

Appendix F

GEIS Environmental Issues Not Applicable to Arkansas Nuclear One, Unit 1

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The following table lists those environmental issues listed in the *Generic Environmental Impact Statement for License Renewal of Nuclear Plants (GEIS)* (NRC 1996, 1999) and 10 CFR Part 51, Subpart A, Appendix B, Table B-1 that are not applicable to Arkansas Nuclear One, Unit 1 (ANO-1) because of plant or site characteristics.

ISSUE—10 CFR Part 51, Subpart A, Appendix B, Table B-1	Category	GEIS Sections	Comment
SURFACE WATER QUALITY, HYDROLOGY, AND USE (FOR ALL PLANTS)			
Altered salinity gradients	1	4.2.1.2.2 4.4.2.2	ANO-1 cooling system does not discharge to an estuary. Lake Dardanelle is freshwater.
Water-use conflicts (plants with cooling ponds or cooling towers using makeup water from a small river with low flow)	2	4.3.2.1 4.4.2.1	This issue is related to heat dissipation systems that are not installed at ANO-1.
AQUATIC ECOLOGY (FOR PLANTS WITH COOLING-TOWER-BASED HEAT DISSIPATION SYSTEMS)			
Entrainment of fish and shellfish in early life stages	1	4.3.3	This issue is related to heat dissipation systems that are not installed at ANO-1.
Impingement of fish and shellfish	1	4.3.3	This issue is related to heat dissipation systems that are not installed at ANO-1.
Heat shock	1	4.3.3	This issue is related to heat dissipation systems that are not installed at ANO-1

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ISSUE—10 CFR Part 51, Subpart A, Appendix B, Table B-1	Category	GEIS Sections	Comment
GROUNDWATER USE AND QUALITY			
Groundwater use conflicts (potable and service water, and dewatering; plants that use > 0.068 m ³ /s [100 gpm])	2	4.8.1.1 4.8.2.1	ANO-1 utilizes surface water sources only.
Groundwater-use conflicts (plants using cooling towers withdrawing makeup water from a small river)	2	4.8.1.3 4.4.2.1	This issue is related to heat dissipation systems that are not installed at ANO-1.
Groundwater-use conflicts (Ranney wells)	2	4.8.1.4	ANO-1 does not have or use Ranney wells.
Groundwater quality degradation (Ranney wells)	1	4.8.2.2	ANO-1 does not have or use Ranney wells.
Groundwater quality degradation (saltwater intrusion)	1	4.8.2.1	ANO-1 is located on Lake Dardanelle, a freshwater lake.
Groundwater quality degradation (cooling ponds in salt marshes)	1	4.8.3	This issue is related to a heat dissipation system that is not installed at ANO-1.
Groundwater quality degradation (cooling ponds at inland sites)	2	4.8.3	This issue is related to a heat dissipation system that is not installed at ANO-1.
TERRESTRIAL RESOURCES			
Cooling tower impacts on crops and ornamental vegetation	1	4.3.4	This issue is related to a heat dissipation system that is not installed at ANO-1.
Cooling tower impacts on native plants	1	4.3.5.1	This issue is related to a heat dissipation system that is not installed at ANO-1.
Bird collision with cooling towers	1	4.3.5.2	This issue is related to a heat dissipation system that is not installed at ANO-1.
Cooling pond impacts on terrestrial resources	1	4.4.4	This issue is related to a heat dissipation systems that is not installed at ANO-1.

F.1 References

10 CFR Part 51, Subpart A, Appendix B, Table B-1, "Summary of Findings on NEPA Issues for License Renewal of Nuclear Power Plants."

U.S. Nuclear Regulatory Commission (NRC). 1996. *Generic Environmental Impact Statement for License Renewal of Nuclear Plants* (GEIS). NUREG-1437, Washington, D.C.

U.S. Nuclear Regulatory Commission (NRC). 1999. *Generic Environmental Impact Statement for License Renewal of Nuclear Plants, Main Report, Section 6.3 - Transportation, Table 9.1, Summary of findings on NEPA issues for license renewal of nuclear power plants.* NUREG-1437, Vol. 1, Addendum 1, Washington, D.C.