

| Sr.<br>No. | Details of the commenter   | Date of the comment | Comment  | Response by the project participants   | Explanation on how due account is taken by the DOE   |
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| 1          | Mr. Axel Michaelowa Programme International Climate Policy Hamburg Institute of International Economics Neuer Jungfernstieg 21 20347 Hamburg Germany Tel. +49 40 42834 309 Fax +49 40 42834 451 a-michaelowa@hwwa.de | 11/11/2005          | This project raises principal issues about project organization and bundling linked with additionality determination. Most wind projects in India are planned and operated by the turbine manufacturers (here Suzlon) who then sell entire wind turbines to industrial electricity consumers (such as Sun-n-sand hotels in a project validated by RW TÜV and Baja Auto in your validation at Supa) who can reduce their electricity supply cost (SEB electricity tariff for industrial consumers being at least twice as high as wind electricity generation cost) and can depreciate 80% of the wind turbine investment in the first year.  Thus wind turbine investment is very attractive to industrial electricity consumers and certainly business-as-usual in India. As the wind turbine manufacturers get a good profit from this business model as well, the projects would not be additional from that side as well. The question is of course whether the CDM project can be proposed by the formal owner of the turbine (who has nothing to do with the operation of the project and just | This project is not a small-scale project. Hence unbundling does not provide the project proponent any advantage.  As mentioned under Appendix C of the Simplified Modalities and Procedures for Small-Scale CDM project Activities, the following results into debundling of large CDM project:  Quote:  "A proposed small-scale project activity shall be deemed to be a debundled component of a large project activity if there is a registered small-scale CDM project activity or an application to register another small-scale CDM project activity:  With the same project category and technology/measure; and  Registered within the previous 2 years; and  Whose project boundary is within 1 km of the project boundary of the proposed small-scale activity at the closest point " | The cost analysis, considering various benefits available for windmills, referenced by Bajaj Auto Limited [BAL] from the official MERC database indicates that the cost of wind power is in the range of grid tariff. BAL have also confirmed that the cost of wind power for BAL is also in the same range.  Two projects currently under validation from BAL are both non-small scale projects. Hence bundling – debundling issues are not of critical nature.  The additionality arguments provided BAL in the PDD and the response to the comment are also sound enough to prove additionality of the project activity and associated emissions reductions.  The comment is therefore considered to be duly accounted for. |



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|         | receives its electricity) or the operator of the turbines, which has an impact on monitoring. At Supa, owners submit projects which generates an issue about unbundling.  Bajaj Auto's grid electricity purchase rate seems rather low in an Indian industrial context. As it has an important impact on the additionality test, this should be checked. | The identified CDM project is being promoted by Bajaj Auto. The project proponent further confirms that it has not registered any small scale CDM activity or applied for registration another small scale CDM project activity within 1km of the respective project boundaries of this project in the same project category and technology/measure. Hence the above criteria of unbundling cases are not applicable for these CDM projects.                  |  |
|         |  | Bajaj Auto is the owner of windpower installation and accordingly it has right on all proceeds thereon. It has procured the services of Suzlon for supply and installation of wind turbines and in absence of in-house knowledge / expertise has retained Suzlon for the operations and maintenance of the same. The O & M agreement with Suzlon would enable Bajaj Auto to diligently carry out monitoring following the Monitoring & Verification protocol. |  |
|         |  | As per Maharashtra Electricity<br>Regulatory Commission (MERC)<br>Order in 2003 (Page 143-6),<br>Electricity Board tariff to industrial<br>consumers is Rs. 3.34 per KWH,<br>cost of thermal is Rs. 3.24 per<br>KWH and the cost of power<br>generated using wind turbines of   |  |

|  |            |   | with Sales tax incentives The cost of windpower is clearly higher than cost of grid and cost of Thermal. The cost of windpower generated by Bajaj Auto is in line with the same.  |   |
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|  |            |   | Grid electricity purchase rate includes energy charges and fixed demand charges. We have considered energy charges and demand charges Separately while giving per unit cost of power in PDD.  |   |
|  |            |   | The PDD further demonstrates that through various other considerations the additionality tests are met and the project is additional.   |   |
|  |            |   | BAL hopes that the above replies clear the comments.  |   |
| Mr. Perumal Arumugam e-mail - perumal_ak@yahoo.co.in | 25/11/2005 | i. The argument on technological barrier is debatable ii. The manpower expertise for the O&M will be provided by the manufacturer himself for the first two years over and above that after sales service, annual maintenance is being done by the manufacturer himself. The norms of jobs per MW | i. BAL has invested into Windpower project to meet its captive power requirement and not for sale to third parties. At the time the company made investment in the project, the windpower technology was in nascent stage in the state of Maharashtra, where our projects | The response by the project participants herewith strengthens the barrier analysis as presented in the PDD.  It is verified that there were lightning stroke/s and corresponding failures at the wind mills. The relevant arguments in the PDD are therefore valid. |



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|               | 0.3 so the manpower requirement would be hardly 15 – 20 people . This technology started its footprints from 1985 so availing manpower would not be a constraint.  | below at Appendix AA.  ii. The year 1985 might be true in World / India context, but not in Maharashtra context as shown above.  | The comment is considered to be duly accounted for. |
|               | iii. The failure of machines due to lightning, catching fire etc may be very very very minimum. Along with the PDD if it could have mentioned with the number of such accidents and occurrences it would be effective. | iii. BAL is engaged in manufacture of two and three wheeler vehicles. It could have very well set up fossil fuel based captive power plants to meet its power requirements. In spite of having the experience of DG Sets, the company went with windpower.   |   |
|               |  | iv. It was a lack of knowledge, expertise and manpower in this area that forced us to tie up with the Turbine manufacturer to provide us with O & M Contract as well.  |   |
|               |  | v. The failure of machines due to lightening may be minimum at sea level. Our project is situated at high altitude, 1150 metres above sea level in heavy rainfall area. Lightening strikes occur quite often at the site. In the past four years, BAL has already incurred losses due to lightening and also in two cases due to fire. The insurance claims for the same |   |
|               |  | were lodged and accepted by Insurance Company.   |   |

|   |  |            |  | vi. Technological barriers have been further elaborated in PDD itself.   |  |
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| 3 | Mr. Perumal Arumugam e-mail - perumal_ak@yahoo.co.in | 25/11/2005 | Whether the financial analysis has taken the following into consideration:  i. Tax holidays,accelerated depreciation, capital subsidy etc.  ii. Why it has been done only for the crediting period when the entire life time of the facility is 20 years.  iii. Does variable cost component has been taken care during computation?  iv. Does the IRR consider all the benefits accruing from the project? In my opinion this should incase also include the value of tax breaks available to the project developer. To the best of my knowledge financial analysis in the PDD hasn't taken value of tax breaks into consideration, which in case of WE projects is very significant. | i. The windmill project in Maharashtra entitles BAL to sales tax incentives, capital subsidy, accelerated depreciation and certain income tax benefits.  ii. Capital subsidy is restricted to Rs. 2 million for the entire project, which is insignificant keeping in mind the overall capital cost of the project.  iii. BAL, for its core business of automobiles, has got two plants set up in the notified backward areas of Maharashtra. Any investment made by the company in backward area of Aurangabad entitles the company to unlimited sales tax benefits for a period of 18 years. Power plants (whether wind, coal or diesel) installed in the backward areas would also entail such benefits to the company. By investment in the windmill project, the company has compromised its sales tax benefits since sales tax incentives for windmill project are limited to the capital investment.  iv. As regards, accelerated | It is true that the wind mill projects enjoy tax holidays, accelerated depreciation, capital subsidy, etc.  However, the project participants, through documented evidence, have shown that in spite of these, the project was not the most financially attractive one.  The comment is considered to be duly accounted for. |



| depreciation and income tax benefits, the same have been taken on a stand alone basis. Automobile division would enjoy the benefits of the same.  v. The income tax benefits and depreciation would be partially available, had the company invested in fossil fuel based power projects in the manufacturing plant itself.  vi. IRR has been calculated for the entire lifetime of 20 years only. Whereas, Long term loans for investment proposal have repayment period of 10 years. Hence, Debt Service Coverage Ratio (DSCR) has been calculated for 10 years.  vii. See below in Appendix BB |
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| the cost component structure of cost of grid and cost of wind power as taken in PDD.  |

## Appendix AA

## Windpower Installed capacity (in MW) in State of Maharashtra

| Year | Maharashtra | BAL |
|------|-------------|-----|
| 1997 | 0.77        |     |



| 1998        | 3.33   |       |
|-------------|--------|-------|
| 1999        | 20.31  |       |
| 2000        | 116.97 | 39.20 |
| 2001 & 2002 | 251.45 | 26.00 |
| Total MW    | 392.83 | 65.20 |

## Appendix BB

| Sr.No. | Cost component | Cost of grid  | Cost of windpower   |
|--------|----------------|---|---|
| 1.a    | Variable cost  | These are charged as<br>Energy Tariff and Fuel Cost | These are repairs of turbines, insurance cost, property taxes and other running |
|        |                | Adjustment charges.                                 | expenses,   |
| 1.b    | Fixed Cost     | These are also included as                          | These are related to initial investment in                                      |
|        |                | Tariff.   | the project.  |
| 2      | Fixed Demand   | These are payable by energy                         | These are payable by energy user as   |
|        | Charges        | user as per Tariff.                                 | per Tariff.   |