

Principles document from the WCI Forestry Sub-committee Stakeholder Group  
(Stakeholders)

February 28, 2008 Draft

**Section I – Stakeholder response to WCI Offsets Sub-committee’s questions outlined in the January 3, 2008 scoping document.**

The Stakeholders agree that WCI should allow offsets as a compliance mechanism. In particular, the stakeholders support forestry offsets, because they are an effective way to achieve reduction in atmospheric carbon. What makes forestry offsets unique compared to other offset types is that they can provide economic and environmental co-benefits beyond atmospheric carbon reduction. Stakeholders recognize the need to ensure the environmental integrity of the cap while providing an efficient administrative process.

The Stakeholders agree that offsets from outside the region should be included but disagree as to whether these offsets from outside the region should be phased in or accepted from the program start.

The Stakeholders support the use of forestry offsets by emitters in meeting compliance with the set cap. There needs to be a large enough volume of forestry offsets allowed in the cap and trade system to ensure that there is enough of a market.

The Stakeholders do not advise developing a list of approved project types until baseline and monitoring methodologies have been established. The Stakeholders do believe that a list of likely project types can and should be developed by August 2008 in addition to outlining the process and timeline for which baseline and monitoring methodologies will be developed. Wherever possible, accounting methodologies should draw from existing protocols, tailored as appropriate to meet the needs of the WCI system. In addition to developing a list of approved project types, WCI should develop an adaptive process which encourages innovation by allowing project developers to bring new types of offsets forward for review and approval in addition to making adjustments to project proposals from the initial list. These new approved offset types, along with their respective methodologies, can then expand the list of approved project types.

**Section II – Specific comments on design approaches to a forestry offset program**

In an attempt to organize the wide variety of opinions and ideas surrounding a forestry offsets program, the stakeholders have developed three main categories and a fourth placeholder category for issues outside the domain of the main three. The main categories include; offset design principles, forest offset types, and co-benefits.

**Offset Design Principles**

The Stakeholders agree that an offsets program must be consistent with the design principles established by WCI for the greater regional cap and trade program. Following is the list of the design principles for the cap and trade as described in the WCI program,

each followed with a discussion specific to forestry offsets. It is the intent of the stakeholders to establish where there is clear agreement, where there is general agreement in concept, but some issues remain uncertain, and where there remain large philosophical or scientific differences of opinion.

1. Is equitable, administratively simple for government and private participants, minimizes administrative costs, and has a clear compliance path;

Stakeholders recognize the need to develop systems that address the needs of small forest landowners and maintain the high quality standards of the system. The development of quality aggregating organizations is one example to meeting small landowner's needs while at the same time ensuring that the aggregated pool of offsets satisfies the design elements at the same level of rigor as required from larger offset providers.

2. Maximizes total benefits throughout the region, including reducing air pollutants, diversifying energy sources, and advancing economic, environmental, and public health objectives, while also avoiding localized or disproportionate environmental or economic impacts;

Stakeholders agree that co-benefits inherent with forestry offset projects need to be recognized when they can be demonstrated and that within the larger context of the cap and trade system, forestry offsets help to address many of the issues within this design principle. From a marketing perspective, co-benefits can be utilized to demonstrate that forestry carbon credits are of superior value to other types of offsets that do not provide co-benefits.

3. Requires all reductions to be real, surplus/additional, verifiable, permanent, and enforceable;
  - a. Real – The stakeholders agree that there is a wide range of certainty associated with different forest carbon offsets and agree that there needs to be an established mechanism such that the market values of different offset types are commensurate with their capacity to store carbon. This includes the timing of issuance of offsets. For example, it would not be appropriate to issue the full value of carbon in a reforestation project the first year the trees are planted. For offsets to be real, the stakeholders agree that they need to be measurable to a given standard of precision and accuracy. This is true not only for forest carbon offsets, but offsets from other non-forestry sources as well.
  - b. Surplus/additional – As a general principle, the stakeholders recognize that additionality means that the forest carbon project must store more carbon (or reduce emissions by a greater amount) than would have been stored in the absence of the project. There is a variety of opinion on how these

terms should be defined for each project type and if the market value of an offset can reflect its degree of additionality.

Stakeholders agree that this is the most contentious design element associated with forestry offsets. Establishment of baselines from which additionality is measured is really the key area that needs the broadest discussion.

- c. Verifiable – Stakeholders agree that some form of third party certification is necessary to maintain credibility within the WCI program as well as outside the WCI region if allowed. Again, establishing quality aggregating organizations can help address issues of scale inherent with small forest landowners while ensuring the design elements are met with the same rigor as for larger landowners. Stakeholders agree that WCI should try to work with existing certification systems to develop audit methodologies that are consistent to what currently is being practiced.
- d. Permanent - The presence of stable land tenure and property rights in the United States provides for a strong foundation of being able to reliably secure permanence for forestry offsets. The stakeholders agree that for projects relying on maintaining forest conditions, some type of easement or similar instrument that ensures that the carbon is maintained at the level of the offset sold, beyond a contract between the buyer and seller is necessary. There is some variety of opinion on the degree to which the easement needs to be permanent and if the easement should contain additional requirements associated with co-benefits (conservation easement). As with other elements, the market value of an offset program can reflect its degree of permanence. A permanent easement, for example, should extract a higher value than a less long lived legal construct.

It is important to recognize that the “regulatory permanence” discussed above is not the only degree of permanence that needs to be evaluated. The actual reliability of a forest project to maintain itself over time, independent of the regulatory construct (e.g. fire risk) needs to be considered.

Stakeholders agree that permanence for wood product storage and product substitution needs to be based on life cycle analysis and accounting. The amount of continued carbon storage that can still be credited depends on a number of factors, including how much of the timber harvest goes into utilization as solid wood products, such as lumber or plywood, and how much becomes pulp or paper. The decomposition rate of the wood products is also important, and is based on longevity of use and the type of disposal (e.g., landfills, burning). Factors and methods for calculating the amount of continued carbon storage in forest product pools can be found in the technical appendix for the U.S. Department of Energy’s greenhouse gas voluntary reporting guidelines.

Appropriate project durations need to be established. The range in the Clean Development Mechanism and within the existing voluntary market is from 30 to 100 years.

Enforceable – The stakeholders agree that participation in an offsets market means that the landowner is legally bound to provide for the offsets issued. A functioning offset program must include regulatory enforcement on the part responsible state agencies as well adherence to civil contracts established within the auspice of the offset program.

4. Stimulates investment, especially in low carbon technologies, and rewards innovations that will lead to long-term permanent greenhouse gas reductions;

A viable forestry offset program will stimulate investment in the long term maintenance of forestlands, a critical element to long-term greenhouse gas reductions.

5. Covers as many sources as is practical, while encouraging pollution reductions beyond the capped sources and sectors;

Stakeholders recognize that the number and diversity of forest landowners makes inclusion of the forest lands within the scope of the cap and trade challenging. While the stakeholder group is far from consensus on whether or not forest lands should be included as part of a cap, there is agreement that a forestry offset program should be allowed, regardless of the inclusion or exclusion of the forest lands in the cap and trade system.

6. Provides appropriate recognition and incentives for early emissions reductions;

Stakeholders agree in concept that there needs to be recognition for early actions, however, the wide variety of opinions on defining baseline and additionality make achieving this goal challenging.

7. Assures a transparent and robust accounting system that will measure and report emissions rigorously and consistently across all sectors and throughout the region;

Stakeholders agree that accurate accounting is important and recognize that we currently possess the technological know how to achieve this. While many stakeholders advocate for particular existing accounting systems, we support utilizing existing systems, with the hopes of improving upon them as appropriate to accommodate the needs of the WCI.

8. Minimizes the potential for leakage; and

The stakeholders agree that one way to address leakage is through requiring the entire forest entity to be enrolled in an offset program. Particularly for small

landowners, this concept needs to be clearly explained so that it does not discourage participation in this important landowner class. Additionally, offsets need to be adjusted at a programmatic level to address leakage that is not directly quantifiable. Some types of offsets, such as those designed to prevent land conversion, are particularly problematic on the issue of leakage. Since preventing conversion is particularly important, some stakeholders have recommended that the forest sector be capped to the current level of forested acreage, with the opportunity to store more through offsets or trading of credits. Other stakeholders feel that including forestlands in the cap imposes another regulation on lands and will serve as a disincentive to keep forestlands in production. Additionally, when a project results in the lowering of harvest levels, there is the potential for leakage, presuming that demand stays constant, in the form of sourcing wood from harvests that may not be sustainable.

9. Facilitates linkage to similarly rigorous regional and international greenhouse gas reduction markets and encourages other states, provinces, and countries to join the market.

Stakeholders agree that the design of the offset program should anticipate participation with other regional, national, and international cap and trade efforts.

### **Forest Offset Project Types**

There are variety of possible forestry offset project types, all with varying degrees of advantages and disadvantages across all of the design principles. The list below represents general project categories and in some cases specific examples that the stakeholder group feels are candidates for developing protocols that put the design principles into action. It should be made clear that there is not consensus on how or if these project types should be considered, but as indicated above are candidates for further discussion. The stakeholder group recognizes that all the project types need to meet the design principles and that there may need to be different definitions of the design principles depending on the specific offset type. The following list does not reflect the priority of the stakeholders.

1. Fire risk reduction in high fire hazard areas. Issues that need to be addressed include the carbon balance over time when controlling stem density through thinning, follow up management to minimize ladder fuel buildup, establishing “high fire hazard areas and/or stand conditions,” favoring species with higher fire tolerance.
2. Afforestation. Establishing a forest in an area where there currently are no trees and was not historically forested. This project type needs to consider the biodiversity, hydrological, and other impacts of conversion of planting trees on systems that have not historically supported trees. Carbon may be enhanced, but other ecosystem services may be negatively impacted. This includes selection of tree species used to establish the forest, considering the site ecology and history.

3. Reforestation. Establishing forest in an area historically forested, but has been out of forest use for a yet to be defined number of years. This project type also should take site ecology and history into consideration when selecting tree species.
4. Rehabilitation of under stocked forests. Re-establishing a fully stocked forest where a currently under stocked forest exists today as a result of historic management activities. Like reforestation, this project type presumes the ability to demonstrate the appropriate selection of tree species used considering the site ecology and history.
5. Conversion Reduction. By establishing a floor or background conversion rate, offsets could be issued to landowners who can demonstrate that they are forgoing conversion to alternative uses, and that their forests are located in areas with high conversion potential.
6. Forest Management (live and dead pools) – these types of projects all have the effect of increasing or managing the volume of carbon in the forest over a period of time. The following is a non-exhaustive list of examples of how this might be achieved:
  - a. Increased Rotation Length – over a period of time longer rotations maintain a higher volume per acre (carbon) than shorter rotations.
  - b. Unevenaged management – maintains a less variable volume of carbon per acre over time.
  - c. Reserves – areas that are not managed and continue to sequester carbon to a point and then primarily function as a reserve over time.
  - d. Forest Productivity – establishing a higher amount of carbon on a site than what was originally on a site over a period of time by a variety of management techniques.
7. Forest Products – wood can be stored for lengthy periods of time in durable wood products such as dimensional lumber in housing, furniture, etc. While technically this is part of a carbon pool, the group recognizes the need distinguish the development of protocols for measuring this pool in a similar manner to those projects listed above, accounting for all of the design principles. As such, the stakeholders agree that credits from forest products can not be achieved as a stand alone process, but must be part of a forest management project that also addresses the design principles including entity wide and full life cycle accounting.
8. Product Substitution
  - a. Wood in lieu of concrete or steel – challenging to assign a “credit” to since the avoided emission presumes the product was never made.
  - b. Wood based liquid fuels in lieu of liquid fossil fuels – easier to assign credit since the emission avoidance is at the use stage, not the manufacturing stage. The additionality is the increase in proportion of the wood based fuel as a percentage of total fuel consumption. Stakeholders assume that the value of any credits would account for emissions associated with the creation of the bio fuels.
  - c. Biomass energy production in lieu of fossil fuel based energy production - easier to assign credit since the emission avoidance is at the use stage, not the manufacturing stage. The additionality is the increase in proportion of

the wood based energy production as a percentage of total energy production. Stakeholders assume that the value of any credits would account for emissions associated with the creation of the bio fuels.

### **Co-benefits**

- The stakeholders agree that the co-benefits of forestry offsets need to be acknowledged when they can be demonstrated, while understanding that the primary purpose of offsets is to reduce atmospheric carbon dioxide. It is presumed that the value of co-benefits, no matter how they are integrated into the forestry program, need to be similarly integrated into any other offset program as well, so not to hold forestry to a higher standard for eligibility, but rather position forestry offsets as advantageous when compared to an “equal” carbon sequestration project outside of the forestry sector.
- There is a wide range of opinion on how to best incorporate co-benefits into an offset program.
  - Some stakeholders feel that economic benefits of participation in an offset program provide a further incentive to keep the land from being converted to a non forest use and that this can help mitigate the uncertainty inherent in a forestry offset program.
  - Other stakeholders feel that projects must provide co-benefits beyond demonstrating a reduction in carbon dioxide, such as biodiversity benefits to be eligible for credits.
  - Some stakeholders feel that projects must demonstrate that a project does not have negative impacts to other environmental or other societal values and that the negative impacts evaluated would need to be described.
- The co-benefits of forestry offsets should provide for a higher quality offset when compared to other offset types.
- There is general agreement among the stakeholders that no matter how co-benefits are addressed in a forestry offset system that they be addressed at a programmatic level, such as in the selection of eligible project types, and not at the project level. Projects are still free of course to seek certification of co-benefits for sale to the voluntary market as well as within a regulated market.

### **Other Issues**

Biomass energy – we may want to consider discussing if we want to recommend to the electric subcommittee some sort of favorable action for use of biomass energy.