Section 9.0 Reclamation and Decommissioning Plan

Wind turbines have a typical design life of approximately 25 years. With proper maintenance, the operating life of the turbines can be extended for decades. The wind turbines are machines and machines will eventually become obsolete or wear out and need to be replaced. The wind energy resource is a natural force which will continue for millenniums. Wind energy resource sites that have been developed in the United States and worldwide are generally repowered instead of decommissioned. Repowering wind energy projects refer to replacement of old, more costly maintenance turbines with new equipment. As the turbines approach their design life of 25 years, or if a significant improvement in technology occurs, a project may assess the cost associated with repowering a site. Also, Mud Springs LLC has entered into 20 year Wind Easement agreements with land owners with the right to extend for additional terms and the Mud Springs Wind Ranch Project's operating companies will enter into a 20 year power sales agreement. These power sales agreements also contain renewal options. Decommission or repowering of the project is anticipated to be necessary after approximately twenty-five years of operations.

Decommissioning involves the removal of all turbines, concrete foundations to some reasonable depth below grade, removal of power poles, met towers and substation equipment and O&M facilities. Site restoration includes regarding and replanting areas where foundation, roads and buildings were located. The following information describes the specific actions the Applicant proposes to restore the site to a useful and non-hazardous condition upon retirement of the facility.

9.1 Operating Life and Repowering

The Applicants propose to operate the wind energy facility for 40 years. New technology may become available for repowering the Mud Springs Wind Ranch Projects which could involve replacing the generators and or major turbine components. After approximately 20 years the performance of the turbines will be reviewed and a decision made whether to repower or continue operations with the existing equipment. The decision will be based on maintenance cost, market conditions and available technology. Repowering generally involves removing and replacing the turbine generator at the top of the tower and updating the instrumentation and control equipment. An application for repowering would be made under the Carbon County Permit at least one year prior to repowering.

9.2 Decommissioning and Site Restoration

At the time that Mud Springs LLC or its successors or assignees, decide to terminate operations, the Mud Springs Wind Ranch Project decommissioning will involve:

- Removal of wind turbine nacelles, blades, towers and other surface facilities and recycle these materials.
- Removal of foundations to 3 feet below grade so that agricultural use may continue.
- Cut off underground cables and abandon cables in place when deeper than 2 feet.
- Removal of transformers, and other substation equipment and recycle or reuse these materials to the extent practical.
- Roads will be left in place to the extent requested by the land owners. Unnecessary roads will be reclaimed by removal of the gravel for reuse in other areas or stock piling and the road surface area scarified and reseeded.
- Recyclable and reusable materials would be reused, or sold as scrap to the extent practical.
- All materials would be land filled in accordance with all federal state and local laws.
- Any hazardous material will be disposed of in accordance with all State and Federal regulations.
- Surface areas would be scarified and reseeded with a native seed.

9.3 Individual Turbine Unit Decommissioning:

Turbines which underperform for mechanical reasons will be repaired or replaced and will not be decommissioned.

9.4 Transmission Line Decommissioning

The overhead transmission line facilities that are associated with the Project will have the wire cables removed at decommissioning and recycled or reused at another site. Power transmission lines poles will be removed and recycled or used at another site. Those segments of the PacifiCorp transmission system that are improved in association with this project will be owned by PacifiCorp and will be permanent infrastructure improvements.

9.5 Estimated Disturbance Area

All phases of the Mud Springs Wind Ranch Project will disturb approximately 584 acres. Table 5 list the approximate acreage disturbance associated with the Mud Springs Wind Ranch Project and identifies the type of disturbance. For all phases of the project, approximately 140 acres will be permanently converted from existing conditions to roads, foundations and crane pads and approximately 444 acres of temporary disturbance involving equipment operations, parking, trenching for underground transmission line installation, and equipment operations associated with construction of the overhead transmission line will be restored.

Table 5
Surface Disturbance Estimates

Facility Improvement	Temporary	Permanent
New Access Roads	180 acres	90 acres
Crane Pads & WTG Foundations	195 acres	14 acres
Power Line Trenching outside of the road area	60 acres	15 acres
Collection Substation	8 acres	3 acres
Laydown parking	15 acres	3 acres
230 kV trans. line	111 acres	10 acres
County Road Improvements	15 acres	5 acres
Total	584 acres	140 acres

9.6 Re-seeding and Re-vegetation Plan

The vegetation of the Project Area is sagebrush dominate steppe plant community typical of the region and dominated by non-native greases and sagebrush. The Sage Creek Valley of Carbon County gets about 6 to 10 inches of precipitation per year where the winters are typically cold and dry, the spring and early summer have higher precipitation and summers and fall have dry to drought conditions. The soils consist of well drained silty clay loams and well drained soils of intermediate terraces and alluvial fans.

Grasses in the project area are dominantly Bluebuch Wheat grass, Prairie Junegrass, Squirrel tail, Indian ricegrass and bluegrass. In non-cultivated areas, dominate shrubs are sagebrush and saltbush. There are large cultivated acreages used for growing grass feed. The general vegetation and habitat in the Project Area is influenced by factors such as agricultural tilling, cattle grazing, recreation and mining. In the non-cultivated area between The Pryor Mountains and Railbed Road has also been modified by pipeline construction, transmission line construction, tilling of the sagebrush and cattle grazing.

The final erosion and sediment control and restoration measures will be established in the construction storm water pollution prevention permit (SWPPP) issued by the Montana Department of Environmental Quality. The Weed Management Plan, (see Attachment 8) also contains a program for control of noxious weeds. The SWPPP design plans will establish the erosion control measures and seeding mix to be used to restore the site. The plan described here provides examples of typical erosion and sediment control measures and seeding mixes that would be expected at the Project site given its terrain and habitat.

9.7 Noxious and Invasive Weed Abatement:

Montana Code, Title 7, Chapter 22, Part 21 establishes county weed control districts and general guidelines for noxious and invasive weed control. Noxious weeds that are known to occur in Carbon County include hoary alyssum, Canadian thistle, spotted knapweed, Russian knapweed, Scotch thistle and Dalmatian toadflax. Noxious and invasive weeds will reduce the success of re-vegetation through competition for soil water, nutrients, space, and sunlight. Weed free seed mixes will be used to re-vegetate disturbed areas. With landowner's consent herbicides will be used to reduce annual weed presence in disturbed areas and when necessary competition before seeding. Application rates will follow the manufacturer's recommendations and will be approved by Mud Springs LLC or the landowner prior to application. A contractor with a Pesticide Use Permit will be used for applications.

Attachment 8 contains the preliminary Weed Control Plan that has been submitted to the Carbon County Weed District. Applicants will update the weed control plan to include suggestions and comments from the Carbon County Weed District.

9. 8 Reclamation Bond and Cost Estimate:

For the first ten years of operations, the salvage value of the wind turbine generator and miscellaneous parts together with the scrap value of various metals (copper, aluminum, steel), will exceed the cost of decommissioning. Following the tenth year of operation, and every fifth year thereafter, the Applicant(s) will provide an independent engineer's estimate of the cost of decommissioning and removal of the wind energy tower(s) and restoration of the site, net of any expected salvage and/or scrap value of the generators, towers, and other components. If the independent engineer's cost estimate concludes that such decommissioning, removal and restoration will cost in excess of the estimated salvage value, the Applicant shall set aside funds ("required decommissioning funds") sufficient for decommissioning and restoration by either providing a performance bond, a surety bond, a letter of credit or by depositing required decommissioning funds sufficient to off-set any shortfall in salvage value into an escrow account to be held by an escrow agent acceptable to the Applicant and the property owner for the benefit of the property owner, as well as the applicant, subject to claims of the landowners.

The escrow agent shall provide those funds to the party removing such tower(s) and restoring the property in the event the cost of disassembling and removal thereof from the premises and restoration of the premises exceeds the value of the improvement.

The Applicant or its successors or assignees will provide Carbon County a report and schedule for repowering, replacing or decommissioning any individual wind turbine that has ceased operations for over 12 months.

After the initial 10 years of operations, the Applicants will provide Carbon County with an estimated cost of decommissioning prepared by an independent engineer. This report will be updated every fifth year thereafter, to take into account inflation or other factors deemed relevant by the independent engineer including, but not limited to, any increase or decrease of the market value of the structure and its related components being decommissioned and the cost of labor to perform the decommissioning and site restoration.