NEW JERSEY BOARD OF PUBLIC UTILITIES

Adopted Amendments to the Electric Service Rules – Vegetation Management Standards for Transmission Line Maintenance

N.J.A.C. 14:5-9.2 and 9.6 Docket No. EX0804235

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PUBLIC UTILITIES BOARD OF PUBLIC UTILITIES Electric Service

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Proposed: May 18, 2009, at 41 N.J.R. 2084(a)

Adopted: December 17, 2009, by the New Jersey Board of

Public Utilities, Jeanne M. Fox, President; Frederick F. Butler, Joseph L. Fiordaliso, Nicholas Asselta, and Elizabeth Randall, Commissioners.

Filed: December 23, 2009, as R. 2009 d. , with

changes not requiring additional public notice

and comment (see N.J.A.C. 1:30-6.3).

Authority: N.J.S.A. 48:2-12 and 13.

BPU Docket Number: EX0804235.

Effective date: January 19, 2010

Expiration date: February 14, 2013

The New Jersey Board of Public Utilities is herein adopting amendments to its rules for vegetation management for electric utility lines at N.J.A.C. 14:5-9. The vegetation management rules were readopted on February 14, 2008 as part of the readoption of the Board's electric service rules. Based on public comments received at that time on the vegetation management provisions, the Board directed staff to conduct a stakeholder process and consider amending the vegetation management subchapter, and in particular the provisions for transmission line vegetation maintenance. This adoption is the outcome of that stakeholder process.

The proposed amendments were published in the New Jersey Register on May 18, 2009 at 41 N.J.R. 2084(a). Comments were accepted through July 17, 2009. Comments were received from 108 commenters. Many of the commenters were apparently under the impression that these amendments permit or require more tree cutting than the previously existing rules. This is not the case. As explained in the proposal summary, these amendments remove the previous 15-foot tree height limit in the border zone (the portion of the right of way on either side of the wires, not directly under the wires). The amended rules now allow the EDC to leave trees over 15 feet standing in the border zone if the trees are consistent with accepted utility industry practices for integrated vegetation management around electric lines.

Summary of Hearing Officer's Recommendation and Agency's Response:
A public hearing on the proposed amendments was held on July 21, 2009, in the Board hearing room at the New Jersey Board of Public Utilities, 2 Gateway Center, Newark, New Jersey. Commissioner Joseph Fiordaliso presided at the hearing. thirteen people testified at the public hearing and the Board also received 95 written comments, summarized below. The hearing officer recommended that the Board proceed with the amendments with the changes indicated below. The record of the public hearing may be reviewed by contacting Kristi Izzo, Board Secretary, New Jersey Board of Public Utilities, 2 Gateway Center, Newark, New Jersey 07102.

Summary of Public Comments and Agency Responses:

The following persons submitted timely comments on the proposal:

- 1. Donna Ambriano, Towaco, New Jersey (DA);
- 2. Cheryl Atkinson, Voorhees, New Jersey (CA);
- 3. Catherine Baron, Voorhees, New Jersey (CB);
- 4. Shannon, Todd, and Cassie Bearman, Voorhees, New Jersey (STCB);
- 5. Carole L. Bell, Voorhees, New Jersey (CLB);
- 6. J. Wade Bell, Voorhees, New Jersey (JWB);

- 7. Albert and Debra Belli, Voorhees, New Jersey (ADB);
- 8. George Bennett, Cinnaminson, New Jersey (GB);
- 9. Rich and Linda Berenson, Voorhees, New Jersey (RLB);
- 10. Alan Blankman, Upper Saddle River, New Jersey (AB);
- 11. Thomas T. Booth, Jr., Voorhees, New Jersey (TTB);
- 12. Diana Brucoli, Cinnaminson, New Jersey (DB);
- 13. Eugene Casole, Voorhees, New Jersey (EC);
- 14. Edwin and Lynn Castillo, Voorhees, New Jersey (ELC);
- Ronald K. Chen, New Jersey Department of the Public Advocate, Division of Rate Counsel (NJRC);
- 16. Jay Chess, Voorhees, New Jersey (JC;)
- 17. Susan and Inho Choi, Voorhees, New Jersey (SIC);
- 18. Lori Clark, Voorhees, New Jersey (LC);
- 19. Gregory P. Clark, Voorhees, New Jersey (GPC);
- 20. Concerned residents of Sturbridge Lakes (no name provided), Voorhees, New Jersey (CRSL);
- 21. Mary Beth Consalvi, Voorhees, New Jersey (MBC);
- 22. Russell M. Coombs and Rosalie B. Coombs, Cinnaminson, New Jersey (RMC/RBC);
- 23. Rick and Pat Coomer, Voorhees, New Jersey (RPC);
- 24. Dominic Cotugno, Voorhees, New Jersey (DC);
- 25. Susan Craft, New Jersey State Agriculture Development Committee (SADC);
- 26. H. Czarnecki (HC);
- 27. Patricia Donahue, Metuchen, New Jersey (PD);
- 28. Edward W. Ferruggia, Voorhees, New Jersey (EF);
- 29. Bob Flynn, Voorhees, New Jersey (BF)
- 30. Mary Frett, Voorhees, New Jersey (MF);
- 31. Kathleen Gabriel, Voorhees, New Jersey (KG);
- 32. Gail Giuliano, Upper Saddle River, New Jersey (GG);
- 33. Bobbi Goerlich, Cinnaminson, New Jersey (BG);
- 34. Adam S. Goldstein, Voorhees, New Jersey (ASG);
- 35. Ronald Grainger, Voorhees, New Jersey (RG);
- 36. Perry Gryskiewicz, Voorhees, New Jersey (PG);
- 37. Leonard W. Hamilton, for the Long Hill Township Environmental Commission, Long Hill, New Jersey (LHTEC);
- 38. James and Catherine Healey, Voorhees, New Jersey (JCH);
- 39. John Helbig, Voorhees, New Jersey (JH);
- 40. Michael Hill, Voorhees, New Jersey (MH);
- 41. Cary Huggard, Voorhees, New Jersey (CH);
- 42. Janene, Michael, Mackenzie, Christian, Cameron, and Michael, Voorhees, New Jersey (JMMCCM);
- 43. Liz and Kurt Jansen, Voorhees, New Jersey (LKJ);
- 44. Bryan Jones, Voorhees, New Jersey (BJ);
- 45. Eileeen C. Jung, Voorhees, New Jersey (ECJ);
- 46. Deborah Kahn, Voorhees, New Jersey (DK)
- 47. Marcia A. Karrow, New Jersey State Assembly (MAK);

- 48. Kathryn and David Kelbaugh, Voorhees, New Jersey (KDK);
- 49. Walt Kowalewski (WK);
- 50. Paula Levine, Voorhees, New Jersey (PL);
- 51. Loretta P. Lipp, Voorhees, New Jersey (LPL);
- 52. Rich Lipp, Voorhees, New Jersey (RL);
- 53. Iris Llewellyn, Voorhees, New Jersey (IL);
- 54. Howard Long, for Mayor Michael Mignona, Voorhees, New Jersey (HL/MM);
- 55. Jane A. Longo, Montvale, New Jersey (JAL);
- 56. Gary Lustig, Voorhees, New Jersey (GL);
- 57. Mackenzie (MZ);
- 58. Maria Maneen, Voorhees, New Jersey (MM);
- 59. Peter and Gina Marone, Voorhees, New Jersey (PGM);
- 60. Peter Marsh, Voorhees, New Jersey (PM2);
- 61. Don McBride, for the New Jersey Chapter of the Sierra Club (NJSC);
- 62. Pat McManus (PM);
- 63. Patricia E. Merkh, Voorhees, New Jersey (PEM);
- 64. Tony and Nancy Merritt, Elmer, New Jersey (TNM);
- Joseph F. Meyer, Cinnaminson, New Jersey (JFM);
- 66. Cheryl Mitchell, Voorhees, New Jersey (CM);
- 67. Craig and Fern Mitnick, Voorhees, New Jersey (CFM);
- 68. Joseph R. Moles, Voorhees, New Jersey (JRM);
- 69. Steven M. Napoliello, for the Power Line Neighbors Coalition, Cinnaminson, New Jersey (PLNC);
- 70. Carrie Nelson, Voorhees, New Jersey (CN);
- 71. Karen R. Parker, Voorhees, New Jersey (KRP);
- 72. Vincent and Jayne Passarella, Voorhees, New Jersey (VJP);
- 73. Helene and William Peters, Cinnaminson, New Jersey (HWP);
- 74. Michael Petrone, Voorhees, New Jersey (MP);
- 75. Eric Phares, Cinnaminson, New Jersey (EP);
- 76. Harry Platt, Voorhees, New Jersey (HP):
- 77. Bob and Christie Prushinski, Voorhees, New Jersey (BCP);
- 78. Monique Purcell, New Jersey Department of Agriculture, Division of Agricultural and Natural Resources (NJDA);
- 79. J. Putro (JP);
- 80. John Ragone, Voorhees, New Jersey (JR2);
- David K. Richter, Public Service Electric and Gas Company; Marc B. Lasky, Jersey Central Power & Light Company; Philip J. Passanante, Atlantic City Electric Company; and John L. Carley, Rockland Electric Company (EDCs);
- 82. David K. Richter, Public Service Electric and Gas Company (PSE&G);
- 83. Scott Riley (SR);
- 84. Nancy Ronquist (NR);
- 85. Barbara Sachau, Whitehouse Station, New Jersey (BS);
- 86. Sharon Buckley Sams, Voorhees, New Jersey (SBS);
- 87. Jan Segal, Voorhees, New Jersey (JS);
- 88. Rashi Shyam, Voorhees, New Jersey (RS);
- 89. Barbara Silary, Voorhees, New Jersey (BS2);

- 90. The Skowronek Residence, Voorhees, New Jersey (TSR);
- 91. Joseph and Belinda Spina, Voorhees, New Jersey (JBS);
- 92. Karl Stauss, Voorhees, New Jersey (KS);
- 93. Andrew Stern, Voorhees, New Jersey (AS);
- 94. The Stull Family, Voorhees, New Jersey (SF);
- 95. Sturbridge Lakes Homeowners Association (SLHA);
- 96. Marianne Swaney-Stueve, Voorhees, New Jersey (MSS);
- 97. Jessica Taber, Cinnaminson, New Jersey (JT);
- 98. Marite Talbergs and Andy Eimanis, Voorhees, New Jersey (MTAE);
- 99. Mark Tolnick, Voorhees, New Jersey (MT);
- 100. Richard K. Tavani, Voorhees, New Jersey (RKT2);
- 101. Rosemarie and Kevin Tierney, Voorhees, New Jersey (RKT);
- 102. The Townsend Family, Voorhees, New Jersey (TF);
- 103. James M. Underwood, Cinnaminson, New Jersey (JMU);
- 104. Victor J. Valponi, Voorhees, New Jersey (VJV);
- 105. Joe and Trish Vastano, Voorhees, New Jersey (JTV);
- 106. Colleen A. Wade, Voorhees, New Jersey (CW);
- 107. Robert G. Wurster, Voorhees, New Jersey (RGW); and
- 108. Ray Zaso, Voorhees, New Jersey (RZ).

General comments:

1. COMMENT: We object, not only to the proposed amendments, but also the underlying regulations as they presently exist. Under the current regulations, any trees over 15 feet require removal and cutting within the right-of-way. The proposed regulations would require removal of anything that can grow over 3 feet in the wire zone which essentially comprises most of this right-of-way. And in the border zone, the remaining balance of the right-of-way, the program would involve the use of an integrative vegetative maintenance program or IVM. It's my understanding that the IVM system will result in essentially clear-cutting any trees inconsistent with the power lines location. (HL/MM, DK, RZ, HP, DA)

Under the previous rules, no trees that grow to a mature height of RESPONSE: more than 15 feet could remain in the border zone (the area on either side of the lines). Under the adopted amendments, the EDC can now allow a tree that grows higher than 15 feet to remain in the border zone if the tree meets integrated vegetation management (IVM) standards for compatibility with the power lines. See N.J.A.C. 14:5-9.6(d). Compatibility in this case is determined according to utility industry best practices, embodied in integrated vegetation management standards. The commenter has apparently misunderstood the provisions that apply to the wire zone (the area directly under the wires). The three foot limit in the wire zone was not amended, and applies only to woody plants, including trees and some shrubs. Previously, in addition to the three foot limitation on woody plants, the rules placed a 15 foot limit for any vegetation in the right of way (ROW) (which would apply to nonwoody plants in the wire zone). This limit was removed through the amendments adopted herein. Under N.J.A.C. 14:5-9.6(c) as adopted, the EDC may allow nonwoody plants that are taller than three feet, such as shrubs and tall grasses, to grow in the wire zone.)

Further, the rules do not mandate clear cutting. In fact, the rules were originally created to reduce sudden, radical clear cutting. Prior to these rules, many EDCs did not manage vegetation regularly, but allowed vegetation around the lines to become seriously overgrown. Each time EDCs finally cut back the vegetation, property owners were shocked and upset by the sudden change. To address this problem, the Board first adopted these rules in 2006 to require EDCs to regularly inspect and maintain vegetation at least once every four years (the EDCs are still in their initial four year cycle – requiring more significant management practices – which may explain some concerns expressed in these comments). These rules prevent the old practice of allowing tall trees to grow until they threaten the lines and then cutting them all down, only to repeat the cycle again and again. Instead, this rule requires the EDC to establish and maintain an appropriate, stable vegetation pattern, which not only protects the power lines from damage, but also presents a more appealing, natural appearance for property owners, and provides continuous habitat for wildlife.

2. COMMENT: We understand the difficult position the Board is in attempting to protect the reliability of the electric grid, as well as balancing the needs of residents. We and other utilities have asked in the past for more discretion in the border zone and we believe that these amendments give us that discretion. Previously, there was a 15-foot requirement in the border zone. Integrative vegetation management will, depending on the topography and the height of the lines, allow additional trees to remain in the border zone. So we support these amendments. We believe they do a good job of balancing the needs of the electric grid with the residents, as well as giving the utilities a little more discretion in the border zone to leave as many trees as they can depending on the topography and the height of the towers. (PSE&G)

RESPONSE: The Board appreciates the commenter's support for the amendments adopted herein.

3. COMMENT: Since this issue with the electric company has come up we have learned that our trees would not be allowed to grow beneath the ROW. We would have to move them. This would reduce the visibility of our children when they play. That is a very important safety issue. Please allow us the 12-15 foot height and trust us with the stewardships of our own properties. We don't want to risk losing our power. We don't want to do anything that would damage the lines. But the 3 foot height restriction is extreme and unfair. (JT)

RESPONSE: The Board has crafted the rules to minimize impacts on property owners while continuing to protect the transmission lines. The three foot height restriction on woody plants, referenced by the commenter, was in the previous rules and the amendments adopted herein did not affect this portion of the rule. This requirement applies only within the wire zone (the area directly under the wires), and only to woody plants (see N.J.A.C. 14:5-9.6(c)2). Non-woody plants (such as shrubs and grasses) generally grow slowly and remain relatively low to the ground, and could be driven over by large vehicles if emergency access to the wires is needed. This will allow for compatible and appropriate plant growth in the wire zone

with the goal of creating a meadow effect. In the border zone (the area on either side of the wires), the amendments adopted herein remove the prohibition on trees that mature above 15 feet, and replace it with a more flexible integrated vegetation management (IVM) standard. IVM embodies best practice utility industry standards, which allow the EDC to leave trees in the border zone if the EDC determines that the trees are compatible with the transmission lines. The rules do not require that homeowners relocate trees to locations that block the visibility of children at play.

- **COMMENT:** Along the edges of the easement, nothing over 15 feet is permitted. If applied to our development, the BPU rules could cause rows of oaks, pines and other trees to be removed from along the ball fields. Many residents would see their backyards clear cut just about up to their houses. (SLHA, RL, ASG, RLB, MBC, MTAE, GL, JRM, JR, SLA, RL, KG, CN, JS, KS, SBS, JR2, RG, PM2, KRP, RL, CFM, RPC, JBS, ELC, ADB, PGM, CM, JBS, SBS, BS, BCP, STCB, CLB, JWB, RKT, LC, EF, LPL, CB, TSR, MF, JP, JWB, IL, TF, PL, JMMCCM, RKT2, BJ, KRP, CH, MM, ECJ, SF, PG, VJV, SBS, GB, EF) The commenter has apparently misunderstood the amendments RESPONSE: adopted herein. The previous rules stated that "any woody species that matures above 15 feet are not allowed to grow in the border zone." See N.J.A.C. 14:5-9.6(e)4. These amendments have relaxed the 15 foot requirement in the border zone, and replaced it with a requirement that the EDC apply integrated vegetation management (IVM). See N.J.A.C. 14:5-9.6(d). IVM embodies electric utility industry best practices and allows the EDC to leave additional trees in the border zone depending on their location, the height of the lines and the topography of the area.
- 5. COMMENT: Please pass regulations that protect both the power lines and homeowners trees. (WK, LKJ, GB) RESPONSE: The Board has made every effort to strike the best possible balance between the interests of homeowners and the need for reliable electric service for the millions of electric customers served by the transmission lines that run through New Jersey. These amendments were developed in response to public comments on the readoption of the rules in 2008, and will result in the third version of these rules since they were originally adopted in 2006. These amendments are the result of a lengthy stakeholder process which included a public hearing before and after drafting of the proposed amendments. The Board believes that the rules as
- 6. COMMENT: This plan is not needed to protect the power lines. Currently, no tree is allowed which could hit the lines or come close enough to be affected by the electrical field. The BPU rules are strictly to save the electric company money, so they will not have to trim trees every several years. I understand it is costly to maintain the trees along the power lines but it is part of their job. (SLHA, RL, ASG, RLB, MBC, MTAE, GL, JRM, JR, (SLA, RL, KG, CN, JS, KS, SBS, JR2, RG, PM2, KRP, RL, CFM, RPC, JBS, ELC, ADB, PGM, CM, JBS, SBS, BS, BCP, STCB, CLB, JWB, RKT, LC, EF, LPL, CB, TSR, MF, JP, JWB, IL, TF, PL, JMMCCM, RKT2, BJ,

adopted achieve the goal of balancing appropriate interests.

KRP, CH, MM, ECJ, SF, PG, VJV, SBS, GB, EF, KDK, RS, EF, BCP, LHTEC, JFM, GG, PEM, RGW, CA, JTV)

RESPONSE: The amendments adopted herein require the EDCs to consider integrated vegetation management in the border zone, rather than a strict height requirement as is required under the rules prior to these amendments. Although this practice will require more time and consideration by the EDCs, the Board is amending these rules in response to concerns expressed during the readoption process in 2008. In fact, the amendments adopted herein will not decrease, and actually may increase, EDCs' vegetation management costs as compared to the rules prior to the amendments. In crafting these rules, the Board had to choose the best possible balance between the esthetic interests of property owners and the need for reliable electric service. As to whether any trees could affect power lines, the Board has determined that EDCs must make such a determination using Integrated Vegetation Management. Also please see the response to comment 7.

- 7. **COMMENT:** The cutting measures that are taking place right now where I live, they top the trees within the easement that would make it impossible for a tree if it was felled by lightning or fell to hit the power lines. If you consider the characteristics of the tree species, how fast it grows, soil conditions, etc., it is possible to anticipate how much to trim before the next cycle of maintenance will be due. That is what the electric company has been doing for us all of these years. That is a practical approach. (GG, MH, RKT2, VJV, PD)
 - RESPONSE: Under the previous rules, trimming and topping of trees was not generally permitted. These amendments do not change this practice. The issue of trimming and topping rather than removing trees that mature above the rules' height limits was discussed at length at several stakeholder meetings. In addition, Board staff consulted with various experts regarding this issue. There are two major problems with this approach to wire zone vegetation management. First, as the commenter states, the amount of trimming required for each tree will vary depending on the species, the soil conditions, and other site-specific factors. A substantial amount of time and effort would be required for the EDC to evaluate these factors for each tree and determine an appropriate trimming amount and schedule for each individual tree or property. The time and effort involved would raise EDC vegetation management costs substantially, and these costs would have to be passed on to ratepayers. Furthermore, during the Board's extensive stakeholder meetings on these rules, tree experts stated that topping a tree is considered bad practice in the forestry industry because it damages and often kills the tree. Therefore, the Board has determined that the topping and trimming trees will have significant disadvantages, and that a more effective and environmentally sound approach is instead to plant vegetation that naturally grows at shorter heights. This allows for a stable, attractive plant community.
- **8. COMMENT:** I'd like to reiterate my support of the BPU's important goal of ensuring the safe and reliable delivery of electric service to New Jersey's residents. New Jersey's electric distribution companies (EDCs), by and large, do an extremely good job meeting the electric needs of its customers. I would also like to commend all the

stakeholders in this process. While we may not all agree on the final product, I truly believe that everyone sincerely approached this process with the intent to develop regulations that would allow for an electric system that is both reliable and environmentally sensitive. (MAK)

RESPONSE: The Board appreciates this comment in support of its efforts.

- 9. COMMENT: I am encouraged by many of the improvements to the regulations including the elimination of the requirements in N.J.A.C. 14:5.9.6(e)2-6. By removing this language, the BPU increases the ability of the EDCs to make individual line assessments and implement vegetation management strategies that will better complement New Jersey's commitment to natural resources protection. (MAK) RESPONSE: The Board appreciates this comment in support of its efforts.
- 10. COMMENT: I was pleased that the BPU has chosen the North American Electrical Reliability Corporation (NERC) standards rather than the National Electric Safety Code (NESC). The BPU's recognition and protection of farming and agriculture crops in both the wire zone and the right of way is also greatly appreciated. Finally, I am pleased to see the prohibition of invasive species and the commitment by the BPU to apply integrated vegetation management in the border zone. (MAK) RESPONSE: The Board appreciates this comment in support of its efforts.
- 11. COMMENT: The regulations should require EDCs to consult with any municipality recognized by the State to have natural resources deemed environmentally sensitive and/or valuable (i.e. the Highlands, Pinelands) and/or located in the Planning Areas 4 and 5. The vegetation management planning in these areas should be a collaborative process between the EDCs and the local officials to create a mutually agreeable plan that will ensure safe and reliable service as well as protect the municipality's natural resources. (MAK)

RESPONSE: The Board agrees that local officials and EDCs should work together on vegetation management planning. Therefore, the rules require notice to municipalities prior to vegetation management activities, so that local officials can contact the EDC and discuss the vegetation management plan for the municipality. However, the Board does not believe that adding a requirement to the rules that EDCs consult with municipalities will further the goal of productive collaboration with local officials.

12. COMMENT: The rules should clarify that it is the responsibility of the EDCs to ensure that all vegetation debris be removed immediately following any cutting or maintenance work. Trees that are cut down should have their stumps ground within a maximum of 30 days. (MAK)

RESPONSE: The rules at N.J.A.C. 14:5-9.5(g) require the EDC to remove all trimmings and cut vegetation resulting from its regular vegetation management activities. However, the Board does not believe that the rules should require grinding of stumps. The EDC should cut the tree trunks as close to the ground as possible, but some property owners may prefer not to have the EDC grind the stumps. Stump grinding also would require an additional piece of heavy equipment which would in-

crease the EDC's, and ultimately the ratepayers', costs. Finally, stump grinding digs into the ground and therefore results in all the hazards of excavation, including a requirement to call and wait three days for a markout under the Board's Underground Facility Protection Act (One-Call) Rules. For these reasons, the Board has not made the commenter's suggested change.

13. COMMENT: The regulations should include a process for homeowners to appeal an EDC's vegetation management plan for his/her property. While this may be difficult to implement, I believe it is very important. An objective opinion should be available to homeowners who disagree with an EDC's opinion about the danger posed by certain vegetation. (MAK)

The Board believes that homeowners should be able to contact the **RESPONSE:** EDC to discuss the vegetation management plan for the homeowner's property. The rule requirement for advance notice to homeowners is intended to facilitate such discussions. However, the Board does not believe that creating a formal appeal process for homeowners to negotiate the specifics of vegetation cutting on their property would be productive or cost effective. The type of objective opinion described by the commenter would require a trained and experienced tree expert, presumably a Board employee paid with ratepayer funds. Thus, the suggested appeal process would essentially provide free technical expertise for a small group of customers (those with power line easements on their properties), subsidized by the rest of the utility customers in New Jersey. This would also be inequitable because this small group of homeowners knowingly consented to the easements and presumable paid less for their properties in return. A homeowner who desires the type of objective opinion described by the commenter is free to hire a tree expert to present information to the EDC on the homeowner's behalf.

Environmental:

14. COMMENT: There are environmental, wetlands, and other concerns that affect our entire community. Because safety is an important consideration, it does not mean it is the only consideration. Perhaps there should be an exemption for land-scaping planted before the rules were adopted. (MT)

RESPONSE: The Board's mission has been to ensure the provision of safe, adequate and proper utility and regulated service at reasonable rates, while enhancing the quality of life for the citizens of New Jersey and performing these public duties with integrity, responsiveness and efficiency. Throughout this review process of N.J.A.C. 14:5-9 the board has continually struggled to find a compromise to satisfy the stakeholders involved. While the Board has included an exemption where "the right-of-way document, easement, indenture, deed or other written land rights" expressly permit certain vegetation and was executed prior to January 1, 2007 (See N.J.A.C. 14:5-9.6(f)(1)), the Board has determined that exempting all previously existing vegetation is neither practical nor appropriate.

15. COMMENT: Vegetation management should include active replanting of native species in managed zones to help prevent the natural tendency of invasive species to move into disturbed areas. (LHTEC)

RESPONSE: The Board's legal mandate is to provide safe, adequate and proper utility service at reasonable rates. In fulfilling this mandate, the Board makes every effort to minimize unintended consequences such as soil erosion and proliferation of invasive species. However, a property owner must determine how they wish to manage their properties within the confines of these rules. Therefore, the commenter's suggested change has not been made.

16. COMMENT: Proposed N.J.A.C. 14:5-9.6(e) provides that the EDC shall not plant an invasive species in the ROW. The regulations retain the requirement that the EDC make reasonable efforts to eliminate such plant species from the ROW. The effect of such vegetation on reliability should be the primary concern, and while removal of such vegetation from the entire right of way should be guided by reliability considerations, removal cost as well as the advice of NJDEP staff and the comments of local officials should also be considered. We support the proposed prohibition on an EDC planting an invasive and non-indigenous plant species in the ROW. (NJRC)

RESPONSE: The Board appreciates the commenter's support for the provision.

- 17. COMMENT: The numerous species of animals would have their habitat disrupted. It's not uncommon to see a pack of deer roam through our backyard, often stopping to nibble from the various trees and brush. Also, the new maintenance policy will destroy the New Albany Elementary School Nature Trail and wild animal preserve and shelter. Now, that vegetation has regrown to some extent, from the initial devastation of 2000, wild life has returned to the site. Thus, clear-cutting would have a disastrous impact on the wildlife in our community, wildlife that we come into contact with everyday. (PLNC, GPC, MH, GPC)
 - **RESPONSE:** A meadow environment, such as that required in the wire zone under the rules, provides important ecological values and habitat. While these are somewhat different from the ecological benefits of forested areas, the Board will not make a valuation between these two ecosystems. Therefore, transforming a portion of a right of way from an area covered by mature trees to a meadow environment is not inherently environmentally damaging. It merely produces a different set of environmental benefits. "slow growing and low growing shrubs and plants" will be allowed to flourish. A natural buffer can be established and grown. The Board further reiterates that these amendments permit the EDCs more, not less, flexibility to allow compatible species to grow in the border zone.
- **18. COMMENT:** Some of those trees fall within wetlands buffer zones. (EF, BCP) **RESPONSE:** The vegetation management required under these rules is consistent with the Department of Environmental Protection's Freshwater Wetlands Rules at N.J.A.C. 7:7A, which contain special provisions to allow for appropriate utility line vegetation management in wetlands. In addition, it is important that there be a variety of wetlands habitat types for the variety of species that live in wetlands. Some

wetlands species require open areas without trees for their survival. See the response to comment 17 above for further detail.

19. COMMENT: We are supposed to be preserving the environment and fighting carbon dioxide emissions that many believe cause global warming - the trees naturally convert carbon dioxide to oxygen. (SLHA, RL, ASG, RLB, MBC, MTAE, GL, JRM, JR, SLA, RL, KG, CN, JS, KS, SBS, JR2, RG, PM2, KRP, RL, CFM, RPC, JBS, ELC, ADB, PGM, CM, JBS, SBS, BS, BCP, STCB, CLB, JWB, RKT, LC, EF, LPL, CB, TSR, MF, JP, JWB, IL, TF, PL, JMMCCM, RKT2, BJ, KRP, CH, MM, ECJ, SF, PG, VJV, SBS, GB, EF, VJP, CRSL)
RESPONSE: First, these amendments will likely result in fewer, not more, trees being cut than the rules prior to amendment. Second, the number of trees affected by these rules is not sufficient to make a substantial impact on carbon dioxide emissions. Finally, the Board, through its Office of Clean Energy, works actively to minimize New Jersey's carbon footprint through energy efficiency and renewable

energy technologies.

- 20. COMMENT: These rights-of-way have been recognized over the years as areas for wildlife movement through these vegetative corridors. The Natural Heritage Program that's run by the DEP indicates at least five endangered and threatened species either living within or adjacent to this right-of-way. (JH) RESPONSE: The Board works hand in hand with the Department of Environmental Protection to ensure that the two agencies' rules do not conflict. In addition, the cutting of vegetation does not necessarily harm wildlife or endangered species. Each species has specific habitat requirements. One New Jersey endangered species, the bog turtle, has been found to thrive in utility line rights of way, because it requires open, meadow-like conditions to survive, and will die off if trees are allowed to grow in its habitat. Furthermore, research has shown that some of the most valuable habitat is "edge" habitat areas where trees and clearings meet. These areas allow a variety of species to feed in the open where predators can be seen at long distances, and also to hide in the wooded areas for resting.
- 21. COMMENT: We're on the cusp of the Pinelands and basically are in a Pinelands environment. Large scale vegetation removal on sandy erosive soils in the presence of slopes is not a good combination when you're trying to protect surface water quality. The state's new storm water management regulations recognize that the most serious and deleterious impact to water quality today is non-point source pollution from unmanaged runoff. (JH, HL/MM)

RESPONSE: The special provisions for the Pinelands are required by statute, and are based on extensive research compiled by both the State and Federal governments, documenting the critical ecological importance of the Pinelands ecosystem to the entire region. The requirements of the rules are not incompatible with appropriate management of stormwater runoff. Furthermore, N.J.A.C. 14:5-9.6(e)3 specifically requires that EDCs comply with soil erosion requirements if bare soil is exposed.

- 22. COMMENT: In 1972 there was a regulation in N.J.A.C. 14:5-6.1 that required electric companies to employ nonuniform clearing in the right-of-way and wherever possible in accordance with sound construction and maintenance practices, as well as clearance requirements, allow a maximum number of mature trees to remain. That can be done in this circumstance without the type of clear-cutting that we fear that this regulation will result in this lovely community. (HL/MM) The 1972 rules were promulgated by the Board based on the electric lines and technologies then in use, and the electric reliability standards that applied at that time. Since 1972, power lines have become much larger, and the number of customers each line serves has increased exponentially, especially in New Jersey, the most densely populated state in the country. Furthermore, regionalization of power grids has linked power lines in regional networks, such that an outage in one place can have a dramatic ripple effect, as was observed in the 2003 outage that began in Ohio and affected huge numbers of customers up through the New England region. Therefore, the 1972 rules are no longer adequate, and the Board has updated the vegetation management rules accordingly. Regarding the issue of clear cutting, please see the response to comment 1 above.
- 23. COMMENT: You are going to leave 36-inch high stumps in the backyard. Why should I have to pay to have those taken to the ground and the stumps ground. (BF) RESPONSE: Under N.J.A.C. 14:5-9.5(g), EDCs are required to remove trimmings and cut vegetation from the site of vegetation management activities within five business days. This provision covers all vegetation involved in the maintenance, including tree stumps, which should be cut to a level even with the ground surface or slightly above it, as necessary to accommodate the terrain.
- 24. COMMENT: How come the FDA has to do anywhere from 7 to 11 years of research before they can put a product on the market but not one bit of research from the electric company has been done to test if these poles will cause cancer? They should find out the threats before they use us as their guinea pigs or perhaps some of their own employees should move under these lines if they feel they won't pose any threat. We have a sun and wind that will never go away. One billion dollars will send the electric company well on their way to putting up solar and wind towers and panels. (PM)

RESPONSE: These rules are limited to vegetation management by EDCs. Therefore, this comment is beyond the scope of these rules.

25. COMMENT: If Federal standards permit, you should add a clause where towns and residents can petition for or opt out of having herbicides used at all. Many towns have lakes and streams and wells which can be polluted by these herbicides through rain water runoff. The NJDEP can only ban particular chemicals if they have already been proven to be unsafe. Since many chemicals act slowly in our bodies, it could take a decade before illness could show itself. No one should be asked to endure these risks because a utility company wishes to save some labor costs in their next cycle of ROW maintenance. (GG)

RESPONSE: The existing rules include a provision requiring that any application

of chemicals for vegetation management purposes must be done in compliance with all applicable law. See N.J.A.C. 14:5-9.3(c). A property owner or town is always free to contact the EDC to discuss the use of herbicides for vegetation management purposes. The commenter's concerns regarding the limits of NJDEP's authority are beyond the scope of these rules.

Case by case is better:

26. COMMENT: We have over the years done a property-by-property walk-through with the electric company, and have been able to preserve a number of trees without endangering the wires. This regulation will take that case-by-case review out of the equation and will devastate this beautiful lakes community. Vegetative maintenance does not require clear-cutting. We can balance the safety needs and the need for reliable electrical service with environmental and quality of life issues. Note: one commenter presented a supporting position paper: Vegetative Management Proposal For the Utility Right-of-Way for the Sturbridge Lakes Community Impact, Voorhees Township, Camden County, New Jersey, July of 2009. (HL/MM, LHTEC, NR, HP)

RESPONSE: The amendments adopted herein increase the authority of the EDC to perform case-by-case reviews and tailor vegetation management in the border zone to the particular site and wires. Under the previous rules, no trees that grow to a mature height of more than 15 feet could remain in the border zone (the area on either side of the lines). Under the adopted amendments, the EDC can allow a tree that grows higher than 15 feet to remain in the border zone if the EDC determines that the tree meets integrated vegetation management standards for compatibility with the safe operation of the power lines. See N.J.A.C. 14:5-9.6(c).

- 27. COMMENT: Electric Distribution Companies should be restricted from vegetation management that goes beyond that required by the regulations. (LHTEC) RESPONSE: Power lines in New Jersey run through a wide variety of sites, each with its own topography, vegetation, and power line configuration. Effective vegetation management requires a corresponding variety of techniques and amounts of cutting, and therefore EDCs must have discretion to adjust vegetation management as necessary. In addition, there are existing limits that restrict the EDCs' vegetation management activities, found in each property's utility line easement. Therefore, the suggested change has not been made.
- 28. COMMENT: If Federal standards permit, local municipalities or other stake-holders should be permitted to petition for less restrictive management that would permit native shrubs and small woody plants within the wire zone, and permit native low-growing trees within the border zone. (LHTEC)

RESPONSE: The determination of the minimum safe distance between a tree and a power line is a technical question, requiring expertise and knowledge concerning both tree cutting and high voltage power lines. Furthermore, the logistics and cost of reviewing and ruling on petitions from multiple property owners would increase EDC costs significantly. These costs would have to be passed on to elec-

tric customers through rates. The Board does not believe this would be a useful or efficient way to handle these issues. However, the Board notes that non-woody shrubs are permitted in the wire zone. Additionally, the use of Integrated Vegetation Management will permit EDCs greater flexibility to allow compatible species to grow in the border zone.

29. COMMENT: The proposed application of IVM to the border zone provides for a degree of variability in the degree of trimming that is enforced in the border zone. We would therefore support these changes if some measure of discretion is allowed through application of IVM in the Border Zone. (NJRC)

RESPONSE: The Board appreciates this comment in support of the rules.

30. COMMENT: We own a historic 1750s home. It's a local landmark; we have trimmed trees at our own expense so we make the power companies happy. And the power companies have been very fair with us over the years. We have easements on 28 acres and we're surrounded by a thousand acres of contiguous parkland. There is an access road. I would encourage the Board to formalize some broad discretion of the power companies to decide on a case-by-case basis. Yes we did know there were easements. Did we know that they could affect negatively on our property value? Of course. But where there are alternatives they should be used. The economic impact is a huge issue right now because we are trying to sell. The rules should provide an exclusion for historical properties (public or private) and parkland properties, much the same as the Pinelands and Agricultural exclusions provide. (NR)

RESPONSE: The special provisions for the Pinelands are required by statute, and are based on extensive research compiled by both the State and Federal governments, documenting the critical ecological importance of the Pinelands ecosystem to the entire region. Similarly, there are several distinct reasons for the special provisions for agricultural crops, which do not apply to historic properties. (See the responses to comments 69 through 72 for more discussion of the special agricultural provisions.) Historic properties do not have the characteristics upon which these other two exceptions were based. While the Board appreciates the importance of preserving New Jersey history, the Board is statutorily mandated to ensure safe, adequate and reliable electric service to all of the residents of New Jersey. The Board believes that these rules fulfill that mandate while also minimizing, to the extent possible, adverse effects that may arise from a change in vegetation from trees to lower growing meadow plants. For a detailed explanation of issues surrounding property values, please see the responses to comments 73 through 75.

Easement issues:

31. COMMENT: Needless, excessive tree cutting may be overstepping the bounds of the intent of many of the original easement agreements, especially when it involves clearing the border zones. (GG)

RESPONSE: The rules are designed not to conflict with easements. Under N.J.A.C. 14:5-9.6(f)1, an EDC may leave trees and other woody vegetation within

the transmission right of way if the "right-of-way document, easement, indenture, deed or other written land right, executed before January 1, 2007, expressly permit vegetation to be located within the transmission right of way."

32. COMMENT: The easement is not a distinct and separate tract of land apart from my home but a tract that is enveloped in my property. As a homeowner I spend thousands of dollars on landscaping. This destruction of property is not ok. Consequences will impact the homeowner and community for years. The Township will ultimately be affected because property owners will be requesting reduced tax assessments. (RKT2, JMU, MT, BF, GB)

RESPONSE: The Board agrees that an easement is enveloped within a property, and understands that many property owners spend time and effort on landscaping in easements located on their properties. However, the utility's rights regarding activities on the easement are determined by the document that creates and memorializes the easement. The utility's rights, as spelled out in the easement, limit the property owner's rights regarding use of the land covered by the easement. For this reason, most properties containing utility easements are already assessed at (and generally sell for) a lower price than properties without easements. Regarding the commenters' suggestion that property owners may request reduced tax assessments, the Board has no jurisdiction over the tax requirements of municipalities.

33. COMMENT: We are Cinnaminson citizens who own property that includes an easement for the electric towers and wires which run through our property. Cinnaminson is unique in that we own the land that the electric company is using all these years. We have used this land as our private yards for 40 to 50 years, we own the land but are losing our rights. (JCH)

RESPONSE: The commenter is mistaken regarding the uniqueness of property owners in Cinnaminson. In fact, virtually all of the land over which transmission lines run in New Jersey is privately owned, and the transmission lines are located in easements on each property. The easement accompanies each property when the property is transferred to a new owner. It spells out the EDC's rights and responsibilities regarding use of the easement for the transmission line crossing. To the extent the commenter is claiming that these rules conflict with his/her easement(s), see the response to comment 31.

34. COMMENT: This proposed regulation is a travesty to our right of property enjoyment as well as an extreme nuisance to our investment. We understand the motive of this regulation but the economic effects on our community will far outweigh the benefits to the electric company. (VJP)

RESPONSE: The rule is not intended to benefit the electric company, but instead to ensure the regular, appropriate management of vegetation under utility lines, in order to ensure safe and reliable electric service to New Jersey customers at a reasonable cost. Regarding property owners' rights in relation to easements on their property, please see the response to comments 31, 32, and 33 above.

35. COMMENT: The new proposed regulations amount to a taking of private property for the benefit of power companies and represent an assault on the environment. (KS, AS)

RESPONSE: The legal concept of a "taking of private property" is complex, and involves government actions that restrict or remove property rights. To the extent the commenter is claiming that these rules conflict with his/her easement(s), please see the response to comment 31.

36. COMMENT: The ROWs are physically and possessively owned, fee simple, by the property owners. (PLNC)

RESPONSE: The commenter's concerns are unclear. To the extent the commenter is claiming that these rules constitute a taking of private property or otherwise conflict with his/her easement(s), see the response to comments 35 and 31, respectively.

37. COMMENT: There needs to be an establishment of the easement. BPU should mandate that EDCs must survey all easements through all residential areas. No tree should be cut down that's not within the easement. If there's a tree that's partially in, you round-off in favor of the homeowner and that tree stands untouched. The new regulation is asking for the easement to extend within 6 feet of my back patio. In 3 more years, will my home will be considered part of the continually growing "easement"? (MSS, BF)

RESPONSE: These rules dictate an EDC's conduct relative to its easement rights. The size and boundaries of easements are not affected by these rules. EDCs and homeowners should be familiar with their easements, as an easement is essentially an agreement between the EDC and the property owner. If there is a dispute as to the boundaries of an easement or the removal of specific trees, these issues must be resolved between the EDC and the property owner in a manner that is consistent with the Board's vegetation management rules.

38. COMMENT: Homeowners should either be compensated for their loss or the utility company should be directed to have the planting relocated elsewhere on the property. (GG, BF, JH, JFM, PD)

RESPONSE: Each property with an electric transmission line right of way is purchased along with an easement that sets forth the utility's rights and responsibilities regarding the utility right of way. Therefore, the terms of the easement would determine the rights of the parties within the easement, including whether compensation is appropriate.

Definitions

39. COMMENT: Under the current definition, the position of Electric Utility Arborist (Vegetation Manager) must be both a Certified Tree Expert <u>AND</u> an International Society of Arboriculture (ISA) Certified Arborist and Utility Specialist. This "and" requirement is unnecessary, as the Certified Tree Expert requirements do not include any utility vegetation management items which serve as the basis for the Electric

Utility Arborist position. The ISA Certified Arborist requirements are similar in nature in general tree care to the Certified Tree Expert elements, and the Utility Specialist requirements are directly related to the utility vegetation management practices. Since there is an overlap in general tree care knowledge requirements between the ISA and Certified Tree Expert requirements, and where as the Utility Specialist qualifications can only be obtained after a person is an ISA Certified Arborist, the ISA and Utility Arborist requirements should be the standard for the Electric Utility Arborist/Vegetation Manager. Therefore, we recommend that the definition of "Electric Utility/Arborist," be revised so as to remove the redundant Certified Tree Expert requirement. (EDCs)

RESPONSE: As this definition was not proposed for amendment, and the term "vegetation manager" is not used in the provisions proposed for amendment, this comment is outside the scope of the proposal.

40. COMMENT: The current definition of the term "Transmission Line" provides that, "an electric transmission line usually has a rating exceeding 69 kilovolts." This definition should be revised so as to include the following sentence at the end of the definition: "Electrical lines, wires or cables, including supporting structures and appurtenant facilities, that have a rating of 69kV, but are operated by the EDC, and identified by the EDC to Board Staff, as distribution lines, will be exempt from the requirements of N.J.A.C. 14:5-9.6." (EDCs)

RESPONSE: Please see the response to comment 42 below.

41. **COMMENT:** The BPU and our electric company have an unwritten understanding that 69 kilovolt transmission lines should be managed in a fashion similar to a distribution line. What happens when the individuals who are making the rules are no longer at the BPU or our electric company? Unless it is clearly and specifically identified the manner and method in which 69 kilovolt lines will be managed, it leaves an opportunity for arbitrary measures in the future on what form of vegetation management will occur. (JAL)

RESPONSE: Please see the response to comment 42 below.

42. COMMENT: I request the word "usually" be deleted from the definition so it clearly identifies that a transmission line is one that exceeds 69 kilovolts. Based on the North American Electricity Reliability Corporation (NERC) Standard FAC-003-1 and pending revisions in NERC Standard FAC-003-2, deleting the word "usually" from the definition of a transmission line is the most desirable and prudent resolution. The RRO does not deem those lines as critical to reliability in the region. In the event the BPU must maintain the existing definition to allow flexibility, the rules should include "For transmission lines with system voltages of 69 kilovolts and lower, the less restrictive vegetation management rules for distribution conductors shall apply." Further, it would be prudent to require identification by the various RROs and EDCs which lines of 69 kilovolts and less are considered critical, as well as the reasoning behind such identification, thus allowing for classification as to which vegetation management rule applies—that for distribution lines or that for transmission lines. I would like the Board to ensure the 69 kilovolt lines in this area

continue to be handled in a similar fashion as that which occurred post February 20, 2008. (JAL, GG)

RESPONSE to comments 40 through 42: The definitional distinction between distribution and transmission lines is incorporated into several different Board rules, including vegetation management, renewable portfolio standards rules, and rules governing interconnection of renewable energy generating units for net metering. In addition, this term is defined by FERC and the Board must not conflict with Federal standards. As such, any examination of these definitions must carefully consider all potential effects of changing these definitions. The Board has initiated internal discussion to determine whether a change is appropriate. However, the Board must, in addition, consult with other State and Federal agencies, and consider practices throughout the region. These efforts will require extensive analysis and coordination prior to any final decision on whether amendments to the regulatory definitions should be promulgated. If the Board does propose changes, they will be published for 60 days of public comment prior to taking effect.

43. COMMENT: We recommend that the proposed definition of "wire zone" be changed to that stated in ANSI A300 Part 7: Tree, Shrub and Other Woody Plant Maintenance - Standard Practices (Integrated Vegetation Management a. Electric Utility Rights-of-Way). This would more accurately reflect how EDCs could manage vegetation in the wire zone and would also be in line with changes in N.J.A.C. 14:5-9.6. The ANSI definition reads as follows:

"Wire Zone" Section of a utility transmission right-of-way directly under the wires and extending to about 10 feet (3 meters) on either side. The wire zone is typically managed to sustain a community of low-growing forbs, grass, herbs and shrubs. (EDCs)

RESPONSE: The Board is not aware of problems that have arisen as a result of the difference between the Board's definition and the ANSI definition of the term "wire zone." Therefore, the commenters' suggested change has not been made.

44. COMMENT: Proposed N.J.A.C. 14:5-9.6(d) states that an EDC shall apply Integrated Vegetation Management. You reference two publications that might define what IVM is, neither of which is available to the general public. You offer no explanation to the layperson to understand how their property will be impacted. I suggest that you add a brief explanation. (GG)

RESPONSE: The Board has added a definition of integrated vegetation management upon adoption. The definition is taken from the Transmission Vegetation Management NERC Standard FAC-0003-2 Technical Reference document (October 20, 2008), which describes the Federal vegetation management requirements.

Notice to property owners, municipalities

45. COMMENT: A postcard mailing would be more effective for notification to property owners that the EDC intends to conduct vegetation management on their property, rather than email or notifying town officers. Many people, particularly elders, are not computer literate. Perhaps you could instruct the EDC to give customers a

way to elect mail notification. If you notify an official from town, you would have no way of knowing if this information would be passed on to residents. Our borough hall had been notified several months before the EDC intended to cut but they did not warn us. Our first notification was a knock on the door from the tree service hired by the EDC, informing us that this was to be done within a week. The EDC cannot use one newspaper or the general billing as a notification. (JMF, JMU, GG) **RESPONSE:** The notice provisions to which the commenter refers already require notice to property owners by mail. N.J.A.C. 14:5-9.8(c) requires notice by certified mail, return receipt requested, when transmission line vegetation management is planned; as well as newspaper notice. These provisions were not changed by the amendments adopted herein.

46. COMMENT: The notice provided to local officials and affected parties should include the name of and contact information for the utility Vegetation Manager as well as the name of and contact information for the contractor performing the vegetation management, if applicable. (NJRC)

RESPONSE: Under existing N.J.A.C. 14:5-9.3(d), all notices required under these vegetation management rules must include the Vegetation Manager's name and contact information. These provisions were not changed by the amendments adopted herein.

47. COMMENT: N.J.A.C. 14:5-9.6 should allow property owners to request a hearing before cutting of any trees that are (at maturity) more than twice the minimum distance as specified in IEEE Standard 516-2003. The hearing would be to determine the need to exceed twice the minimum clearance. This is consistent with EDC practices prior to 2007. To determine the minimum distance you need to compute wire sag and sway of the conductor and distance to the nearest limb/foliage. Alternatively, a general guideline like the following would be easier to administer, allowing EDCs to cut trees with up to five times the minimum clearance without notification:

Distance from the edge
of the wire zone.

1-25 ft
26-50 ft
> 51 ft

Height at maturity
> 20 ft.
> 30 ft
> 45 ft

(NJSC)

RESPONSE: The use of Integrated Vegetation Management in the Border Zone is intended to provide EDCs more flexibility than the current rules to determine whether vegetation is compatible with the transmission lines. This change should assist in resolving the issue identified by the commenter. As noted by the commenter, determining the minimum allowable clearance distance under the federal standard requires complex computations which cannot ordinarily be done by property owners or municipalities, but require trained experts. The Board does not believe that setting a threshold requiring a hearing is necessary or appropriate, in the ordinary course, to determine the safe distance between a tree and a power line. This is a technical question, requiring expertise and knowledge of the characteris-

tics of various types of trees, and of high voltage power lines, which is ordinarily made by an EDC's Vegetation Manager.

48. COMMENT: The four year listing of municipalities where transmission line Vegetation Management work is anticipated to be done, required under N.J.A.C. 14:5-9.6(h)3 will not be accurate after the first year of the cycle. This is due to changes caused by the ability to obtain outages on the transmission lines, work load and other variables such as weather. A one year listing would be more appropriate. (EDCs)

RESPONSE: The Board understands that the accuracy of any listing of future plans will inevitably become less accurate as time goes by. However, the listing will still provide helpful information to municipal officials. Furthermore, the rules do not require the EDCs to adhere strictly to the plan, but provide flexibility and the opportunity to update the plan annually to reflect evolving vegetation management activities. Annual publication of a four year plan will provide appropriate updates regarding planned vegetation management activities.

- **49. COMMENT:** We suggest that notice of the EDC's anticipated four year vegetation management schedule should also be sent to the Shade Tree Commission if the municipality has one, or otherwise to the municipal engineer. The utility should also provide an updated planned vegetation management schedule on its website at least 14 days in advance of the vegetation management activities. (NJRC) RESPONSE: The Board believes that the burden of distributing the EDC's transmission line vegetation management schedule to various municipal bodies should rest with the municipality. Each municipality is likely to have different divisions or committees to which it wishes to distribute this information, and it would be inefficient and cumbersome to place the burden on the EDCs to determine municipal preferences. Regarding website posting, the EDC must prepare and submit to the Board its four-year vegetation management schedule by May 31 each year, and should post the schedule on the web simultaneously with submittal to the Board. More specific notice regarding planned vegetation management activities is required pursuant to N.J.A.C. 14:5-9.8(a). Therefore, the Board has determined that the commenter's suggested 14-day advance re-posting of the four-year vegetation management schedule on the EDC's website is not necessary.
- 50. COMMENT: N.J.A.C. 14:5-9.6(I): The notification procedures used now and required in N.J.A.C. 14:5-9.8 are more than sufficient for ensuring that municipalities, public authorities, customers and property owners are informed of planned vegetation management activity. The name description used for transmission lines will be foreign to the general public and cause confusion regarding the transmission lines scheduled for vegetation management. Posting the schedule on the web will cause unneeded concern for those customers not directly affected by these vegetation management activities and/or generate questions about transmission lines that are not on the schedule for maintenance for the next two to four years. There is also a security concern about posting information concerning an EDC's transmission sys-

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tem on the EDC's web site. For these reasons, we recommend no changes to the current notification procedures in N.J.A.C. 14:5-9.8. (EDCs)

RESPONSE: During the extensive stakeholder process concerning these rules, property owners repeatedly stated that they did not receive sufficient notice of vegetation management activities prior to the arrival of tree trimming crews on their properties. The web posting requirement is designed to address this problem. If the names EDCs use to identify transmission lines will confuse the public, the EDC should use common names instead, or should add clarifying, descriptive language when preparing the listing of planned vegetation management locations. A carefully prepared listing will prevent undue confusion, and the public is entitled to ask questions regarding the EDCs vegetation management activities in relation to any transmission line. It is not clear what security concerns will arise from the required listing, especially given the current proliferation of online mapping that already makes the locations of transmission lines readily available to the general public.

- 51. COMMENT: A change is proposed requiring each EDC to provide lists of acceptable plant species for use in rights of way, either on its web site or in a publication provided free of charge upon request by a ratepayer. We suggest that both the web site access and the free publication upon request be required. (NJRC) RESPONSE: The Board does not believe that the cost of providing both means of accessing this information will be justified by the benefits, and notes that EDC costs would eventually be paid by electric customers.
- **52. COMMENT:** Notification of a "60 day" commentary window in the "New Jersey Ledger, March 17, 2008" is insufficient. Most residents of New Jersey "never heard of the "New Jersey Ledger... where to get it or how to get it!" Since we live with the ROW and were parties to a previous ROW vegetation maintenance law suit, we should have been effectively and timely notified of the proposed changes. (PLNC, JCH)

RESPONSE: The New Jersey Legislature has considered the interests of citizens in being notified of proposed rule changes and the cost of various types of notification, and has set forth rulemaking notice requirements for all New Jersey State agencies. These requirements can be found in the New Jersey Administrative Code at N.J.A.C. 1:30. As required, notice of the proposed rule changes adopted herein was provided through the Board's website, through notice in the New Jersey Register (the official publication for all New Jersey State agency rules), and through distribution to all media outlets that maintain an office in the New Jersey Statehouse in Trenton. Furthermore, it would be virtually impossible for the Board to monitor all lawsuits in the State to determine if participants in a particular lawsuit might be interested in a proposed rule change.

53. COMMENT: We live in South Jersey. We were told that the BPU advertised in the Star Ledger that the regulations for vegetation management were being reviewed. As far as I am aware, there was no advertisement in any south Jersey newspaper and the Star Ledger is a Newark newspaper. (BG, JCH) RESPONSE: Please see the response to comment 52 above.

- 54. COMMENT: We recognize the important mission of Electric Distribution Companies to maintain the integrity of the nation's power grid, but this can be accomplished with a gentler hand. We urge the NJBPU to adopt amendments that promote a reasoned dialogue among the stakeholders so we do not destroy one set of resources while protecting another. (LHTEC)
 - **RESPONSE:** The Board has conducted an exhaustive stakeholder process, and does not believe that further stakeholder dialogue would produce additional benefits at this time.
- **55. COMMENT:** The Board of Utilities had meetings but at no time were Cinnaminson Township or the citizens who own this Right of Way notified of any meeting. We would have been greatly interested in hearing about any new vegetation maintenance regulations. (PLNC)
 - **RESPONSE:** Despite the Board's exhaustive efforts to obtain input from all interested stakeholders, it is impossible to reach every potential interested party. The Board used several different methods to publicize its stakeholder meetings including a special notice in the New Jersey Register (the official publication for announcing all New Jersey State agency rules), multiple postings on a special page of the Board's website that was dedicated to vegetation management, and use of a "list serv" an e-mail list to multiple parties with a potential interest in the rules. Several Cinnaminson residents provided input to the Board and to the EDC in various ways during the comment period on these rules. Regarding notice of proposed rules, please see the response to comment 52 above.
- 56. COMMENT: We appreciate the Board of Public Utilities' efforts at balancing the needs of reliability and cost and efficient management of natural growth along utility lines while respecting the rights and concerns of the residents directly affected. The most common cause of electric utility outages is a tree branch contacting a wire or causing a fault to ground on a circuit. It is appropriate that the Board has undertaken this extensive effort, involving all stakeholders, to review and revise the vegetation management rules. We generally support the Board's proposal. (NJRC) RESPONSE: The Board appreciates the commenter's support for the rules and for its efforts to include all stakeholders in the rulemaking process.

Previous authorizations to plant, lawsuit:

57. COMMENT: After some previous vegetation management, we asked the electric company where we could plant a row of Douglas Firs. At a cost of \$1,000 we planted a row of ten Douglas Firs. Now we are told that the proposed new rules prohibit any wooded growth that exceeds three feet in height and the Fir trees we had planted will have to come down. Many property owners planted trees and now the electric company is going to remove them. At some properties, the electric company did the plantings. (PLNC, GG, BS2, JCH, JMU, HWP, EF, AB, DA, HWP) RESPONSE: The Board understands that the updating of the vegetation management rules over time has changed conditions for some property owners whose

property is subject to a utility easement. In some cases, these changes may result in a requirement that a property owner remove vegetation that was previously authorized. Inevitably, conditions in the electricity industry evolve and more information becomes available regarding the type and seriousness of the threats to electric lines, and the Board is not free to ignore new information regarding protection of power lines. However, the Board believes that these rules strike a reasonable balance between the interests of property owners and the reliability of electric service delivery to all customers. The Board notes that the three foot limit in the wire zone (the area directly under the wires) was not created through this rulemaking, but has been in effect since 2007. Please see the response to comment 6 above for a detailed discussion of the reasons for the three foot limit.

58. COMMENT: We had a court order and only approved trees are now on the easement section of our property. Doesn't our court settlement fall under proposed N.J.A.C. 14:5-9.6 (f)1, which says: "Notwithstanding (e) above, an EDC may leave trees and other woody vegetation within the transmission right of way under... [a] right-of-way document, easement, indenture, deed, or other written land rights, executed before Jan 1, 2007, expressly permit[ting] vegetation to be located within the transmission right-of-way. Our settlement states what we could plant on the right of way. (JCH, BG, BF, PLNC, GB, MP)

RESPONSE: A person who is a party to a previous lawsuit should consult legal counsel to determine whether the particular settlement document or court order resulting from the lawsuit would be covered by this provision.

Trim don't remove

59. COMMENT: The electric company hires employees from other states to do this tree trimming so they don't care what the street looks like after they get through killing all of the trees. We need to let public comment be heard before this company moves into a neighborhood. The wires on these poles are hanging down and look like no money is spent in maintenance. The electric providers don't care about the way we get electricity to our homes. We need the BPU to see that the public is protected from this attitude of the electric providers. (BS)

RESPONSE: The visual appearance of electric wires, as well as the residency of EDC vegetation management workers, are issues beyond the scope of these rules. Nonetheless, EDCs are required to maintain transmission lines in order to provide safe adequate are reliable service, pursuant to N.J.S.A. 48:2-13. Regarding public comment, the rulemaking process provided for public comment on the amendments adopted herein. The Board does not believe that holding an additional formal public comment process prior to each instance of vegetation management would resolve the problems cited by the commenter. In addition, such a process would cause significant delay and cost on the part of the EDCs. Since EDCs' operating funding comes from electric customers, the result would be substantial increases in the rates that customers would have to pay for electricity. The rules do, however, provide for notice to homeowners before vegetation management is begun in a neighborhood. See N.J.A.C. 14:5-9.8.

Rules not needed:

- **60. COMMENT:** I urge the BPU to pass regulations that balance effective safety of power lines with private property needs and environmental needs. Removing trees that pose no danger to power lines is poor policy. (KS, TTB, RMC/RBC, JC) The amendments as proposed and adopted will actually decrease RESPONSE: the number of trees that will be cut, and thus will not result in the adverse environmental effects cited by the commenter. It is not clear upon what data the commenter relies to support the statement that these rules are not necessary to ensure reliable electric service. The New Jersey Legislature has delegated to the Board the responsibility to ensure that New Jersey utility customers receive safe, adequate and reliable utility service at reasonable rates. See N.J.S.A. 48:2-13. To carry out this mandate, the Board employs Staff with technical knowledge and experience in the electric utility industry. In addition, Board Staff has conducted an exhaustive stakeholder process and also consulted extensively with other government officials. including those at the Federal, State and county level, officials from other states, property owners, utility workers, tree experts, and environmental consultants. Board Staff have applied their knowledge and expertise to a thorough consideration of all of the information and statistics gathered during this stakeholder process. Based on this, the Board believes that the rules as adopted strike an appropriate balance between the interests of reliable electric service at reasonable rates, and the interests of property owners and the environment.
- 61. COMMENT: The Sturbridge Lakes Association has a covenant requiring a resident to seek permission from the Board of Trustees before trees can be removed from his or her property. Why, then, should the electric company come in and remove trees to avoid future maintenance? (LPL, MH, GPC, RGW, CA, JTV)
 RESPONSE: A covenant among a group of property owners regarding how they will use their properties does not supersede the Board's rules, which have the binding force of law.
- 62. COMMENT: At the public hearing, a commenter made the statement that the most common cause of outages was tree contact with wires. It's my understanding that that is true for distribution lines, the lines that go in front of your house, but I don't know that that is true for transmission lines. (NJSC)
 RESPONSE: The most common cause of power outages on transmission lines, as well as on distribution lines, is contact with trees or other vegetation. Transmission lines are particularly vulnerable because the wires sag and sway more with higher voltages.
- **63. COMMENT:** There was never a trip out or failure due to tree contact in our area. The utilities indicate there were zero tree caused trip-outs/lock-outs during 2007 and there were only three trip-outs/lock-outs for the period 2002 to 2006. I believe the electric company is using the "crisis trip out" in Ohio, to implement this more stringent policy that has nothing to do with that "trip out" that cascaded into Canada.

Common sense tells me that the major issue with respect to that problem was a grid circuit(s) design failure. A "limb falling on a conductor" should not cascade into an international grid outage. There should be "go around circuitry or work around circuitry" to localize the problem and minimize the outage. (PLNC, EP, JAL, PEM) RESPONSE: Damage to a transmission line in New Jersey can have devastating effects. New Jersey is the most densely populated state in the country. Furthermore, regionalization of power grids has linked power lines into large regional networks, such that line damage in one location can have a dramatic ripple effect, traveling rapidly across many states, as was observed in the 2003 outage that began in Ohio and affected huge numbers of customers. Preventive practices followed by the Board and PJM Interconnection (the regional grid manager) helped halt the cascade in northern New Jersey. The Board must continue its vigilance to ensure that it meets its legal responsibility to ensure the reliability of the electric grid. In so doing, and in consideration of the lessons learned from the 2003 outage resulting in part from improper vegetation management, the Board has determined that preventative vegetation management is necessary and appropriate.

Possible solutions - underground, raise wires, bowl effect:

64. COMMENT: If the electric company no longer wishes to conduct maintenance, through our commingled properties, they should be made to extend the stanchions to an appropriate height (i.e. 10, 20, 30 ft. etc. higher) so as to have the lowest conductor no lower than 50 ft at maximum Kv plus summer droop. Correspondingly specify that resident stakeholders only be allowed to plant trees that grow no higher than 30 feet. Higher stanchions exist in Europe where farms, homes, barns, trees, fences, farm equipment, cars and livestock roam freely under the conductors. (PLNC)

RESPONSE: Raising the stanchions that support transmission wires would pose many problems, including engineering challenges in building the supports and maintaining the wires, as well as costs that would be passed on to electric customers throughout New Jersey. Additionally, such changes may raise alternate concerns by affected residents regarding the height of the towers.

- **65. COMMENT:** Instead of paying a portion of the taxes on the land, why not just keep that money to use towards the maintenance of the trees? Everyone is a winner then-you will have some extra money for maintenance, and we will still have our lovely trees to enjoy. (RS)
 - **RESPONSE:** Issues regarding the use and distribution of local tax assessments are outside the scope of these rules. EDCs obtain funding for vegetation management, and all other activities, through rates charged to electricity customers. While cost is sometimes a factor, these rules are primarily designed to increase the protection of electric wires from damage caused by overgrown or falling vegetation.
- **66. COMMENT:** Why don't you just move these dangerous power lines out of our neighborhood that would resolve numerous issues. Force the utility companies to put their wires underground as many states already do. It would be a great solution

for only the residential areas and it would make everyone happy. (GB, BS, TSR, SR, MSS)

RESPONSE: These amendments concern transmission wires only. Placing transmission wires underground is very expensive, and increases long term maintenance costs, because every repair requires excavation to access the wires. If the Board required EDCs to place wires underground, these additional costs would have to be passed on to all New Jersey electric customers through rates. The Board does not believe that millions of New Jersey electric customers should subsidize the cost of the esthetic preferences of a handful of property owners.

67. COMMENT: The best proposal is the bowl effect. The rules should calculate the swing of the wires, including sagging from heat and movement from wind. Every foot back from the point where the wire will be at maximum swing, any tree in that area could be a foot and a half taller; another foot back, another foot and a half taller. Basically you're building a bowl which would accommodate droppage of wires due to intense heat and heavy-duty winds. That should be adopted for residential areas. It is in the spirit of fair compromise and it is completely safe. (BF, BS2)

RESPONSE: The Board believes that the application of Integrated Vegetation Management in the border zone will provide utilities with the flexibility to use the commenter's suggested approach as appropriate.

68. COMMENT: Why aren't there varied standards for transmission lines based on the level of voltage, as is done in NERC Standard FAC-003-1? (JAL) RESPONSE: The Board's rules do provide for varied standards in the border zone, in that they require application of IVM, which is consistent with the NERC Standard. The Board rules are also consistent with the NERC standard in the wire zone, as the NERC standard states that: "The wire zone is managed to promote a low-growing plant community dominated by grasses, herbs and small shrubs (under 3 feet in height at maturity)." See NERC Standard FAC-003-2 Technical Reference, September 2009, page 15.

Agricultural exemption:

69. COMMENT: The Right-to-Farm Act (N.J.S.A. 4:1C-1 et seq.) requires an agency proposing a rule to issue an Agriculture Industry Impact Statement, setting forth the impact on the agricultural industry. The State Agriculture Development Committee (SADC) is authorized to determine if the proposed rule may have a significant adverse impact on the agricultural industry, and if so the agency proposing the rule is obligated to consult with the SADC. Based on the information the SADC has been able to obtain, the Agriculture Impact Statement relies on a "special provision for agricultural vegetation" to conclude that there will be no Agriculture Industry Impact. However, the proposed regulation restricts the height of woody agricultural crops in the wire zone to the extent that a farmer will not be able to grow his/her trees to their mature height and produce more abundant crops while creating no bar to the maintenance of power lines. This rule, as proposed, has a significant adverse im-

pact on the agriculture industry. Therefore, pursuant to N.J.S.A. 4:1C-10.3(c), consultation is requested prior to the adoption of N.J.A.C. 14:5-9. (SADC) **RESPONSE:** During the course of developing this rule proposal, the Board consulted with the Department of Agriculture. Additionally, pursuant to N.J.S.A. 4:1C-1 et seq., the Board consulted with the SADC prior to final adoption of these amendments. The SADC argued that the maximum height of permitted agricultural crops should be increased. The Board has determined not to make SADC's suggested change at this time. Regarding the commenter's suggestion to raise the maximum height, please see the response to comment 70 below.

- 70. COMMENT: We believe that a maximum height of 18-20 feet is necessary to allow continued agricultural production while maintaining the access needed for power line maintenance and harvest. Commercial woody agricultural crops in the right-of-way wire zone, such as fruit trees, nursery stock and Christmas trees, should have no height restriction. If these heights are not allowed the agricultural community would suffer significant loss by preventing growth to a productive height before harvest. This requested change does not harm the public. In fact, a Rutgers University Cooperative Extension Fruit Tree Specialist with 45 years of experience notes that a standard apple and pear tree grows to 20 feet. The requested change also benefits the farmer/producer and the power companies because the presence of agricultural crops keeps the vegetation pruned and the lines accessible. (NJDA) The Board has expanded allowable agricultural crops to include RESPONSE: woody plants and increased the allowable height of agricultural crops in the wire zone from three feet to 12 feet through these amendments. However, the Board has not increased the limit beyond 12 feet. After collecting data from many stakeholders, including EDCs, foresters, farmers, the SADC and the New Jersey Department of Agriculture, the Board has determined that only a moderate number of agricultural properties are affected by these rules. Furthermore, the majority of farmed lands and nurseries have easements specifying cutting practices mutually agreed upon by the land owner and the utility. Generally, these easements predate these rules and therefore supersede the height restrictions in the rules in accordance with N.J.A.C. 14:5-9.6(f). Finally, in many cases the NERC rules would require the removal of the types and sizes of trees suggested by the commenter, even if the Board rules did not require their removal.
- 71. COMMENT: The wire zone height allowance of 12 feet for landscape nursery stock and Christmas tree plantation stock should be conditioned on: 1) there being no effect on the access to transmission towers or other facilities; and 2) the potentially destructive removal of such stocks if needed to permit emergency repairs or construction or if the woody crops later grow in excess of a safe limit. (NJRC) RESPONSE: An EDC's right to access property is dictated by the right-of-way document or easement, and also by the Board's rules for all utilities at N.J.A.C. 14:3-3.6, which allows utility personnel reasonable access to private property. Permitting nursery stock and Christmas tree plantation stock growth does not limit this right. Therefore, there is no need to restate the EDC's access rights in the vegetation management rules.

72. COMMENT: There is an exception that allows growth up to 12 feet for agricultural enterprises. There is currently no exception for privately owned land that has a Right of Way (ROW) as part of an easement. The regulations should be the same whether land is owned by agricultural enterprises or private individuals. Trees or shrubs that are 15 feet maximum should be allowed for both agricultural and privately owned properties. From a safety, reliability and security standpoint, there is no difference between woody plants sold for money and those that are not sold. (NJRC, DB, JFM, BG, HC, JCH, EP, BF)

RESPONSE: The Board believes that there are differences between commercial agricultural properties and other residential and non-agricultural use properties which make an exception for agricultural crops appropriate. First, agricultural properties are more limited and can be more easily identified and monitored, including through farmland assessment status. Reducing the areas subject to this exception reduces risk of contact between vegetation and a transmission line. Second, commercial vegetation owners have the experience to properly care for vegetation while maneuvering around the transmission lines. These commercial growers have the resources, tools, and working knowledge of how to prevent dangerous vegetation scenarios. Further, these professionals carry commercial insurance, so that the difficult issues of liability that plague the commenters' suggestion of individual contracts for each property owner do not exist in this customer class. One of the reasons for allowing only non-woody crops or woody plants smaller than three feet in rights of way is to ensure that no one can easily climb them and reduce the distance between themselves and the transmission conductors.

Home values:

73. **COMMENT:** It is already more challenging to sell a home that is along the power lines or has a tower in the yard. When there are trees that obstruct the view of the tower and/or lines, buyers tend to be a little less tense. Additional clear cutting of what is left of the trees will greatly decrease the value of the homes along these lines. It is an injustice to the residents to destroy the value of their homes. (PEM, DC, BCP, TTB, PLNC, BF, PLNC, RGW, CA, JTV, GPC, MH) The Board's previous rules required EDCs to conduct vegetation RESPONSE: management within their rights of way. As noted in the response to comment 4 above, these rules provide more flexibility to EDCs with regard to vegetation in the Border Zone of a right of way. An EDC's rights regarding a right of way are set forth in the right of way document, as discussed in the response to comment 31 above. The owners of property that includes a utility right of way have generally paid less for their homes at the time of their original purchase. Further, buyers of such property are made aware of the right of way at the time of purchase, and are given copies of the easement spelling out the utility's rights to perform the necessary vegetation maintenance. Furthermore, these property owners, like other utility customers, benefit from the existence of electric transmission lines, and from the service reliability that results from regular vegetation management under the lines.

- **74. COMMENT:** Create language which allows for less invasive vegetation management in the case of residential communities vs. non-populated areas, thereby protecting residential communities from devastating aesthetic and property value loss. There should be different rules attending to the maintenance of lines that run through a residential community. (MT, EF, NR)
 - **RESPONSE:** The Board has made every effort to minimize the impact of utility line vegetation management on property owners, including residential property owners. However, the Board is also mandated by legislation to protect the reliability of the State's electric supply, and to do so at a reasonable cost to the electric customers who fund electric distribution companies through electric rates. Overgrown vegetation in residential areas is just as dangerous to power lines as overgrown vegetation in rural areas. The Board further notes that residential property owners knowingly purchased properties containing electric utility line rights of way which authorized the electric utility to maintain the utility lines. Presumably, the fact that these properties contain utility line rights of way has been factored into the assessed value of the property from the time the utility line was built.
- **75. COMMENT:** When the electric company placed the lines and built the towers, they knew the homes were there and that the people living here relied upon the vegetation to hide the view of the towers. The electric company seeks to skirt the costs of maintaining their easements by simply clear cutting, reducing the need to cut back vegetation on an as-needed basis. (TTB)

RESPONSE: In fact, the towers and the transmission conductors in the commenter's housing development were installed in 1967 and ran through farmland at that time. The easement through which the then-property owners gave the EDC rights to use the right of way is dated December 9, 1966, long before the houses to which the commenter refers were built. The housing development was not built until the mid-to-late 1970s and early 1980s. With regard to each party's rights under the easement that applies to their property, please see the response to comment 31 above.

Privacy, aesthetics:

76. COMMENT: The EDC wants more access ways under the wires. This would beckon and usher in ATVs, mountain bikes, motor scooters, bikes, hikers, and very likely burglars, especially since fences are not allowed in our development. It would change the ROW from a private residential appearance to a public property appearance. Trees along the ROW would deter non-resident wanderers from venturing along the ROW into our backyards, would help us to feel safer and more secure, not just aesthetically pleased. (JFM, MT, JT, MSS, PEM, GPC, GPC, AS, PLNC) RESPONSE: The Board's previous rules required EDCs to conduct vegetation management within their rights of way. As noted in the response to comment 4 above, the amendments adopted herein provide more flexibility to EDCs with regard to vegetation in the border zone of a right of way. An EDC's rights regarding a right of way are set forth in the right of way document, which is usually an easement. For a more detailed discussion of easements, please see the response to comment 31

- above. Accessibility under the wires, and keeping vegetation away from the wires, are both critical to the reliability of the electricity supply. Power outages can be dangerous, and restoration of service delayed, if the utility cannot reach the wires in an emergency such as a fire, downed line or tree collapse. While the Board understands that property owners may prefer to use trees as privacy screens or to deter trespassers, there are many other ways to accomplish these goals, which would not threaten the electric wires.
- 77. COMMENT: The electric company should allow homeowners to screen the stanchions with artificial (vinyl) ivy vegetation made to look as natural as possible. Other utilities do the same with cell phone and micro wave towers. (PLNC) RESPONSE: The Board's rules cover only the management of vegetation to ensure reliable electric service, and do not address esthetic arrangements that might be made with an EDC by a property owner.
- **78. COMMENT:** The proposed regulation to remove anything capable of growth over 36 inches is extreme. While it may make sense in unpopulated areas to remove growth in such a manner to avoid repeated trimmings, this is excessive when lines cross through residential yards. Approximately 50% of our property is subject to the electric company easement. We ask that you please work with all parties involved to promote a vegetation management standard that is reasonable, minimizes environmental impact, and maintains our properties' beauty and value. (SIC) RESPONSE: As noted in the response to comment 3 above, the three foot requirement in the wire zone was in the rules previously and was not changed by these amendments. The amendments adopted herein offer more flexibility for vegetation growth and preservation of compatible vegetation species throughout the ROW. In the wire zone, a three foot cap will remain on woody vegetation but these amendments remove the three foot limit from non-woody plants, including many shrubs and tall grasses. This change was made to address instances where bushes that grow wider than higher were being removed from the wire zone and upsetting the overall natural surroundings of the area. The Board has engaged in an extensive stakeholder process to develop an appropriate and balanced vegetation management policy.
- 79. COMMENT: Please do not cut down our trees. My brothers and I play in the trees and we were just going to build a tree house and now our trees are going to be cut down. Many animals are going to have no homes because they live in our back yard. Global Warming will get worse. I am 10 years old. I am upset because our trees give us a lot of shade and keep our house colder. Please help me help my animals and neighborhood by telling the people to not cut down the trees. (MZ) RESPONSE: The Board's mission has been to ensure the provision of safe, adequate and proper utility service at reasonable rates, while enhancing the quality of life for the citizens of New Jersey and performing these public duties with integrity, responsiveness and efficiency. Throughout the review process for N.J.A.C. 14:5-9, the Board has continually struggled to find a compromise to satisfy all of the stakeholders involved. The Board is working to combat climate change with myriad pro-

grams established and executed by our Office of Clean Energy. Utilities and transmission line owners must comply with our rules and procedures as well as those of the New Jersey Department of Environmental Protection which is responsible for maintaining and protecting New Jersey's wildlife.

Miscellaneous

80. COMMENT: Most of the lattice towers have not been painted or maintained since their installation in the early 1940s. None of the steel stanchion towers installed in the late 1940s and early 1940s have ever been painted. They are currently rusting and flaking lead based paint into the environment. The rules should serve the rights of the property owners and have an access to the towers from the nearest point of entry. (JFM)

RESPONSE: These rules do not address painting of towers by EDCs, but are narrowly focused on vegetation management. Therefore, this comment is beyond the scope of these rules.

81. COMMENT: The regulations need to be much more specific with regard to best management practices for tree protection while trimming. As written, the rules authorize "the VM or his or her designee" to select the most appropriate method among several. In other words, whoever the designee is can do what they want. Nowhere else in the rules does it codify who a designee is so this person can be anyone. This subverts the requirements that there be an "electric utility arborist." (PD)

RESPONSE: The provision quoted by the commenter does not provide a Vegetation Manager's designee with unlimited authority. A designee is bound by the same requirements that apply to the Vegetation Manager.

82. COMMENT: I would like to thank the Board staff for all the work they did on this, particularly Commissioner Fiordaliso who made numerous visits to areas where cutting was in progress. (NJSC)

RESPONSE: The Board appreciates the commenter's support for the efforts of the Board and Commissioner Fiordaliso.

83. COMMENT: Where is the following statement, taken from NERC FAC-003-2, found in the Board's rules?: "Where the line is less than 50 feet off the ground, managers could apply a full wire-border zone prescription." Also, in many cases the lines sag in the middle between the towers so that the middle of the line is less than 50 feet. In such a case, where would the 50 feet be measured? (NJSC) RESPONSE: The statement quoted by the commenter is not found in the Board's rules. As explained in the Federal Standards Statement in the proposal, the application of the Board's special provisions for agriculture will have results that are consistent with this statement from NERC FAC-003-2. All EDCs must comply with minimum clearances set forth in NERC FAC-003-2 pursuant to N.J.A.C. 14:5-9.6(b). The 50 foot measurement is taken at the point of maximum sag, which is usually in the middle portion of the conductor.

- 84. COMMENT: Proposed N.J.A.C. 14:5-9.6(b) says: "At a minimum, each EDC shall meet the requirements for minimum clearances between any transmission line and the closest vegetation [beneath it] which are set forth in the North American Electric Reliability Corporation (NERC) FAC-003, which is incorporated herein by reference and is available at www.nerc.com." So, it does exceed the NERC standard since there is no upper limit on what can be cut. (NJSC)

 RESPONSE: The phrase "at a minimum" indicates that the EDC must always comply with NERC requirements, regardless of whether the Board's rules are stricter than NERC's or not. Board rules cannot authorize an EDC to ignore NERC requirements.
- **85. COMMENT:** The proposal summary states that the proposed requirement that the EDCs apply integrated vegetation management (IVM) in the border zone is consistent with the NERC standard. Where does NERC FAC-003-2 refer to integrated vegetation management (IVM)? (NJSC) **RESPONSE:** IVM is discussed in NERC Standard FAC-003-2 Technical Reference, September 2009, page 15.
- **86. COMMENT:** Permitting easily removable woody crops below a certain height in the Border Zone might be reasonable, conditioned on: I) there being no effect on the accessibility of access routes to transmission towers or other facilities; and ii) the potentially destructive removal of such stocks if needed to permit emergency repairs or construction or if the woody crops later grow in excess of a safe limit. (NJRC)

RESPONSE: These amendments allow all vegetation, including woody crops, in the border zone regardless of height, as long as the vegetation is consistent with the application of IVM to the area. See N.J.A.C. 14:5-9.6(d).

- **87. COMMENT:** As more residents get these notices, the electric companies are going to be involved in numerous lawsuits that are going to bump up their costs of vegetation management, and that's not going to be a positive economic impact. (AS, EF)
 - **RESPONSE:** The Board does not believe that the amendments adopted herein will trigger a large number of lawsuits against EDCs.
- **88. COMMENT:** Use of normative and informative language conflict in N.J.A.C. 14:5-9.6(c)2. Not sure if you are suggesting something or mandating it. Delete N.J.A.C. 14:5-9.6(c)2. (HC, EP)
 - **RESPONSE:** The Board agrees that the phrasing of N.J.A.C. 14:5-9.6(c) is confusing, and has reorganized the provision upon adoption for clarity.
- **89. COMMENT:** The electric company installed a 22+ acre substation with no notice to the township or community. And they're planning to build out the remaining acreage whenever and however they want. Where was the notice to the community? Where is the regulation by the state? Who addresses the loss in farming

rights, the disturbance to area residents, quality of life issues, the loss in property values and business income? Why aren't EDCs held accountable for this? (TNM) **RESPONSE:** These rules do not address construction by EDCs, but are narrowly focused on vegetation management. Therefore, this comment is beyond the scope of these rules.

90. COMMENT: There are increased heating and cooling costs. During spring and summer the trees shade the house, keeping it cooler. During winter the trees deflect winds. (BF)

RESPONSE: The Board is aware that trees can have beneficial effects on heating and cooling costs for houses. However, there are many other ways to ensure efficient and cost-effective home heating and cooling, which do not pose a danger to electric lines.

91. COMMENT: The property directly behind us has many trees surrounding the tower in their easement but also a fence around it. They were not told to remove them nor do they get trimmed. The wires along my road and in my surrounding neighborhood along the roads are overgrown, with vegetation not having been cleared for 8 years. If stringent vegetation management rules are to be applied to the lines that run across my property, they should apply to the local roads. (DA, HWP)

RESPONSE: The rules mandate that each EDC inspect and maintain all of its power lines at least once every four years. This often results in towns being split into sections that are cut at different times. Inclement weather has also at times exacerbated the staggered cutting style employed by some utilities. In addition, EDC activities on each property are governed by an easement that is specific to that property, which may provide for different vegetation management practices than apply on other properties with different easements. Finally, the vegetation management requirements that apply to distribution lines differ from those that apply to transmission lines, producing a very different appearance depending on the classification of the power line as distribution or transmission.

92. COMMENT: The height of the power lines is such that they would most likely be repaired via helicopter. Cutting to a height of three feet is not necessary for such service. I am questioning the size of a helicopter (and driver?) that requires such a broad clearing. (MSS)

RESPONSE: The purpose of the rules is not only to provide emergency access to the wires. The rules are also critical to preventing damage to the wires from overgrown, falling or blowing vegetation, and the resulting widespread power outages. The transmission lines that run through New Jersey serve thousands of electricity customers, both within and outside of New Jersey. The most common cause of power outages is tree contact with electric wires. As demonstrated in the 2003 blackout that started in Ohio with a tree branch falling on a power line, and affected millions of electricity customers, it is very important to maintain vegetation so that it will not come into contact with the electric lines.

93. COMMENT: N.J.A.C. 14:5-9.6(b): The Board is portraying the informative sections of the NERC standard as requirements. NERC references IEEE-516 for vegetation heights. IEEE-516 is a guideline and suggests 3' as a maximum mature height for woody vegetation in the wire zone. There is no factual data presented to support this conclusion. NERC suggests many methods of vegetation control including the later extreme method, but only mandates the adoption of a method and does not mandate the method. There are equally effective methods that are less extreme and would provide the same benefits to the EDC while accommodating the landowner. Maintain 2008 version with reference to NESC, and eliminate any reference to NERC. (EP, HC)

RESPONSE: During the stakeholder process, the Board reviewed the NERC and NESC requirements and determined that it was appropriate to amend the rules to reference NERC. The commenter is correct that the NERC standards allow a certain amount of latitude in designing vegetation management requirements. The Board's decision to adopt the three foot limit in the wire zone is consistent with both IEEE-516 and NERC FAC-003-2.

94. COMMENT: Previously, the NESC was used to determine safe clearance distances between energized conductors and surrounding vegetation. However, NERC sets federally mandated standards that address various aspects of reliability, including minimum vegetation clearance distances for transmissions lines, as well as the clearing distance that is to be achieved at the time that vegetation management work is performed. Considering the role that NERC plays in setting mandatory vegetation management requirements, standardizing the references to NERC standards seems advisable and will work to reduce confusion. (NJRC)

RESPONSE: The Board appreciates the commenter's support for the rules.

95. COMMENT: As maximum vegetative height limits in the wire zone suggested by NERC conflict with those adopted by the BPU as safe for vegetation in the wire zone, there is no longer a need to reference NERC. (EP)

RESPONSE: It is not clear why the commenter believes that the Board's wire zone provisions conflict with those of NERC. The NERC technical reference points to ANSI requirements for vegetation that grows no taller than three feet at maturity.

Federal Standards Statement

Executive Order No. 27 (1994) and N.J.S.A. 52:14B-1 et seq. require State agencies that adopt, readopt or amend State regulations that exceed any Federal standards or requirements to include in the rulemaking document a Federal Standards Analysis. This proposal amends N.J.A.C. 14:5-9, which governs vegetation management under electric transmission lines. The Federal analogue to this is FAC-003, published by the North American Electric Reliability Corporation (NERC). These proposed amendments do not exceed the NERC standard, and in fact they incorporate the NERC standard by reference. In addition, the proposed requirement that we apply integrated vegetation management (IVM) in the border zone is consistent with the NERC standard, which also requires IVM. Although the NERC FAC-003-2 does not have a specific agriculture ex-

emption, it states that "Where the line is less than 50 feet off the ground, managers could apply a full wire-border zone prescription." This requirement, when applied, will have results that are consistent with the special provisions for agriculture in the proposed amendments. Similarly, the Board's wire zone requirement that plants be no more than three feet tall at maturity is also consistent with the NERC FAC-003-2. Therefore, these amendments do not exceed the NERC standard and no Federal Standards Analysis is required.

<u>Full text</u> of the adopted amendments follows (additions indicated in boldface with asterisks *thus*; deletions indicated in brackets *[thus]*):

CHAPTER 5. ELECTRIC SERVICE

SUBCHAPTER 9. ELECTRIC UTILITY LINE VEGETATION MANAGEMENT

14:5-9.2 Definitions

The following words and terms, when used in this subchapter, shall have the following meaning unless the context clearly indicates otherwise. Additional definitions that apply to this chapter can be found at N.J.A.C. 14:3-1.1:

. . .

"Integrated Vegetation Management" or "IVM" means a system of managing plant communities whereby vegetation managers set objectives, identify compatible and incompatible vegetation, consider action thresholds, and evaluate, select and implement the most appropriate vegetation control method(s) to achieve those objectives, based on the methods' environmental impact and anticipated effectiveness, along with site characteristics, security, economics, current land use and other factors.

. . .

14:5-9.6 Transmission line vegetation management

- (a) (b) (No change.)
- (c) Except as provided at (f) below, the following shall apply in the wire zone:
 - An EDC shall *[not]* allow woody plants that *are agricultural crops which* naturally mature *[above three feet tall to grow in the wire zone, except for agricultural crops that naturally mature]* at 12 feet or less;
 - 2. *[For plants not covered by]* *Other than as provided at* (c)1 above, the *EDC shall not allow woody plants that mature above three feet tall to grow in the wire zone, and the* preferred growth shall be grasses or a low-growing, compatible, scrub-shrub plant community to obtain a meadow effect where possible.

Note: This is a courtesy copy of the adoption. The official version will be published in the New Jersey Register on 19 January 2010. Should there be any discrepancies between this courtesy copy and the official version, the official version will govern.

(d) - (I) (No change.)