Submission by the United States of America

Land use, land-use change and forestry activities in developing countries, in particular those that are linked to the drivers of deforestation and forest degradation

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In decision 1/CP.16, the Convention of the Parties (COP) of the United Nations Framework Convention on Climate Change (UNFCCC) requested the Subsidiary Body for Scientific and Technical Advice (SBSTA) to "identify land use, land-use change and forestry activities in developing countries, in particular those that are linked to the drivers of deforestation and forest degradation, identify the associated methodological issues to estimate emissions and removals resulting from these activities, and assess the potential contribution of these activities to the mitigation of climate change, and report on the findings and outcomes of this work to the Conference of the Parties (COP) at its eighteenth session on the outcomes of the work referred to in this paragraph." At its thirty-fifth session, the SBSTA further "invited Parties and accredited observers to submit to the secretariat, by 28 February 2012, their views on issues identified in decision 1/CP.16, paragraph 72 and appendix II, in particular on how to address drivers of deforestation and forest degradation..."

The United States believes this program of work is critical to the eventual success of global efforts related to reducing emissions from deforestation and forest degradation, plus forest conservation, sustainable forest management, and enhancement of forest carbon stock (collectively known as REDD+). Emissions related to deforestation and degradation simply cannot be reduced effectively without addressing the root causes. At the same time, we are aware that a substantial amount of work is underway already in this realm, both by Parties and other stakeholders. We feel SBSTA should define its program of work to focus on the areas where it has authority and relative competence while avoiding duplication.

We believe the most important result of the workplan on land use, land-use change and forestry activities in developing countries, in particular those that are linked to the drivers of deforestation and forest degradation, would be to fully understand the linkage between drivers of forest emissions, investments in addressing those drivers, and the benefits of these investments. We have presented suggestions for a program of work with this objective *in italics* in the text below. The last section contains initial thoughts on recommendations the SBSTA might make to the COP based on this workplan.

Identify land use, land-use change and forestry activities in developing countries, in particular those that are linked to the drivers of deforestation and forest degradation Given the depth and breadth of work that has gone into identifying the global drivers of deforestation, we do not feel SBSTA's scarce resources are best employed on new primary research in this area. Many thorough analyses have been done on the general drivers of land use change, and especially drivers of deforestation (see annex for several citations). We do feel there would be a value to Parties in synthesizing, reviewing and internalizing the results of research by recognized experts in this field. To facilitate this, SBSTA might request the Secretariat to work through the Collaborative Partnership on Forests to compile and synthesize expert work on the global drivers of deforestation.

Many Parties have already invested substantial effort in identifying and analyzing the drivers of deforestation and forest degradation (and potentially forest conservation, sustainable forest management, and enhancement of forest carbon stock) which are most relevant to their national or subnational contexts. In some cases this work has been linked to comprehensive low emissions development strategies, or to sustainable, "green" development strategies. Much of this work has been summarized in national REDD+ strategies or action plans, in documents such as Readiness Preparation Proposals (R-PPs), and in other publications. Again, this work should not be duplicated. Where it has not been done, SBSTA should recommend the COP encourage developing country Parties to undertake a full analysis of relevant drivers at a national (and subnational, where appropriate) level.

Finally, the private actors in sectors frequently referred to as "drivers" (agriculture, forestry, finance, etc) have also been engaged in understanding and reducing their impact on the world's forests, forest carbon, and other related services. Examples include The Consumer Goods Forum's Zero Net Deforestation commitment, REDD+-related work by the major commodity roundtables, and the Equator Principles (see annex for citations). To date these efforts have been largely separate from the public sector realm; we feel there is real value in creating links between public and private sector discussions as land use inextricably involved decisions made by both. SBSTA could facilitate this by inviting relevant actors from the private sector to participate in workshops and other dialogues, and synthesize the results for the reference of national and private sector efforts.

Identify the associated methodological issues to estimate emissions and removals resulting from these activities

While the drivers of deforestation and forest degradation (and potentially forest conservation, sustainable forest management, and enhancement of forest carbon stock) may be well known, not all opportunities to mitigate atmospheric greenhouse gasses associated with different land uses have been identified, and many are not fully implemented due to gaps in information or data. To name just a few:

- Refining allometric models for carbon in land-based systems, including both forest and non-forest uses, in order to better estimate carbon stock changes;
- Quantifying the net emission reduction opportunities related to implementing different land use, land use change, and forestry management practices compared to current techniques;
- Improving detection of deforestation and forest degradation, and attributing observations to the different drivers;
- Quantifying net emissions reduction opportunities related to carbon stock enhancement activities in different forest types;
- Evaluating the emissions associated with dynamic ecosystem processes such as wildland fire and other natural disturbances, and human activities that enhance or mitigate them;
- Understanding the relative net emission profiles of different agriculture, agroforestry, silvopastoral systems and settlement areas that frequently replace forest, including emissions from soil carbon;
- Tracking drivers, linking drivers to specific land areas, and quantifying emissions from specific changes to those land areas, through recognized methodologies;
- Examining opportunities to integrate data collection and information management systems related to forest harvesting and illegal logging;

- Ensuring that the definitions of forested land and estimates of emissions reductions or increases are consistent across spatial scales (national, provincial or state, and project);
- Developing methods for estimating dynamic baselines that allow credible assessments of "additional" emissions reductions;
- Determining whether definitions of deforestation and forest degradation can be identified that reflect consensus among parties for use in a REDD+ context under the UNFCCC, and that can be applied for quantitative assessments;
- Promoting the use of statistically rigorous sampling and estimation procedures and valid techniques for uncertainty assessment;
- Evaluating opportunities related to land tenure reform and clarification which may lead to enhanced forest conservation and reductions in emissions.

The United States suggests Parties could collectively identify what is known about these questions, and where research opportunities may exist to fill knowledge gaps and identify additional opportunities to mitigate greenhouse gas emissions associated with different land uses, including the drivers of deforestation and degradation. Where work is underway on these issues, for example through ongoing testing of different methodologies or techniques, SBSTA might identify opportunities for Parties to engage in or otherwise support this work. Where little or no work is ongoing, opportunities to stimulate the resolution of these methodological challenges might be sought, perhaps through the Collaborative Partnership on Forests.

Assess the potential contribution of these activities to the mitigation of climate change As noted earlier, the most important result of this workplan is to fully understand the linkage between drivers of forest emissions, investments in addressing those drivers, and the benefits of these investments. This is important at a global scale, but especially critical at a national scale where action will be taken.

As with the identification of drivers, some good work has been done to date looking at the contribution of individual practices in specific locations (for example, no-till agriculture on Cerrado soils) to reducing emissions. Many Parties have identified options to mitigate the effects of identified drivers of deforestation and forest degradation in their national strategies and action plans. There are also analyses of the contribution of different sectors, like agriculture or transportation, to global and national emissions. We are less aware of comprehensive national scale assessments of the mitigation potential associated with all the major identified drivers of deforestation and degradation in REDD+ countries, and in particular the related costs of this mitigation. We also have seen few evaluations of whether and how emissions associated with other land use and land-use change activities in developing countries are captured in carbon accounting systems for REDD+. We would appreciate learning more about good examples of these assessments and evaluations.

SBSTA might request the Secretariat to collect national scale assessments of mitigation potential associated with land use and land use change, and evaluations of how such emissions are captured in carbon accounting systems where such analyses exist, and could encourage their execution where they do not. This would be a useful step in fully understanding the potential contribution of these activities to the mitigation of climate change. Such an effort might well be done in collaboration with other global REDD+ initiatives, for example the REDD+ Partnership, UN-REDD, or the Forest Carbon Partnership Facility. In the case of agriculture, it might also be linked to the SBSTA's consideration of issues related to this sector.

Report on the findings and outcomes of this work to the Conference of the Parties

If SBSTA were successful in implementing a program of work that allowed Parties to understand, globally and nationally, the linkage between land use, land-use change and forestry activities and what has been termed "REDD+," and to analyze the mitigation potential associated with these activities, useful recommendations might be presented to the COP at its 18th meeting. Some recommendations might address how Parties might reduce the impact of the drivers of deforestation and degradation on net emissions, while others might provide suggestions for how these emissions might be better incorporated in comprehensive monitoring and carbon accounting systems such as those being developed for REDD+.

Forest Monitoring

The United States presented its submission on forest monitoring in September 2011, as part of our broader submission to the SBSTA. Please find the link at: http://unfccc.int/files/methods science/redd/application/pdf/sbsta_submission_united_states_final

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