VCS PROJECT REVIEW REPORT

Project ID	1345
Project Name	Boyabat Hydroelectric Power Plant
Project Proponent	Boyabat Elektrik Uretim ve Ticaret AS
Methodology	ACM0002 v14
Sectoral Scope(s)	1: Energy industries (renewable/non-renewable sources)
Validation/Verification Body (VVB)	TÜV Rheinland Energie und Umwelt GmbH
Registry	APX

Assessment Criteria	VCS Standard v3.4, VCS Program Guide v3.5, ACM0002 v.14 ""Large-scale Consolidated Methodology: Grid-connected Electricity Generation From Renewable Sources"
Date of First Issue	22 August 2014
Date of Second Issue	19 September 2014
Date of Final Issue	24 October 2014

Summary:

A review of the Boyabat Hydroelectric Power Plant has been initiated by VCS in accordance to its responsibilities set out in Section 2.5.6 of the *VCS Program Guide* and carried out in conformance with the relevant procedure contained in Section 7 of the *VCS Registration and Issuance Process.*

The review has raised one assessment finding detailed below. The project proponent, in coordination with the VVB as may be necessary, is hereby required to provide a response to the assessment finding presented in section 1. The assessment finding must be addressed to the satisfaction of VCS. As per Section 7 of the *VCS Registration and Issuance Process*, further issuance of VCUs from the project is temporarily suspended during this review process.

1 ASSESSMENT FINDINGS

Finding 1

Section 3 of the VCS Program Guide v3.5 states that GHG emission reductions and removals verified under the VCS Program and issued as VCUs shall meet the principle of additionality, in that "*GHG emission reductions and removals must be additional to what would have happened under a business as usual scenario if the project had not been carried out*."

Section 2.5.6 of the VCS Program Guide v3.5 states that VCS "*reserves the right not to register projects and programs, or issue VCUs where it deems that they are not in compliance with the VCS rules or may otherwise impact the integrity of the VCS Program or the functioning of the broader carbon market, and to delist projects, programs and VCUs where it deems that they have not been registered or issued in accordance with the VCS rules*."

Section 1.1 of the project description states that the first feasibility for the dam was conducted in 1958, technical and budgetary works were conducted in 1979, and the final design of the project and construction of tunnels and roads were completed by 1986. The section goes on to state that the project was offered to the private sector in the 1990s, where in 1999 the final design of the project was updated.

Section 5 of the project description states that "*since the project has a history that goes back to 1958…the Boyabat HPP project is exempted from conducting an EIA*."

Section 5 of the project description further states that because "*the project was started in the early 1950s the villagers were aware that they would be obliged to be relocated*."

The above references in the project description seem to strongly indicate that there has been an intention to develop the project long before any conceptualization of carbon markets. As such, the emission reductions may have happened under a business as usual scenario, in contravention to the principle of additionality. Allowing registration of projects that have taken such significant actions decades before carbon market conceptualization runs counter to the spirit and intent of the VCS Program and the wider carbon market. Therefore VCS has serious concern that the project may impact the integrity of the VCS Program or the functioning of the broader carbon market.

The project proponent, in coordination with the VVB as may be necessary, is requested to describe how it can be considered that the project is not the business as usual scenario taking into account of its history. Furthermore, information is requested on how the project adheres to the principle of additionality and thus does not negatively impact the integrity of the VCS Program and the functioning of the broader carbon market.

Project Proponent/VVB Response:

The projects nature and long history has been made available at a very early stage and both, the PO/PP and the V/VB are well aware of that.

However also the VCS has committed itself to its program rules and approved CDM methodologies. Notwithstanding any ambiguous discussions about the project, its nature and impact all involved parties have to adhere to some explicit guidelines which make it possible to assess projects according to a carbon project standard, such as the VCS in the first place. The Validation of the project follows

this rationale exactly by applying such approved methodology, namely ACM0002. Also the underlying tool for the demonstration and assessment of additionality has been used. Both relevant aspects, the consideration of the Baseline Scenario as well as the assessment of Additionality have been conducted strictly according to the methodology. Elaboration on both subjects can be found in the Final Validation Report.

The baseline for grid connected renewable power plants is pre-defined in the methodology following section 5.2 herein. Hence there is no room for interpretation with regard to this and a definition of a "business as usual scenario". The definitions of the project nature under section 4 of this methodology provide further clarifying guidance.

For additionality assessment the aforementioned tool has been strictly followed by applying the investment analysis in particular (whereas this is the only step an option can be chosen) taking into account a well-documented and proven timing of investment decision date.

As a conclusion both aspects, the baseline and additionality principles have been considered and were assessed positively as described in the Validation Report.

Project Proponent Response:

We understand that the long and complex history of the project activity had caused a confusion. We also understand that this confusion further caused a misunderstanding about "the definition" of the project activity. We strongly believe that our project history is not hidden, and is not exhibiting a project that would anyway be realized, but instead a project where government resources and efforts were spent but these efforts were stopped by lack of finance despite the guarantees provided by the treasury of the host country (namely Republic of Turkey) . We therefore want to bring your attention not to the year 1958 but the gap between the years 1999 and 2008. Why on earth, would a project wait 6 years to take off. In year '99, the project could have been developed under the guarantee of the treasury and could be built, operated and transferred back to the government. But please note that, the project was not implemented, and it is transferred back to the Ministry of Energy and its license is auctioned and the auction was won by "Boyabat Energy", where Doğuş, the earlier BOT title winner was also part of the consortium. So a distinction is also necessary related to the project proponent.

The project proponent has the carbon finance signed and indicated in their main finance agreement that was signed in 2010 after the bridge loan agreement that was signed in 2009. The finance negotiations with the banks was started in 2007 and was concluded only in 2010. **But prior to the firm investment decision date (Construction start date), the project owner started to look for a consultant to develop the carbon assets. All these documents are provided as Addendum 1 "early consideration.zip**" (Please download it from the following link: https://app.box.com/s/7xnwgy8tkz2mbov6e7by).

VCS is requesting us to explain why the project is not the Business as usual scenario, when we are mentioning that the villagers was expecting the project to be realized since 1950s, or when the project was not asked to go through an environmental impact assessment due to its ties going back to 1950s.

One must consider that the expropriation issues and the EIA process are bound by the legal implementations in the host country[1] and has nothing to do with the concepts of baseline or additionality.

Yet, taking into account that the project is a large hydro project, it is important to see if it made the local stakeholders upset or the operations harmed the environment seriously. To assess this one must check and see that the project scored sustainable for the Natural resources score due to the Environmental Management and Risk Management certifications provided as an Annex (Annex 2) to the Social Carbon report. And the project is also committed to increase its score related to biodiversity by improving its score related to research about ichtyofauna.

Besides the jobs the project provided to the local inhabitants during the construction phase it is providing 18 permanent jobs to the people living in the immediate project vicinity and another 39 from the host country. In addition to this the project have added new infrastructure and improved the quality of life by the new settlements (such as the Kızılırmak Neighbourhood) they have built for the host country citizens that are effected from the project activity. And as long as the project will operate the project will be contributing to the local economy as they are procuring all their possible needs locally, and renting housing from the vicinity and so on.

Therefore, refusing an already successfully registered project that is technically proved to be additional according to the methodological approach required by the VCS would essentially harm the integrity of voluntary carbon markets that aim not only reducing emissions but also helping communities.

VCS Response:

The project proponent states that in 1999 the project could have been developed under the "build, operate and transfer" model, but that ultimately the project was not implemented.

The project proponent is requested to please explain why the project was not developed at the time when this option may have been available.

The response from the project proponent also states that the license was auctioned off and won by Boyabat Energy, and that Doğuş was part of the consortium.

The project proponent is requested to please clarify when Boyabat Energy won the license to the project, and to also please explain the distinction of title ownerships as it relates to Doğuş and Boyabat Energy.

Project Proponent Response:

As can be seen from the correspondences between the Project Owner (Boyabat Enerji) and the government authorities such as Ministry of Energy and Natural Resources and General Directorate of state Water Works, (Please see document tittled "1-Project History Related Correspondences") the project was contracted to Boyabat Elektrik Üretim ve Ticaret Ltd. based on Law No:3096, the Built operate and Transfer Law (http://www.juristurk.com/law-no-3096-english-version/). The project could

[1] Please also note that Boyabat Elektrik asked the host country authorities if an EIA was requested and the Ministry of Environment officially responded that they were exempted-The correspondence can be provided upon request

have been developed under the guarantee of the treasury and could be built, operated and transferred back to the government at that time if and only if the financing problems could have been solved. In their article tittled “A Brief account of the Turkish economy: 1980-2000” Ertuğrul and Selçuk (2001) describes the economic environment when the project was tried to be developed in those years, and as one can understand, due to the hardship at this period no finance institution was found to provide loans for the development of the project. This paper also provides information on why it was not possible to develop the project neither by the government nor by the BOT tittle owner.

Later on, as clearly explained in the project history, in 2007 the shareholder structure, have changed, and Dogan Holding and Unit Group have joined the project. In addition to this the BOT tittle owner applied to EMRA to change the license status to Private Production License, whereby for a period of time (49 years) all the project revenues are given to the Production license owner. Thus the finance institutions first agreed to sign a “bridge loan” that helped the project startup and the main loan agreement also was signed taking into account the carbon revenues of the project activity. To explain all this we are providing the translated version of the Law number 4628, the translation of the Electricity Production License, the initial share holder staructure in 1999 when the Boyabat Elektrik Üretim and Ticaret Ltd. was only belonging to Doğuş holding, and the final shareholdership structure is shown at the last page of the electricity production license.

As it is obvious from these documentation, without the carbon revenue, and due to the legal and economic barriers (that we have not mentioned in the PDD) the project was not able to launch untill 2007, when the carbon revenue was also part of consideration when the finance institutions was financing the project (as can be seen from the main loan agreement).

VCS Response:

The project proponent has provided evidence that although the project could have been developed under the “build, operate and transfer” model in 1999, the project was not implemented because it was unable to obtain loans from finance institutions as a result of the economic environment.

The project proponent has also clarified the ownership history of the project and provided evidence demonstrating the role of carbon revenues in the main loan agreement of the project.

Based on the evidence above, the project proponent has described how it can be considered that the project is not the business as usual scenario. This finding is therefore closed and no further responses are required.

2 MINOR FINDINGS

3 ASSESSMENT CONCLUSION

On 22 August 2014, VCS issued the first round of findings to the project proponent and TÜV Rheinland Energie und Umwelt GmbH.

On 2 September 2014, VCS received the first round of responses from the project proponent and TÜV Rheinland Energie und Umwelt GmbH. The response included multiple supporting documents which clarify the loan agreement and other aspects of the project‘s development.

On 19 September 2014, based on the responses provided, VCS determined that TÜV Rheinland Energie und Umwelt GmbH had appropriately demonstrated additionality within the use of the CDM tool and was therefore notified that further participation in addressing the findings would be optional. VCS requested that the project proponent provide further clarification to their response.

On 13 October 2014, VCS received the first round of responses from the project proponent. The response included multiple supporting documents which clarify the issues identified in the findings.

24 October 2014, VCS closed all findings and no further action was required by the VVB.