

**BEFORE THE PUBLIC UTILITIES COMMISSION OF THE STATE OF COLORADO**

DOCKET NO. 03A-276E

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IN THE MATTER OF THE APPLICATION OF PUBLIC SERVICE COMPANY OF  
COLORADO FOR A CERTIFICATE OF PUBLIC CONVENIENCE AND NECESSITY  
FOR THE MIDWAY-DANIELS PARK TRANSMISSION REBUILD PROJECT.

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**RECOMMENDED DECISION OF  
ADMINISTRATIVE LAW JUDGE  
DALE E. ISLEY  
GRANTING APPLICATION, IN PART**

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Mailed Date: November 21, 2003

**TABLE OF CONTENTS**

I. <u>STATEMENT</u> .....	2
II. <u>FINDINGS OF FACT</u> .....	4
III. <u>DISCUSSION</u> .....	16
IV. <u>CONCLUSIONS</u> .....	25
V. <u>ORDER</u> .....	26
A. The Commission Orders That: .....	26

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Appearances:

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Company of Colorado;

Anne K. Botterud, Esq., Assistant Attorney General, Denver,  
Colorado, for the Staff of the Colorado Public Utilities  
Commission;

Thorvald A. Nelson, Esq., Holland & Hart, LLP , Greenwood  
Village, Colorado, for Castle Pines North Association, Inc.;

Harris Adams, Esq., Castle Rock, Colorado, *pro se*;

Carol Padilla, Castle Rock, Colorado, *pro se*; and

Kimberly Steenhoek, Castle Rock, Colorado, *pro se*.

## **I. STATEMENT**

1. The captioned application of Public Service Company of Colorado (PSCo) was filed with the Colorado Public Utilities Commission (Commission) on June 27, 2003. Public notice of the application was provided on July 1, 2003.

2. Timely interventions were filed in this proceeding by the Staff of the Commission (Staff), Thomas Kellogg and Carol Padilla (collectively, Padilla), Harris Adams (Adams), Kurt and Kimberly Steenhoek (collectively, Steenhoek), Castle Pines North Association, Inc. (Castle Pines), and Colorado Springs Utilities (CSU).<sup>1</sup>

3. On August 13, 2003, the Commission deemed this application complete as of August 15, 2003. PSCo filed its direct testimony and exhibits along with the application and, as a result, sought a Commission decision in this matter on or before December 15, 2003, the 120th day after the application was deemed complete. *See*, § 40-6-109.5(1), C.R.S.

4. A pre-hearing conference was held on September 4, 2003 at which time potential hearing dates and other procedural matters were discussed. *See*, Decision No. R03-0992-I. The matter was scheduled for hearing on October 28 through 31, 2003, and procedures and a procedural schedule were adopted. *See*, Decision No. R03-1013-I. That decision also extended

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<sup>1</sup> Staff, Castle Pines, CSU, Adams, Steenhoek, and Padilla may be collectively referred to herein as “Intervenors”.

the deadline referred to above for issuance of a Commission decision in this matter to January 14, 2004. *See*, § 40-6-109.5(1), C.R.S.

5. On October 10, 2003, Intervenors filed their respective answer testimony and exhibits. PSCo's rebuttal testimony and exhibits were filed on October 20, 2003.

6. On October 16, 2003, PSCo and CSU filed a Motion to Accept Stipulation and Settlement Agreement (Motion) and a Stipulation and Settlement Agreement (Stipulation).<sup>2</sup>

7. At the assigned place and time the undersigned administrative law judge (ALJ) called the matter for hearing. Appearances were entered by or on behalf of PSCo, Staff, Castle Pines, Adams, Steenhoek, and Padilla.

8. The Motion was considered as a preliminary matter. The Stipulation indicates that CSU supports the application but has certain operational concerns regarding possible overloading on its system. Specifically, based on power flow studies conducted by PSCo, taking the Midway-Daniels Park transmission line out of service could cause power flows in excess of system ratings for certain CSU transmission circuits. The most vulnerable facility is a CSU 115 kV circuit commonly referred to as the Kettle Creek Line. If the application is granted, PSCo has agreed to address these concerns by implementing the monitoring and remedial action measures described at pages 2 through 4 of the Stipulation. No party objected to the Motion or to approval of the Stipulation. Accordingly, the Motion was granted and the Stipulation was approved.

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<sup>2</sup> A copy of the Stipulation was admitted into evidence as Exhibit 13.

9. Prior to commencement of the parties' evidentiary presentations, each submitted brief oral opening statements. During the course of the hearing the pre-filed testimony and exhibits of the following witnesses were identified, offered, and admitted into evidence: Sandra Johnson (Exhibit 1 and attachments SJ-1 through SJ-4; Exhibit 2 and attachments SJ-5 and SJ-6); Thomas Green (Exhibit 3 and attachment TG-1; Exhibit 4 and attachment TG-2); Anne MacRea (Exhibit 5 and attachment ALM-1; Exhibit 6 and attachments ALM-2 through ALM-5); Andrew Schaller (Exhibit 7 and attachments AS-1 through AS-3; Exhibit 8); Harris Adams (Exhibit 9 and attachments GHA-1 through GHA-11); Kimberly Steenhoek (Exhibit 10); Carol Padilla (Exhibit 11); and Inez G. Dominguez (Exhibit 12). The following additional exhibits were identified, offered, and admitted into evidence: Exhibits 13, 14, and 16 through 32. Administrative notice was taken of Exhibit 15.

10. At the conclusion of the hearing all parties indicated a desire to submit written Statements of Position. Such Statements of Position were filed on November 10, 2003.<sup>3</sup>

11. In accordance with § 40-6-109, C.R.S., the undersigned now transmits to the Commission the record and exhibits in this proceeding along with a written recommended decision.

## **II. FINDINGS OF FACT**

12. By this application PSCo requests that the Commission issue it a certificate of public convenience and necessity (CPCN) authorizing the construction of the Midway-Daniels Park Transmission Rebuild Project (Project). PSCo also requests that the Commission make

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<sup>3</sup> The deadline for filing Statements of Position was extended from November 7, 2003 to November 10, 2003 at the request of the parties.

findings as to the reasonableness of the Electromagnetic Fields (EMFs) and noise levels that it projects will result from the Project. Specifically, it requests Commission findings that it is reasonable for the Project, when operating at 230kV, to create the EMF levels set forth in Attachment AS-2 of Exhibit 7 and the noise levels set forth in Attachment AS-3 (within a range of error of plus or minus 15 percent) of Exhibit 7. In addition, PSCo requests a finding that the EMF and noise ultimately resulting from the Project when operating at 230kV will, at whatever levels, be reasonable if it employs the EMF prudent avoidance techniques and the noise mitigation techniques described in the testimony of Mr. Schaller.

13. The PSCo transmission system running between the Denver area load center and generation resources located in the southern part of the state is referred to as the Front Range Path (FRP). As currently configured, the FRP consists of two 230kV transmission lines that originate at PSCo's Comanche Station in Pueblo and terminate at its Daniels Park Substation.<sup>4</sup> One of these lines passes through the Midway Substation south of Colorado Springs. The other passes through the Fuller Substation, northeast of Colorado Springs.

14. PSCo contends that the Project is the best alternative to facilitate the transfer of power between new generation in the southern part of the state and its Denver area load center. Currently, PSCo either owns or has contracted to purchase approximately 960 MW of generation capacity in southern Colorado. By 2005, it will contract for an additional 610 MW of power as a result of its 1999 Integrated Resource Plan (IRP). The transfer capability of the FRP is limited based on a single contingency or outage on either of the existing 230kV lines along the path.

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<sup>4</sup> The Midway-Daniels transmission line is approximately 70 miles in length. For much of the distance in this corridor, a 115kV line runs parallel to the 230kV lines. However, it is used for serving electric load rather than transferring bulk power.

The existing lines can only transfer 1,024 MW, or about 65 percent, of the 1,570 MW (960 MW of existing + 610 MW of planned additions) expected generation by 2005. *See*, Attachment TG-1 to Exhibit 3. PSCo contends that the Project is needed to increase the transfer capability of the FRP so that all the generation contemplated by its 1999 IRP can be accessed and used to serve its electric customers.

15. PSCo's 1999 IRP initially contemplated constructing a new 230kV transmission line between the Midway and Daniels Park Substations. However, after the IRP studies were done and the IRP hearing were completed, PSCo discovered that the additional right-of-ways that would be necessary to accommodate a new line adjacent to the existing transmission corridor had become very difficult to obtain due to the construction of several new residential subdivisions adjacent to the corridor. These new right-of-ways could not be obtained without condemning at least some of these residential properties. At that time, therefore, PSCo no longer considered this a viable option. This left two alternatives; either an existing 230kV line in the FRP corridor would have to be taken out of service for a rebuild, or an entirely new corridor would have to be acquired. PSCo was reluctant to take such a critical transmission line out-of-service for long periods of time during construction. As a result, the Midway to Daniels Park alternative was abandoned and PSCo shifted its focus to evaluating other possible corridors located east of the current Midway-Daniels Park corridor.

16. PSCo first investigated an "initial" study area for a new corridor in portions of El Paso, Elbert, and Arapahoe Counties, and the City of Aurora. *See*, Attachment SJ-1 to Exhibit 1. Instead of terminating at the Daniels Park Substation, the proposed line terminated at the Smoky Hills Substation (North and East of the Daniels Park Substation). With the help of a consultant, PSCo identified potential route alternatives within the initial study area. These routes

were then presented to the public and to local officials in an effort to obtain local input. PSCo's preferred route for this initial study area was 105 miles in length with an estimated cost of \$54.7 million. The route required the acquisition of new right-of-ways and siting permits that were estimated to cost \$3.8 million. Adverse comments received during the course of the public meeting process suggested that PSCo should consider additional alternatives further to the east.

17. As a result, PSCo established an "expanded" study area encompassed by portions of El Paso, Lincoln, Elbert, and Arapahoe Counties. *See*, Attachment SJ-1 to Exhibit 1. As with the initial study area, the transmission line associated with this proposed alternative terminated at the Smoky Hills Substation. Once again, preliminary routes were identified and presented to the public and local officials. PSCo's preferred route for the expanded study area was 139 miles in length with an estimated cost of \$80.4 million. This route required the acquisition of new right-of-ways and siting permits estimated to cost \$5.0 million. During the public meeting process, numerous expressions of concern were submitted regarding potential adverse impacts to large-lot developments, farmland, rangeland, wildlife, and trees. PSCo also received comments from state and local agencies concerned about state trust lands, future development, and potential environmental impacts.

18. The above concerns led PSCo to re-evaluate the original Midway-Daniels Park corridor. In addition to these concerns, a Smoky Hill single-circuit 345kV transmission line did not provide as much transfer capability as the original Daniels Park alternative, mainly due to the longer distances involved. Also, PSCo concluded that there would be significant difficulties and expense associated with obtaining the necessary right-of-ways and land-use permits from local jurisdictions within an acceptable time frame. During the re-evaluation process, PSCo determined that the operational issues that caused the existing Midway-Daniels Park corridor to

be initially discarded could be resolved. Its engineers determined that a double-circuit transmission line could be constructed within the existing right-of-way. The use of multiple construction crews would allow the Project to be completed on an expedited basis thereby reducing the time the existing line would be placed out of service. Also, additional generation recently constructed in the Denver area would allow for greater flexibility for system operation during construction. Finally, new transmission lines recently built north of Denver would enhance the network's ability to move northern Colorado generation power to the Denver area.

19. The above-described factors led PSCo to conclude that the Project presents the best alternative for increasing the transfer capacity of the FRP while, at the same time, satisfying the following objectives: (a) fully accommodating existing and planned generation in the southern portion of the state; (b) be the most reliable and not interfere with existing electric systems; (c) allow for higher voltage operation when conditions warrant; (d) minimize right-of-way issues such as environmental impacts, legal and regulatory requirements, public concerns, and easement acquisition; (e) make the best use of existing transmission facilities and corridors; (f) allow for an acceptable level of operational risk during construction; and (g) be the most cost effective.

20. The Project consists of replacing one of the existing single circuit 230kV wooden K-frame transmission lines, the one running through the Midway Substation, with a double-circuit steel pole transmission line.<sup>5</sup> The new steel poles will be about 30 feet taller than the existing poles at each specific location. By placing two of the phases on the lower arms, the new poles will be approximately 25 to 30 feet shorter than they would have to be if a different

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<sup>5</sup> See, Attachment AS-1 to Exhibit 7 for a diagram of these two types of transmission line poles.



structural design had been chosen. In order to minimize the visual impact of the poles, PSCo will install self-weathering steel poles that are designed to darken to a brown earth-tone color over time. It has also agreed to install non-specular conductors and insulators, as recommended by Staff.<sup>6</sup>

21. The cost of the Project is estimated to be \$54.4 million. Because PSCo considers this estimate to be “high-level,” it anticipates that the final costs will be within +/- 25 percent of the estimate. PSCo indicates that it must start survey work this fall in order for the line to be in-service by June 2005, the timeframe within which the additional generation sources described above are expected to be available.

22. PSCo proposes to initially operate the Project at 230kV. Operation at this level is sufficient to accommodate transfer of the additional generation contemplated by PSCo’s 1999 IRP as described above. However, PSCo has requested authority to construct the Project for future operation at 345kV.<sup>7</sup> PSCo contends that it is prudent to make the additional investment needed to construct for operation at that level now in order to accommodate anticipated future load growth. It also contends that this is responsive to the desire expressed by the Commission in Docket No. 00A-067E to “develop a comprehensive plan for deployment of a

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<sup>6</sup> Use of non-specular material minimizes glare from the line.

<sup>7</sup> By this application PSCo is not asking for Commission approval to operate the Project at 345kV or for EMF or noise level reasonableness findings for operation at that level. When and if future need warrants operation at that level, PSCo will notify the Commission of such need through a filing under Rule 18 of the Commission’s Electric Utility Rules (hereinafter, Rule 18). *See, 4 Code of Colorado Regulations 723-3-18.* At hearing, PSCo indicated that it would have no objection to the imposition of a condition to a grant of this application requiring it to file a subsequent application for a CPCN specifically requesting Commission approval to operate the Project at 345kV.

higher (than 230kV) bulk transmission voltage in the Front Range, and particularly, the Denver area.” *See*, Decision No. C01-67 at page 23.<sup>8</sup>

23. PSCo estimates that 20 percent of the cost of the Project (\$10 to \$12 million) is attributable to construction of the facility for operation at 345kV. Conversion from 230kV to 345kV can be accomplished by adding autotransformers at the substations at both ends of the line. No change in the towers, conductors, or insulators will be required. If the Project is initially built to 230kV specifications and then future demand dictates a need for operation at 345kV operation, a complete rebuild of the 230kV structures would likely be necessary. This would require the installation of new foundations, new poles and, possibly, new wires. It would also require another planned outage on the FRP that could compromise system reliability. The cost of such a future rebuild would be substantially greater than the cost of converting a line constructed at 345kV specifications from 230kV operation to 345kV operation.

24. Mr. Schaller presented testimony in support of PSCo’s request for a finding that the projected levels of EMF that will result from operation of the Project at 230kV will be reasonable. Attachment AS-2 to Exhibit 7 sets forth a graphic depiction of anticipated EMF levels at two different points in the right-of-way corridor. The first, at page 1 of Attachment AS-2, is for locations involving the existing twin 230kV lines only. The second, at page 2 of Attachment AS-2, is for locations where the third existing 115kV line runs parallel to the twin 230kV lines in the same corridor. The load used for these EMF analyses was developed from projected system normal conditions expected in 2006. Using the center of the corridor right-of-

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<sup>8</sup> PSCo cited three other recent transmission projects that were constructed to be capable of future operation at 345kV. These include Fort Saint Vrain to Green Valley single circuit line, the RMEC to Green Valley double circuit line, and the Green Valley to Blue Spruce line. The Commission authorized at least two of these projects without requiring PSCo to file an application for a CPCN. *See*, Decision No. C02-716.

way as the measuring point, Attachment AS-2 indicates that anticipated EMF levels for the Project operated at 230kV for both locations in the corridor is estimated to be somewhat lower than anticipated EMF levels produced by the existing twin 230kV lines for points located on one side of the corridor right-of-way and somewhat higher for points located on the other side.

25. Mr. Schaller also described the “prudent avoidance” techniques PSCo plans to incorporate into the Project for the purpose of minimizing EMF levels. *See, 4 Code of Colorado Regulations 723-3-18(i).*<sup>9</sup> These include the use of structures designed with three to five feet of additional ground clearance (Step 3 of Rule 18(i)) and placement of the proposed line in a manner designed to optimize “reverse phasing” (Step 1 of Rule 18(i)). Reverse phasing occurs when the magnetic field of one line has the effect of canceling, at least in part, the magnetic field emanating from an adjacent line. PSCo analyzed over 100 combinations of line placements and chose the one that optimized reverse phasing and, therefore, had the greatest reduction on EMF at the edge of the corridor right-of-ways. That combination is portrayed in Attachment AS-2. The remaining EMF prudent avoidance steps described in Rule 18(i) were not employed by PSCo since, in its opinion, they cannot be implemented for a moderate cost and would, therefore, not be reasonable given the levels of EMF estimated by the models employed.<sup>10</sup> For example, the cost of burying the Project would be approximately ten times greater than the cost for overhead construction but it would not eliminate EMF.

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<sup>9</sup> Rule 18(i) obligates a utility to include the concept of prudent avoidance with respect to planning, siting, construction, and operation of transmission facilities by striking a reasonable balance between the potential health effects of exposure to magnetic fields and the cost and impacts of mitigating such exposure. It instructs the utility to take steps to reduce the exposure at reasonable or moderate cost and describes five potential steps that might be considered.

<sup>10</sup> The three steps set forth in Rule 18(i) not employed by PSCo include routing the line to limit exposure to areas of concentrated population and group facilities such as schools and hospitals, widening the right-of-way corridor, and burial of the line.

26. Mr. Schaller also presented testimony in support of PSCo's request for a finding that the estimated noise levels from operation of the Project at 230kV will be reasonable.<sup>11</sup> PSCo used a Bonneville Power Administration model to perform its noise analysis. This model predicts average noise levels generated by transmission lines by considering such variables as conductor size and spacing, static wire dimensions, the overall geometry of the line, its elevation, its operating voltage, and the rain rate. PSCo utilized the following assumptions when it modeled the estimated noise levels of the Project: (1) readings were predicted for mid-span locations without the influence of the structures; (2) elevation was 6,900 feet; (3) operating voltages were 230kV; (4) wet conditions occurred when water droplets formed on the line; (5) noise reflection from the ground or other objects is unknown; and (6) the model predicts noise after the "burn-in" period.<sup>12</sup> Attachment AS-3 to Exhibit 7 sets forth PSCo's modeled estimates of noise levels that may emanate from the Project under fair and damp weather conditions on the basis of the above assumptions.

27. Mr. Schaller acknowledged that sound modeling for transmission lines is an inexact science and that there are a number of variables that can affect the level of noise emanating from a transmission line. The primary variable is moisture, with wet lines emitting noise levels as much as 25 dB(A) higher than lines that are dry. Other variables include elevation, the level of voltage being transmitted over the line, ground cover, intervening fences and trees, and noise reflected from the transmission poles, adjacent buildings, or hard surfaces.

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<sup>11</sup> Evidence dealing with projected noise levels emanating from the Project at 345kV operation was also presented. However, as indicated previously, PSCo is not requesting a CPCN to operate the Project at 345kV and, accordingly, is not requesting a finding that the projected noise resulting from operation at that level is reasonable.

<sup>12</sup> Mr. Schaller described the "burn-in" period as some indeterminable period of time after the line is energized where imperfections, residue, and other foreign material burn off. This ultimately results in the line becoming less noisy.

Mr. Schaller also acknowledged that PSCo's noise models are new and that he is unsure of the range of error that should be expected. He estimates the range of error to be +/- 15 percent based on his personal observations of data produced by the model in question. PSCo has not, within the past two years at least, conducted any field readings for the purpose of determining whether the actual noise levels produced by a transmission line are consistent with the modeled noise levels projected for the line.

28. PSCo proposes to employ various measures designed to minimize the level of corona-related noise generated by the Project. These include the use of high quality bundled conductors (*i.e.*, two or more conductors per phase) with phases adequately spaced, use of corona-free hardware, and the use of proper construction techniques such as the careful handling of conductors and proper line tensions. Placing the Project underground would eliminate the noise emanating from the upgraded line. However, undergrounding was rejected by PSCo as too costly. As indicated previously, it estimates that burying the Project would increase its cost tenfold. In addition, underground lines are somewhat more difficult to repair than overhead lines and can have a negative impact on soils, surface water, vegetation, and wildlife.

29. Staff supports the application and recommends that the Commission grant PSCo a CPCN to construct the Project at 345kV standards and to operate it at 230kV. Staff also supports PSCo's request for "reasonableness" findings with regard to projected EMF and noise levels for operation at 230kV. Staff recommends that the Commission decline to make reasonableness findings concerning EMF and noise levels produced by the Project for operation at 345kV until such time as PSCo applies to operate the Project at that voltage level.

30. Castle Pines is an incorporated association that represents the residents of the Castle Pines North subdivision, a residential community located northwest of Castle Rock, Colorado. The remaining Intervenorers are individual residents of Castle Pines North. Castle Pines North was constructed after the existing Midway-Daniels Park transmission line corridor was established. The corridor abuts this subdivision. The Steenhoek's home is adjacent to the corridor. The Adams' home is located off the corridor with approximately 15 homes between it and the corridor. The Padilla home backs up to open space that abuts the corridor.

31. None of the Intervenorers dispute the need for the additional transmission capacity that would be provided by the Project. However, they all oppose construction of the same within that portion of the existing Midway-Daniels Park corridor that abuts Castle Pines North, a distance of approximately two miles. They contend that the Project will impair the esthetics of the area, both visually and through an increase in noise production. They are especially concerned that a Commission reasonableness finding with regard to the noise projected for the Project will deprive them of the ability to legally challenge actual noise levels under the Colorado Noise Abatement Statute (CNAS). *See*, § 25-12-101, C.R.S. They also contend that the public notice process employed by PSCo did not provide them sufficient time to explore the feasibility of self-financing the cost of burying the two-mile portion of the Project referred to above.

32. Intervenorers urge the Commission to order PSCo to bury the Project within Castle Pines and to pay the additional cost (approximately \$10 million) of doing so. Burial would eliminate noise produced by the Project and, to a degree, enhance the visual esthetics within that area. PSCo contends that incurring this incremental cost would not be prudent given the level of noise (low, in its opinion) that it projects will be produced by the Project at 230kV operation. It

also cites the environmental damage and esthetic impairment that burial would likely produce; *i.e.*, trenching with the resultant destruction of foliage and the installation of above-ground oil pumping equipment and an oil reservoir. Because of the relatively large incremental cost, PSCo's general policy is to not bury transmission lines unless burial is technically required or the beneficiaries of burial agree to pay such cost.

33. As an alternative to burial, Castle Pines and Adams have suggested that a "hybrid" construction approach be adopted. That would allow for construction of the Project for operation at 345kV as it leaves the Midway Substation but once it approached the southern edge of Castle Pines North and into the Daniels Park Substation it would be constructed for 230kV operation. Castle Pines and Adams contend that this would meet the current demonstrated need for transmission capacity, would minimize negative impacts on Castle Pines North residents, and would allow for further study of alternate routes around Castle Pines North before installation of a facility capable of operating at 345kV becomes necessary. They also contend that this alternative would avoid incurring the cost of building this portion of the Project for 345kV operation in the event the Commission ultimately denies a PSCo request to operate the Project at that voltage level.

34. PSCo estimates that 15 to 20 slightly different 230kV poles could be used under the "hybrid" construction proposal and that this would result in between \$200,000 and \$300,000 in cost savings. The height of the 230kV poles would be essentially the same as those used for construction at 345kV operation and the noise level generated by this portion of the Project would not be reduced and, in PSCo's opinion, may possibly be greater than current noise levels. PSCo is also concerned that the hybrid proposal would create a "weak link" in the FRP by constructing to a lesser standard. Also, subsequent conversion of this portion of the Project to

345kV operation would cost up to \$1.5 million and would require the Project to be placed out-of-service for some period of time. During that period, system reliability could be compromised.

### III. **DISCUSSION**

35. This application is brought under the provisions of § 40-5-101, C.R.S. That statute precludes a public utility from beginning the construction of or extending a new facility, plant, or system without first obtaining a certificate from the Commission that the present or future public convenience and necessity requires or will require such construction or extension. To secure such a certificate the utility must show by competent evidence that there is a need for the additional construction/extension and that existing facilities are not reasonably adequate and available. *See, Public Service Company v. PUC*, 142 Colo. 135, 350 P.2d 543, *cert. denied* 364 U.S. 820, 81 S. Ct. 53, 5 L.Ed.2d 50 (1960).

36. The evidence presented by PSCo in support of a need for the additional transmission capacity that will be provided by the Project operating at 230kV was substantial and was not contested by any Intervenor. Indeed, two of the Intervenors, Staff and CSU, support the application on an almost unqualified basis.<sup>13</sup> The evidence establishes that current limits on the FRP will not allow PSCo to fully transfer all the power from new generation sources in the Colorado Springs/Pueblo area approved by the Commission in PSCo's 1999 IRP to its Denver area load center. The Project will allow it to do so by increasing the transfer capability of the FRP from 368 MW (which corresponds to a generation level of 1,024 MW) to 788 MW. This increased transfer capacity corresponds to a generation level of 1,572 MW, an amount sufficient to accommodate the 1,570 MW in new generation that is scheduled to be added to the FRP by

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<sup>13</sup> Evidence was also presented that a non-party, Intermountain Rural Electric Association, supports the application. *See*, Attachment SJ-6 to Exhibit 2.



2005. PSCo has, therefore, sustained its burden of establishing a need for the additional transfer capability afforded by the Project and that existing facilities are inadequate to satisfy that need.

37. The evidence also establishes that use of the existing Midway-Daniels Park transmission corridor provides the most reliable, efficient, and least costly method of securing the needed additional transfer capacity. The eastern alternatives studied by PSCo do not provide as much transfer capacity and the costs are higher. *See*, Table 5 of Attachment TG-2 to Exhibit 4 and Attachment SJ-4 to Exhibit 1.

38. The evidence does not establish a current need for operation of the Project at 345kV. Accordingly, PSCo will be required to submit a subsequent application for a CPCN seeking authority to operate the Project at that voltage level when and if such a need arises. Notwithstanding the lack of a current need to operate at 345kV, the ALJ is convinced that prudent transmission planning dictates that the Project be constructed to accommodate future operation at that voltage level. The incremental cost of constructing the Project to operate at 345kV is approximately \$10 million.<sup>14</sup> The current expenditure of this amount is reasonable given the likelihood that PSCo will need additional transfer capacity from southern generation sources to the Denver load area in the future.<sup>15</sup> Conversion of the Project from 230kV to 345kV requires only the addition of autotransformers in the substations at each end of the line.

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<sup>14</sup> Some of the Intervenor are concerned that PSCo may be allowed to recover this incremental cost from ratepayers even if it never obtains a CPCN to operate the Project at the 345kV voltage level. However, the cost of the Project should not be included in PSCo's rate base unless it establishes in an appropriate rate case that the Project is "used and useful." This concept should limit PSCo's ability to recover the approximate \$10 million incremental cost incurred in constructing the Project for 345kV operation if, in fact, the Project cannot legally be operated at that voltage level.

<sup>15</sup> The evidence of such future need was mostly anecdotal and somewhat speculative. However, there was testimony to the effect that both PSCo and Tri-State Generation and Transmission Association are currently exploring the possibility of adding generation sources in southeastern Colorado and that PSCo is considering an expansion of the DC Tie Line. Both could result in a future need for additional transfer capacity on the FRP.

Therefore, if needed, the Project could achieve 345kV operation quickly, inexpensively, and with minimal risk to FRP reliability. In addition, in the so-called Transmission Adequacy Docket, the Commission expressed its desire for PSCo to deploy higher voltage transmission capabilities in the Front Range area. *See*, Decision No. C01-76 at page 23. Constructing the Project for future operation at 345kV is consistent with that policy.

39. By contrast, the cost and reliability concerns associated with constructing the Project for operation at 230kV and then upgrading it later to accommodate additional generation sources are substantial. Under that scenario PSCo would have two alternatives. Either one of the 230kV lines in the Midway-Daniels Park corridor would be taken out-of-service and replaced with a new double circuit 345kV line, or the 230kV double circuit line would remain in service and a new single circuit 345kV transmission line outside the Midway-Daniels Park corridor would be constructed. PSCo estimates the cost of the first alternative to be \$44 million now for the 230kV line (current estimated Project cost less 20 percent) and \$54 million (plus the cost of autotransformers) later when reconstruction of the double circuit 230kV line to a double circuit 345kV line is required. It estimates the cost of the second alternative to be \$44 million now for the 230kV line and between \$54.7 and \$80 million later for construction of a new single circuit 345kV line.<sup>16</sup>

40. On the other hand, requiring PSCo to spend an additional \$10 million to bury that portion of the Project that abuts Castle Pines North is not prudent. There is no technical reason requiring that this portion of the Project be buried. While burial would eliminate noise, it would

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<sup>16</sup> The estimated cost of a new 345kV line outside the Midway-Daniels Park corridor is based on the estimates generated in connection with the “initial” and “expanded” study areas discussed above. *See*, Attachment SJ-4 to Exhibit 1.

not eliminate EMF. As discussed more fully below, those who contend that noise from the Project unreasonably interferes with the use and enjoyment of their property are free to assert such claims in a different forum. Further, there is no evidence that burial would materially enhance the reliability of the Project. Indeed, the evidence suggests that it may be more difficult to maintain and repair buried transmission lines than those located overhead.

41. Evidence concerning the environmental effect of burial is conflicting. The enhanced visual aesthetics gained by burial would likely be offset by environmental damage inflicted through the burial process. Finally, requiring PSCo and, ultimately, its ratepayers, to bear the cost of burying that portion of the Project passing through Castle Pines North would be unfair to those similarly situated residential communities that will not receive the alleged benefits of burial. This supports PSCo's policy of requiring that the beneficiaries of transmission line burial pay the incremental cost of the burial process.<sup>17</sup>

42. Nor would it be prudent to adopt the "hybrid" construction proposal advanced by certain Intervenors. The cost savings resulting from implementation of that proposal are minimal (\$200,000 to \$300,000) while the cost of subsequently converting this portion of the Project to 345kV operation are significant (\$1.5 million). The enhanced visual aesthetics to be gained are also *de minimis* since the height of the poles that would be used for construction at 230kV operation would not be materially different than those used for construction at 345kV operation. Similarly, there is no evidence that the noise levels would be significantly different. Finally, both

---

<sup>17</sup> The ALJ is sympathetic to Adams' argument that this policy may be ineffectual when, for example, the notice provided by PSCo to those to be affected by transmission line projects provides insufficient time to arrange for payment of the incremental cost of line burial. However, the ALJ has been unable to locate any provision of public utility law that requires PSCo to provide any such notice. In the absence of a notice requirement, it is impossible to find that PSCo's alleged failure to provide Intervenors with more advance notice of the Project provides either a basis for denial of the application or the imposition of conditions designed to implement the construction alternatives they propose.

Staff and PSCo agree that construction of the Project in this manner would not constitute prudent transmission planning since it would interject a “weak-link” into the FRP.

43. As indicated previously, Rule 18(i) requires PSCo to include the concept of “prudent avoidance” with respect to planning, siting, construction, and operation of the Project for the purpose of minimizing EMF levels. Accordingly, Rule 18(i) provides the legal basis underlying PSCo’s request for Commission findings concerning the “reasonableness” of the EMF levels it projects will result from the Project when operated at 230kV.

44. The prudent avoidance measures to be employed by PSCo designed to minimize EMF levels are described in Section I, Paragraph 25 above. No party challenged the sufficiency of these measures or contended that the anticipated EMF levels shown on Attachment AS-2 of Exhibit 7 (for operation of the Project at 230kV) were in any way unreasonable. Similarly, no party took issue with PSCo’s contention that the EMF ultimately resulting from the Project when operating at 230kV will, at whatever levels, be reasonable so long as it employs such prudent avoidance techniques. Accordingly, the evidence warrants a finding that the prudent avoidance techniques to be employed by PSCo in connection with the Project strike a reasonable balance between the potential health effects of exposure to EMF and the cost and impacts of mitigating such exposure; that the anticipated EMF levels for operation of the Project at 230kV as shown on Attachment AS-2 of Exhibit 7 are reasonable; and that the EMF ultimately resulting from the Project when operating at 230kV will, at whatever levels, be reasonable so long as PSCo employs such prudent avoidance techniques.

45. The concept of prudent avoidance as it relates to noise produced by a transmission line is not encompassed by Rule 18(i) or by any other Commission rule or regulation. PSCo’s

request that the Commission make reasonableness findings with regard to noise levels that may be emitted by the Project is submitted in response to the holding of our Supreme Court in *Public Service Company v. Van Wyk*, 27 P.3d 377 (2001).

46. In that case, the Court ruled that the Van Wyks could maintain an intentional nuisance claim against PSCo with regard to noise emitted by a 230kV transmission line running through Douglas County (the Daniels Park Line). In 1989, the Commission granted PSCo's application, brought under § 30-28-127, C.R.S., to upgrade the Daniels Park Line from 115kV to 230kV (the 1989 Daniels Park Upgrade Case). *See*, Decision No. C89-1622. After the upgrade was completed, the Van Wyks sued PSCo claiming, among other things, that the noise emitted by the Daniels Park Line constituted an intentional nuisance. PSCo sought to dismiss this claim on the ground that it was negated by the Commission's finding of reasonableness. However, the Supreme Court allowed the claim to proceed, stating that the Commission's failure to specifically quantify the level of noise it deemed to be reasonable afforded the Van Wyks an opportunity to prove that the noise emitted by the Daniels Park Line fell outside the Commission's reasonableness finding thereby constituting an "unreasonable and substantial interference" with the use and enjoyment of their property. As part of this application, PSCo is requesting that the Commission quantify the noise levels relating to the Project that it deems to be reasonable. That quantification would, presumably, set the standard by which future noise-related nuisance claims relating to the Project would be measured.

47. First, it is important to note that the holding in the Van Wyk case does not require the Commission to quantify noise reasonableness findings that it may make in connection with transmission line application proceedings. The Court merely states, by way of *dicta*, that such a quantification, if made, "...would become the standard for the level at which noise would not

constitute an invasion interfering with the Van Wyks' use and enjoyment of their property." *See, Public Service Company v. Van Wyk, supra*, at page 393.

48. Second, it is observed that this application is brought under the provisions of § 40-5-101, C.R.S., not § 30-28-127, C.R.S., the statute under which the 1989 Daniels Park Upgrade Case was brought and which underlies the Van Wyk decision discussed above. Section 30-28-127, C.R.S., provides an exception to the Colorado Land Use Act by authorizing the Commission to order public utility improvements to be made even if they modify a county's master use plan upon a finding that such improvements are "**reasonable**." Therefore, consistent with the provisions of that statute, the Commission found in the 1989 Daniels Park Upgrade Case that "...the increase in noise levels which is likely to be occasioned by the transmission line upgrade is reasonable under the circumstances." *See*, Decision No. C89-1622 at page 9. Unlike § 30-28-127, C.R.S., § 40-5-101, C.R.S., imposes no requirement that the Commission make specific reasonableness findings in connection with an application, such as this one, that seeks a CPCN to construct or extend a utility facility. Therefore, the relevance of the Van Wyk holding to PSCo's request that the Commission make reasonableness findings in this proceeding is questionable at best.

49. Notwithstanding the above, the Commission has, on two occasions at least, gratuitously included the noise reasonableness findings requested by PSCo in granting CPCN applications brought under § 40-5-101, C.R.S., for the construction of transmission lines. *See*, Decision Nos. C03-0946 and C03-1055. It is noted that neither of these applications were contested and, as a result, were not subject to the scrutiny afforded by a full evidentiary proceeding.

50. In any event, the ability of the Commission to determine whether the level of noise anticipated from a particular transmission line is “reasonable” is currently limited. It could, as it has done with EMF, adopt a rule specifying steps to be followed by a utility designed to mitigate transmission line noise which, if so followed, would provide the legal basis for noise reasonableness findings. In the absence of such a rule, the Commission’s ability to make such a determination requires that it be presented with noise level projections that have been demonstrated to be reliable and some objective noise standard against which such projected noise levels may be measured. Here, the Commission has neither.

51. Mr. Schaller acknowledged that the models used to predict estimated noise levels for the Project are “inexact.” He also acknowledged that the models have some range of error but he was unsure of the range of error that might be expected. He “suspected” that the range of error was +/- 15 percent based only on his personal observations of the data produced by the model. Therefore, the noise levels set forth in Attachment AS-3 to Exhibit 7 are only PSCo’s “best projections” of actual noise levels that may be produced by the Project. In addition, Mr. Schaller testified that a wide variety of variables affect the actual noise levels produced by a transmission line. He also stated that noise levels will be higher than those projected during the “burn-in” period. However, he could not quantify the length of that period. Most importantly, no field readings have been conducted to determine if actual noise levels produced by a PSCo transmission line are consistent with the Bonneville Power Administration’s modeled noise levels projected for the Project. Given this level of uncertainty as to the accuracy of the models used and their ability to predict actual noise levels to be emitted by the Project, it cannot be concluded that the noise levels set forth in Attachment AS-3 to Exhibit 7 are reasonable. It follows, therefore, that the evidence is also insufficient to support a finding that the noise

ultimately resulting from the Project will, at whatever levels, be reasonable so long as PSCo employs the previously described noise mitigation techniques.

52. Castle Pines and Adams urge the Commission to adopt the maximum permissible noise levels contained in the CNAS as the standard by which the actual noise levels produced by the Project may be measured. *See*, § 25-12-103, C.R.S. However, the applicability of the CNAS to transmission lines in general and to the Project in particular is in question. For example, Adams' claim that the projected noise levels for the Project exceed those permitted by the CNAS presumes that the CNAS noise standards for a residential zone apply to the Project. However, PSCo contends that the Project is located in an agricultural zone for which there are no CNAS noise standards. In addition, Adams' interpretation of the CNAS assumes that an activity in a non-residential zone must comply with the residential zone noise standards if there is a residential zone adjacent to the non-residential area in which the activity is located. PSCo takes issue with this interpretation and contends that the applicable noise limit for an activity is the zone limit in which the activity is located. Finally, since they are not specifically referred to in the CNAS and since there has been no judicial determination of the issue, PSCo questions whether the CNAS even applies to transmission lines. These issues are outside the expertise and jurisdiction of the Commission and are best determined by the courts. As a result, the Commission should not adopt the maximum permissible noise levels contained in the CNAS as the standard against which projected noise levels for the Project are to be measured.

53. In sum, neither § 40-5-101, C.R.S., nor the holding in the Van Wyk case require that the Commission make noise reasonableness findings in connection with the Project. In addition, unlike EMF, in the absence of any rule or regulation encompassing the concept of prudent avoidance as it relates to noise produced by a transmission line, the Commission's ability



to make noise reasonableness findings is limited. Even if it were inclined to make such findings, the evidence presented in this proceeding is insufficient to support such findings given the level of uncertainty as to the accuracy of the models used to predict actual noise levels and the lack of any objective noise standard against which such projected noise levels may be measured.

#### **IV. CONCLUSIONS**

54. The Stipulation between PSCo and CSU should be approved without modification.

55. PSCo should be granted a CPCN authorizing it to upgrade the Midway-Daniels transmission line to 345kV standards within the existing corridor and to operate it at 230kV.

56. PSCo should be allowed to construct the Project for operation at 345kV but should not be allowed to operate the Project at that voltage level until such time as it secures a CPCN from the Commission authorizing it to do so.

57. PSCo should not be required to bury any portion of the Project.

58. PSCo should not be required to construct the Project in accordance with the “hybrid” construction approach advocated by Castle Pines and Adams as described in paragraph 33 above.

59. The EMF prudent avoidance techniques to be employed by PSCo in connection with the Project (described in paragraph 25 above) strike a reasonable balance between the potential health effects of exposure to EMF and the cost and impacts of mitigating such exposure. Accordingly, the anticipated EMF levels for operation of the Project at 230kV as shown on Attachment AS-2 of Exhibit 7 are reasonable and the EMF ultimately resulting from

the Project when operating at 230kV will, at whatever levels, be reasonable so long as PSCo employs such EMF prudent avoidance techniques.

60. The evidence of record does not support a finding that the anticipated noise levels to be produced by the Project as set forth in Attachment AS-3 to Exhibit 7 are reasonable.

61. The evidence of record does not support a finding that the noise ultimately resulting from the Project will, at whatever levels, be reasonable so long as PSCo employs the noise mitigation techniques described in paragraph 28 above.

## **V. ORDER**

### **A. The Commission Orders That:**

1. Docket No. 03A-276E, being an application of Public Service Company of Colorado is granted, in part, consistent with the provisions of this Recommended Decision.

2. Public Service Company of Colorado is hereby issued a Certificate of Public Convenience and Necessity to upgrade its transmission system by removing one of the existing 230kV single-circuit transmission lines running between its Midway Substation and its Daniels Park Substation and replacing it with a double-circuit transmission line to be constructed to 345kV standards but to be operated at 230kV. Public Service Company of Colorado shall not be authorized to operate the upgraded transmission line at 345kV unless and until it is granted a Certificate of Public Convenience and Necessity to do so.

3. The Electromagnetic Fields projected by Public Service Company of Colorado to result from operation of the upgraded transmission line at 230kV set forth in Attachment AS-2 of Exhibit 7 submitted in this proceeding are reasonable. In addition, the level of Electromagnetic Fields resulting from operation of the upgraded transmission line at 230kV will continue to be

reasonable in the event they vary from such projections so long as Public Service Company of Colorado employs the EMF prudent avoidance techniques described in the testimony submitted in this matter by Andrew Schaller.

4. The Stipulation and Settlement Agreement between Public Service Company of Colorado and Colorado Springs Utilities filed on October 16, 2003, is approved without modification. A copy of the Stipulation and Settlement Agreement is attached hereto as Appendix A and is incorporated herein for all pertinent purposes.

5. This Recommended Decision shall be effective on the day it becomes the Decision of the Commission, if that is the case, and is entered as of the date above.

6. As provided by § 40-6-109, C.R.S., copies of this Recommended Decision shall be served upon the parties, who may file exceptions to it.

a) If no exceptions are filed within 20 days after service or within any extended period of time authorized, or unless the decision is stayed by the Commission upon its own motion, the recommended decision shall become the decision of the Commission and subject to the provisions of § 40-6-114, C.R.S.

b) If a party seeks to amend, modify, annul, or reverse basic findings of fact in its exceptions, that party must request and pay for a transcript to be filed, or the parties may stipulate to portions of the transcript according to the procedure stated in § 40-6-113, C.R.S. If no transcript or stipulation is filed, the Commission is bound by the facts set out by the administrative law judge and the parties cannot challenge these facts. This will limit what the Commission can review if exceptions are filed.

7. If exceptions to this Decision are filed, they shall not exceed 30 pages in length, unless the Commission for good cause shown permits this limit to be exceeded.

(S E A L)



ATTEST: A TRUE COPY

Bruce N. Smith  
Director

THE PUBLIC UTILITIES COMMISSION  
OF THE STATE OF COLORADO

DALE E. ISLEY

Administrative Law Judge

BEFORE THE PUBLIC UTILITIES COMMISSION  
OF THE STATE OF COLORADO

RECEIVED  
STATE OF COLORADO  
PUBLIC UTILITIES  
2003 OCT 16 PM 4:28

IN THE MATTER OF THE APPLICATION OF )  
PUBLIC SERVICE COMPANY OF )  
COLORADO FOR A CERTIFICATE OF )  
PUBLIC CONVENIENCE AND NECESSITY )  
FOR THE MIDWAY - DANIELS PARK )  
TRANSMISSION REBUILD PROJECT )

DOCKET NO. 03A-276E

OCT 17 2003  
STIPULATION AND SETTLEMENT AGREEMENT  
BETWEEN PUBLIC SERVICE COMPANY OF COLORADO  
AND COLORADO SPRINGS UTILITIES

Public Service Company of Colorado ("Public Service") and Colorado Springs

Utilities hereby stipulate and agree as follows:

Public Service has applied to the Colorado Public Utilities Commission for a Certificate of Public Convenience and Necessity ("CPCN") granting to it the right to construct the Midway – Daniels Park Transmission Rebuild Project ("the Project"). The Project will enhance the transfer capability of that portion of the Public Service transmission system referred to in Public Service's Application as the Front Range Path. Once completed, the Project will allow Public Service to access all the Southern Colorado generation resources approved by the Commission during Public Service Company's 1999 Integrated Resource Plan. Colorado Springs Utilities supports this proposed increase in transmission transfer capability between Southeastern Colorado and the Denver area.

Colorado Springs Utilities intervened in this proceeding due to its concern about the potential for the overloading of certain of its transmission circuits during the construction phase of the Project. Specifically, the Project will require that the existing 230kV circuit be taken out of service and, during this period of outage, the studies

conducted by Public Service demonstrate that the power flows from generation located south of Colorado Springs can cause flows of power in excess of the system ratings for certain Colorado Springs Utilities' transmission circuits.

The most vulnerable Colorado Springs Utilities' facility during the outage of the Public Service 230 kV transmission line is a 115kV circuit commonly referred to as "the Kettle Creek Line". This transmission circuit runs between the Kettle Creek Line and the Monument substations. Under contingency, this line can experience overloading.

In order to address this contingency, Public Service and Colorado Springs Utilities have agreed to the following process:

a) Public Service has purchased, and Colorado Springs Utilities will install, CAT-1 monitoring equipment in order to establish real-time line ratings for the Kettle Creek Line. This equipment was purchased by Public Service Company on August 1, 2003 and is expected to be installed by Colorado Springs Utilities by October 31, 2003, so that historical data can be obtained prior to the planned outage of the Midway – Daniels Park Line.

b) Based on the historical data, operational studies will be performed by Public Service and Colorado Springs Utilities to examine the anticipated loadings on the Kettle Creek Line during Public Service's planned construction outage of the 230 kV Midway – Daniels Park transmission line.

c) Public Service and Colorado Springs Utilities will share the results from these operational studies, and based upon the results, Public Service will develop an Operational Procedure to be placed into effect prior to the construction outage. The purpose of the Operational Procedure will be to design a procedure that should prevent

the overloading of any portion of the Colorado Springs Utilities' transmission system, including the Kettle Creek Line. It is anticipated that the Operational Procedure will include procedures for the dispatching of Public Service generation resources as a means to avoid overloading the Colorado Springs Utilities' transmission system.

d) Once the Operational Procedure has been developed, personnel from both utilities will meet to discuss the nature of the procedure, any underlying assumptions, and the expected results. Public Service and Colorado Springs Utilities will each undertake good faith efforts to resolve any differences, and Public Service may modify the Operational Procedure to address any concerns raised by Colorado Springs Utilities.

e) Public Service will distribute the Operational Procedure to its operational personnel who are necessary to effectuate the procedures, including the personnel responsible for generation dispatch.

f) Public Service and Colorado Springs Utilities will continue to meet from time to time, both before and during the construction outage, in order to discuss any issues relevant to the Operational Procedure.

g) Public Service will employ construction practices so as to minimize any outage times and, to the extent possible, will place the Midway –Daniels Park Line back in service temporarily if operational problems occur on the Colorado Springs Utilities' system due to the construction outage. Such operational problems could include overloading of transmission lines, out-of-limit voltages, or other operating conditions inconsistent with the WECC criteria for an N-1 outage.

h) Public Service will use its best efforts to avoid creating operational problems on the Colorado Springs Utilities' transmission system. Notwithstanding these best efforts and the best efforts of Colorado Springs Utilities, contingencies may occur that adversely affects the transmission systems of either utility. Nothing in this Stipulation and Settlement Agreement shall be construed to create a guarantee by either utility of uninterrupted transmission availability on the system of the other utility.

In correspondence to Public Service dated March 19, 2003, Colorado Springs Utilities expressed support for the proposed transmission upgrade but voiced concern about the number of critical transmission facilities that would be located in a single corridor. Irrespective of the routing decisions made by Public Service, Colorado Springs Utilities believes that the benefits the Project provides to the overall reliability of the transmission system exceed the extremely low probability for multiple corridor events. As to the relief requested in this Docket, Colorado Springs Utilities is concerned only about potential overloading of its own transmission facilities and resulting impacts to the system during the construction of the Project. The commitments made by Public Service in this Stipulation and Settlement Agreement adequately address the concerns previously expressed by Colorado Springs Utilities.

Colorado Springs Utilities supports the relief requested by Public Service and agrees with Public Service that this Project is needed to support regional reliability. When completed the Project will enhance reliability and will increase transfer capabilities in support of continued growth along the Front Range. For these reasons Colorado Springs Utilities supported the Approval of Location filing by Public Service



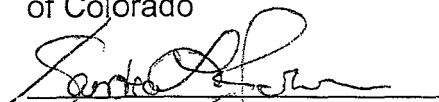
before the El Paso County Planning Department (see attached correspondence) and now urges the Public Utilities Commission to grant Public Service's requested CPCN.

Colorado Springs Utilities takes no position on any of the specific issues raised by other intervenors in this Docket; however, Colorado Springs Utilities would be concerned if operation of the Midway -- Daniels Park Line were to be constrained in any way that could affect the Colorado Springs Utilities' transmission system.

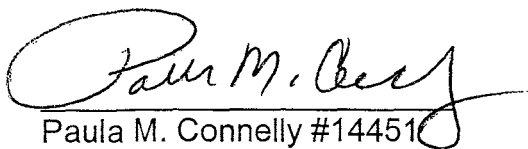
Colorado Springs Utilities and Public Service Company of Colorado respectfully request that the Commission acknowledge the commitments made by Public Service in this Stipulation and Settlement Agreement in the Commission's Decision.

Dated this 16<sup>th</sup> day of October, 2003.

On Behalf of Public Service Company  
of Colorado

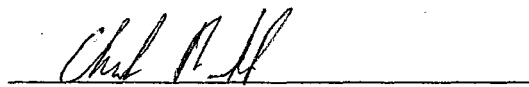


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and Assessment  
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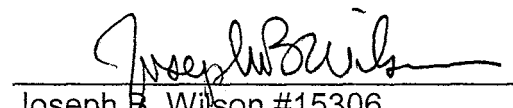


Paula M. Connelly #144516  
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Denver, CO 80202

On Behalf of Colorado Springs Utilities



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Phone: (719) 668-8032  
Fax: (719) 668-8048  
E-mail: JBWilson@csu.org



Colorado Springs Utilities

*It's how we're all connected*

July 23, 2003

Ms. Shelia Booth, Planner II  
El Paso County Planning Department  
27 E. Vermijo  
Colorado Springs, CO 80903

Re: Midway – Daniels Park Transmission Rebuild Project

Thank you for the opportunity to comment on this proposed project. I have read the letter of intent from Xcel, and from a technical perspective agree with the need for the project. In this region of the electrical grid, power generally flows from south to north. Upgrading one of Xcel's existing 230kV lines to double circuit 230kV, and ultimately to double circuit 345kV, is an important enhancement of the electric system's capability. Once completed the proposed project will provide greater reliability and will support continued growth along the Front Range, including El Paso County.

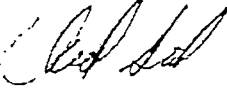
While the electric transmission system will be stronger as a result of this project, during the time the existing single circuit line is removed for construction, the system will be more susceptible to overloads and possibly outages. For this and other reasons, Colorado Springs Utilities initially favored the establishment of a new and separate corridor for this project. The establishment of a new corridor is not the alternative proposed by Xcel, and Colorado Springs Utilities is actively working with Xcel to minimize the likelihood of overloads or outages. We appreciate the cooperation of Xcel in this context.

In summary, Colorado Springs Utilities offers its support for Xcel's petition for the Approval of Location for this project.

In closing I would like to raise a related issue of location concerning this project. The proposed location for this project passes through a portion of the future Jimmy Camp Creek Reservoir planned by Colorado Springs Utilities. Acquisition of the properties for this future reservoir are ongoing. Colorado Springs Utilities and Xcel have been in communications over the need to relocate the existing transmission line facilities prior to the construction of this project or inundation of the reservoir. Colorado Springs Utilities may be filing a petition for approval of location in the near future that may involve these facilities as well as others owned by the Tri-State Generation & Transmission Association.

If you have any questions, please feel free to contact me at 668-8025.

Sincerely,



Chuck Sisk  
Managing Engineer  
Colorado Springs Utilities

cc:

Joseph Wilson  
Rita Soller  
Wayne Booker  
Steve Schaarschmidt  
Bob Robler  
Sandra Johnson, Xcel

**CERTIFICATE OF SERVICE**

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PUBLIC UTIL

Appendix A  
Docket Nos. 03A-276E  
Decision No. R03-1308  
November 21, 2003  
Page 8 of 9

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I hereby certify that on this, the 16th day of October, the original and five (5) copies of the foregoing **MOTION TO ACCEPT STIPULATION AND SETTLEMENT AGREEMENT BETWEEN PUBLIC SERVICE COMPANY OF COLORADO AND COLORADO SPRINGS UTILITIES AND STIPULATION AND SETTLEMENT AGREEMENT BETWEEN PUBLIC SERVICE COMPANY OF COLORADO AND COLORADO SPRINGS UTILITIES** were served via hand delivery on:

Bruce Smith, Director  
Colorado Public Utilities Commission  
1580 Logan, OL2  
Denver, CO 80203

all addressees indicated on service list were served electronically and copies were placed in the U. S. Mail, postage pre-paid, addressed as follows:

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Denver, CO 80203

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Thomas Kellogg and Carol Padilla  
8168 Oak Briar Way  
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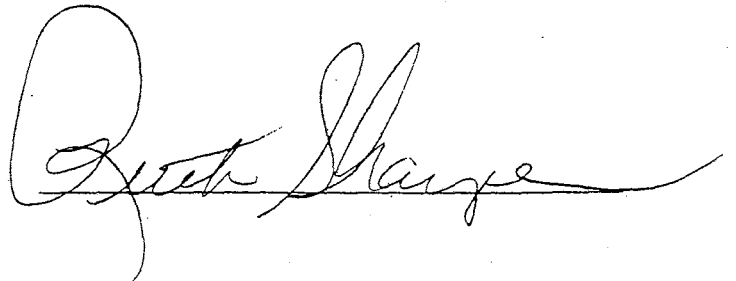
Wendie Allstot  
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Michael Zimmerman  
Public Utilities Commission  
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Denver, CO 80203

A handwritten signature in black ink, appearing to read "Frank Shafer". The signature is written in a cursive style with a large, looping initial "F".