

# Blue Ridge Environmental Defense League

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## **Groundbreaking Clean Water Act Challenge Goes Before Judge** Update on our Appeal of Nuclear Power Plant Water Permit

The Virginia State Water Control Board's cooling water discharge permit for Dominion Virginia Power North Anna Power Station Units 1 and 2 violates Virginia's State Water Control Law, the federal Clean Water Act, and the Virginia Pollution Discharge Elimination System. On December 18, 2008, the Blue Ridge Environmental Defense League appeared in court and asked the judge to: 1) suspend the permit and 2) require that the State Water Control Board and Virginia DEQ go back to the drawing board and bring the permit into compliance with federal and state laws.

The Board's permit is illegal for several reasons. First, under the US Clean Water Act the Commonwealth of Virginia must protect water quality of the Lake Anna reservoir. Second, the EPA says a study is required before a state may grant a variance from the requirements of the Clean Water Act. However, the state never performed a variance analysis for the lake. Nor did Virginia DEQ include a heat limit for North Anna's permit to discharge pollution into Lake Anna.

Dominion Virginia Power's defense is that Virginia permits are issued under state law, not federal law. The Commonwealth tries to avoid the issues entirely by arguing we lack standing. Both Dominion and the Commonwealth attempted to ignore the case law we presented, which is not surprising. Also not surprising was their emphasis on the technical engineering issues. In fact, Dominion's attorney did very little to make this intelligible, which may be by design. Making the science scarier is a method of getting the judge to defer to the company. The only surprising issue was Dominion's motion to strike, which said that we somehow argued our way out of relying on the CWA. We did not, and to say that we did borders on bad faith. They know full well that Virginia law incorporates federal law which forbids issuance of a state permit that violates the Clean Water Act. So, on December 18<sup>th</sup>, we focused on the following main points:

1. The hot side of Lake Anna drains into the cool side, so it is not isolated;
2. The public has access to the hot side and does makes use of that unrestricted access. Deeds sold to adjacent landowners restricting access are irrelevant. People walk down the hill next to a bridge or walk over to the hot side at Dike 3; there are no "no trespassing signs"; we have photos which show this.
3. Our members and others have been and will continue to be guests to residents on the hot side which the Commonwealth conceded provides standing; and
4. BREDL has members who are Lake Anna residents – so, even if they did not participate in the public hearing, BREDL did, and that is all that matters. A recent Court of Appeals case supports this.

The Virginia Attorney General's opinion upon which the Commonwealth of Virginia relied in its defense is dead wrong. The granting of Federal authority to states to enforce the Clean Water Act and grant National Pollution Discharge and Elimination System Permits (NPDES) comes with strings attached. Authority is delegated with a

*Esse quam videre*

floor below which the state may not go. In its defense of the North Anna NPDES permit, Virginia claimed that its surface water regulations exclude certain waters—in this case the hot side of the lake. The Commonwealth makes state law but the state may not go below the floor established by federal law; they may only make regulations more stringent, not less.

Contrary to what Dominion-Virginia Power says, it does not matter who created the lake. Lake Anna is “waters of the United States” governed by the Clean Water Act. It does not matter that the state has granted the permit many times before. Committing an error more than once does not justify the original error. It does not matter what lakeside residents’ deeds say. What matters is that Virginia is bound to enforce the minimum standards of the Clean Water Act. These standards include the limitation of pollution and heat is a pollutant under the Clean Water Act.

### **Review of the Arguments Presented on December 18, 2008**

#### **I. The Board Improperly Issued Permit No. VA0052451 Based Upon An Erroneous Determination That The “Hot Side” of Lake Anna Is Exempt From Regulation.**

Congress enacted the Clean Water Act to restore and maintain the chemical, physical, and biological integrity of the Nation’s waters by reducing, and eventually eliminating, the discharge of pollutants into these waters.<sup>1</sup> In the CWA, Congress established the National Pollution Discharge Elimination System (NPDES) program, which issues permits that allow the discharge of pollutants as long as they comply with standards set forth in the CWA.<sup>2</sup> The CWA allows states to operate their own programs under the NPDES, provided the states adhere to standards at least as stringent as the federal requirements.<sup>3</sup> Virginia has such a program – the Virginia Pollution Discharge Elimination System (VPDES), which was approved by the EPA Administrator in 1975.<sup>4</sup> VPDES permits must contain limitations necessary to meet water quality standards developed by the state.<sup>5</sup> Once water quality standards have been set, permit limitations must be established to ensure compliance, regardless of the availability or effectiveness of treatment technologies.<sup>6</sup>

The Virginia State Water Control Board (Board) is charged with administering Virginia’s state VPDES program under the CWA’s NPDES program.<sup>7</sup> . Essentially, the Commonwealth of Virginia is running a Federal program – the NPDES – locally, and is not creating its own program. Accordingly, the Board must follow the CWA to ensure

<sup>1</sup> Natural Res. Def. Council, Inc. v. EPA, 16 F.3d 1395, 1399 (4th Cir. 1993) (citing 33 U.S.C. § 1251(a)).

<sup>2</sup> 33 U.S.C. § 1342(a)(1) (2007)

<sup>3</sup> See 33 U.S.C. § 1342(b) & (c)(1) (2007); 40 C.F.R. § 122.1(a)(2) (2007); see also State Water Control Bd. v. Smithfield, 261 Va. 209, 212, 542 S.E.2d 766, 768 (2001).

<sup>4</sup> Id. at 212, 542 S.E.2d at 768; 40 Fed. Reg. 20,129 (May 8, 1975) (approving Virginia’s NPDES program).

<sup>5</sup> Id. (citing 33 U.S.C. 1313)

<sup>6</sup> Westvaco, 899 F.2d at 1384

<sup>7</sup> See Va. Code Ann. § 62.1-44.15 (2008)

that all VPDES permits measure up to the standards articulated by Congress in the CWA. **The permit issued in this case represents an abject failure to uphold federal water quality standards.** By refusing to limit heat discharge into the “hot side” of Lake Anna, the Board failed to regulate 3,400 acres of “waters of the United States” protected under the CWA.

The CWA unequivocally prohibits the discharge of heat into waters of the United States except by permit issued by either the EPA or the states. The SWCB committed an error in determining that the “hot side” of Lake Anna did not fall within its regulatory jurisdiction. The CWA is a sweeping mandate. The CWA prohibits the discharge of any pollutant into “navigable waters” except in compliance with its provisions.<sup>8</sup> The CWA defines “navigable waters” as “waters of the United States” and classifies heat as a pollutant subject to regulation.<sup>9</sup> The VPDES program must comply with the mandates of the CWA.<sup>10</sup> In other words, the Board cannot allow any “waters of the United States” to go unregulated under the CWA. Congress intended that the term “waters of the United States” have the broadest possible interpretation.<sup>11</sup> According to the EPA and the Army Corps of Engineers, “waters of the United States” means:<sup>12</sup>

- a) All waters which are currently used, were used in the past, or may be susceptible to use in interstate or foreign commerce, including all waters which are subject to the ebb and flow of the tide;
- b) All interstate waters, including interstate “wetlands;”
- c) All other waters such as intrastate lakes, rivers, streams (including intermittent streams), mudflats, sandflats, “wetlands,” sloughs, prairie potholes, wet meadows, playa lakes, or natural ponds the use, degradation, or destruction of which would affect or could affect interstate or foreign commerce including any such waters
  - 1) Which are or could be used by interstate or foreign travelers for recreational or other purposes;
  - 2) From which fish or shellfish are or could be taken and sold in interstate or foreign commerce; or
  - 3) Which are used or could be used for industrial purposes by industries in interstate commerce;
- d) All impoundments of waters otherwise defined as waters of the United States under this definition;
- e) Tributaries of waters identified in paragraphs (a) through (d) of this definition;
- f) The territorial sea; and
- g) “Wetlands” adjacent to waters (other than waters that are themselves wetlands) identified in paragraphs (a) through (f) of this definition.

Cooling ponds which also meet these criteria are waters of the United States.<sup>13</sup> Although “waste treatment systems” are excluded from the definition of “waters of the

<sup>8</sup> 33 U.S.C. § 1311(a), 1362(12) (2007).

<sup>9</sup> Id. § 1362(6)-(7).

<sup>10</sup> See *State Water Control Bd. v. Smithfield Foods, Inc.*, 261 Va. 209, 212, 216, 542 S.E.2d 766, 768, 770 (2001) (quoting 40 C.F.R. § 122.1(a)(2)).

<sup>11</sup> *Ohio Valley Envtl. Coal. v. U.S. Army Corps of Eng'rs*, No. 3:05-0784, 2007 WL 2200686, at \*11 (S.D.W. Va. Jun. 13, 2007) (quoting S. Conf. Rep. No. 92-1236, at 144 (1972), as reprinted in 1972 U.S.C.C.A.N. 3776, 3822).

<sup>12</sup> 33 C.F.R. § 328.3(a) (2007); 40 C.F.R. § 122.2 (2008)

<sup>13</sup> as defined in 40 CFR 423.11(m)

United States,” cooling ponds do not enjoy this exclusion.<sup>14</sup> Interpretation of this regulation is a matter of law.<sup>15</sup> The hot side is not a waste treatment system, but rather a cooling lake. The Board improperly broadened the “waste treatment system” exception to exclude the hot side of Lake Anna from regulation.

Congress stated that the use of rivers, lakes, streams, or the ocean as waste treatment systems was unacceptable.<sup>16</sup> **The “hot side” of Lake Anna, which was created by the impoundment of the North Anna River and is fed by ten tributaries, cannot fall within the waste treatment system exclusion.** The Board’s broad interpretation of the “waste treatment system” exclusion has been rejected by the courts that have addressed the issue.

Despite the failure of the Commonwealth to require “cooling ponds” to be regulated under the VPDES, the Board committed a bigger error by glossing over the fact that the “hot side” is a cooling lake which is within EPA’s and the Board’s jurisdiction. The EPA stated why “cooling ponds”<sup>17</sup> and “cooling lakes”<sup>18</sup> must be regulated under the CWA.<sup>19</sup> *Cooling ponds* meet the criteria for “waters of the United States” if they are “. . . for example, those which are used for fishing or other recreational purposes by interstate travelers . . .”<sup>20</sup> And, *cooling lakes* are always “waters of the United States”<sup>21</sup> subject to regulation under the CWA and VPDES.

The “hot side” of Lake Anna is a “cooling lake” subject to CWA and VPDES regulatory permitting. Lake Anna – both the “hot side” and “cool side” – was created by impounding the North Anna River, a “water of the United States.” Thus, it is an impoundment that impedes the flow of a navigable stream. Water from the “cool side” of Lake Anna flows through the North Anna Power Station to remove heat, and the heated water byproduct is subsequently released into the “hot side” of Lake Anna. Water then flows through the “hot side” until it is discharged back into the “cool side” at Outfall 001, when the process repeats. Since the “hot side” meets all elements of the definition of “cooling lake,” it must be so classified and regulated under the CWA and VPDES

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<sup>14</sup> The referenced section that supposedly defines “cooling ponds” does not exist in the current Code of Federal Regulations. However, at the time the original definition of “waters of the United States” was promulgated, “cooling ponds” were defined as “any manmade water impoundment which does not impede the flow of a navigable stream and which is used to remove heat from condenser water . . .” 40 C.F.R. § 423.11(m) (1979).

<sup>15</sup> See *Christensen v. Harris County*, 529 U.S. 576, 588 (2000).

<sup>16</sup> *Ohio Valley*, 2007 WL 2200686, at \*11 (quoting S. Rep. No. 92-414, at 7 (1971), as reprinted in 1971 U.S.C.C.A.N. 3668, 3674).

<sup>17</sup> A cooling pond is defined as “any manmade water impoundment *which does not impede the flow of a navigable stream*” used to remove “heat from heated condenser water prior to returning the recirculated cooling water to the main condenser.” 40 C.F.R. 423.11(m) (1979).

<sup>18</sup> A “cooling lake” is defined as “any manmade water impoundment which impedes the flow of a navigable stream” used to remove “heat from heated condenser water prior to recirculating the water to the main condenser.” *Id.* § 423.11(n).

<sup>19</sup> See 44 Fed. Reg 32,854, 32,858 (Jun. 7, 1979)

<sup>20</sup> *Id.*

<sup>21</sup> This term is used interchangeably with “navigable waters” throughout the CWA and its interpretive regulations.

program. By following the Virginia Attorney General's erroneous interpretation, the Board failed to regulate 3,400 acres of waters of the United States protected under the CWA. Second, the "hot side" "harbors fish populations which invite recreational uses. There is a minimum of 13 public access areas for fishing on the "hot side" of Lake Anna.

On its website, Dominion states that the "Lake Anna reservoir and the Waste Heat Treatment Facility have become a popular outdoor recreational area, whose shoreline is dotted with homes, cabins."<sup>22</sup> Owners of properties that abut the "hot side" of Lake Anna have deeds which demonstrate the Dominion contemplated such recreational uses. These deeds allow the owners to construct piers and other recreational or protective structures. **The Board simply ignored these recreational uses during the most recent permitting.** The Board failed to account for the fact that Dominion is not the only user of the "hot side" of Lake Anna. Rather, thousands of homeowners and recreational visitors use the "hot side" and must be protected under the CWA. Second, as discussed above, the "hot side" cannot be legally classified as a "treatment facility." **Dominion simply cannot be permitted to have it both ways. It cannot sell land and allow recreational uses on the "hot side" while simultaneously claiming that it is a "waste treatment" cesspool that is beyond regulation.**

Since the "hot side" is a "cooling lake" subject to CWA and VPDES jurisdiction, it was error to issue Permit No. VA0052451 without limits and regulation on thermal pollution discharges into the "hot side."

**II. States must develop water quality standards pursuant to section 303 of the CWA. These standards consist of: (i) a designated "use" for the subject waters and (ii) "water quality criteria" specifying the maximum levels of various pollutants to comport with the designated uses.<sup>23</sup>**

Under the Clean Water Act, the State Water Control Board sets Virginia's Water Quality Standards.<sup>24</sup> According to the Fourth Circuit Court of Appeals, "once water qualities have been set, NPDES permit limitations must be established to ensure compliance, regardless of the availability or effectiveness of treatment technologies."<sup>25</sup> Since the "hot side" of Lake Anna is a "water of the United States" subject to and requiring regulation under the CWA and VPDES program, it must meet standards for thermal pollution.

According to the permit's Fact Sheet, Lake Anna is part of the York River Basin and is designated a Class III water under Virginia's water quality standards regulations. Under this classification, the upper limit on temperature is 32 degrees Celsius, or 89.6 degrees Fahrenheit.<sup>26</sup> The data collected by Dominion and summarized by the Board unequivocally demonstrates that both hourly and mean temperatures in the "hot side" of

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<sup>22</sup> <http://www.dom.com/about/stations/nuclear/northanna/index.jsp> (last visited Oct. 15, 2008)

<sup>23</sup> 40 C.F.R. §§ 131.2-3 (2007).

<sup>24</sup> See 9 VAC 25-260-50, -60-90 (2007).

<sup>25</sup> *Westvaco Corp. v. EPA*, 899 F.2d 1383, 1384 (4th Cir. 1990) (emphasis added).

<sup>26</sup> 9 VAC 25-260-50 (2007).

Lake Anna routinely exceed this 32-degree Celsius threshold from May through October. Dominion and the Board also concede that these temperature violations are due to the discharge of heat from the North Anna Power Station into the “hot side.”<sup>27</sup> **Therefore, the “hot side” is in continued violation of the water quality standards and the CWA.** Since it has not applied for the variance required by the CWA at the Outfall 101 discharge point, the Board committed an error by issuing a permit that allows for continued derogation of the Commonwealth’s and the CWA’s water quality standards.

Section 316(a) of the CWA allows owners of thermal-discharging point sources (i.e. the North Anna Power Station) to apply for a variance from any effluent limitation proposed for the control of the thermal component of any discharge if it is shown that the current effluent limitation is more stringent than necessary to assure the protection and propagation of a balanced indigenous population of shellfish, fish and wildlife in the receiving waters.<sup>28</sup> Before such a variance can be granted, the owner would need to submit a 316(a) demonstration that would show the superfluity of the more stringent effluent limitations.<sup>29</sup> Dominion has not done this and cannot be permitted to exceed the effluent limitations imposed by the Virginia water quality standards.

**Without a § 316(a) variance at Outfall 101, Dominion simply cannot be allowed to continually violate water quality standards in “waters of the United States.”** However, the Board approved a permit that will virtually assure the continued defiance of Virginia’s water quality standards in the “hot side” of Lake Anna. In so doing, it acted in violation of its clear obligation under the CWA. Thus, the failure to insist on a § 316(a) demonstration before issuing permit number VA0052451 is reversible legal error.<sup>30</sup>

Dominion and the Board have attempted to completely side-step the applicability of the CWA and VPDES program at the Outfall 101 discharge into the “hot side” of Lake Anna. Because the “hot side” of Lake Anna is a “cooling lake” that is a “water of the United States,” it is subject to regulation. Thus, either the “hot side” must be held to the water quality standards established pursuant to the CWA or Dominion must show why these standards should not apply.

12/29/08

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*The Blue Ridge Environmental Defense League and its chapter the People’s Alliance for Clean Energy are appealing the permit in the Commonwealth of Virginia Circuit Court. Our Petition for Appeal was filed in Circuit Court for the City of Richmond on December 28, 2007 pursuant to Virginia Code §§ 62.1-44.29 and 2.2-4026 and Rule 2A:4 of the Rules of the Supreme Court of Virginia. We are seeking judicial review of the October 29<sup>th</sup> decision by the Virginia State Water Control Board to re-issue Virginia Pollution Discharge Elimination System Permit No. VA0052451.*

<sup>27</sup> See R. at 2929 (stating that the North Anna Power Station routinely heats water by 14 degrees Celsius).

<sup>28</sup> 33 U.S.C. § 1326(a) (2007)

<sup>29</sup> 40 C.F.R. § 125.72 (2007).

<sup>30</sup> See *Envtl. Def. Fund v. Va. State Water Control Bd.*, 15 Va. App. 271, 278, 422 S.E.2d 608, 612 (1992) (finding that an agency decision must be set aside if it failed to observe required procedures).