

**STATE OF NORTH DAKOTA
PUBLIC SERVICE COMMISSION**

**Bear Paw Energy, LLC
Garden Creek to Riverview NGL Pipeline- McKenzie
County
Siting Application**

Case No. PU-11-66

FINDINGS OF FACT, CONCLUSIONS OF LAW AND ORDER

September 7, 2011

Appearances

Commissioners Tony Clark, Kevin Cramer and Brian P. Kalk.

John W. Morrison, Attorney at Law, Crowley Fleck, PLLP, 400 East Broadway, Suite 600, Bismarck, North Dakota 58501, on behalf of the Applicant, Bear Paw Energy, LLC.

Matthew A. Sagsveen, Assistant Attorney General, 600 E. Boulevard Ave., Dept. 125, Bismarck, ND 58505, on behalf of the Public Service Commission.

Christopher A. Marohl, Public Utility Analyst, Public Service Commission, 600 E. Boulevard Ave., Dept. 408, Bismarck, ND 58505, on behalf of the Public Service Commission.

Al Wahl, Administrative Law Judge, Office of Administrative Hearings, 1701 North Ninth Street, Bismarck, North Dakota 58501-1882, as Procedural Hearing Officer.

Preliminary Statement

Under North Dakota Century Code § 49-22-07, a utility may not begin construction of a transmission facility in the state without first having obtained a certificate of site compatibility or a route permit. The facility must be constructed, operated and maintained in conformity with the certificate or permit and any terms, conditions or modifications of the certificate or permit.

On February 15, 2011, Bear Paw Energy, LLC ("Bear Paw") filed with the Public Service Commission (Commission) a Letter of Intent ("LOI") to submit an application for a certificate of corridor compatibility and an application for a route permit to authorize construction of a natural gas liquids pipeline located in McKenzie County, North Dakota. Bear Paw requested that the Commission shorten the one-year waiting period between the filing of the LOI and the filing of an application.

On March 24, 2011, the Commission acknowledged the Letter of Intent and shortened the one-year waiting period between the filing of the Letter of Intent and the application to thirty days, and assessed a filing fee of \$100,000.

On June 27, 2011, Bear Paw filed with the Commission an application for a certificate of corridor compatibility and an application for a route permit to authorize construction of a natural gas liquids (“NGLs”) pipeline located in McKenzie County, North Dakota.

Bear Paw also filed an application to waive and reduce procedures and time schedules required under N.D.C.C. ch. 49-22, which requires an application for certificate of corridor compatibility to be filed separately from a route permit, requires separate notices of such applications, requires separate hearings on such applications, and requires certain time schedules requesting that the applications for a certificate of corridor compatibility and a route permit be consolidated into one application. Bear Paw further requests that the Commission reduce the minimum width of the corridor for this project, from 5.42 miles, as required by North Dakota Administrative Code § 69-06-04-02, to 1 mile.

On July 27, 2011, the Commission deemed the applications of Bear Paw complete and issued a Notice of Filings and Notice of Hearing scheduling a hearing for August 29, 2011, at 10:00 a.m. CDT at the McKenzie County Courthouse, 201 5th Street NW, Watford City, North Dakota 58854.

The Notice of Hearing identified the following issues to be considered:

1. Is the proposed facility or such length, design, location, or purpose that it will produce minimal adverse effects, or does a demonstrable emergency exist which requires immediate construction and that adherence to the procedures and time schedules would jeopardize the utility’s system?
2. Will the location, construction, and operation of the proposed facilities produce minimal adverse affects on the environment, natural resources, and upon the welfare of the citizens of North Dakota?
3. Are the proposed facilities compatible with the environmental preservation and the efficient use of resources?
4. Will the proposed facility locations minimize adverse human and environmental impact while ensuring continuing system reliability and integrity and ensuring that energy needs are met and fulfilled in an orderly and timely fashion?

On August 29, 2011, the public hearing was held as scheduled.

Having allowed all interested persons an opportunity to be heard, and having heard, reviewed and considered all testimony and evidence presented, the Commission makes the following:

Findings of Fact

1. Bear Paw is a Delaware limited liability company with its principal place of business located at 100 W. 5th Street, Tulsa, Oklahoma.
2. Bear Paw has been authorized to do business in the State of North Dakota since January 14, 2000, as evidenced by a Certificate of Good Standing issued by the North Dakota Secretary of State on that same date.

Size, Type and Preferred Location of Facility

3. The Pipeline is proposed to transport natural gas liquids (“NGLs”) from the tailgate of the Garden Creek Gas Plant (the “Plant”), near Watford City, North Dakota, to a point on the North Dakota/Montana border, approximately 54.2 miles, and continuing to the Riverview Rail Terminal (the “Terminal”) in Richland County, Montana, for a total distance of 63.2 miles. The Pipeline will be a 10 inch pipeline with a capacity of 31,000 barrels per day.
4. The Pipeline will include 15 block valves, of which 11 will be located in North Dakota, which will allow segments of the Pipeline to be segregated for inspection and maintenance; as well as segregated in the event of a system failure. There will be a single pumping station for the Pipeline that will be located at the Plant. A supervisory control and data acquisition (“SCADA”) system will report pipeline operations and facilitate early response to any breach or failure of the Pipeline. Bear Paw has personnel available to respond to any conditions 24 hours a day, 7 days a week.

Need for the Facility

5. Drilling activity in three counties where Bear Paw has significant gathering facilities has dramatically increased and the associated gas is exceptionally high in NGLs. Without a means of transporting the NGLs to market, the Garden Creek Gas Plant would either be unable to operate or would be required to operate at significantly reduced volumes.
6. Alternatives to construction of the Pipeline consist of trucking or shipping the NGLs by rail to the Terminal. Trucking would require approximately 55 trucks per day to be loaded at the Plant, driven to the Terminal, and unloaded at the Terminal. This level of trucking activity would result in unacceptable wear and tear of infrastructure, unduly burden area residents, and render the operation of the Plant susceptible to interruption

as a result of inclement weather, road repairs, and load restrictions. There is not sufficient space in the vicinity of the Plant to construct a rail loading rack, and the construction of a rail spur and loading rack to connect the Plant to the Terminal would result in a significantly greater environmental burden than the Pipeline.

Study of Preferred Location(s)

7. In its application, Bear Paw defined a one-mile wide study area centered on the preferred pipeline route. Within the study area, Bear Paw identified a 250-foot wide survey corridor centered on the preferred pipeline route to conduct cultural resource field surveys, biological and wetland/waterbody field surveys and environmental assessments.

8. During construction, Bear Paw will generally require a construction corridor of 95 feet, or 100 feet in some areas. All construction work will occur within the construction corridor. After completion of construction, the permanent right-of-way ("ROW") will be 50 feet wide.

9. Bear Paw conducted a Class I literature search on the one-mile wide study area, and a Class III cultural resource inventory was completed on the 250-foot wide survey corridor. Additionally, for the 250-foot wide survey corridor, environmental data collected included information on soils, land use, wetlands and water body crossings, and protected species.

10. Bear Paw consulted with various governmental agencies, including the North Dakota State Lands Department; the State Historical Society of North Dakota; the State Historic Preservation Office; the North Dakota Parks and Recreation Department; the North Dakota Game and Fish Department; the U.S. Forest Service; the North Dakota Department of Health; and the U.S. Fish and Wildlife Service.

11. There were 57 previously recorded and 10 newly recorded cultural resources found within the corridor. To mitigate any impact to these resources, Bear Paw will modify the pipeline alignment and related construction right of way, use 50 foot fenced exclusion buffers, and have an archaeologist monitor two sites while construction activities occur at those two locations. The State Historic Preservation Officer has concurred with the determination that no historic properties will be affected by the pipeline project provided these measures are used.

12. The U.S. Fish and Wildlife Service (the "FWS") comments focused on threatened and endangered species, candidate species, migratory birds, bald and golden eagles, and high value habitat avoidance. Bear Paw will comply with the FWS recommendations as found in Exhibit 1 or implement practicable measures to avoid impacts to wildlife.

13. The Commission has established criteria, pursuant to North Dakota Century Code § 49-22-05.1, to be used in identifying exclusion and avoidance areas and to guide the site, corridor, and route suitability evaluation and designation process. In addition, inhabited rural residences must be designated avoidance areas. The exclusion areas, avoidance areas, selection criteria, and policy criteria are set forth in North Dakota Administrative Code § 69-06-08-01.

14. With the exception of prime and unique farmland, a transmission facility must not be sited within an exclusion area. The exception for prime and unique farmland under North Dakota Administrative Code § 69-06-08-01(d) is that if the Commission finds that the prime and unique farmland that will be removed from use for the life of the facility is of such small acreage as to be of negligible impact on agricultural production, then the exclusion shall not apply. No exclusion areas were identified along the proposed Project route.

15. A transmission facility must not be sited within an avoidance area, unless the applicant shows that under the circumstances there is no reasonable alternative. The one-mile corridor for the Project contained two avoidance areas, the first being an occupied structure located within 500 feet of the proposed alignment. Moving the route to maintain a 500 foot setback would require moving the route outside an existing corridor on U.S. Forest Service ("FS") land. A waiver of the 500 foot setback requirement has been obtained from the owner of the occupied structure. The second avoidance area that the pipeline will pass through is the Little Missouri National Grasslands managed by the FS. The only reasonable alternative would have required a more sensitive crossing of the Yellowstone River in Montana at or near its confluence with other water bodies. The FS conducted an environmental assessment of the project on FS lands and is expected to issue a finding of no significant impact and a Special Use Permit in the near future.

16. A wetlands and waterbodies assessment was completed for the Project. A total of 16 wetlands and 25 waterbodies were identified within the survey corridor. Bear Paw plans to avoid impacts by directionally drilling all wetlands and waterbodies.

17. The Project may result in short term wildlife habitat removal, due to clearing and construction. Following construction, Bear Paw will restore the right-of-way as near to pre-construction conditions as is practicable to mitigate any such impacts. The Project will have no significant impact on fish and wildlife resources and no impacts are anticipated to endangered or threatened sensitive plant or animal species.

18. In accordance with the Commission's selection criteria, a transmission facility shall be approved only if it is demonstrated that no significant adverse impact will result from the location, construction and operation of the facility. Bear Paw has analyzed the impacts of the Project in relation to all of the relevant selection criteria. No significant adverse impact will result from the location, construction and operation of the Project.

19. In accordance with the Commission's policy criteria, preference may be given to an applicant demonstrating certain benefits of the transmission facility. Bear Paw has analyzed the relevant policy criteria and is expressly committed to conducting its business in compliance with all applicable environmental laws and regulations; committing to energy conservation through the facility's location, process, and design; committing to training and utilizing available labor in the state, constructing the Project to take advantage of economies of scale, achieving transmission capacity in the most minimally intrusive and most efficient way possible, and coordinating with state and local officials. Bear Paw submitted evidence to demonstrate commitment to maximize the benefits of the proposed transmission facility so as to meet the policy criteria.

20. It is appropriate to authorize a corridor only for the area on which Bear Paw performed the more thorough cultural resource study.

Measures to Minimize Impact

21. Bear Paw has agreed to a number of steps to mitigate the impact of the Project as indicated by the August 26, 2011, Certification Relating to Order Provisions-Transmission Facility Siting with accompanying Tree and Shrub Mitigation Specifications, which is attached to this Order.

22. The 95 to 100 foot-wide construction ROW will provide room for topsoil separation, work equipment and pipe stringing. This ROW will consist of both a permanent easement and temporary work space that will be utilized only during construction and includes material staging areas and temporary access roads.

23. The design, construction, and operation of the Pipeline will conform to the Department of Transportation regulations contained in 49 CFR Part 195-Transportation of Hazardous Liquids by Pipeline.

From the foregoing Findings of Fact, the Commission now makes its:

Conclusions of Law

1. The Commission has jurisdiction over Bear Paw and over the subject matter of this application under North Dakota Century Code Chapter 49-22.

2. Bear Paw is a utility pursuant to North Dakota Century Code § 49-22-03(13) solely for purposes of this Project.

3. The pipeline and associated facilities as proposed by Bear Paw is a transmission facility as defined in North Dakota Century Code § 49-22-03(12)(b).

4. The location, construction, and operation of the proposed transmission facility will produce only minimal adverse effects on the environment and upon the welfare of the citizens of North Dakota.

5. The location, construction, and operation of the proposed transmission facility are compatible with environmental preservation and the efficient use of resources.

6. The proposed transmission facility will minimize adverse human and environmental impact, while ensuring continuing system reliability and integrity, and ensuring that energy needs are met and fulfilled in an orderly and timely fashion.

7. The proposed transmission facility is of such design and location that it will produce minimal adverse effects, as defined under North Dakota Century Code § 49-22-07.2.

8. It is appropriate for the Commission to waive those certain procedures and time schedules as requested in the Application and provided under North Dakota Century Code § 49-22-07.2.

From the foregoing Findings of Fact and Conclusions of Law, the Commission now issues its:

Order

The Commission orders:

1. Bear Paw's application for a waiver of procedures and time schedules is granted.

2. Certificate of Corridor Compatibility No. 122 is issued to Bear Paw designating a corridor for the construction, operation and maintenance of the proposed transmission facilities. For purposes of the Certificate of Corridor Compatibility, the corridor consists of a 250 foot-wide area centered on the pipeline route for the length of the route. Construction on U.S. Forest Service lands will not begin until Bear Paw has submitted to the Commission a copy of the U.S. Forest Service issued finding of no significant impact and the Special Use Permit.

3. Route Permit No. 131 is issued to Bear Paw granting authority to construct and operate the transmission facilities in McKenzie County as further described in this Application and at the public hearing of August 29, 2011. Construction on U.S. Forest Service lands will not begin until Bear Paw has submitted to the Commission a copy of the U.S. Forest Service issued finding of no significant impact and the Special Use Permit.

4. The August 26, 2011, Certification Relating to Order Provisions-Transmission Facility Siting is incorporated by reference and attached to this Order.


PUBLIC SERVICE COMMISSION



**Kevin Cramer
Commissioner**



**Tony Clark
Chairman**



**Brian P. Kalk
Commissioner**

STATE OF NORTH DAKOTA
PUBLIC SERVICE COMMISSION

Bear Paw Energy, LLC
Garden Creek to Riverview NGL Pipeline, McKenzie County
Siting Application

Case No. PU-11-66

CERTIFICATION RELATING TO ORDER PROVISIONS - TRANSMISSION FACILITY SITING

I am Craig Forsander, a representative of Bear Paw Energy, LLC (Bear Paw) with authority to bind Bear Paw to requirements to be set forth by the Commission in its Order and I certify the following:

1. Bear Paw understands and agrees that any Certificate of Corridor Compatibility or Route Permit issued by the Commission will be subject to the conditions and criteria set forth in Chapter 49-22 of the North Dakota Century Code and Chapter 69-06-08 of the North Dakota Administrative Code, and that Bear Paw shall be responsible for compliance with this order and conditions and criteria set forth in the applicable laws and rules.
2. Bear Paw agrees to hold a preconstruction conference prior to commencement of any construction, which must include a Bear Paw representative, its construction supervisor, and a representative of Commission Staff, to ensure that Bear Paw fully understands the conditions set forth in the Commission's order.
3. Bear Paw agrees to comply with the rules and regulations of all other agencies having jurisdiction over any phase of the transmission facility including all city, township, and county zoning regulations.
4. Bear Paw understands and agrees that it shall obtain all other necessary licenses and permits, and shall provide copies of all licenses and permits to the Commission prior to construction activity associated with the transmission facility that requires said license or permit.
5. Bear Paw agrees to inform the Commission of its intent to start construction on the transmission facility prior to the commencement of construction. Once construction has started, Bear Paw shall keep the Commission updated on construction activities on a weekly basis.
6. Bear Paw understands and agrees that the pipeline will be buried to a minimum depth from the ground surface to the top of the pipe of 48 inches in rangeland, 48 inches for cultivated land, 48 inches at the bottom of the ditch for road crossings, and 72 inches across undeveloped section lines.
7. Bear Paw understands and agrees that any Certificate of Corridor Compatibility or Route Permit issued by the Commission is subject to suspension or revocation and may, in an appropriate and proper case, be suspended or revoked for failure to comply with the Commission's order, the conditions and criteria of the certificate or subsequent modification, or failure to comply with the applicable statutes, rules, regulations, standards, and permits of other state or federal agencies.



8. Bear Paw agrees to maintain records that will demonstrate that it has complied with the requirements of the Commission's order issuing a Certificate of Corridor Compatibility or Route Permit, and that it will preserve these records for Commission inspection at any reasonable time upon reasonable notice.
9. Bear Paw agrees to construct and operate the transmission facility in the manner described in Bear Paw's application, in any late filed exhibits and supplemental materials, and in accordance with all applicable safety requirements.
10. Bear Paw agrees to report promptly to the Commission the presence in the permit area of any critical habitat or threatened species, endangered species, bald eagles, or golden eagles of which Bear Paw becomes aware and which were not previously reported to the Commission.
11. Bear Paw understands and agrees that all cultural resource mitigation plans must be submitted to the North Dakota State Historic Preservation Office and approved prior to the start of any fieldwork and construction activity in the affected area.
12. Bear Paw understands and agrees that if any cultural resource, paleontological site, archeological site, historical site, or grave site is discovered during construction, it must be marked, preserved and protected from further disturbances until a professional examination can be made and a report of such examination is filed with the Commission and the State Historical Society and clearance to proceed is given by the Commission.
13. Bear Paw understands and agrees that all buried facility crossings of graded roads must be bored unless the responsible governing agency specifically permits Bear Paw to open cut the road.
14. Bear Paw understands and agrees that all pre-existing township and county roads and lanes used during construction must be repaired or restored to a condition that is equal to or better than the condition prior to the construction of the transmission facility and that will accommodate their previous use, and that areas used as temporary roads or working areas during construction must be restored to their original condition.
15. Bear Paw understands and agrees that construction must be suspended when weather conditions are such that construction activities will cause irreparable damage to roads or land, unless adequate protection measures approved by the Commission are taken.
16. Bear Paw understands and agrees that all topsoil, up to 12 inches, or topsoil to the depth of cultivation, whichever is greater, over and along trench areas where cuts will be made, must be stripped and segregated from the subsoil. Except along segments of the line using the double ditching method, any area on which excavated subsoil will be placed must also be stripped of topsoil. After backfilling is completed, any excess subsoil must be placed over the excavation area, blending the grade into existing topography. Topsoil must be replaced over areas from which it was stripped only after the subsoil is replaced.


17. Bear Paw understands and agrees that reclamation, fertilization, and reseeding is to be done according to the Natural Resources Conservation Service recommendations, unless otherwise specified by the landowner and approved by the Commission.
18. Bear Paw understands and agrees that its obligation for reclamation and maintenance of the right-of-way will continue throughout the life of the transmission facility.
19. Bear Paw understands and agrees that its obligation for reclamation and maintenance of the transmission facility, associated facilities, and roadways will continue throughout the life of the transmission facility.
20. Bear Paw agrees to comply with the Tree and Shrub Mitigation Specifications, attached.
21. Bear Paw understands and agrees that it shall work with landowners and residents to mitigate any increase in television and residential radio interference that results from the construction of the transmission facility.
22. Bear Paw understands and agrees that it shall repair or replace all fences and gates removed or damaged during all phases of construction and operation of the transmission facility.
23. Bear Paw understands and agrees that it shall repair or replace all broken or damaged drainage tile during all phases of construction and operation of the transmission facility.
24. Bear Paw understands and agrees that staging areas or equipment shall not be located on land owned by a person other than Bear Paw unless otherwise negotiated with landowners.
25. Bear Paw understands and agrees that it shall remove all waste that is a product of construction and operation, restoration, and maintenance of the site, and properly dispose of it on a regular basis.
26. Bear Paw understands and agrees that it shall, as soon as practicable upon the completion of the construction of the transmission facility, restore the area affected by the activities to as near as is practicable to the condition as it existed prior to the beginning of construction.
27. Bear Paw understands and agrees that it shall provide any necessary safety measures for traffic control or to restrict public access to the transmission facility.
28. Bear Paw understands and agrees that it shall advise the Commission of any extraordinary events which take place at the site of the transmission facility, including injuries to any person, or the death of any threatened or endangered species on the site within five business days of such event.
29. Bear Paw understands and agrees that it shall implement a procedure for how complaints concerning the transmission facility will be handled by Bear Paw
30. Upon request, Bear Paw agrees to provide the Commission with engineering design drawings of the transmission facility prior to construction.

31. Bear Paw understands and agrees that it shall inform the Commission in writing of any plans to modify the transmission facility or of any plans to modify the site plan for the transmission facility. Bear Paw understands and agrees to obtain written approval from the Commission prior to any modifications to the site plan or the transmission facility. Approval may be granted after notice and opportunity for hearing.
32. Bear Paw agrees to provide the Commission with both an electronic and a paper copy of the corridor approved by the Commission, and will provide this information within three months of the Commission order approving the corridor. Bear Paw also agrees to provide an electronic version of the approved corridor that can be imported into ESRI GIS mapping software within 3 months of the completion of the construction. This electronic map data must be referenced to the North Dakota coordinate system of 1983, North and/or South zones US Survey feet (NAD 83) UTM Zone 13N or 14N feet (NAD 83), or geographic coordinate system (WGS 84) feet. The vertical data must be in the appropriate vertical datum for the coordinate system used. All submissions must specify the datum in which the data was developed.
33. Bear Paw agrees to provide the Commission with both an electronic and a paper copy of the design specifications for the construction of the transmission facility showing the location of the transmission facility as built, and will provide this information within three months of the completion of the construction. Bear Paw also agrees to provide an electronic version of the as-built facility design specifications that can be imported into ESRI GIS mapping software within 3 months of the completion of the construction. This electronic map data must be referenced to the North Dakota coordinate system of 1983, North and/or South zones US Survey feet (NAD 83) UTM Zone 13N or 14N feet (NAD 83), or geographic coordinate system (WGS 84) feet. The vertical data must be in the appropriate vertical datum for the coordinate system used. All submissions must specify the datum in which the data was developed.
34. Bear Paw understands and agrees that the authorizations granted by any Certificate of Corridor Compatibility or Route Permit issued by the Commission for the transmission facility are subject to modification by order of the Commission if deemed necessary to protect further the public or the environment.
35. Bear Paw understands and agrees that in the event Bear Paw desires to construct, within any corridor granted by a Certificate of Corridor Compatibility in this proceeding, a transmission facility or energy conversion facility that was not included in Bear Paw's application in this proceeding, Bear Paw shall apply to the Commission for a Route Permit or Site Certificate for the facility.
36. Bear Paw shall notify the Commission, as soon as reasonably possible, if any damage, as defined by North Dakota Century Code Chapter 49-23, occurs to underground facilities during construction conducted under the certificate or permit issued in this proceeding. In the event of any damage to underground facilities, Bear Paw shall suspend construction in the vicinity of the damage until compliance with One-Call Excavation Notice System requirements under North Dakota Century Code Chapter 49-23 has been determined and clearance to proceed has been given by the Commission or Commission staff.

37. Bear Paw understands and agrees that the corridor certificate and route permit are subject to suspension or revocation and may, after hearing, be suspended or revoked for failure to comply with the Commission's order, requirements of the One-Call Excavation Notice System under North Dakota Century Code Chapter 49-23, the conditions and criteria of the certificate or permit or subsequent modification, or failure to comply with applicable statutes, or rules, regulations, standards, and permits of other state or federal agencies.

Dated this 26th day of August, 2011.

BEAR PAW ENERGY, LLC

By 
Craig Forsander

Its: Vice President



Case No. PU-11-66

Tree and Shrub Mitigation Specifications

Inventory

1. Trees and shrubs anticipated to be cleared, including those that are considered invasive species or noxious weeds (*e.g.*, *Caragana arborescens*, *Elaeagnus angustifolia*, *Rhamnus cathartica*, *Tamarix chinensis*, *T. parviflora*, *T. ramosissima*, *Ulmus pumila*), shall be inventoried before cutting. The inventory shall record the location, number, and species of trees and shrubs.
2. In windbreaks, shelterbelts and other planted areas, trees or shrubs anticipated to be cleared, regardless of size, shall be inventoried for replacement.
3. In native growth areas, trees anticipated to be cleared that are 1 inch diameter at breast height ("dbh") or greater shall be inventoried for replacement.
4. In native growth areas, shrubs anticipated to be cleared in the permanent right-of-way shall be inventoried for replacement.
5. In native growth areas outside the permanent right-of-way, shrubs shall be cut flush with the surface of the ground, taking care to leave the naturally occurring seed bank and root stock intact. If soil disturbance is necessary, the native topsoil shall be preserved and replaced after construction. Shrubs shall be allowed to regenerate naturally where native topsoil is preserved and replaced. Where native topsoil is not preserved and replaced, shrubs anticipated to be cleared shall be inventoried for replacement.
6. In native growth areas, trees and shrubs may be inventoried by actual count or by sampling method that will properly represent the woody

vegetation population. A sampling plan developed by the company, filed with the North Dakota Public Service Commission (NDPSC) and approved prior to the start of construction shall define the sampling method to be used for trees, for tall shrubs and for low shrubs. The data from the sample plots shall be extrapolated to the total acreage of the wooded area to be cleared to determine the species and quantity of trees and shrubs to be replaced.

Clearing for Construction

7. Trees and shrubs shall be selectively cleared, leaving mature trees and shrubs intact where practical.
8. The width of clear cuts through windbreaks, shelterbelts and all other wooded areas shall be limited to 50 feet or less unless otherwise approved by the NDPSC.
9. If the area of trees or shrubs actually cleared differs from the area inventoried, the difference in number of trees and shrubs to be replaced shall be noted on the inventory.

Replacement

10. Prior to tree/shrub replacement, documentation identifying the number and variety of trees removed as well as the mitigation plan for the proposed number, variety, type, location and date of replacement plantings shall be filed with the NDPSC for approval.
11. Tree replacement shall be on a 2 to 1 basis with 2-year-old saplings. Shrub replacement shall be on a 2 to 1 basis with stem cuttings.
12. Trees and shrubs shall be replaced by the same species or similar species suitable for North Dakota growing conditions as recommended by the North Dakota Forest Service.

13. Tree and shrub replacement shall not be conducted within a 20 to 30 foot wide path over the pipeline to facilitate visual inspections of the right-of-way in accordance with U.S. Department of Transportation safety regulations.
14. Landowners shall be given the option of having replacement trees/shrubs planted off the right-of-way on the landowner's property or waiving that requirement in writing and allowing those replacement trees/shrubs to be planted at alternative locations.
15. At the conclusion of the project, documentation identifying the actual number, variety, type, location and date of the replacement plantings shall be filed with the NDPSC.
16. Tree/shrub replacements shall be inspected once a year for three years, on about the anniversary of the plantings, and, on or shortly before October 1 of each year, a report shall be submitted to the NDPSC documenting the condition of replacement planting and any woodlands work completed. If after three years from the anniversary of the plantings the survival rate is less than 75%, the NDPSC may order additional planting(s).