not possible, this includes allocation of priority. Report table (9.1) only shows final recommendation for each patch (conserve or RBA).
2. There are no high priority patches – largest patch has core 26ha.
3. There are a total of 15 potential HCS patches, but the final patch list table (Section 9.1 Summary Report) only lists 9 patches. The other 6 patches all have core area of less than 1 ha – these have been removed/recommended for development. The latest toolkit version does not include automatic removal of these patches. As this is a low forested landscape under the toolkit these patches should go to Pre-RBA/RBA.
4. Shp files of patch analysis process need to be provided.
5. Small patches should be allocated to Pre-RBA/RBA.

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6. If the land cover stratification is redone (see 4.2 & 4.3 above) then all patch analysis work will have to be repeated.

Wilmar's response: The idea behind the give and take is sustained by the fact that the different patches were too small to be preserved. The core areas were less than 10 ha. Furthermore, for the continuity of its operation, Wilmar proposed to take these patches and give more land as conserved area in the corridor. The company decided also to reforest some degraded areas within the corridor. We think that this decision matches very well with the new HCSA step 12 mentioning the conditions of "Give and Take" of low priority but also of medium priority patches. Shp files will be provided. In addition, core areas of small patches were non-existent. Field visits were conducted, many of them were close to the villages and had some agricultural activity

Reviewers Recommendation:

Wilmar refer to the "give and take" principle and the fact that the different patches were too small to be preserved. This is a fair point but there is no information in the report describing what is finally being given and what is being taken, so it is difficult to review.

6.4. Please review Sections 10.1 and 10.2 of the Summary Report. Were the final integrated conservation and land use planning steps completed to maximize the ecological and social viability of the conservation areas (HCV, HCS, peatland, riparian zones, customary forest, etc)? Were the results of the final ground verification (if any) adequately incorporated into the land use plan and final HCS map?

Finding:

1. Community enclaves appear to have been well planned and agreed to by communities.
2. In the final Land Use Plan, assessors have created a single conservation reserve centered around the Ababua River and associated wetlands referred to as "Combined HCS/HCV Corridor" covering 636ha (based on figure on map in Section 1.3). In fact, the Corridor consists of the HCV management area identified in the ProForest HCV Report from 2014.
3. The report describes the Corridor as being "designed to integrate the conservation of these swamps and maximize the conservation of important HCS areas. The whole approach therefore created a solid connection between Forest reserves and cohesion of humid

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ecosystems (rivers and swamps).” The toolkit does allow for rationalization of conservation area boundaries. The corridor area does represent a significant set aside, and the design is a solid defensible reserve area.

4. The Corridor design does not directly take into account areas recommended for conservation and/or RBA under the HCS patch analysis, and no Pre RBA or RBA is planned. The decision for conserve/develop has been made based solely on whether land is inside or outside the 2014 HCV management area.
5. Some of the HCS areas excluded are contiguous with the Corridor.
6. There are some “forest strata” areas outside the Corridor. Under the toolkit these areas are supposed to be conserved.

Reviewers Recommendation:

The decision to remove HCS areas recommended for conservation / RBA needs to be justified. (See response to 6.3)