WEST VIRGINIA
SECRETARY OF STATE
Betty Ireland
ADMINISTRATIVE LAW DIVISION

Form #1

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OFFICE WEST VIRGINIA
SECRETARY OF STATE

NOTICE OF A PUBLIC HEARING ON A PROPOSED RULE

AGENCY: WV Department of Environmental Protection, DWWM TITLE NUMBER: 47

RULE TYPE: Legislative CITE AUTHORITY: W. Va. Code § 22-11-4(a)(16); § 22-11-7b

AMENDMENT TO AN EXISTING RULE: YES [X] NO [ ]

IF YES, SERIES NUMBER OF RULE BEING AMENDED: 2

TITLE OF RULE BEING AMENDED: Requirements Governing Water Quality Standards

IF NO, SERIES NUMBER OF RULE BEING PROPOSED: _____

TITLE OF RULE BEING PROPOSED: _____

DATE OF PUBLIC HEARING: July 16, 2007 TIME: 6:00 p.m.

LOCATION OF PUBLIC HEARING: Coopers Rock Training Room
WV Department of Environmental Protection
601 57th Street SE
Charleston, WV 25304

COMMENTS LIMITED TO: ORAL [ ] WRITTEN [ ] BOTH [X]

DATE WRITTEN COMMENT PERIOD ENDS: July 17, 2007 TIME: 5:00 p.m.

WRITTEN COMMENTS MAY BE MAILED TO:
Scott G. Mandirola, Assistant Director
Water Quality Standards Program
WV Department of Environmental Protection
601 57th Street SE
Charleston, WV 25304

The Department requests that persons wishing to make comments at the hearing make an effort to submit written comments in order to facilitate the review of these comments.

The issues to be heard shall be limited to the proposed rule.

ATTACH A **BRIEF** SUMMARY OF YOUR PROPOSAL

Authorized Signature

DEPARTMENT OF ENVIRONMENTAL PROTECTION

BRIEFING DOCUMENT

Rule Title:

"Requirements Governing Water Quality Standards," 47CSR2

A. AUTHORITY:

W.Va. Code §22-11-4(a)(16); 22-11-7b

B. SUMMARY OF RULE:

This rule establishes requirements governing surface water quality standards for the waters of the State and establishes standards of purity and quality consistent with public health and the enjoyment thereof, the protection of animal, aquatic and plant life and the expansion of employment opportunities, agricultural expansion and a foundation for healthy industrial development.

C. STATEMENT OF CIRCUMSTANCES WHICH REQUIRE RULE:

DEP is proposing several changes to the rule, as follows:

Several clerical corrections and updates have been made. These include the replacing of "streams or stream segments" with "waters" in the definition of "Trout waters". This is to assure that lakes are not excluded from the definition. In numerous places throughout the rule the term "water body" is replaced with "water" or "waters" in an effort to be more consistent with use of the term "waters" in 47-2-1 General Scope section of the rule. Two exceptions listed in subsection 7.2.d were removed because they had expired. Stony River, section 7.2.d.6.1, expired December 31, 1998 and Simmons Creek, section 7.2.d.20.3, expired May 30, 1998. In section 8.4, a correction was made to reference the appropriate paragraphs, "6.1.b.1 through 6.1.b.6". References to "Board" or "rule making authority" have been changed to "Secretary" to reflect current authority. In section 7.2.d.9, the Blackwater River is referred to as a trout stream, which is repetitive since it is listed on the trout list in Appendix A. Therefore, section 7.2.d.9 has been amended.

Section 7.2.d.14. The Categories A and E exclusions on the tributaries of the Youghiogheny River in West Virginia which flow into Maryland have been deleted. A documentation search was done and no justification was found for this exclusion; therefore, it is being removed.

The term "not to exceed" in Table 1 of Appendix E, is being removed from numerous places where it conflicts with aquatic life footnotes 1 and 2. The phrase "Concentration not to be exceeded unless otherwise noted" is being added to footnotes 3 and 4 to assure that the intent of the human health criteria is not changed. Also in Appendix E in section 8.13, the term "Primary Contact Recreation" is being replaced with "Water Contact Recreation" to be consistent with Category C designation as outlined in section 6.4 of the rule.

Nutrients criteria, including phosphorous and chlorophyll-a, for both warm and cool water lakes, have been added to the rule based on a consensus reached by the Nutrients Criteria Committee. A definition of "Cool water lakes" is being added to 47-2-2 Definitions. Section 8.3 has been added to the rule and states the criteria for both warm and cool water lakes with summer residence times greater than 14 days. It was also suggested by the Nutrients Criteria Committee that a representative list of cool water lakes be included in the rule. This representative list consists of lakes on the Appendix A list of trout waters and lakes which DNR is managing as cool water fisheries, again with summer residence times greater than 14 days. The representative list has been added to the rule as Appendix F.

EPA's approval of the aluminum language in 46CSR1 has allowed DEP to begin assessing warmwater streams using the 750 µg/l criteria (e.g. 2006 draft Section 303(d) List.) New permits with discharges into warmwater streams are also being issued with limits protective of the 750 µg/l value. Currently the criterion in warmwater is not to exceed 750 µg/l dissolved aluminum as both a chronic and acute value. For trout waters, the criterion is not to exceed 87 µg/l dissolved aluminum – as a chronic value and 750 µg/l dissolved aluminum – as an acute value.

Pursuant to the recent EPA finding that 750 µg/l dissolved aluminum is protective of warmwater aquatic life, DEP proposes to remove the language from 47CSR2 which effectively only suspends the warmwater chronic aluminum value of 87 µg/l until July 4, 2007. This action is in large part based on the EPA finding "[t]he criteria are protective of the aquatic life regardless of whether they apply temporarily or permanently." Essentially EPA has determined that the revised criterion is protective of West Virginia warmwater aquatic life. Since this is the case, Appendix E footnote "[e]" is being removed and the dissolved aluminum for warmwater chronic criterion of $87xCF^5$ is being replaced with $750xCF^5$ in Appendix E, Table 1, section 8.1.

The fluoride standard for Category D was changed to Category D1 to better reflect the Environmental Quality Board's intentions as per the 1986 Rationale for revisions to the rule which states "The one comment received, pointed out that criteria for irrigation water has been established at 2.0 mg/l. The Board found this to be correct and agreed to add the additional criteria for the D1 Category use."

The rule also extends the exceptions for Harmon Creek from July 1, 2007 to July 1, 2009 to allow Weirton Steel Corporation (now Mittal Corporation) to continue to operate under to existing variance while it is determined whether the requested "modified use designation" is possible under the provisions of the rule. Additional information is being examined to determine the extent of the required variance and/or use modification needed and its effect on the fish population. Extending the date to 2009 would allow this information to be reviewed and keep the current limits in place.

The rule also extends the exception on the Ward Hollow of Davis Creek variance from July 1, 2008 to July 1, 2010. The exception was approved by EPA in September 2006 and the status of the site and the discharge has not changed since that time. The variance will remain in effect until the next triennial review and at that time will be reevaluated.

A number of changes in Appendix E, Table 1 of the rule have been made to remain consistent with the original rationale used or to update to currently accepted science. The arsenic footnote [b], is removed because the value is not based on a cancer risk of 10^6. The human health criteria of 50ug/l arsenic is based on the drinking water MCL and EPA, on February 22, 2002, promulgated a new EPA MCL of 10ug/l. To remain consistent with the rationale of using the MCL for arsenic, the value has been changed to 10ug/l. Dissolved trivalent arsenic chronic and acute values, in Appendix E, Table 1, have been updated from 360ug/l and 190ug/l to 340ug/l and 150ug/ based on EPA updates. The units (ug/l) were added to the dissolved trivalent arsenic column in Appendix E, Table 1 to clarify the units. The correction factor (CF) is removed for dissolved trivalent arsenic and chromium, dissolved hexavalent because the EPA values are based on dissolved criteria not total; therefore they do not need to be corrected. The rule updates the benzene criterion for Human Health Category C from 71 ug/l to the new EPA value of 51 ug/l. The benzene value that controls the permit limits is the Human Health Category A criterion of 0.66ug/l, which remains unchanged. The selenium criterion for Category A is changed from 10ug/l to 50ug/l to make it consistent with the MCL for Drinking Water. The rule also adds a footnote to the phthalate esters group that clarifies which phthalates are included in the total.

Appendix E, Table 1 of the rule contained two groups of compounds, the halomethanes and the polynuclear aromatic hydrocarbons (PAH), that have been removed and replaced with the individual compounds that make up each group. The four individual halomethanes listed in the rule are based on the list in the Quality Criteria for Water: 1986. EPA 440/5-86-001 (Gold Book). The polynuclear aromatic hydrocarbons (PAH) group is comprised of 17 PAH's listed in the EPA recommended criteria list. One of the compounds is in the current rule and four of the compounds have no EPA recommended limits; therefore 12 compounds are being added. All individual compound limits for both halomethanes and polynuclear aromatic hydrocarbons (PAH) are based on EPA's Current National Recommended Water Quality Criteria.

The formulas in Appendix E for cadmium, copper, nickel, silver, and zinc, which are used to calculate aquatic life limits, are being updated to reflect those recommended by EPA in 2002.

The Fecal Coliform exception for the non-recreational season of November–April on the Ohio River has been changed to include Category A, to be consistent with Ohio River Valley Water Sanitation Commission (ORSANCO). Based on the Rationale document from the Environmental Quality Board (EQB) in 1986, the intent was to replace existing language with that of ORSANCO. By not including the X in Category A column of the exception the Category A statewide limits apply.

The rule also includes a Use Removal of Category A and D1 designations on Pats Branch. Subsection 7.2.d.34.1 states that "Pats Branch from its confluence with the Guyandotte River to a point 1000 feet upstream shall not have Water Use Category A and Category D1 designation." For more information on this addition see attached Use Removal Request Information Sheet.

Finally, the trout water list (in Appendix A of the rule) has been edited to reflect the currently known trout waters of the State, as per the definition of "trout waters" in section 2.18 of 47CSR2. This list is intended to be a representative list and is not meant to exclude any waters that meet the definition

of "trout waters." "Trout waters" are defined as "waters which sustain year-round trout populations. Excluded are those waters which receive annual stockings of trout but which do not support year-round trout populations."

The list was prepared with the assistance of the West Virginia Division of Natural Resources (DNR), Coldwater Management Section, the State agency with recognized expertise on this subject. The list generally is composed of streams documented as having natural trout reproduction and streams that sustain trout year round, but do not have documented natural reproduction.

The DNR submitted a list of waters as defined in Section 2.18 of 47CSR2 to DEP. This list consisted of streams supporting reproducing populations of rainbow, brown and native brook trout. Additionally, the list contained streams stocked with fingerling trout, primarily browns, that sustain year-round trout populations. The list does not include streams that are stocked with trout solely on a "put and take" basis, but do not support year-round trout populations.

The DNR considers reproducing rainbow, brown, and native brook trout populations as year-round residents because of their lifecycle. Natural reproduction is verified when multiple year classes, including young-of-the-year, are collected during population surveys. However, some streams, particularly native brook trout streams, are considered naturally reproducing if only adults or young-of-the-year are collected in the sample. This is based on knowledge of the stream and its location, and stocking practices in the area.

Fingerling brown trout are stocked into streams that are known or expected to support trout year-round because of the presence of suitable habitat and temperature. After a stream has been stocked with fingerlings for several years, an effort is made to conduct fish population surveys to determine if the stockings are successful in maintaining a year-round population. Again, if multiple year classes are found during sampling, or if reproduction is occurring, but is not at a level to sustain a viable fishery, then the fingerling stockings are continued. In some cases, a stream is considered capable of sustaining a year-round trout population if only one year-class is collected during sampling, prior to that year's scheduled fingerling stocking. A stream may also be considered capable of sustaining a year-round trout population if one year-class is collected during the critical low water, high temperature months of July, August, or September.

Additionally, sections 4.1.a and 6.1.b of 47CSR2 require the protection of existing uses. "Existing uses" are "those uses actually attained in a water body on or after November 28, 1975." The list therefore includes waters where sustained year-round trout populations, or trout reproduction, has been documented since November 28, 1975, regardless of their current condition.

Six (6) waters that were previously listed have been omitted from the current trout list because they were originally listed in error, and do not meet the definition of a "trout waters." There were 337 trout waters added to the list in the current rule because they meet the definition of "trout waters" as described above.

D. FEDERAL COUNTERPART REGULATIONS - INCORPORATION BY REFERENCE/DETERMINATION OF STRINGENCY:

Although the State is required by the federal Clean Water Act to adopt water quality standards, there is no direct federal counterpart regulation. Therefore, no determination of stringency is required.

E. CONSTITUTIONAL TAKINGS DETERMINATION:

In accordance with §22-1A-1 and 3(c), the Secretary has determined that this rule will not result in taking of private property within the meaning of the Constitutions of West Virginia and the United States of America.

F. CONSULTATION WITH THE ENVIRONMENTAL PROTECTION ADVISORY COUNCIL:

At its meetings on May 21, 2007 and May 30, 2007, the Environmental Protection Advisory Council discussed this rule. (See attached minutes for Council's discussion.)

west virginia department of environmental protection

Division of Water & Waste Management
601 57th Street SE Charleston, WV 25304
304-926-0499 Fax: 304-926-0496

Joe Manchin III, Governor
Stephanie R. Timmermeyer, Cabinet Secretary
www.wvdep.org

USE REMOVAL REQUEST INFORMATION SHEET

1. APPLICANT

Huntington Alloys Corporation (HAC)
3200 Riverside Drive
Huntington, WV 25705

2. NAME AND LOCATION OF THE STREAM

The stream for which the reclassification of a designated use is requested is Pats Branch from its confluence with the Guyandotte River to a point 1000 feet upstream. Pats Branch (WVOG-0.5), an intermittent stream, originates at the Dietz Hollow Landfill located in Huntington, Cabell County, West Virginia and flows southwest approximately 0.8 stream miles through a residential area. Pats Branch then enters a culvert under a CSX Railroad track, resurfaces, and within a few yards enters a culvert that flows beneath the HAC facility. The reclassification that is requested begins at the culvert that carries Pats Branch beneath the HAC facility and ends at its confluence with the Guyandotte River. HAC operates under a National Pollutant Discharge Elimination System (NPDES) storm water permit, number WV0114618, that discharges into the Pats Branch stream segment for which a reclassification is requested.

3. USE DESIGNATIONS OF THE STREAM

The designated uses applicable to the stream subject to the application are Category A, Public Water Supply; Category B1, Warm Water Fishery; Category C, Water Contact Recreation and Category D, Agriculture and Wildlife. The existing uses that are currently being attained applicable to the stream segment are Category B1, Warm Water Fishery and Subcategory D3, Wildlife.

4. PROPOSED CHANGE BEING REQUESTED FOR THE STREAM

HAC is requesting a determination that the Category A (public water supply) and Subcategory D1 (agriculture irrigation water) uses are not attainable uses nor existing ones and should therefore be removed from the segment of Pats Branch beginning at the point where it flows beneath its facility to its confluence with the Guyandotte River.

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5. SUPPORTIVE DOCUMENTATION DEMONSTRATING THE REVISION IS APPROPRIATE

The stream segment for which the use removal is requested begins at a culvert that carries Pats Branch beneath the HAC facility and ends at its confluence with the Guyandotte River. The culvert beneath the HAC facility consists of a six-foot diameter concrete pipe 600 feet in length. At the end of this culvert, Pats Branch "daylights" for approximately 50 feet before entering another culvert. The second culvert carries Pats Branch approximately 350 feet beneath the flood wall pumping station and Guyan River Road until it is discharged into the Guyandotte River via a submerged pipe. The only location where above-ground contact with the Pats Branch stream segment could occur is located on HAC property within a fenced area that is not accessible to the public, making the use of Pats Branch for drinking water highly unlikely. Based upon the review of construction drawings and the results of a physical survey of the stream segment, no water intake pipes or other evidence reveals that the stream segment is used as a drinking water source or a source of irrigation water. In addition, there are no homes or agricultural areas located adjacent to the stream segment. The physical survey was expanded to include the Guyandotte River stream banks which are located downstream of Pats Branch, and it found no water intake pipes or other evidence that the downstream segment of the Guyandotte River is used as a drinking water or agricultural water source. This was also supported by a database search of EPA's Safe Drinking Water Information System (SDWIS), interviews with personnel at the Cabell-Huntington Health Department as well as information obtained from the local public water supplier, West Virginia American Water Company (WVAWC). A survey was also conducted to determine the presence of drinking water wells in the vicinity of Pats Branch in order to determine the potential for a hydrogeologic connection between the wells and the water of Pats Branch. The search did not identify any groundwater wells within one mile of the downstream segment, making any connection between local wells and the segment of Pats Branch improbable

Despite application of legally-required best management practices at the HAC facility, stormwater outlet 001 at times contains fluoride in excess of the Category A and Subcategory D1 water quality criteria. While it has been documented that neither Category A nor the Subcategory D1 uses are existing in this stream segment, stream monitoring has further demonstrated that there is no measurable impact to the downstream waters (Guyandotte River and Ohio River) by Pats Branch.

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Future attainment of the public water supply use (Category A), as well as the agriculture irrigation water uses, is not feasible in this segment of Pats Branch due to hydrologic modifications that preclude the attainment of the use. The culverts in the application area were constructed 40 or more years ago as a diversion for industrial expansion and go under the City of Huntington floodwall. Culverts in the segment are sub-grade pipes that lack any water intake pipes, and the introduction of water withdrawal pipes into the application area would be impractical. Due to the location of the City of Huntington floodwall, it is not feasible to restore Pats Branch to its original condition. Pats Branch was diverted approximately 3,000 feet in the 1930's as part of the City of Huntington flood wall construction. An examination of alternative control strategies revealed no feasible alternatives for controlling the discharge beyond those in place.

6. **IMPLICATIONS OF THE REVISION FOR THE COMMUNITY AND OTHER USERS OF THE WATERS**

Based upon the results of a physical survey of the stream segment, no water intake pipes or other evidence reveals that the stream segment is used as a drinking water source or a source of irrigation water. From the information provided, this segment of Pats Branch is not now and will not be a suitable public water supply or agriculture water supply given its limited flow, the absence of residences and agricultural areas, and the presence nearby of several large rivers that serve as alternative water sources.

THE APPLICATION AND OTHER SUPPORTING DOCUMENTATION ARE ON FILE AT WVDEP OFFICE AT 601 57TH STREET, SE CHARLESTON, WV. ANYONE WISHING TO REVIEW THE FILE MAY CONTACT WVDEP AT (304)926-0499 EXTENSION 1033.

West Virginia Department of Environmental Protection

ADVISORY COUNCIL MEETING MINUTES

Monday – May 21, 2007
1:00 p.m. – 3:00 p.m.
601 57th Street, SE, Charleston, WV
West Virginia Room – 3rd Floor

ATTENDEES:

Advisory Council Members:

Rick Roberts
Karen Price
Bill Raney
Lisa Dooley
Larry Harris
Jackie Hallinan

DEP:

Randy Huffman, Deputy Cabinet Secretary/Director –Division of Mining & Reclamation
Karen G. Watson, Assistant General Counsel
Ken Ellison, Director - Division of Land Restoration
Lisa McClung, Director – Division of Water and Waste Management
John Benedict, Director – Division of Air Quality
Lewis Halstead, DMR
Ken Politan, DMR
Charlie Sturey, DMR
Jessica Greathouse, Chief Communication Officer – WVDEP – Public Information Office
James Martin, Chief, Office of Oil & Gas
Carroll Cather, DWWM
Pam Nixon, Advocate
David L. Vande Linde, Blasting
Jim Mason, DAQ
Mike Zeto, DWWM – EE
Matt Sweeney, DWWM

VISITORS:

Ann Bradley, Spilman Thomas & Battle
Charlie Burd, IOGA
Don Garvin, WVEC
Dave Yaussy, Robinson & McElwee

Randy Huffman, Deputy Cabinet Secretary - West Virginia Department of Environmental Protection called the meeting to order at 1:00 p.m.

Karen Price stated that the Council did not have enough time to review the rules, therefore was requesting to have another meeting to discuss further and the remaining of the Council agreed. The Council will meet May 30, 2007 at 10:00 a.m. – WVDEP – 601 57th Street, SE – Charleston, WV 25304 – West Virginia Room (3001).

Deputy Cabinet Secretary Huffman apologized for the short time period regarding the rules getting out to Council. Randy Huffman then introduced Karen Watson, Assistant General Counsel to discuss with the Council the DEP bills that had passed in the 2007 Regular Legislative Session:

- SB 337 – Establishing New Greenhouse Gas Inventory Program
  Approved by Governor – April 4, 2007

- SB 425 – Relating to Water Pollution Control Revolving Fund
  Approved by Governor – April 4, 2007

- SB 465 – Establishing Dam Safety Rehabilitation Revolving Fund
  Approved by Governor – March 27, 2007

- SB 490 – Relating to Underground Storage Tank Insurance Fund
  Approved by Governor – April 3, 2007

- SB 524 – Requiring Proof of Lawful Disposal of Solid Waste
  Approved by Governor – March 28, 2007

- SB 588 – Removing Tax Expiration Date on Manufacturing or Production of Synthetic Fuel From Coal
  Approved by Governor – April 4, 2007

Karen Watson then gave a brief summary of each proposed rule for the 2008 legislative session:

Air Quality

45CSR6 – Control of Air Pollution from Combustion of Refuse

SUMMARY

Proposed Rule 6 is now a basic open burning/ incinerator rule. Revised scope includes 'statutory air pollution,' addition of new language for posted operating instructions and open burning or incineration of animal or poultry carcasses during a declared state of emergency. Except for temporary Air Curtain Incinerators for land clearing debris (DOH jobs) and incineration of animal or poultry remains, most Air Curtain Incinerators will now be exempted under Rule 6 and placed under Rule 18.

COMMENT

Mr. Harris: Why does it allow low-level radioactive waste?

DEP Response: To allow crematories to dispose of bodies with chemo drugs. Does not allow high-level radioactive compounds related to research.

Council wanted to know if the agency would accept comments in writing after the meeting (e-mail in comments)

DEP Response: Yes

45CSR8 – Ambient Air Quality Standards

SUMMARY

NAAQS rules 45CSR8, 45CSR9 & 45CSR12 have been combined for the 2008 legislative session. Rule 8 is now the complete NAAQS incorporation by reference rule, and 45CSR9 & 45CSR12 will be repealed and replaced. Revisions to SO_2 & PM NAAQS include correction of SO_2 annual primary standard from 0.003 to 0.030 ppm, addition of annual and 24-hour $PM_{2.5}$ standards, and addition of measurement methods for $PM_{2.5}$. Revisions to CO & Ozone NAAQS include revocation of one-hour ozone standard except for Berkeley & Jefferson counties, identification of one-hour ozone maintenance areas, and addition of 8-hour primary and secondary ozone standards. Revisions to NO_2 and Lead NAAQS include addition of primary and secondary standards for lead, and addition of measurement methods for lead. Revisions also include general language updates, improved citing and consistency.

COMMENT

Mr. Harris: Are we sure we are protecting the public's health? We should not be lowering standards so that our energy being transmitted to other states doesn't pollute our air. Are we aware of EPA's Science Advisory Panel?

DEP Response: CAIR aims to lower emissions at power plants. Utility controls are helping us meet targets earlier. EPA's regional approach has generally been successful and we are seeing tremendous benefits. The agency is aware of the EPA's panel, and EPA is considering more stringent regulations but has not done so yet.

45CSR16 – Standards of Performance for New Stationary Sources

SUMMARY

Revisions to rule incorporate annual incorporation by reference updates and exclusions.

COMMENT

No questions.

45CSR18 – Control of Air Pollution from Combustion of Solid Waste

SUMMARY

CISWI Rule 18 combines and incorporates by reference all current federal Section 111/129 combustion regulation into one rule. Old Rule 24 will be repealed and replaced. New exemption section is consistent with revised Rules 6, 25 and 34. Revisions also include revised scope, extensive federal counterpart language updates, improved citing and consistency.

COMMENT

No questions.

45CSR25 – Control of Air Pollution from Hazardous Waste Treatment, Storage and Disposal Facilities

SUMMARY

Revisions to the proposed rule include general annual incorporation by reference and revisions required to maintain consistency with the DWWM's rule 33CSR20 and federal counterpart regulation. Addition of direct incorporation by reference of new provisions published in the Federal Register. Language for pathological waste incinerators is revised for clarity.

COMMENT

No questions.

45CSR34 – Emission Standards for Hazardous Air Pollutants

SUMMARY

Rule 34 now combines all NESHAP regulations previously adopted under both Rules 15 & 34. Old Rule 15 will be repealed and replaced. Revisions to Rule 34 incorporate annual NESHAP updates under Parts 61 & 63. Some Part 63 standards affecting non-major sources of hazardous air pollutants are being excluded from incorporation by reference: Oil and Natural Gas; Polyvinyl Chloride and Copolymers; Primary Copper Smelting; Secondary Copper Smelting; and Primary Nonferrous Metals.

COMMENT

No questions.

45CSR39 – Control of Annual Nitrogen Oxides Emissions

SUMMARY

Annual CAIR NOx Rule - Incorporates revisions to 40 CFR Part 96.

COMMENT

No questions.

45CSR40 - Control of Ozone Season Nitrogen Oxides Emissions

SUMMARY

Ozone Season CAIR NOx Rule - Incorporates revisions 40 CFR to Part 96.

COMMENT

No questions.

45CSR41 – Control of Annual Sulfur Dioxide Emissions

SUMMARY

Annual CAIR SO_2 Rule - Incorporates revisions to 40 CFR Part 96.

COMMENT

No questions.

45CSR42 – Greenhouse Gas Emissions Inventory Program

SUMMARY

The Greenhouse Gas Inventory Program Rule is authorized by SB337 passed in the 2007 legislative session. The rule establishes a program which requires the reporting and inventory of greenhouse gas emissions by stationary sources which emit more than a *de minimis* amount; inventories greenhouse gas emissions from stationary, area, mobile and biogenic sources, and accounts for reductions, capture and sequestration; provides for: a periodic compilation of a greenhouse gas inventory; a determination whether WV is a net sink or emitter; development of a registry for voluntary reductions; and a determination whether greenhouse gas can be developed as an asset for economic development.

COMMENT

Mr. Raney: Is the exclusion still there for coal preparation activities?

DEP Response: Yes, section 3.2. (45CSR42)

Mr. Raney: How do we quantify sequestration?

DEP Response: Don't think we will get down to stationary source level. Agency will look at area

sources and biogenic activities. Once we get information, we will compile in an inventory.

Division of Water and Waste Management

33CSR9 – Standards for Beneficial use of Filtrate from Water Treatment Plants

SUMMARY

This legislative rule establishes a mechanism and requirements for the permitting, siting, bonding, and use of water treatment plant sludge from water treatment plants that has beneficial properties. This rule applies to the beneficial use of water treatment plant sludge and to any person who seeks approval from the Secretary to beneficially use such sludge within the state. This rule is intended to enhance the resource recovery and recycling goals of article fifteen of chapter twenty-two of the West Virginia Code and to encourage the beneficial use of water treatment plant filtrate. Section 22-15-23 of the West Virginia Code and this rule, and not the provisions of W. Va. Code § 22-15-10 or 33 CSR 1, shall govern the beneficial use of water treatment plant sludge. This rule does not apply to sewage sludge, products derived from sewage sludge, sludges regulated under 33 CSR 8, or materials regulated as hazardous waste under W. Va. Code §§22-18-1, et seq.

COMMENT

Lisa Dooley: Public notice of permits – who bears the cost – there has to be a more efficient way of getting notices out than Class I legal ads. This is a suggestion for the future.

DEP Response: Applicant bears cost – DEP is trying other methods of getting the information out – but not everyone has access to e-mail.

400 people on DEP's mailing list to receive permits by e-mail and we have between 30-40 who receive permits by US mail.

33CSR20 – Hazardous Waste Management System

SUMMARY

This amendment will adopt by reference approximately two years of changes to federal regulations by adopting the federal regulations in effect as of June 1, 2007 consisting of changes that correct errors in previously enacted Dye and Pigment rule and Manifest rule, allow more hazardous waste, allow greater flexibility in SW-846 testing and monitoring, allow more mercury containing devices to be managed as universal waste, streamline permitting process through a standardized permit, allow additional headworks and de minimus waste exemptions, reference Clean Air Act standards for hazardous waste combustors, allow a series of paperwork burden reductions for hazardous waste management facilities, corrects errors in 40 CFR (federal regulations) and excludes cathode ray tubes from the definition of solid waste under certain conditions. Language corrections, updated references and a change as the result of an EPA comment regarding annual groundwater monitoring at corrective action sites are also included in the amended rule. The rule amendment is not projected to require additional operating expenses above current levels as the amendments are generally de-regulatory in nature.

COMMENT

No questions.

33CSR30 – Underground Storage Tanks

SUMMARY

There are several new provisions to reflect the 2005 Federal Energy Act, including: secondary containment requirements for new or replaced thanks or piping; secondary containment requirements for new or replaced fuel dispenser systems; tank eligibility for delivery, deposit or acceptance – enables agency to prevent deposit or delivery to a tank that is not in compliance; and training requirements for individuals who operate, maintain or are responsible to address emergencies from spills or releases from underground storage tank systems.

COMMENT

No questions.

47CSR2 – Requirements Governing Water Quality Standards

SUMMARY

The proposed revisions reflect updates identified during the federally-mandated triennial review of the Water Quality Standards rule. These include proposed additions to the trout water list, new criteria for nutrients, revisions to criteria in Appendix E and a use redesignation in the Guyandotte River Basin.

COMMENT

Mr. Raney: Would like to have the trout water list stay within the agency and be able to discuss the science on a case-by-base basis before the EQB, not the Legislature.

DEP Response: The DEP believes the scientific basis for the proposed trout streams is clear and does not need to be litigated before the EQB.

Mr. Harris: Commented on the changes in Appendix E and asked whether the formula change for copper and cadmium resulted in a more or less stringent standard.

DEP Response: The changes in Appendix E are recommended by EPA, updating MCL's, etc. The revised hardness formulas represent EPA's latest science.

47CSR10 – National Pollutant Discharge Elimination System (NPDES)

SUMMARY

The proposed revisions to the National Pollutant Discharge Elimination System Rule reflect updates/additions made to the various federal regulations that govern the NPDES program. The proposed changes also include specific language in section 14 of the rule relating to the Pretreatment Program to ensure that the rule is consistent with the most recent federal pretreatment regulations in 40 CFR Part 403.

COMMENT

No questions.

47CSR34 – Dam Safety

SUMMARY

The proposed revisions establish requirements governing the disbursement and use of moneys in the Dam Safety Rehabilitation Revolving Fund, authorized by SB 465 in the 2007 legislative session.

COMMENT

Ms. Hallinan: Any progress being made in reducing the number of deficient dams?

DEP Response: Not very much. The fund initiative is badly needed.

60CSR5 – Antidegradation Implementation Procedures

SUMMARY

Antidegradation is a requirement of the federal Clean Water Act intended to preserve the existing quality of the State's waters and to prevent and/or minimize future degradation. The rule was first adopted in 2001 and establishes four levels, or tiers, of protection for state waters, Tiers 1, 2, 2.5 and 3. Each tier provides a graduated level of protection used during the NPDES permit issuance process. The proposed revisions to the rule carry forward the agency's antidegradation implementation efforts, and move the Tier 2.5 streams that had been on the "presumptive" list in Appendix C to a final proposed list in Appendix A. The agency is proposing a total of 156 streams be included on the list. The list of 156 waters is comprised of the 37 waters that did not receive objections in the formal objection period, those waters that contain reproducing trout and are 100% on public land, those waters listed as high quality on public land based on their high biological scores, and Loop Creek.

COMMENT

Mr. Harris: Suggested we file with 309 streams instead of 156 streams because Legislature will further reduce.

Mr. Raney: Suggested we start with 39.

Mr. Harris: Asked about section 2.11 in the definitions regarding "trading" and if it includes cross-pollutant trading.

DEP Response: The definitions were unchanged from the ones the EQB first adopted in 2001. The agency does not think it allows cross-pollutant trading.

Division of Mining and Reclamation

38CSR2 – Surface Mining Reclamation Rule

SUMMARY

§38-2-3.2.g. Notice of Technical Completeness is new language and is to provide the public an opportunity to review the application once technical review is completed. §38-2-5.4.e.1 is removing language that is contrary to returning the natural drainway to its original pattern, profile, and dimensions once drainage control structure is removed. The changes in §38-2-5.6 clarify what operations may be exempt from conducting a "Surface Water Runoff Analysis", monitoring requirements and removes phase-in compliance schedule that expired on June 19, 2006. Changes to §38-2-6 removes duplication of rules for Blasting and after this change, all the requirements for blasting will be contained in Surface Mining Blasting Rule, Title 199 Series 1. New §38-2-11.8 titled "Bond Credit for Reclamation of Bond Forfeiture Site under a No Cost Reclamation Contract" encourages qualified operators to undertake reclamation of bond forfeiture sites for the purpose of eliminating hazards to human health and safety, abating pollution of surface and ground waters and the contribution of sediment to adjacent areas, and restoring land to beneficial uses. Changes in §38-2-14.15.c.2 and 14.15.d.3 are clarifying contemporaneous reclamation rules on excess spoil disposal. The changes in 14.15.e remove a phase-in compliance schedule that expired in 2004. The changes in §38-2-23 are being made to make the mining rule consistent with the proposed changes in the State's NPDES Mining Rules.

COMMENT

No questions.

47CSR5A – Individual State Certification of Activities Requiring a Federal Permit

SUMMARY

The proposed amendments to this rule are being made to adopt into rule requirements that have been applied through past practices for coal related activities requiring mitigation and issuance of a 401 State Certification of a 404 Permit. Ratios for monetary compensation for temporary impacts are detailed. Monetary compensation for permanent impacts to wetlands from coal related activities are made the same as non-coal related. Additional economic and stream measurement information is being requested to be added to the 401 application.

COMMENT

Mr. Harris: How do we determine the "ordinary high water mark" under section 4.2.f.4 and how is it determined on a small stream?

DEP Response: The US Army Corps of Engineers is responsible for determining "waters of the U.S." under the rule.

Mr. Harris: What are the differences between coal and non-coal impacts and how are they determined?

DEP Response: Rule has to be consistent with statute.

47CSR30 – WV/NPDES Rules for Coal Mining Facilities

SUMMARY

The proposed amendments to this rule are being made to allow general clean-up of sections referencing outdated names of agencies and references to the EQB governing rule making. This rule addresses the Secretary as being the person as head of all actions. References to the "Director" are changed to "Secretary" to eliminate the need to distinguish between the Director of Mining and Reclamation and the Director of Water and Waste Management when issuing a coal related WV/NPDES permit. This rule adds provision for storm-water coverage for certain minimal activities without the requirement for modification through application to the permit. This rule also provides for an advanced approval of transfer of a WV/NPDES Permit to coincide with the advanced approval of the corresponding Article 3 Permit. This rule clarifies provisions related to coal remining operations and provides a remining water quality standard variance for any parameter of concern.

COMMENT

No questions.

199CSR1 - Surface Mining Blasting Rule

SUMMARY

The proposed amendments change the following sections: 2.27. Adds the definition of "other structure" (structures built by the permittee); 2.38 Clarifies definition of "surface mine operation"; 3.2.C. Plan for blasting should include seismic monitoring when within 1000 ft of a structure, and performance specifications for blasting seismographs; 3.4. Areas of blasting that will be regulated for shaft and slope development; 3.6.c.3. Requiring field practice guidelines for blasting seismographs; 3.7a Request for alternate limits must have written consent of the owner; 3.9. Minimum qualifications and continuing education requirements for surveyor; 4.1.b. Allows the agency to consider blasting experience of applicants that was gained prior to the last three years; 4.5.d. Requires applicants who have been suspended or revoked in other states to show cause as to why should be issued a certification; 4.9.a.2 process for issuing a temporary suspension to a blaster and appeal rights; 4.13 Clarifies blasters responsibility of training the blasting crew; 5.2.a.3&4 Clarifies

the investigations process on a claim of blasting damage; 6.1 Requiring that any arbitrators that are removed from the list must be done with cause; and 7.3 Detonators and initiation systems are not considered for calculation of fees.

COMMENT

No questions.

Office of Oil and Gas

35CSR3 – Coalbed Methane Wells Rule

SUMMARY

The WVDEP, Office of Oil and Gas is proposing to revise existing rule 35CSR3. Series 3 is a legislative rule in place to enforce the provisions in WV Code §22-21-1 et seq., Coalbed Methane Wells and Units, commonly referred to at the Coalbed Methane Act. The revisions will: Address the establishment of special field rules to promote the orderly development of coalbed methane fields; Protect the correlative rights of all owners located within the geographic area for which special field rules are established; Provide a process by which the Review Board may hold a hearing on an application for special field rules and issue such rules; Insert language (Section 17) which was inadvertently deleted from the rule during the 2006 legislative session. This language existed in the rule prior to the revisions in 2006.

COMMENT

Is this the same rule that went through last year?

DEP Response: Yes, except for two sections that had changes:

16.2.e – advertisement "15 days"

16.1.6.1 – "FOIA" issue that came out of the LRMRC.

Mr. Raney: Is this the product of the stakeholders group?

DEP Response: Yes.

Ms. Hallinan: What is a field rule?

DEP Response: Special spacing procedure for coalbed methane wells. It deals with pooling and royalty issues.

Division of Land Restoration

33CSR10 – Recycling Assistance Grant Program

SUMMARY

This rule sets out guidelines and procedures for providing assistance grants to local governments and other interested parties for the purpose of planning, initiating, expanding, or upgrading recycling programs, provide related public education programs, and assist in recycling market procurement efforts.

COMMENT

No questions.

60CSR3 – Voluntary Remediation and Redevelopment Rule

SUMMARY

This legislative rule establishes the eligibility, procedures, standards and legal documents required for voluntary and brownfield cleanups and updates risk protocol standards, including updates to the deminimis table. It also includes changes to the land use covenant section to incorporate the components of the Uniform Covenant Act.

COMMENT

Ms. Dooley: Are there grant dollars for brownfields?

DEP Response: Yes

The next scheduled Advisory Council Meeting will be on May 30, 2007 at 10:00 a.m. Mr. Huffman asked the Council members to notify the DEP of which rules they want to discuss so the right agency person can be at the meeting. He also asked them to submit comments prior to the meeting if possible.

West Virginia Department of Environmental Protection

ADVISORY COUNCIL MEETING MINUTES

Wednesday – May 30, 2007
10:00 a.m. – 12:00 p.m.
601 57th Street, SE, Charleston, WV
West Virginia Room – 3rd Floor

ATTENDEES:

Advisory Council Members:

Rick Roberts
Karen Price
Bill Raney
Larry Harris - Teleconference
Jackie Hallinan

DEP:

Randy Huffman, Deputy Cabinet Secretary/Director –Division of Mining & Reclamation
Karen G. Watson, Assistant General Counsel
Lisa McClung, Director – Division of Water and Waste Management
John Benedict, Director – Division of Air Quality
Jessica Greathouse, Chief Communication Officer – WVDEP – Public Information Office
Pam Nixon, Advocate
Jim Mason, DAQ
Mike Zeto, DWWM – EE
John Morgan, DWWM
Scott Mandirola, DWWM
Greg Adolfson, PIO

VISITORS:

Dave Yaussy
Brittany Carns
Joe Gollehon
Gregory Hoyer
Jeff Mauzy
Amy Christy

Randy Huffman, Deputy Cabinet Secretary - West Virginia Department of Environmental Protection called the meeting to order at 10:00 a.m. Advisory Council Member Larry Harris joined the meeting via teleconference. Deputy Cabinet Secretary Huffman then turned the meeting over to Karen Watson, Assistant General Counsel for the West Virginia Department of Environmental Protection. Karen informed the Council that the agency had received comments from several Council members and those comments would be appended to the minutes. (see attached) She explained the agency

had representatives from each of the programs to answer questions for the rules identified in those comments. She also explained the agency had made several changes in the rules as a result of those comments.

Air Quality

45CSR6 – Control of Air Pollution from Combustion of Refuse

SUMMARY

Proposed Rule 6 is now a basic open burning/ incinerator rule. Revised scope includes 'statutory air pollution,' addition of new language for posted operating instructions and open burning or incineration of animal or poultry carcasses during a declared state of emergency. Except for temporary Air Curtain Incinerators for land clearing debris (DOH jobs) and incineration of animal or poultry remains, most Air Curtain Incinerators will now be exempted under Rule 6 and placed under Rule 18.

COMMENT

Larry Harris: Had raised the issue of "low-level radioactive waste" in the last meeting.

DEP Response: DEP has removed the chemotherapeutic waste and low-level radioactive waste provisions from the proposed rule. The proposed rule does not in any way affect current medical waste incineration rules now on the books.

45CSR8 – Ambient Air Quality Standards

SUMMARY

NAAQS rules 45CSR8, 45CSR9 & 45CSR12 have been combined for the 2008 legislative session. Rule 8 is now the complete NAAQS incorporation by reference rule, and 45CSR9 & 45CSR12 will be repealed and replaced. Revisions to SO_2 & PM NAAQS include correction of SO_2 annual primary standard from 0.003 to 0.030 ppm, addition of annual and 24-hour $PM_{2.5}$ standards, and addition of measurement methods for $PM_{2.5}$. Revisions to CO & Ozone NAAQS include revocation of one-hour ozone standard except for Berkeley & Jefferson counties, identification of one-hour ozone maintenance areas, and addition of 8-hour primary and secondary ozone standards. Revisions to NO_2 and Lead NAAQS include addition of primary and secondary standards for lead, and addition of measurement methods for lead. Revisions also include general language updates, improved citing and consistency.

COMMENT

Karen Price: Section 4.2.c – $PM_{2.5}$ Maximum 24-Hour Average Concentration. The level for the 24-hour primary and secondary standard states 35 ug/m^3. This should be 65 ug/m^3, pursuant to 40 CFR 50.7.

DEP Response: On October 17, 2006, the federal NAAQS regulation changed from 65 to 35.

Larry Harris: Restated his concern that the standards may not be stringent enough to protect public health. He also restated his question about the antidegradation language struck from the rule.

DEP Response: DEP cannot lower the NAAQS standards below that of federal levels unless the provisions for the stringency test in §22-1-3a are fully met. 45CSR14, in its entirety, has wholly replaced the intent of the relic anti-degradation language struck in proposed Rule 8.

45CSR39 – Control of Annual Nitrogen Oxides Emissions

45CSR40 - Control of Ozone Season Nitrogen Oxides Emissions

Ozone Season CAIR NOx Rule - Incorporates revisions 40 CFR to Part 96.

Annual CAIR NOx Rule - Incorporates revisions to 40 CFR Part 96.

45CSR41 – Control of Annual Sulfur Dioxide Emissions

Annual CAIR SO_2 Rule - Incorporates revisions to 40 CFR Part 96.

COMMENT

Karen Price: Asked why the opt-in language was deleted from each of these rules.

DEP Response: has removed the opt-in provisions in the three CAIR rules so that West Virginia can say that CAIR equals NOx RACT for EGUs under the PM2.5 implementation rule.

45CSR42 – Greenhouse Gas Emissions Inventory Program

SUMMARY

The Greenhouse Gas Inventory Program Rule is authorized by SB337 passed in the 2007 legislative session. The rule establishes a program which requires the reporting and inventory of greenhouse gas emissions by stationary sources which emit more than a *de minimis* amount; inventories greenhouse gas emissions from stationary, area, mobile and biogenic sources, and accounts for reductions, capture and sequestration; provides for: a periodic compilation of a greenhouse gas inventory; a determination whether WV is a net sink or emitter; development of a registry for voluntary reductions; and a determination whether greenhouse gas can be developed as an asset for economic development.

COMMENT

Karen Price and Larry Harris: Both asked about the definitions of "anthropogenic" and "biogenic" in the rule and asked for examples of each.

DEP Response: An example of an anthropogenic source is the coal extraction process and an example of a biogenic source is the erosion of soil exposing a coal seam. The agency does not plan

to ask sources to report biogenic activities. In order to receive credit a source must report all of its emissions.

Karen Price: Can the reporting requirement in section 4.1 be made consistent with the emissions inventory requirements.

DEP Response: The date in the rule is March 31st and is the same as the emissions inventory date.

Karen Price: Does not believe fees should be required for greenhouse gas reporting.

DEP Response: The agency will consider the issue.

Karen Price: The last sentence in section 5.3 allowing the Secretary to request information is not authorized by statute.

DEP Response: It is authorized by the statute.

Karen Price: There should be a reasonable protocol for reporting emissions.

DEP Response: DAQ purposely wrote the rule in a manner flexible to the Secretary, as greenhouse gas reduction quantification protocols are still being developed at this time.

Karen Price: Is WV going to sign on to the climate registry or are we going to have our own?

DEP Response: In order to trade, we have to be consistent with other programs, but we do not want to be more specific in the rule.

Bill Raney: The exemption in section 3.2 includes language referring to sources covered by chapter 22-3 as well as sources required to report emissions. We are concerned this may take the exemption in the statute away.

DEP Response: While the agency did not want to require mining extraction to report emissions, thermal dryers associated with coal prep plants often have huge emissions of greenhouse gases. That is the reason the statute and rule only exempt sources permitted under chapter 22-3.

Division of Water and Waste Management

33CSR9 – Standards for Beneficial use of Filtrate from Water Treatment Plants

SUMMARY

This legislative rule establishes a mechanism and requirements for the permitting, siting, bonding, and use of water treatment plant sludge from water treatment plants that has beneficial properties. This rule applies to the beneficial use of water treatment plant sludge and to any person who seeks approval from the Secretary to beneficially use such sludge within the state. This rule is intended to enhance the resource recovery and recycling goals of article fifteen of chapter twenty-two of the West Virginia Code and to encourage the beneficial use of water treatment plant filtrate. Section 22-

15-23 of the West Virginia Code and this rule, and not the provisions of W. Va. Code § 22-15-10 or 33 CSR 1, shall govern the beneficial use of water treatment plant sludge. This rule does not apply to sewage sludge, products derived from sewage sludge, sludges regulated under 33 CSR 8, or materials regulated as hazardous waste under W. Va. Code §§22-18-1, et seq.

COMMENT

Larry Harris: DEP made changes to this rule during the Interims process last year, and the rule now requires a permit for both short-term and long-term applications. This is a good change. However, we feel that most of the information required in Section 7.3. Permit Application Requirements for long-term permits should also be required for short-term permits.

DEP Response: The requirements of section 7.3 were intended to be directed toward facilities that proposed to land apply filtrate as the beneficial use. It was intended to be applicable to both, if land application was the proposed method of reuse. Section 7.3 will be revised to more clearly reflect the applicability of the requirement for both long-term and short-term, if land application is the proposed beneficial reuse.

Rick Roberts and Larry Harris: Regarding the environmental effects of disposal of sludge are the values in Table 1 of the rule sufficient?

DEP Response: The Table 1 values are the same as the sewage sludge levels in DEP's other rules, and the agency believes they are supported by sound science.

Rick Roberts and Larry Harris: Mr. Harris expressed concern with the distinction between "beneficial reuse" and "disposal." Mr. Roberts believes that his concern is satisfied by the language in section 3.1.b.1.

Rick Roberts: The rule should include general permits as proposed.

Larry Harris: Only individual permits should be allowed under the rule.

DEP Response: There will be public notice in the general permit process.

33CSR30 – Underground Storage Tanks

SUMMARY

There are several new provisions to reflect the 2005 Federal Energy Act, including: secondary containment requirements for new or replaced thanks or piping; secondary containment requirements for new or replaced fuel dispenser systems; tank eligibility for delivery, deposit or acceptance – enables agency to prevent deposit or delivery to a tank that is not in compliance; and training requirements for individuals who operate, maintain or are responsible to address emergencies from spills or releases from underground storage tank systems.

COMMENT

Karen Price: Section 6.1. states "....including any person who accepts a delivery order, accepts payment, delivers or deposits product into an underground storage tank.....". The portion that states "...accepts payment..." should be removed from this section because those individuals within a company who accept payment or make payments most often do not know anything about the underground storage tank (UST), the operation of the UST, or the current regulatory status of the UST.

DEP Response: This language will give the agency a better handle on transporters and middle-men involved in the process.

Karen Price: Section 7.3.a.1. states "....the methodology for verifying attendance, the date, time and location of the course, the name of the offering organization, the credentials of the instructors, and a certification that the technology or methods.....".

1. The portion that states "..the date, time and location of the course,...." should be deleted. For large companies with many UST installations and locations there can be numerous individuals that need to be trained. Training will most likely occur on multiple dates, times, and locations that may not always be known until just prior to the training event. When new employees are hired training might occur on short notice and for one individual. The burden of having to report the dates, time and locations would hinder and slow down the training process and restrict a company's ability to comply.

2. The portion that states "...the credentials of the instructors..." should be removed. Credentials will vary from instructor to instructor new instructors might be utilized, and a company might not know which instructors will be used at the various training sessions until just prior to the training session. In addition, the course content is the main issue of concern and should be the main focus in obtaining State approval of a training program.

DEP Response: Regarding dates, times and location of the training the agency will not require the information prior to the training. As far as the credentials of the instructor the agency needs this information as part of its curriculum review, in this case before the training.

Karen Price: Section 7.3.a.2 - This section states that a nonrefundable application fee of $280 must be submitted with the application. Larger companies may have one training program, but administer the training on multiple dates, times and locations. Having to submit an application for approval of the training program each time the program is administered would be cost prohibitive, burdensome, and would hinder the training process.

DEP Response: The agency agrees and believes the rule only requires a one-time fee.

Rick Roberts: Regarding the $5.00 per ton fee, how does a source measure the tonnage? Perhaps the agency should consider using a cubic-yard approach.

DEP Response: The agency will consider.

47CSR2 – Requirements Governing Water Quality Standards

SUMMARY

The proposed revisions reflect updates identified during the federally-mandated triennial review of the Water Quality Standards rule. These include proposed additions to the trout water list, new criteria for nutrients, revisions to criteria in Appendix E and a use redesignation in the Guyandotte River Basin.

COMMENT

Larry Harris: Does the use removal in section 7.2.d follow the federal Clean Water Act requirements?

DEP Response: Yes, the agency followed all the requirements, federal and state, and required extensive information from the company. The agency also conducted two public meetings.
Bill Raney: Mr. Raney repeated his concern with the listing of trout waters in the rule and the fact that the list has to be approved by the Legislature. Karen Price agreed with this comment. Jackie Hallinan and Larry Harris did not agree with this comment.

Karen Price: Questioned the need for Appendix D, because the Category C use applies to all state waters.

DEP Response: Agency will consider.

Karen Price: Will the agency consider not making use removals go through the legislative process.

DEP Response: The agency decided not to include any language pertaining to this issue at this point in time, but will be subjecting this issue to the public participation process in the coming months.

60CSR5 – Antidegradation Implementation Procedures

SUMMARY

Antidegradation is a requirement of the federal Clean Water Act intended to preserve the existing quality of the State's waters and to prevent and/or minimize future degradation. The rule was first adopted in 2001 and establishes four levels, or tiers, of protection for state waters, Tiers 1, 2, 2.5 and 3. Each tier provides a graduated level of protection used during the NPDES permit issuance process. The proposed revisions to the rule carry forward the agency's antidegradation implementation efforts, and move the Tier 2.5 streams that had been on the "presumptive" list in Appendix C to a final proposed list in Appendix A. The agency is proposing a total of 156 streams be included on the list. The list of 156 waters is comprised of the 37 waters that did not receive objections in the formal objection period, those waters that contain reproducing trout and are 100% on public land, those waters listed as high quality on public land based on their high biological scores, and Loop Creek.

COMMENT

Larry Harris: Scientific criteria should be used to add or delete streams from the Tier 2.5 list.

Rick Roberts: Can the SRF program give priority to facilities impacted by the Tier 2.5 list?

DEP Response: Agency will take this under advisement.

Larry Harris: Is the nomination process adequate?

DEP Response: The agency believes the process is generally adequate and workable. If, however a large number of streams are nominated at one time, the individual notification requirements may be difficult and costly.

At this point in the meeting, Bill Raney submitted written comments regarding several mining rules. (see attached)

60CSR8 - Environmental Excellence Program

Greg Adolfson summarized the rule revisions. He said the changes would provide more flexibility for the agency to approve or disapprove of incentives in the program, as well as other flexibilities.

SUMMARY

Changes are being proposed to the Environmental Excellence Program Rule (60CSR8) to better align with and follow the momentum of the United States Environmental Protection Agency's National Environmental Performance Track Program. Additionally, the primary purpose for the changes is to give more flexibility to the Department of Environmental Protection Cabinet Secretary in areas such as: Eligibility Criteria for Participation (section 4); Environmental Performance Record (section 5); Environmental Management System (section 6); Public Participation (section 8); Incentives (section 9); Procedures for Application (section 10); and Annual Performance Report (section 14). Language, such as "may include, but will not be limited to, the following," has been added to allow for this flexibility.

COMMENT

Rick Roberts: Why is section 6.2 completely deleted?

DEP Response: The section is not completed deleted, just the 1996 standards. This will allow the agency to use the most current standards.

Bill Raney: How many companies are participating in the program?

DEP Response: There are two in the National Program, Toyota and Dow.

Jackie Hallinan: The program is a good idea.

Meeting was adjourned by Deputy Cabinet Secretary Randy Huffman.

Council meeting – 5/30/07
Comments
Submitted
by Bill Raney

Bill…

Here are some preliminary comments provided by the Environmental-Technical Committee on the rules that will be reviewed by the Advisory Council:

Water Quality Standards Rule (47CSR2)

Only concern relates to the Trout Stream List:

Inclusion of a stream in the codified list contained in the rule forever locks in unrealistic WQS on that stream regardless of existing and/or future water quality. The lower standards are very problematic for the coal industry by targeting iron and aluminum.

WVCA believes the list is immaterial to protection of the existing use if it is indeed a trout stream.

WV DEP, in the NPDES permitting process, will apply appropriate trout stream effluent limitations if the agency believes a stream to have a trout population regardless of whether or not it in on the codified list contained in the water quality standards rule or not. The only difference is that in the permitting process, the applicant has the opportunity to present data and sampling to refute the agency's assertion that a stream is a trout stream, and has a right of appeal if they continue to disagree with agency's assignment of trout stream limits. The ability to dispute the trout stream designation is very important, especially since some of the data supporting the current initiative to expand the codified list is decades old.

If a trout stream is included on the codified list approved by the legislature, the only option for removing that designation is to once again pursue a legislative fix. Under those circumstances, it is easier to just challenge the entire expansion of the trout stream list.

The massive expansion of the trout stream list as currently proposed is much more restrictive than the standards found in surrounding states, where the regulatory agencies have developed different levels and categories of trout streams. West Virginia continues to treat all trout streams the same as though they were native, naturally-reproducing, cold water streams that deserve the highest levels of protection. This is simply not true, as many streams in West Virginia are stocked trout streams where the existing, in-stream water quality is lower than the established effluent guidelines for native trout streams.

Mining & Reclamation Rule (38 CSR 2)

Main concern relates to 14.15.c.2, regarding contemporaneous reclamation and valley fills:

This revision will penalize operators that are constructing "bottom-up" valley fills, the agency's preferred method of fill construction by unnecessarily restricting when such fill can be counted as "reclaimed" under the state's contemporaneous reclamation rules. These rules already vastly exceed the federal requirements and those of any other surrounding state, and this change will only make them worse.

Additionally, this proposed revision was deleted during the Legislative session in 2007.

401 Water Quality Certification Rule (47 CSR 5A)

The changes to this rule are totally un-necessary, and add further detail and complication to a state mitigation rule when the Legislature has specifically instructed the agency to better align its mitigation program with that of the Corps of Engineers. Several years ago, the Legislature passed a bill directing WV DEP to provide state mitigation credit for Corps mitigation. While this has occurred, we feel the revisions to this rule will drive the two programs further apart. Additionally, we know of no state statutory revision that necessitates these changes…the state mitigation program has functioned for years without this level of detail, and we question why it's needed now.

Further, we are concerned that the rule seeks to change definitions that should only be revised in the statute with Legislative approval. For example, the revisions jettison the long-used references to stream types and insert reference to ordinary high water mark. This appears to be an effort to expand the definition of "waters of the state" to all cover every erosional feature, regardless of whether or not it actually functions as a stream.

West Virginia Coal Association

PO Box 3923, Charleston, WV 25339 ■ (304) 342-4153 ■ Fax 342-7651 ■ www.wvcoal.com

July 18, 2006

Mr. Charles Sturey
West Virginia Department of Environmental Protection
Division of Mining & Reclamation
601 57th Street SE
Charleston, WV 25304

Re: Comments on Proposed Revisions to 47 CSR 5A

Dear Mr. Sturey:

Pursuant to the notice filed with the Secretary of State on June 15, 2006, the West Virginia Coal Association (WVCA) offers the following comments and observations regarding the agency's proposed revisions to 47 CSR 5A, "Rules for Individual State Certification of Activities Requiring a Federal Permit".

WVCA is a non-profit state trade association representing the interests of the West Virginia coal industry on policy and regulatory issues before various state and federal agencies that regulate coal extraction, processing, transportation and consumption. WVCA's primary goal is to enhance the viability of West Virginia's coal industry by supporting efficient and environmentally responsible coal extraction and processing through reasonable, equitable and achievable state and federal policy and regulation. WVCA appreciates the opportunity to provide comments regarding the West Virginia Department of Environmental Protection's (WVDEP") proposed revisions to the state's Clean Water Act ("CWA") Section 401 certification rule.

General Comments

WVCA is very concerned about the WVDEP's proposal to add detail to its § 401 mitigation program, particularly at this time. The WVDEP has not articulated any problems with implementation of its existing mitigation program pursuant to this rule, and the WVCA sees no benefit to adding further detail and complexity now. Even more importantly, the WVCA understands the history of the WVDEP's § 401 mitigation program, and believes that the very basis for its development years ago no longer exists. The WVDEP's program has been fully replaced by the federal mitigation program which has developed into a comprehensive program and is the subject of new joint United States Army Corps of Engineers ("Corps") and the United States Environmental Protection Agency ("EPA") rules to update and conform their collective mitigation goals and requirements. The state's mitigation requirements, at least as they relate to mitigation for activities permitted by a CWA § 404 permit, have become obsolete and duplicative.

History of State § 401 Mitigation Requirements.

The state's mitigation program as maintained by the WVDEP and implemented through the § 401 rules is not a required component of the federal § 404 permitting program. The § 401 certification program is intended to insure that

issuance of a federal permit does not result in a violation of state water quality standards:

> CWA section 401 provides that states certify that federal activities or activities requiring federal approvals relative to CWA section 404 would not violate applicable effluent limitations, or other limitations, or other water quality requirements. [1]

Instead, the state has independently required mitigation as a condition of § 401 certification. Implementation of the state's mitigation program and requirements dates from a time when the Corps imposed no federal mitigation requirement on mining operations authorized by the § 404 General Permit for coal mining operations, Nationwide Permit 21("NWP 21"):

> [NWP] 21. Activities associated with surface coal mining activities provided they are authorized by the Department of the Interior, Office of Surface Mining (OSM) or by states with approved programs under Title V of the Surface Mining Control and Reclamation Act of 1977 and provided the permittee notifies the District Engineer in accordance with the "Notification" general condition. **The notification must include an OSM or state-approved mitigation plan** (emphasis added).[2]

Based on the requirements of the NWP 21, a state mitigation plan was required for a mining-related § 404 permit (usually a NWP 21) to be issued by the Corps:

> Prior to reissuance of NWP 21 in January 2002, the COE [Corps] considered mitigation adequate with the inclusion of an OSM or state-approved SMCRA onsite mitigation plan in the permit application. [3]

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[1] Programmatic Environmental Impact Statement. Corps, EPA et.al. 2005. page II.C-42.
[2] Final Notice of Issuance, Reissuance, and Modification of Nationwide Permits. U.S. Army Corps of Engineers, Dec. 13, 1996. 61 Fed. Reg. 241.
[3] Programmatic Environmental Impact Statement. Corps, EPA et.al. 2005. Page II.C-52.

West Virginia implemented this program through the § 401 certification program which imposed monetary or in-lieu fee requirements on coal mining related § 404 permits.

In 2002, the Corps revised and reissued NWP 21 adding a condition that the Corps' District Engineer require federal mitigation, reviewed and approved by the Corps in accordance with its joint mitigation rules and regulations maintained with the EPA.[4] The revised and reissued NWP 21 allowed the Corps to consider state mitigation when determining federal mitigation, but removed the automatic acceptance of state-required mitigation as sufficient for § 404 authorization. From this point on, the state mitigation requirements as maintained in the § 401 certification process became duplicative because the Corps was requiring federal mitigation plans as part of the § 404 permitting process.

Federal Mitigation Requirements are Comprehensive.

Coal mining-related § 404 permitting and mitigation has evolved since the Corps's reissuance of NWP 21 in 2002. Most mining projects are now permitted using the Corps' Individual Permit process and mitigation plans are now developed based on the Corps's and EPA's combined preference for on-site, in-kind mitigation to restore the impacted aquatic resource.

As you know, coal mining operations are typically subject to the federal CWA § 404 program and the state § 401 certification program because of

[4] Final Notice of Issuance, Reissuance and Modification of Nationwide Permits. U.S. Army Corps of Engineers, Jan. 15, 2002. 67 Fed. Reg. 10.

activities undertaken in jurisdictional waters. The steeply-sloped terrain of West Virginia is permeated by small ephemeral and intermittent streams that serve to drain natural runoff into larger perennial stream systems. Any development in these areas--coal mining or otherwise--will result in some form of impact to small streams. Unlike many other activities subject to § 404 permitting and § 401 certification, mining activities are mostly temporary in nature, with the reclamation process providing a unique opportunity for reconstruction of impacted stream segments.[5] The Corps has recognized this opportunity for on-site, in-kind replacement/restoration of impacted aquatic resources and issued guidance encouraging this type of mitigation:

> This guidance acknowledges the uniqueness of regional and site-specific conditions, recognizes that features constructed in accordance with the Surface Mining Control and Reclamation Act may contribute to overall mitigation plans, and identifies several appropriate ways to accomplish appropriate mitigation projects.
>
> Surface mining operations can result in the creation of intermittent and and/or perennial streams depending on the on-site hydrologic conditions and the chosen method of dealing with groundwater and/or runoff. Applicants are encouraged to optimize these opportunities for on-site mitigation.
>
> ...Corps staff, Office of Surface Mining staff, and the mining operator should coordinate to explore options for incorporating...features required by SMCRA into compensatory mitigation plans. If successfully implemented, channels and other features will help maintain and potentially improve the physical, chemical and biological integrity of waters of the United States. [6]

[5] See pages ____ of attachment "A", comments filed by WVCA concerning the draft federal mitigation rule.

[6] "Mitigation for Impacts to Aquatic Resources from Surface Coal Mining." U.S. Army Corps of Engineers. May 7, 2004

Council Meeting – 5/30/07
Comments
Submitted
by Bill Raney

Bill…

Here are some preliminary comments provided by the Environmental-Technical Committee on the rules that will be reviewed by the Advisory Council:

Water Quality Standards Rule (47CSR2)

Only concern relates to the Trout Stream List:

Inclusion of a stream in the codified list contained in the rule forever locks in unrealistic WQS on that stream regardless of existing and/or future water quality. The lower standards are very problematic for the coal industry by targeting iron and aluminum.

WVCA believes the list is immaterial to protection of the existing use if it is indeed a trout stream.

WV DEP, in the NPDES permitting process, will apply appropriate trout stream effluent limitations if the agency believes a stream to have a trout population regardless of whether or not it in on the codified list contained in the water quality standards rule or not. The only difference is that in the permitting process, the applicant has the opportunity to present data and sampling to refute the agency's assertion that a stream is a trout stream, and has a right of appeal if they continue to disagree with agency's assignment of trout stream limits. The ability to dispute the trout stream designation is very important, especially since some of the data supporting the current initiative to expand the codified list is decades old.

If a trout stream is included on the codified list approved by the legislature, the only option for removing that designation is to once again pursue a legislative fix. Under those circumstances, it is easier to just challenge the entire expansion of the trout stream list.

The massive expansion of the trout stream list as currently proposed is much more restrictive than the standards found in surrounding states, where the regulatory agencies have developed different levels and categories of trout streams. West Virginia continues to treat all trout streams the same as though they were native, naturally-reproducing, cold water streams that deserve the highest levels of protection. This is simply not true, as many streams in West Virginia are stocked trout streams where the existing, in-stream water quality is lower than the established effluent guidelines for native trout streams.

Mining & Reclamation Rule (38 CSR 2)

Main concern relates to 14.15.c.2, regarding contemporaneous reclamation and valley fills:

This revision will penalize operators that are constructing "bottom-up" valley fills, the agency's preferred method of fill construction by unnecessarily restricting when such fill can be counted as "reclaimed" under the state's contemporaneous reclamation rules. These rules already vastly exceed the federal requirements and those of any other surrounding state, and this change will only make them worse.

Additionally, this proposed revision was deleted during the Legislative session in 2007.

401 Water Quality Certification Rule (47 CSR 5A)

The changes to this rule are totally un-necessary, and add further detail and complication to a state mitigation rule when the Legislature has specifically instructed the agency to better align its mitigation program with that of the Corps of Engineers. Several years ago, the Legislature passed a bill directing WV DEP to provide state mitigation credit for Corps mitigation. While this has occurred, we feel the revisions to this rule will drive the two programs further apart. Additionally, we know of no state statutory revision that necessitates these changes...the state mitigation program has functioned for years without this level of detail, and we question why it's needed now.

Further, we are concerned that the rule seeks to change definitions that should only be revised in the statute with Legislative approval. For example, the revisions jettison the long-used references to stream types and insert reference to ordinary high water mark. This appears to be an effort to expand the definition of "waters of the state" to all cover every erosional feature, regardless of whether or not it actually functions as a stream.

West Virginia Coal Association

PO Box 3923, Charleston, WV 25339 ■ (304) 342-4153 ■ Fax 342-7651 ■ www.wvcoal.com

July 18, 2006

Mr. Charles Sturey
West Virginia Department of Environmental Protection
Division of Mining & Reclamation
601 57th Street SE
Charleston, WV 25304

Re: Comments on Proposed Revisions to 47 CSR 5A

Dear Mr. Sturey:

Pursuant to the notice filed with the Secretary of State on June 15, 2006, the West Virginia Coal Association (WVCA) offers the following comments and observations regarding the agency's proposed revisions to 47 CSR 5A, "Rules for Individual State Certification of Activities Requiring a Federal Permit".

WVCA is a non-profit state trade association representing the interests of the West Virginia coal industry on policy and regulatory issues before various state and federal agencies that regulate coal extraction, processing, transportation and consumption. WVCA's primary goal is to enhance the viability of West Virginia's coal industry by supporting efficient and environmentally responsible coal extraction and processing through reasonable, equitable and achievable state and federal policy and regulation. WVCA appreciates the opportunity to provide comments regarding the West Virginia Department of Environmental Protection's (WVDEP") proposed revisions to the state's Clean Water Act ("CWA") Section 401 certification rule.

General Comments

WVCA is very concerned about the WVDEP's proposal to add detail to its § 401 mitigation program, particularly at this time. The WVDEP has not articulated any problems with implementation of its existing mitigation program pursuant to this rule, and the WVCA sees no benefit to adding further detail and complexity now. Even more importantly, the WVCA understands the history of the WVDEP's § 401 mitigation program, and believes that the very basis for its development years ago no longer exists. The WVDEP's program has been fully replaced by the federal mitigation program which has developed into a comprehensive program and is the subject of new joint United States Army Corps of Engineers ("Corps") and the United States Environmental Protection Agency ("EPA") rules to update and conform their collective mitigation goals and requirements. The state's mitigation requirements, at least as they relate to mitigation for activities permitted by a CWA § 404 permit, have become obsolete and duplicative.

History of State § 401 Mitigation Requirements.

The state's mitigation program as maintained by the WVDEP and implemented through the § 401 rules is not a required component of the federal § 404 permitting program. The § 401 certification program is intended to insure that

issuance of a federal permit does not result in a violation of state water quality standards:

> CWA section 401 provides that states certify that federal activities or activities requiring federal approvals relative to CWA section 404 would not violate applicable effluent limitations, or other limitations, or other water quality requirements. [1]

Instead, the state has independently required mitigation as a condition of § 401 certification. Implementation of the state's mitigation program and requirements dates from a time when the Corps imposed no federal mitigation requirement on mining operations authorized by the § 404 General Permit for coal mining operations, Nationwide Permit 21("NWP 21"):

> [NWP] 21. Activities associated with surface coal mining activities provided they are authorized by the Department of the Interior, Office of Surface Mining (OSM) or by states with approved programs under Title V of the Surface Mining Control and Reclamation Act of 1977 and provided the permittee notifies the District Engineer in accordance with the "Notification" general condition. **The notification must include an OSM or state-approved mitigation plan** (emphasis added).[2]

Based on the requirements of the NWP 21, a state mitigation plan was required for a mining-related § 404 permit (usually a NWP 21) to be issued by the Corps:

> Prior to reissuance of NWP 21 in January 2002, the COE [Corps] considered mitigation adequate with the inclusion of an OSM or state-approved SMCRA onsite mitigation plan in the permit application. [3]

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[1] Programmatic Environmental Impact Statement. Corps, EPA et.al. 2005. page II.C-42.
[2] Final Notice of Issuance, Reissuance, and Modification of Nationwide Permits. U.S. Army Corps of Engineers, Dec. 13, 1996. 61 Fed. Reg. 241.
[3] Programmatic Environmental Impact Statement. Corps, EPA et.al. 2005. Page II.C-52.

West Virginia implemented this program through the § 401 certification program which imposed monetary or in-lieu fee requirements on coal mining related § 404 permits.

In 2002, the Corps revised and reissued NWP 21 adding a condition that the Corps' District Engineer require federal mitigation, reviewed and approved by the Corps in accordance with its joint mitigation rules and regulations maintained with the EPA.[4] The revised and reissued NWP 21 allowed the Corps to consider state mitigation when determining federal mitigation, but removed the automatic acceptance of state-required mitigation as sufficient for § 404 authorization. From this point on, the state mitigation requirements as maintained in the § 401 certification process became duplicative because the Corps was requiring federal mitigation plans as part of the § 404 permitting process.

Federal Mitigation Requirements are Comprehensive.

Coal mining-related § 404 permitting and mitigation has evolved since the Corps's reissuance of NWP 21 in 2002. Most mining projects are now permitted using the Corps' Individual Permit process and mitigation plans are now developed based on the Corps's and EPA's combined preference for on-site, in-kind mitigation to restore the impacted aquatic resource.

As you know, coal mining operations are typically subject to the federal CWA § 404 program and the state § 401 certification program because of

[4] Final Notice of Issuance, Reissuance and Modification of Nationwide Permits. U.S. Army Corps of Engineers, Jan. 15, 2002. 67 Fed. Reg. 10.

activities undertaken in jurisdictional waters. The steeply-sloped terrain of West Virginia is permeated by small ephemeral and intermittent streams that serve to drain natural runoff into larger perennial stream systems. Any development in these areas--coal mining or otherwise--will result in some form of impact to small streams. Unlike many other activities subject to § 404 permitting and § 401 certification, mining activities are mostly temporary in nature, with the reclamation process providing a unique opportunity for reconstruction of impacted stream segments.[5] The Corps has recognized this opportunity for on-site, in-kind replacement/restoration of impacted aquatic resources and issued guidance encouraging this type of mitigation:

> This guidance acknowledges the uniqueness of regional and site-specific conditions, recognizes that features constructed in accordance with the Surface Mining Control and Reclamation Act may contribute to overall mitigation plans, and identifies several appropriate ways to accomplish appropriate mitigation projects.
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> Surface mining operations can result in the creation of intermittent and and/or perennial streams depending on the on-site hydrologic conditions and the chosen method of dealing with groundwater and/or runoff. Applicants are encouraged to optimize these opportunities for on-site mitigation.
>
> ...Corps staff, Office of Surface Mining staff, and the mining operator should coordinate to explore options for incorporating...features required by SMCRA into compensatory mitigation plans. If successfully implemented, channels and other features will help maintain and potentially improve the physical, chemical and biological integrity of waters of the United States.[6]

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[5] See pages ____ of attachment "A", comments filed by WVCA concerning the draft federal mitigation rule.

[6] "Mitigation for Impacts to Aquatic Resources from Surface Coal Mining." U.S. Army Corps of Engineers. May 7, 2004

In addition to the Corps's above-cited guidance for mining, on-site, in-kind mitigation remains the preferred means of performing mitigation for other authorized impacts to aquatic resources:

> In the interest of achieving functional replacement, in-kind compensation of aquatic resources will often be appropriate. [7]
>
> Mitigation should be required, when practicable, in areas adjacent or contiguous to the discharge site. On-site mitigation generally compensates for locally important functions, e.g., local flood control functions or unusual wildlife habitat.[8]
>
> Compensatory mitigation should generally be "in-kind" and occur as close to the site of the adverse impact as practicable in order to minimize losses to the local aquatic ecosystem.[9]

To satisfy the Corps's preference (enunciated in previously-cited Regulatory Guidance Letters issued by the Corps) for in-kind mitigation, or a functional replacement of the impacted resources, a Functional Assessment Protocol, referred to as the "Central Appalachian Protocol", has been used for several years now by the Huntington District to assist in assessing and assigning mitigation requirements for mining-related projects.[10]

Unfortunately, the WVDEP has to date largely ignored the mitigation guidance and requirements developed and imposed by the Corps, as well as the functional assessment protocol. The WVDEP has continued to implement its duplicative § 401 mitigation requirements, and typically requires mitigation above

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[7] Regulatory Guidance Letter No.01-1. U.S. Army Corps of Engineers, October 31, 2001.
[8] Regulatory Guidance Letter No.02-2. U.S. Army Corps of Engineers, December 24, 2002.
[9] Compensatory Mitigation Guidelines- Huntington District . U.S. Army Corps of Engineers, Huntington, WV District. January 30, 2004.
[10] See attached power point presentation—Central Appalachian Protocol.

and beyond that which is required by the Corps despite the mandate of W. Va. Code § 22-11-7a(a)(2)(C):

> The Director shall provide credit for any mitigation that is a required component of the permit issued by the United States Army Corps of Engineers pursuant to 33 U.S.C. § 1344 to the extent that it satisfies required mitigation pursuant to this section.

Because a comprehensive federal mitigation program is being implemented, the WVDEP's failure to provide credit for such mitigation ***as mandated*** is a serious concern to the WVCA. To the extent a state program is relevant at all, perhaps to address the limited circumstances where the state's definition of "waters of the state" is broader than the CWA definition of "waters of the United States," it should be narrowly tailored to address that need. The WVCA cannot support proposed revisions that are not so narrowly tailored.

WVCA urges WVDEP to postpone pursuit of these proposed revisions at this time and to more fully consider the need for its separate mitigation program in light of (1) the federal mitigation now required as part of a § 404 permit, (2) the possibility of creating inconsistencies with the draft federal Corps and EPA rule for mitigation, (3) the deletion of NWP 21 conditions relating to state mitigation, and (4) the mandate of W. Va. Code § 22-11-7a(a)(2)(C) to rely on and give credit for federally mandated mitigation to satisfy any state mitigation needs.

Specific Comments

Page 4 4.2.f.2.A. Economic Info[illegible]tion about the coal mi[illegible]g operations, including, without limitation, the estimated nu[illegible]r of jobs created, the e[illegible]ated proportion of employees who will be residents of Wes[illegible]irginia, the estimated a[illegible]al payroll, the

estimated annual coal production (if applicable), the estimated life of the operation, the estimated severance tax for the operation, the estimated annual property tax, and such other economic information as may be requested by the agency.

WVCA questions why this level of information is needed for the § 401 certification process. Similar information is provided to the Corps under the § 404 permitting program and to the state through the Community Impact Statement. The justification for requiring duplicative information as part of the § 401 certification process is lacking. Further, we are puzzled as to why this information is required only for mining operations. Sections 404 and 401 of the CWA apply to all manner of filling activities, not just coal mining operations. If this information is needed by the WVDEP to properly implement the § 401 certification process, then it should be required for all dredge and fill activities. If it is not, then it should be removed from the proposed revisions. Without further explanation and justification, the WVCA does not support this proposed revision.

4.2.f.4. A Delineation of the Stream to be Impacted. The length, width and depth of the stream segment impacted shall be measured. Width and depth measurements shall be made at one hundred (100)foot intervals. The stream delineation shall indicate the ephemeral and intermittent/perennial segments to be impacted. The stream shall be measured from the farthest downstream disturbance, excluding stream crossings associated with haul roads for surface mining operations, upstream to the beginning of ~~an intermittent stream, as defined in 46 CSR 1-2.9 and/or 38 CSR 2-2.71.~~ the ordinary high water mark. The applicant shall provide a table listing the station number with the corresponding acreage, including the drainage area from the toe of the pond and the toe of the fill.

As proposed, this revision appears to extend the reach of the state's jurisdiction and expand the WVDEP's mitigation requirements under the § 401 certification program. While this change may be motivated by a desire to more closely align the state's mitigation requirements with those of the Corps, the

WVDEP's first and most needed step in that direction is compliance with W. Va. Code § 22-11-7a(a)(2)(C). Until the WVDEP revises its mitigation rules and policies to accept Corps-required mitigation, this proposed change will serve only to increase the amount of in-lieu fee mitigation provided to the state, with no resulting environmental benefit. Further, the proposed change appears to be counter to the authorizing statute which bears no mention of the "ordinary high water mark." The WVCA does not support this proposed revision.

6.2.b.1. Compensatory mitigation shall be required for all permanent and temporary stream impacts resulting from coal related activities in watersheds greater than or equal to two hundred and fifty (250) acres and/or when the activity results in a stream loss or impact exceeding one half (1/2) acre of stream. The drainage area and ½ acre assessments shall be measured starting from the toe of the most downstream permanent or temporary impact (excluding stream crossings) in which the activity occurs.

WVCA believes that this proposed revision extends the authority of the state beyond the authorizing, underlying statute:

> 1) If the applicant's surface coal mining operation will not impact waters of the state designated as national resource waters and streams where trout naturally reproduce and will not impact wetlands of the state in a manner inconsistent with all applicable state or federal standards as the case may be, as required by the federal Clean Water Act, and if the watershed above the toe of the farthest downstream permanent structure authorized pursuant to the United States Army Corps of Engineers permits issued in accordance with 33 U.S.C. §1344 and 33 C.F.R. Parts 323 or 330 is less than two hundred fifty acres, then the director may issue a water quality certification pursuant to the requirements of this section. If the watershed above the toe of the farthest downstream permanent structure impacted is equal to or greater than two hundred fifty acres, the director shall require that mitigation be undertaken. Additionally, the director may require mitigation for temporary impacts to waters of the state as specified in subdivision (2) of this subsection.

(2) If the watershed above the toe of the farthest downstream permanent structure authorized pursuant to the United States Army Corps of Engineers permits issued in accordance with 33 U.S.C. §1344 and 33 C.F.R. Parts 323 or 330 is greater than or equal to two hundred fifty acres and all other necessary requirements are met consistent with this section, the director shall further condition a water quality certification on a requirement that the applicant mitigate the expected water quality impacts under the following conditions…

The above-cited statute contains no reference to "1/2 acre" of stream. Apparently, the agency is attempting to further extend its jurisdiction or merely implementing past policies that existed with respect to coal and non-coal mitigation. Since the statute contains no reference to ½ acre of stream, **WVCA suggests the agency delete this proposed revision. If the agency truly believes that this change is necessary, it should seek a legislative revision to 22-11-7(a) and only then seek to modify the rule.**

6.2.d.1. ~~Permanent impacts for coal related monetary mitigation will be assessed at $200,000 per acre of impacts in watersheds greater than or equal to two hundred and fifty (250) acres from the toe of the farthest downstream permanent structure, and/or exceeds a ½ acre of loss or impact of stream.~~ Monetary compensation for stream impacts resulting from coal related activities shall be assessed as follows:

6.2.d.1.APermanent impacts for coal related monetary mitigation will be assessed at $200,000 per acre of impacts

6.2.d.1.B Temporary coal related stream impacts resulting from structures (excluding stream crossings) that will be removed prior to final bond release will be assessed at $20,000 per acre of stream impact per each five-year period of impact and/or prorated for each year the impact occurs.

6.2.d.1.CTemporary coal related stream impacts resulting from stream crossings (i.e. culverting) and stream relocations where the stream impact is greater than or equal to two hundred one (201) lineal feet, but less than or equal to four hundred (400) lineal feet and is in place for five years or more, shall be assessed at $20,000 per acre for the first five (5) year period and prorated for each additional year the impact shall occur. A temporary stream impact resulting in more than four hundred (400) linear feet shall be monetary compensated at a rate of $20,000 per acre per each five (5) year term and/or prorated for

each year the impact occurs.

As noted in our general comments, the state § 401 certification program has functioned for several years without the level of minutia and detail presented here, and there appears to be no justification for adding these new provisions to the rule at this time. In addition, because § 404 permit mitigation plans cover both permanent and temporary impacts, there is no need for the duplicative state provision for monetary mitigation. As explained in our general comments, the Corps and EPA have continuously stressed a desire for on-site, in-kind mitigation. Using the "Central Appalachian Protocol", coal mining operations have been providing on-site, in-kind mitigation through the reclamation and stream reconstruction process. These projects have been embraced by the Corps and EPA through mining-specific regulatory guidance.

WVCA questions the need for these revisions, and urges WVDEP to re-evaluate the need for this provisions in light of the federal mitigation now required as part of a § 404 permit and the mandate of W. Va. Code § 22-11-7a(a)(2)(C) to rely on and give credit for federally mandated mitigation to satisfy any state mitigation needs.

6.2.d.1.D Permanent wetland impacts for coal related monetary mitigation will be assessed at the rate $30,000 per acre of wetland replaced based on the ratios in section 6.2.c.

Again, as noted in our general comments, the state § 401 certification program has functioned for several years without the level of minutia and detail presented here, and there appears to be no justification for adding these new provisions to the rule at this time. In addition, § 404 permit mitigation plans cover

both permanent and temporary impacts to all impacted aquatic resources, including wetlands, and there is no need for the duplicative state provision for monetary mitigation for wetland impacts.

To the extent WVDEP nevertheless chooses to pursue this proposed revision, it has no justification for the $30,000 replacement value proposed. In addition, by proposing this specific amount, the WVDEP has excluded any opportunity to determine a monetary mitigation amount for wetlands on a case-by-case basis, which could be either higher or lower than $30,000 per acre.

In-lieu fee payment for wetlands impacts is a desirable option to have, but we question whether the agency will ultimately determine that wetland replacement as already specified in the rule is sufficient. The WVCA cannot support this proposed revision without additional justification and explanation, and again urges the WVDEP to re-evaluate the need for this provisions in light of the federal mitigation now required as part of a § 404 permit and the mandate of W. Va. Code § 22-11-7a(a)(2)(C) to rely on and give credit for federally mandated mitigation to satisfy any state mitigation needs.

Sincerely,

Jason Bostic, Vice President
Regulatory & Technical Affairs

West Virginia Coal Association

PO Box 3923, Charleston, WV 25339 ■ (304) 342-4153 ■ Fax 342-7651 ■ www.wvcoal.com

Ms. Gloria Shaffer
West Virginia Department of Environmental Protection
Division of Water and Waste Management-
Water Quality Standards Program
601 57th Street SE
Charleston, WV 25304

Via Electronic Mail: Gjshaffer@wvdep.org

Re: Comments on 2007 Triennial Review of Water Quality Standards

Dear Ms. Shaffer:

Pursuant to the September 22, 2005 announcement by the West Virginia Department of Environmental Protection (WV DEP), the West Virginia Coal Association (WVCA) offers the following comments and observations regarding the agency's first triennial review of water quality standards.

WVCA is a non-profit state coal trade association representing the interests of the West Virginia coal industry on policy and regulation issues before various state and federal agencies that regulate coal extraction, processing, transportation and consumption. WVCA's producing members account for 80 percent of the Mountain State's underground and surface coal production. WVCA also represents associate members that supply an array of services to the mining industry in West Virginia. WVCA's primary goal is to enhance the viability of the West Virginia coal industry by supporting efficient and environmentally

criteria. EPA is currently in the process of revising the nationally-recommended selenium criteria.[6] Because of the flawed nature of the current selenium criteria and its inappropriate application to flowing waters in West Virginia, WVCA is supportive of this federal initiative. However, we caution WV DEP to fully analyze the appropriateness of applying any federally-revised standard in West Virginia. Available information seems to indicate that a state-specific selenium standard for West Virginia may be warranted, as fish populations appear to be healthy and diverse in streams with identified selenium concentrations.[7] The pressing nature of selenium also warrants that WV DEP investigate a state-specific criteria for West Virginia since the federal revisions remains pending. The agency has recently completed draft TMDL documents that impose selenium allocations based on the existing water quality criteria, and will continue to develop and implement selenium TMDLs, adding urgency to this important issue.

Trout Streams

In the EQB's last triennial review, it proposed adding some 400 streams to the list of Trout Waters contained in the water quality standards rule. The EQB allowed only a 30-day comment period on this major expansion of the Trout Waters list. The EQB proposal was based only on the recommendations of the

[6] See Attachment "F", October 29, 1999 Federal Register Notice published by EPA regarding revision of the selenium criteria and Attachment "G", December 17, 2004 Federal Register Notice announcing draft criteria and requesting public comments.

[7] See Attachment "H", relevant pages from comments filed by the National Mining Association and WVCA regarding the programmatic Mountaintop Mining/ Valley Fill Environmental Impact Statement and *Fish Communities and Their Responses to Environmental Factors in the Kanawha River Basin, West Virginia, Virginia, and North Carolina.* U.S. Geological Survey, 2001.

West Virginia Division of Natural Resources, with no accompanying data or information on whether or not the streams actually meet the requirements to be classified as trout waters. Based on the lack of information regarding the current status of the proposed trout waters and the limited opportunity for comment provided, the West Virginia Legislature rejected the revision.

The permitting ramifications of classifying streams as trout waters can be significant, as different water quality standards (uniformly more stringent) apply to trout streams. Incorrectly classifying a water as a trout stream can have serious economic impacts for property owners and NPDES dischargers along that streams and should not be taken lightly be WV DEP. Before the agency undertakes any effort as part of its 2007 triennial review to list any additional streams as trout waters, WV DEP should conduct scientific investigations of water quality and fish populations in order to ascertain if a water body meets the criteria required of a trout stream. The agency should also hold hearings in the communities where such streams are located to take comment from the persons most familiar with the conditions of these streams.

We appreciate the agency's consideration of these comments.

Respectfully Submitted,

Jason D. Bostic
West Virginia Coal Association

West Virginia Coal Association

PO Box 3923, Charleston, WV 25339 ■ (304) 342-4153 ■ Fax 342-7651 ■ www.wvcoal.com

July 17, 2006

Mr. Charles Sturey
West Virginia Department of Environmental Protection
Division of Mining & Reclamation
601 57th Street SE
Charleston, WV 25304

Re: Comments on Proposed Revisions to 38 CSR 2

Dear Mr. Sturey:

Pursuant to the notice filed with the Secretary of State on June 15, 2006, the West Virginia Coal Association (WVCA) offers the following comments and observations regarding the agency's proposed revisions to 38 CSR 2, the state's Mining and Reclamation rules.

WVCA is a non-profit state coal trade association representing the interests of the West Virginia coal industry on policy and regulation issues before various state and federal agencies that regulate coal extraction, processing, transportation and consumption. WVCA's membership accounts for over 80 percent of the Mountain State's underground and surface coal production. WVCA's primary goal is to enhance the viability of the West Virginia coal industry by supporting efficient and environmentally responsible coal extraction and processing through reasonable, equitable and achievable state and federal policy and regulation. WVCA appreciates the opportunity to provide comments to the West Virginia

Department of Environmental Protection (WV DEP) regarding the proposed revisions to the state's mining and reclamation rule.

Specific Comments

3.2.g. Notice of Technical Completeness. After the Secretary deems a Surface Mine Application technically complete, the Secretary shall cause the applicant to advertise stating such. The notice shall state that the application has been deemed technically complete by the Secretary and include a fifteen (15) day public review period. Provided, however, Notice of Technical Completeness may not be necessary if the application was technically complete prior to the end of the comment period of the original advertisement and a decision is made within ninety (90) day of the end of the comment period or informal conference.

WVCA believes this revision is unnecessary. Existing state rules provide the agency with authority to require re-advertisement:

> 3.2.e. Re-advertisement. After a Surface Mine Application (SMA) has been advertised once a week for four successive weeks, and is determined by the Secretary to have had a limited number of minor changes that do not significantly affect the health, safety or welfare of the public and which do not significantly affect the method of operation, the reclamation plan, and/or the original advertisement, he may require one (1) additional advertisement to be published with a ten (10) day public comment period.

As the above-cited provision reveals, the agency has the authority to require the additional advertisement that appears to be the goal of the proposed revision. The language of 38 CSR 2.3.e restricts the applicability of the provision to "a limited number of minor changes that do not significantly affect the health, safety or welfare of the public and which do not significantly affect the method of operation, the reclamation plan, and/or the original advertisement..." for changes that are substantive WV DEP has always required re-advertisement. Additionally,

the proposed revisions exceed the corresponding federal requirements maintained by the Office of Surface Mining (OSM) at 30 CFR 773.6. Because the agency has already has the authority to require re-advertisement, WVCA suggests that WV DEP delete the proposed revision.

14.15.c.2. Areas within the confines of excess spoil disposal fills which are under construction provided the fill is being constructed in the "conventional" method, i.e., completed from the toe up, or those fills which are being constructed progressively in lifts from the toe up or are being progressively completed from the toe up by constructing benches and appropriate drainage control structures (ditches, flumes, channels, etc.) from the toe up as soon as the ~~area is available to do so;~~ first two lifts are in and are seeded and certified;

WVCA is extremely concerned about this proposed revision and believes that it will unnecessarily restrict operating flexibility and thereby discourage the construction of "bottom-up" valley fills. WVCA strongly suggests the agency delete this proposed revision. This entire section of rules already exceeds the corresponding federal requirements of OSM, but members of WVCA negotiated the rules in good faith to remedy an agency-perceived problem with valley fill construction. These rules have been scrutinized and approved by the West Virginia Legislature and OSM. WVCA is concerned as to why the agency believes this change is necessary, and would be willing to discuss other possible remedies to the situation.

Respectfully Submitted,

Jason D. Bostic, Vice-President
Regulatory & Technical Affairs

Surface Mining 38 CSR2 (agreement)
401 Certification 47 CSR5A
TROUT LISTING

45CSR42

2.5 1 Biogenic Sources include COAL

TITLE 45

LEGISLATIVE RULE
DEPARTMENT OF ENVIRONMENTAL PROTECTION
DIVISION OF AIR QUALITY

SERIES 42
GREENHOUSE GAS EMISSIONS INVENTORY PROGRAM

3.2 turned an exemption into an inclusion
5.3 "Shall provide information"

§45-42-1.General.

1.1. Scope. -- This rule establishes a greenhouse gas emissions inventory program in West Virginia which:

1.1.a. Requires the reporting and inventory of greenhouse gas emissions by stationary sources which emit more than a *de minimis* amount of greenhouse gases on an annual basis;

1.1.b. Inventories greenhouse gas emissions from stationary, area, mobile and biogenic sources, and accounts for reductions and sequestration of greenhouse gas emissions;

1.1.c. Provides for a periodic compilation of a greenhouse gas emissions inventory and a determination whether West Virginia is a net sink or emitter of greenhouse gases;

1.1.d. Provides for development of a registry to record voluntary reductions of greenhouse gas emissions; and

1.1.e. Provides for a determination whether the reduction and sequestration of greenhouse gas emissions can be developed as an asset for economic development.

1.2. Authority. -- W.Va. Code §22-5-19.

1.3. Filing Date. --

1.4. Effective Date. -- June 1, 2008.

§45-42-2. Definitions.

2.1. "Air pollutants" means solids, liquids, or gases which, if discharged into the air, may result in statutory air pollution.

2.2. "Air pollution" or "statutory air pollution" means and is limited to the discharge into the air by the act of man substances (liquid, solid, gaseous, organic or inorganic) in a locality, manner and amount as to be injurious to human health or welfare, animal or plant life, or property, or which would interfere with the enjoyment of life or property.

2.3. "Anthropogenic" means a direct result of human activities or the result of natural processes that have been influenced by human activities.

2.4. "Area source" means, for purposes of this rule, a collection of similar sources of air pollutants within a geographic area. Area sources collectively represent individual sources that are small and numerous, and that typically have not been inventoried as a stationary or mobile source.

2.5. "Biogenic" means a naturally occurring biological source or process that is not significantly affected by human actions or activity.

Biogenic sources include COAL

2.6. "Capture" means the collection of greenhouse gas emissions from a stationary source.

2.7. "*De minimis*" means emissions from a stationary source that are equal to or less than ten thousand tons per year for carbon dioxide, four hundred seventy-six tons per year for methane, thirty-two and six tenths tons per year for nitrous oxide, eight hundred fifty-five thousandths tons per year for hydrofluorocarbons, one and nine hundredths tons per year for perfluorocarbons and forty-two hundredths tons per year for sulfur hexafluoride.

2.8. "Emission" means the release, escape or discharge of regulated air pollutants or greenhouse gases into the air.

2.9. "Greenhouse gas" means the gaseous compounds: carbon dioxide, methane, nitrous oxide, hydrofluorocarbons, perfluorocarbons, and sulfur hexafluoride (SF_6).

2.10. "Mobile source" means a variety of onroad and nonroad vehicles, engines, locomotives, marine vessels, airplanes and other equipment that generate air pollutants and greenhouse gas emissions, and that move or can be moved from place to place.

2.11. "Regulated air pollutant" means, for purposes of this rule, any air pollutant regulated under rules promulgated by the Secretary pursuant to W.Va. Code §22-5-4.

2.12. "Reservoir" means a geological site where a greenhouse gas is securely stored.

2.13. "Secretary" means the Secretary of the Department of Environmental Protection or such other person to whom the Secretary has delegated authority or duties pursuant to W.Va. Code §§22-1-6 or 22-1-8.

2.14. "Sequestration" means the physical process by which emissions of a greenhouse gas are directly captured for storage in a reservoir, or the biologic process by which a greenhouse gas is indirectly removed from the atmosphere for storage in a sink.

2.15. "Sink" means any process, activity or mechanism which removes a greenhouse gas from the atmosphere. Forests are considered sinks because they remove carbon dioxide through photosynthesis.

2.16. "Source" means, for purposes of this rule, any process or activity which releases a greenhouse gas into the air.

2.17. "Stationary source" means any building, structure, facility, installation, stationary process or process equipment which emits or may emit any regulated air pollutant or greenhouse gas.

2.18. "Ton" means a short ton, or 2000 pounds.

2.19. Other words and phrases used in this rule, unless otherwise indicated, shall have the meaning ascribed to them in W.Va. Code §22-5-1 et seq.

§45-42-3.Applicability.

3.1. Any stationary source that emits one or more greenhouse gases on an annual basis greater than the *de minimis* amounts listed in the table below, and reports emissions of regulated air pollutants pursuant to the emissions inventory requirements of the Secretary under rule or W.Va. Code §22-5-4(a)(14), shall be an affected source required to report emissions of all greenhouse gases to the Secretary under section 4:

Greenhouse Gas Compound	tons/year
carbon dioxide	10,000
methane	476
nitrous oxide	32.6

Any facility, etc.

hydrofluorocarbons	0.855
perfluorocarbons	1.09

sulfur hexafluoride	0.42

rec plants under title IV

s/s/y stationary sources

3.2. Stationary sources which are regulated by the Secretary under W.Va. Code §22-3-1 et seq. and do not report emissions of regulated air pollutants pursuant to the emissions inventory requirements under W.Va. Code §22-5-4(a)(14) are not required to, but may voluntarily report their greenhouse gas emissions under section 4.

§45-42-4.Reporting Requirements.

4.1. By March 31, 2009, and March 31 of each year thereafter, affected sources shall report to the Secretary the quantity of all greenhouse gases emitted in the previous calendar year.

4.2. Affected sources shall only be required to report annual quantities of anthropogenic non-mobile source greenhouse gas emissions at the source, and shall not be required to report biogenic emissions of greenhouse gases.

4.3. The Secretary shall determine the form and format of the information reported by affected sources under subsection 4.1 to ensure that the information is consistent as possible with developing regional, national, or international greenhouse gas emissions programs.

4.4. Notwithstanding the provisions of subsection 4.3, to satisfy the greenhouse gas emission reporting requirements under this section, affected sources may submit greenhouse gas emissions inventory information from documented greenhouse gas inventories such as those provided to the Environmental Protection Agency's Climate Leaders Program, Chicago Climate Exchange Registry, the International Organization for Standardization and the SF_6 Emissions Reduction Partnership for Electric Power Systems. Greenhouse gas emissions inventory information from other widely recognized and verified greenhouse gas emissions inventory programs may be submitted by affected sources under this subsection, but shall be subject to approval by the Secretary on a case-by-case basis.

4.5. Reports of greenhouse gas emissions submitted to the Secretary under this section shall be signed by a responsible official and shall include the following certification statement: "I, the undersigned, hereby certify that the data transmitted to the West Virginia Department of Environmental Protection is true, accurate, and complete, based upon information and belief formed after reasonable inquiry."

§45-42-5.Greenhouse Gas Emissions Inventory.

5.1. The Secretary shall periodically compile an inventory of greenhouse gas emissions to:

5.1.a. Characterize the relative contributions of greenhouse gas emissions from stationary, area, mobile and biogenic sources in West Virginia; and

5.1.b. Determine the extent to which greenhouse gas emissions are offset by the rate of sequestration, and whether West Virginia is a net sink or emitter of greenhouse gases.

5.2. The greenhouse gas emissions inventory shall include the emissions from stationary sources reported under section 4, and other relevant information regarding significant emissions, reductions, and sequestration of greenhouse gases from stationary, area, mobile

entire surface Area / underground Area is an AREA SOURCE

and biogenic sources requested by the Secretary under subsections 5.3 and 5.4.

5.3. To inventory greenhouse gas emissions reductions, the Secretary shall consult with the citizenry and other entities such as industry trade groups that have information relating to greenhouse gas emissions reductions, and sequestration. Upon request of the Secretary, such entities shall provide relevant information relating to greenhouse gas emissions reductions; capture and sequestration.

5.4. The Department of Agriculture, the Division of Forestry, Marshall University, West Virginia University, West Virginia Geological and Economic Survey, and the Department of Transportation shall enter into interagency agreements with the Secretary and at the Secretary's request provide:

5.4.a. Relevant information relating to greenhouse gas emissions from area, mobile and biogenic sources;

5.4.b. Relevant information relating to greenhouse gas emissions reductions and sequestration; and

5.4.c. Any assistance the Secretary may request during the development of the greenhouse gas emissions inventory.

5.5. The Secretary shall determine the form and format of the information submitted by the entities under subsections 5.3 and 5.4 to ensure that the information is consistent as possible with developing regional, national, or international greenhouse gas emissions programs.

§45-42-6.Greenhouse Gas Emissions Registry Program.

6.1. The Secretary shall develop a registry for the recordation of voluntary reductions of greenhouse gas emissions.

6.2. The greenhouse gas emissions registry program shall be as consistent as possible with developing regional, national, or international programs designed to monitor, quantify and register reductions in greenhouse gas emissions with respect to:

6.2.a. Development of criteria, based on a set of standardized emissions accounting, reporting and verification protocols, to determine baseline emissions and quantification of voluntary reductions in emissions of greenhouse gases;

6.2.b. Public recognition of such voluntary emissions reductions;

6.2.c. Consideration of voluntary greenhouse gas emission reductions when determining baselines and reduction requirements under future federal greenhouse gas emission reduction programs; and

6.2.d. The ability of sources to participate in future greenhouse gas emission trading programs.

§45-42-7.Economic Development Potential.

7.1. Using information obtained, gathered or developed under this rule, the Secretary will determine whether the reduction and sequestration of greenhouse gas emissions can be developed as an asset for economic development in West Virginia.

§45-42-8.Inconsistency Between Rules.

8.1. In the event of any inconsistency between this rule and any other rule of the West Virginia Department of Environmental Protection, the inconsistency shall be resolved by the determination of the Secretary and the determination shall be based upon the application of the more stringent provision, term, condition, method or rule.

13 results for: *Biogenic*

Displaying 1 best match. Browse all 13 results below.

View results from: Dictionary | Thesaurus | Encyclopedia | All Reference | the Web

Biogenic substance

Wikipedia, the free encyclopedia – Cite This Source

A **biogenic substance** is a substance produced by life processes. It may be either constituents, or secretions, of plants or animals.
Examples

Coal and oil are examples of constituents which have undergone changes over geologic time periods.

Chalk, and limestone are examples of secretions (marine animal shells) which are of geologic age.

Cotton and wood is are biogenic constituents of contemporary origin.

Pearls, silk and ambergris are examples of secretions of contemporary origin.

13 More from Wikipedia »

All 13 results for: *Biogenic*

13 from Wikipedia

From: "Charles Harris" <clharris@hsc.wvu.edu>
To: <jhallinan@hallinanlaw.com>, <rick@lcpsd.com>, <braney@wvcoal.com>, <PWHITE@wvdep.org>, <karen@wvma.com>, <wvml@wvml.org>
Date: 5/24/2007 7:54:40 PM
Subject: Re: May 30, 2007 Meeting

Trish: I received some last minute comments on 33CSR8 that I would like to submit:

§33-9-2. Definitions -- Section 2.5 defines "Beneficial Use" as "the use of a non-hazardous material for a specific beneficial purpose where it is done in a manner that protects groundwater and surface water quality, soil quality, air quality, human health, and the environment." We are concerned that it has not been adequately demonstrated that this filtrate is non-hazardous, and point to the current "inter-sex" fish issue in the Potomac River drainage which illustrates that there are unanswered questions concerning unmonitored pollutants in sludge from both water and waste treatment facilities.

§33-9-2. Definitions - Section 2.5 defines beneficial uses as including "use as a fertilizer substitute, soil amendment, cover material, fill material, mulch or horticultural product, or other purpose approved by the Secretary." However, Section 33-9-3, in sub-Section 3.1.b.1 requires that "The use proposed is a reuse, and not a disposal." We suggest that the use of this filtrate as fill material is actually simply a disposal and not a "reuse." We believe this material should not be used as fill material. This would also require a change to Section 33-9-5, sub-Section 5.2.

§33-9-5. Standards for Beneficial Use of Filtrate - sub-Section 5.3 states, "The Secretary may approve the use of filtrate as fill material within fifty (50) feet of surface water upon submission of information sufficient to show that the fill material will have no significant impact on the quality of runoff reaching the surface water." Even the U.S. Forest Service has adopted stronger stream buffers for sediment runoff. DEP should develop stronger stream buffers for this rule, and there should be no discretion.

§33-9-7. -- DEP made changes to this rule during the Interims process last year, and the rule now requires a permit for both short-term and long-term applications. This is a good change. However, we feel that most of the information required in Section 7.3. Permit Application Requirements for long-term permits should also be required for short-term permits.

§33-9-8. Draft Permits and Public Comment. Section 8.2.a. provides for a 30-day public comment period for long-term permits, but only a 15-day public comment period for short-term permits. We oppose the shortened public notice provisions for short-term permits. The 30-day comment period should apply in both instances.

§ 33-9-11. General permits. We oppose the development of a General Permit to cover the provisions of this rule. Specific individual permits are necessary to inform potentially affected parties of the application of this material.

Appendix A -- Frequency of Monitoring. The Legislative Rule-Making Review Committee last session accepted an amendment proposed by industry that reduced monitoring tests to once a year. While we would prefer even more frequent monitoring than proposed in this rule, we hope DEP will strongly oppose any attempts to reduce the monitoring provisions provided in this rule.

Charles L. Harris
Professor of Biochemistry
West Virginia University
School of Medicine
304-293-7749
>>> "Patricia White" <PWHITE@wvdep.org> 05/21/07 4:21 PM >>>
Please be advised of the following meeting:

Comments on DEP Rules for 2007

Communicated by Larry Harris, Public Advisory Council Member

I would like to commend the staff of the DEP for the hard work and expertise used in preparing and reviewing the rules with Council. As promised, I include below some of the technical and other issues raised during the May 21 meeting of the Council, omitting some questions that were answered at the meeting. Members of the environmental community who reviewed the rules raised some of the questions.

Some of the issues mentioned below are related to the act of valley fills and determining compensation for this process. I have pointed out my view to Council previously that the permitting of valley fills is essentially allowing the destruction of upper tributaries of watersheds. As such the process should be outlawed, in my view.

47CSR2 Water Quality

We learned that the B2 list is essentially the same as submitted previously and includes the definition of trout waters cited on page 2 of the rule.

.Page 11: Why is the temperature regulation on Stony River being removed?

47CSR2 (7.2.d.9) — The removal of variances, etc. on the Blackwater seems to be a strength, but why do these rivers remain "reserved" on the list? Why not just remove them?

47CSR2 (7.2.d.34.1): Adds language for site-specific applicability of water use categories and water quality criteria: "Pats Branch from its confluence with the Guyandotte River to a point 1000 feet upstream shall not have Water Use Category A and Category D1 designation."

* Is this a use removal? Yes was the answer.
* If so, did this go through the appropriate public process and use attainability analysis to justify a use removal . Did the use and attainability

analysis follow the federal Clean Water Act provision. (i.e. how was this decision justified)? Not sure this was fully answered.

47CSR2 (Appendix E):

Are the changes in concentrations for cadmium, copper, and others in Appendix E consistent with EPA changes/ recommendations? Some of the changes in hardness calculations are in response to comments from our groups last year asking DEP to be consistent--so this is good.

47CSR5A

47 CSR 5A (State Certification)

***47CSR5A (4.2.f.4): seems to be weakening the system for determining stream miles (delineation). DEP inserts the language: "The stream shall be measured from the farthest downstream disturbance, excluding stream crossings associated with haul roads for surface mining operations, upstream to the beginning of the ordinary high water mark."

This will result in fewer stream miles being "delineated" as actual stream miles, it seems. Why would you move upstream (where there are fewer inputs) to find a high water mark? Thus, it also seems fewer miles of headwaters will be mitigated for impacts.

47CSR5A (6.2.b): Typo—"loses" should be "losses"

47CSR5A (6.2.d.1): Is there a discrepancy between how monetary compensation for coal versus non-coal impacts is assessed? It may be worth determining that coal is not getting a break, in comparison to non-coal.

For example—why is it lineal miles for coal and acreage for non-coal? If they are going to assess from the high water mark—as discussed above—will this not result in fewer stream miles and thus fewer miles to mitigate/compensate? Also, there is no assessment for non-coal related temporary impacts—why?

60 CSR5 Antidegradation

I made the suggestion that the list of Tier 2.5 streams (156 in the current rule) should be returned to the same number as began the legislative session, which is 309 streams. A scientific process that included expertise

from the WVDNR, which manages trout waters, arrived at the list of 309 streams. The list now submitted with the bill was reduced by the political process. Politics should not determine which streams merit protection from pollution; science should.

Other issues:

2.11 Explanation of the addition of this trading section is needed. Is this similar to EPA rules and consistent with the Clean Water Act?

3.9 Which advisory committee is this phrase referring to:

5.5b is removed. Why?

Is the procedure for nomination and addition of streams to the tier 2.5 list adequate?

Comments from Adam Webster (WVRC)

60CSR5 (2.11) : It's good that DEP provides "upstream controls" and mentions "for the same parameter" in the first sentence of the "trading" definition. Overall, the definition is good, but it is important to remember that the intent of the definition is not to allow cross-pollutant trading. With this in mind, the second sentence—"More than one parameter of concern may be traded on a given stream"—needs to be worded more restrictively (i.e. despite what the first sentence says, the second sentence could be interpreted as if cross-pollutant trading is allowed).

*** 60CSR5 (5.2) : Removes (strikes) the language: "Water segments that support the minimum fishable/swimmable uses and have assimilative capacity remaining for some parameters shall generally be afforded Tier 2 protection".

Does this suggest the default is Tier 1 (if data does not suggest otherwise)? If so,why?

60CSR5 (5.6.c) : The deletion is a response to lawsuit. However, the new 5.6.c suggests they cannot assess assimilative capacity when dealing with pH,

DO, temperature, and fecal coliform. We feel that they can assess these parameters and should not treat them separately.

45CSR42 Greenhouse Gases

The fact that the DEP is beginning to deal with the process of greenhouse gases that lead to global warming is commendable. Some questions on the rule were raised by Dr. Kotcon:

The greenhouse gases emissions inventory rule (45-42-1) needs to be
>strengthened considerably. The sections on emissions inventory
>(section 5, pages 3-4) is so vague as to be meaningless, especially
>as it deals with sequestration for area sources and sinks. I do not
>see how any meaningful data can be generated with this language.
How would the carbon sequestration be estimated? Has there been studies estimating the biogenic incorporation of CO2 per acre of woodland, for example? The rule appears to be a vague in how it would be implemented.

Air Quality and Emission Rules (see below)

45CSR8 Ambient Air Quality Standards

Don Garvin pointed out that the the antidegradation language was removed from this rule, and it was explained that the agency feels these provisions are now covered in 45-CSR-14("Prevention of Significant Deterioration.") However, the language that was stricken does not appear in 45-CSR-14, and the stricken language is the ONLY statement in the rules of West Virginia's antidegradation policy for air quality. The environmental community still believes the stricken language should be restored.

Here is what should be reinstated:

§45-8-2. Anti-Degradation Policy.

2.1. Pursuant to the best interests of the State of West Virginia, it is the objective of the Secretary to obtain and maintain the cleanest air possible, consistent with the best available technology.

2.2. Where the present ambient air is of better quality than the established standards, the Secretary will develop long-range plans to protect the difference between the present quality and the established standards. The plans will be based upon the best available forecasts of probable land and air uses in these areas of high air quality.

2.3. The air quality of these areas will not be lowered unless it has been clearly demonstrated to the Secretary that such a change is justifiable as a result of necessary economic or social development and will not result in statutory air pollution. This will require that any industrial, public, or private project or development which could constitute a new source of air pollutants, within an area of such high air quality, provide the best practicable control available under existing technology as part of the initial project or development.

45CSR41 Control of Annual SO2 emissions

45CSR6 Control of Air Pollution from Refuse Combustion

45CSR39 Nitrogen Oxides

I raised the general concern whether the standards for air quality were consistent with the EPA guidelines or not. Further, were any recognized health authorities consulted when these levels were determined? I also raised the issue that West Virginia is increasing supplying electricity to the population east of our mountains. New transmission lines are proposed that are to be connected with coal burning power plants. Billy Jack Gregg, Consumer Advocate for the WV PSC has pointed out that the states receiving our generated power will not permit generation plants in their region. They are concerned about air pollution and its various effects. But they need power, so they turn to West Virginia. This helps the coal industry and generation plants, but puts the health of West Virginians in jeopardy. I feel that our air quality and emission limits should be even more stringent than the EPA calls for in order to protect our citizens. This should be particularly true for power plants that export electricity.

Dr. Kotcon has raised the following issues:

45-CSR-8 Ambient Air Quality Standards

The standards for PM2.5 and Ozone are not adequately protective. I recommend that the standards be lowered from 15 $\mu g/m^3$ to 13 $\mu g/m^3$ in section 4.2.b., and from 0.08 ppm to 0.07 ppm in section 4.4.b.

The air standards (45-8-1) retains the standards for PM2.5 and ozone
>that the EPA Clean Air Scientific Advisory Council has already
>determined to be inadequate. Keeping these old standards will kill
>dozens or hundreds of West Virginians each year.

>The rule on refuse combustion (45-6-1) attempts to revise the
>definition of low-level radioactive waste and revives the
>Below-Regulatory_Concern (BRC) issue from some years ago. It also
>creates a large number of exemptions for "temporary" pollution
>sources. I am not yet sure if this re-opens old battles over
>medical waste incineration, but this was a really hot issue a few
>years back.

Comment submitted by Karen Price at Council meeting 5/30/07

Questions/Comments on DEP's 2007 Proposed Rules

- **45 CSR 8 Ambient Air Quality Standards**

Section 4.2.c – $PM_{2.5}$ Maximum 24-Hour Average Concentration. The level for the 24-hour primary and secondary standard states 35 ug/m^3. This should be 65 ug/m^3, pursuant to 40 CFR 50.7.

- **45 CSR 39, 45 CSR 40, 45 CSR 41**

The opt-in unit language is deleted from each of these rules. What is the purpose for the deletion of these provisions?

- **33 CSR 30, Underground Storage Tank Rules**

Section 6.1. states "....including any person who accepts a delivery order, accepts payment, delivers or deposits product into an underground storage tank.....". The portion that states "...accepts payment..." should be removed from this section because those individuals within a company who accept payment or make payments most often do not know anything about the underground storage tank (UST), the operation of the UST, or the current regulatory status of the UST.

Section 7.3.a.1. states "....the methodology for verifying attendance, the date, time and location of the course, the name of the offering organization, the credentials of the instructors, and a certification that the technology or methods.....".

1. The portion that states "..the date, time and location of the course,...." should be deleted. For large companies with many UST installations and locations there can be numerous individuals that need to be trained. Training will most likely occur on multiple dates, times, and locations that may not always be known until just prior to the training event. When new employees are hired training might

occur on short notice and for one individual. The burden of having to repor the dates, time and locations would hinder and slow down the training process and restrict a company's ability to comply.

2. The portion that states "...the credentials of the instructors..." should be removed. Credentials will vary from instructor to instructor new instructors might be utilized, and a company might not know which instructors will be used at the various training sessions until just prior to the training session. In addition, the course content is the main issue of concern and should be the main focus in obtaining State approval of a training program.

Section 7.3.a.2 - This section states that a nonrefundable application fee of $280 must be submitted with the application. Larger companies may have one training program, but administer the training on multiple dates, times and locations. Having to submit an application for approval of the training program each time the program is administered would be cost prohibitive, burdensome, and would hinder the training process. The State should clarify or make provision for a company to submit one application for the training program that will be administered to all company UST facilities. This will make the $280 application fee reasonable and the application process less burdensome.

APPENDIX B

FISCAL NOTE FOR PROPOSED RULES

Rule Title: Requirements Govering Water Quality Standards, 47CSR2

Type of Rule: [X] Legislative [ ] Interpretive [ ] Procedural

Agency: West Virginia Department of Environmental Protection

Address: 601 57th Street, SE

Charleston, WV 25304

Phone Number: (304) 926-0495 Email: lmcclung@wvdep.org

Fiscal Note Summary

Summarize in a clear and concise manner what impact this measure will have on costs and revenues of state government.

No fiscal impacts on state government are anticipated.

Fiscal Note Detail

Show over-all effect in Item 1 and 2 and, in Item 3, give an explanation of Breakdown by fiscal year, including long-range effect.

FISCAL YEAR			
Effect of Proposal	Current Increase/Decrease (use "-")	Next Increase/Decrease (use "-")	Fiscal Year (Upon Full Implementation)
1. Estimated Total Cost	0.00	0.00	0.00
Personal Services	0.00	0.00	0.00
Current Expenses	0.00	0.00	0.00
Repairs & Alterations	0.00	0.00	0.00
Assets	0.00	0.00	0.00
Other	0.00	0.00	0.00
2. Estimated Total Revenues	0.00	0.00	0.00

Rule Title: _____

Rule Title: Requirements Govering Water Quality Standards, 47CSR2

3. **Explanation of above estimates (including long-range effect):**
Please include any increase or decrease in fees in your estimated total revenues.

None anticipated

MEMORANDUM

Please identify any areas of vagueness, technical defects, reasons the proposed rule **would not** have a fiscal impact, and/or any special issues **not** captured elsewhere on this form.

The proposed revisions reflect updates identified during the federally-mandated triennial review of the Water Quality Standards rule. These include proposed additions to the trout water list, new criteria for nutrients, revisions to criteria in Appendix E and a use redesignation in the Guyandotte River basin. Costs of implementing the changes will be absorbed in the agency's current budget.

Date: May 7, 2007

Signature of Agency Head or Authorized Representative

TITLE 47
LEGISLATIVE RULES
DEPARTMENT OF ENVIRONMENTAL PROTECTION

SERIES 2
REQUIREMENTS GOVERNING WATER QUALITY STANDARDS

§47-2-1. General.

1.1. Scope. -- These rules establish requirements governing the discharge or deposit of sewage, industrial wastes and other wastes into the waters of the state and establish water quality standards for the waters of the State standing or flowing over the surface of the State. It is declared to be the public policy of the State of West Virginia to maintain reasonable standards of purity and quality of the water of the State consistent with (1) public health and public enjoyment thereof; (2) the propagation and protection of animal, bird, fish, and other aquatic and plant life; and (3) the expansion of employment opportunities, maintenance and expansion of agriculture and the provision of a permanent foundation for healthy industrial development. (See W. Va. Code §22-11-2.)

1.2. Authority. -- W. Va. Code §22-11-4(a)(16); §22-11-7b

1.3. Filing Date. -- ~~May 10, 2006.~~

1.4. Effective Date. -- ~~June 1, 2006.~~

§47-2-2. Definitions.

The following definitions in addition to those set forth in W. Va. Code §22-11-3, shall apply to these rules unless otherwise specified herein, or unless the context in which used clearly requires a different meaning:

2.1. "Conventional treatment" is the treatment of water as approved by the West Virginia Bureau for Public Health to assure that the water is safe for human consumption.

2.2. "Cool water lakes" are lakes managed by the West Virginia Division of Natural Resources for cool water fisheries, with summer residence times greater than 14 days.

~~2.2.~~ 2.3. "Cumulative" means a pollutant which increases in concentration in an organism by successive additions at different times or in different ways (bio-accumulation).

~~2.3.~~ 2.4. "Designated uses" are those uses specified in water quality standards for each ~~water body~~ water or segment whether or not they are being attained. (See sections 6.2 - 6.6, herein)

~~2.4.~~ 2.5. "Dissolved metal" is operationally defined as that portion of metal which passes through a 0.45 micron filter.

~~2.5.~~ 2.6. "Existing uses" are those uses actually attained in a ~~water body~~ water on or after November 28, 1975, whether or not they are included in the water quality standards.

~~2.6.~~ 2.7. The "Federal Act" means the Clean Water Act (also known as the Federal Water Pollution Control Act) 33 U.S.C. § 1251 - 1387.

~~2.7.~~ 2.8. "High quality waters" are those waters whose quality is equal to or better than the minimum levels necessary to achieve the national water quality goal uses.

~~2.8.~~ 2.9. "Intermittent streams" are streams which have no flow during sustained periods of no precipitation and which do not support aquatic life whose life history requires residence in flowing waters for a continuous period of at least six (6) months.

~~2.9.~~ 2.10. "Outstanding national resource waters" are those waters whose unique character, ecological or recreational value or pristine nature constitutes a valuable national or State resource.

~~2.10.~~ 2.11. "Natural" or "naturally occurring" values or "natural temperature" shall mean for all of the waters of the state:

~~2.10.a.~~ 2.11.a. Those water quality values which exist unaffected by -- or unaffected as a consequence of -- any water use by any person; and

~~2.10.b.~~ 2.11.b. Those water quality values which exist unaffected by the discharge, or direct or indirect deposit of, any solid, liquid or gaseous substance from any point source or non-point source.

~~2.11.~~ 2.12. "Non-point source" shall mean any source other than a point source from which pollutants may reach the waters of the state.

~~2.12.~~ 2.13. "Persistent" shall mean a pollutant and its transformation products which under natural conditions degrade slowly in an aquatic environment.

~~2.13.~~ 2.14. "Point source" shall mean any discernible, confined and discrete conveyance, including, but not limited to, any pipe, ditch, channel, tunnel, conduit, well, discrete fissure, container, rolling stock or vessel or other floating craft, from which pollutants are or may be discharged. This term does not include agricultural stormwater discharges and return flows from irrigated agriculture.

~~2.14.~~ 2.15. "Representative important species of aquatic life" shall mean those species of aquatic life whose protection and propagation will assure the sustained presence of a balanced aquatic community. Such species are representative in the sense that maintenance of water quality criteria will assure both the natural completion of the species' life cycles and the overall protection and sustained propagation of the balanced aquatic community.

~~2.15.~~ 2.16. "Secretary" shall mean the Secretary of the Department of Environmental Protection or such other person to whom the Secretary has delegated authority or duties pursuant to W. Va. Code §§22-1-6 or 22-1-8.

~~2.16.~~ 2.17. The "State Act" or "State Law" shall mean the West Virginia Water Pollution Control Act, W. Va. Code §22-11-1 et seq.

~~2.17.~~ 2.18. "Total recoverable" refers to the digestion procedure for certain heavy metals as referenced in 40 CFR 136, as amended June 15, 1990, Guidelines Establishing Test Procedures for the Analysis of Pollutants Under the Clean Water Act.

~~2.18.~~ 2.19. "Trout waters" are ~~streams or stream segments~~ waters which sustain year-round trout populations. Excluded are those ~~streams or stream segments~~ waters which receive annual stockings of trout but which do not support year-round trout populations.

~~2.19.~~ 2.20. "~~Water~~ Waters of special concern" are those waters occurring in the categories outlined in section 4.1.c. of the antidegradation policy. This designation provides an intermediate level of antidegradation protection between high quality waters and outstanding national resource waters.

~~2.20.~~ 2.21. "Water quality criteria" shall mean levels of parameters or stream conditions that are required to be maintained by these regulations. Criteria may be expressed as a constituent concentration, levels, or narrative statement, representing a quality of water that supports a designated use or uses.

~~2.21.~~ 2.22. "Water quality standards" means the combination of water uses to be protected and the water quality criteria to be maintained by these rules.

~~2.22.~~ 2.23. "Wetlands" are those areas that are inundated or saturated by surface or groundwater at a frequency and duration sufficient to support, and that under normal circumstances do support, a prevalence of vegetation typically adapted for life in saturated soil conditions. Wetlands generally include swamps, marshes, bogs and similar areas.

~~2.23.~~ 2.24. "Wet weather streams" are streams that flow only in direct response to precipitation or whose channels are at all times above the water table.

§47-2-3. Conditions Not Allowable In State Waters.

3.1. Certain characteristics of sewage, industrial wastes and other wastes cause pollution and are objectionable in all waters of

the state. Therefore, the Secretary does hereby proclaim that the following general conditions are not to be allowed in any of the waters of the state.

3.2. No sewage, industrial wastes or other wastes present in any of the waters of the state shall cause therein or materially contribute to any of the following conditions thereof:

3.2.a. Distinctly visible floating or settleable solids, suspended solids, scum, foam or oily slicks;

3.2.b. Deposits or sludge banks on the bottom;

3.2.c. Odors in the vicinity of the waters;

3.2.d. Taste or odor that would adversely affect the designated uses of the affected waters;

3.2.e. Materials in concentrations which are harmful, hazardous or toxic to man, animal or aquatic life;

3.2.f. Distinctly visible color;

3.2.g. Concentrations of bacteria which may impair or interfere with the designated uses of the affected waters;

3.2.h. Requiring an unreasonable degree of treatment for the production of potable water by modern water treatment processes as commonly employed; and

3.2.i. Any other condition, including radiological exposure, which adversely alters the integrity of the waters of the State including wetlands; no significant adverse impact to the chemical, physical, hydrologic, or biological components of aquatic ecosystems shall be allowed.

§47-2-4. Antidegradation Policy.

4.1. It is the policy of the State of West Virginia that the waters of the state shall be maintained and protected as follows:

4.1.a. Tier 1 Protection. Existing water uses and the level of water quality necessary to protect the existing uses shall be maintained and protected. Existing uses are those uses actually attained in the ~~water body~~ water on or after November 28, 1975, whether or not they are included as designated uses within these water quality standards.

4.1.b. Tier 2 Protection. The existing high quality waters of the state must be maintained at their existing high quality unless it is determined after satisfaction of the intergovernmental coordination of the state's continuing planning process and opportunity for public comment and hearing that allowing lower water quality is necessary to accommodate important economic or social development in the area in which the waters are located. If limited degradation is allowed, it shall not result in injury or interference with existing stream water uses or in violation of state or federal water quality criteria that describe the base levels necessary to sustain the national water quality goal uses of protection and propagation of fish, shellfish and wildlife and recreating in and on the water.

In addition, the Secretary shall assure that all new and existing point sources shall achieve the highest established statutory and regulatory requirements applicable to them and shall assure the achievement of cost-effective and reasonable best management practices (BMPs) for non-point source control. If BMPs are demonstrated to be inadequate to reduce or minimize water quality impacts, the Secretary may require that more appropriate BMPs be developed and applied.

4.1.b.1. High quality waters are those waters meeting the definition at section ~~2.7~~ 2.8 herein.

4.1.b.2. High quality waters may include but are not limited to the following:

4.1.b.2.A. Streams designated by the West Virginia Legislature under the West Virginia Natural Stream Preservation Act, pursuant to W. Va. Code §22-13-5; and

4.1.b.2.B. Streams listed in West Virginia High Quality Streams, Fifth Edition, prepared by the Wildlife Resources

Division, Department of Natural Resources (1986).

4.1.b.2.C. Streams or stream segments which receive annual stockings of trout but which do not support year-round trout populations.

4.1.c. Tier 2.5 Protection. Waters of special concern include all of those waters listed in 60 C.S.R. 5, Appendix A. Waters of special concern may include, but are not limited to naturally reproducing trout streams, federally designated rivers under the "Wild and Scenic Rivers Act," 16 U. S.C. §§ 1271 et seq., waters in state parks and forests, waters in National parks and forests, waters designated under the "National Parks and Recreation Act of 1978," and waters with unique or exceptional aesthetic, ecological, or recreational value. Waters may be nominated for inclusion in this category by any interested party or by the ~~Board~~ Secretary on ~~its~~ his or her own initiative.

In addition to the Waters of Special Concern outlined in 60 CSR 5 - "Antidegradation Implementation Procedures", Appendix A, the following streams are classified as Waters of Special Concern:

4.1.c.1. Watkins Run (Preston County) ~~and;~~

4.1.d. Tier 3 Protection. In all cases, waters which constitute an outstanding national resource shall be maintained and protected and improved where necessary. Outstanding national resource waters include, but are not limited to, all streams and rivers within the boundaries of Wilderness Areas designated by The Wilderness Act (16 U.S.C. §1131 et seq.) within the State.

Additional waters may be nominated for inclusion in that category by any interested party or by the Secretary on his or her own initiative. To designate a nominated water as an outstanding national resource water, the Secretary shall follow the public notice and hearing provisions as provided in 46 C.S.R. 6.

4.1.e. All applicable requirements of section 316(a) of the Federal Act shall apply to modifications of the temperature water quality criteria provided for in these rules.

§47-2-5. Mixing Zones.

5.1. In the permit review and planning process or upon the request of a permit applicant or permittee, the Secretary may establish on a case-by-case basis an appropriate mixing zone.

5.2. The following guidelines and conditions are applicable to all mixing zones:

5.2.a. The Secretary will assign, on a case-by-case basis, definable geometric limits for mixing zones for a discharge or a pollutant or pollutants within a discharge. Applicable limits shall include, but may not be limited to, the linear distances from the point of discharge, surface area involvement, volume of receiving water, and shall take into account other nearby mixing zones. Mixing zones shall take into account the mixing conditions in the receiving stream (i.e: whether complete or incomplete mixing conditions exist). Mixing zones will not be allowed until applicable limits are assigned by the Secretary in accordance with this section.

5.2.b. Concentrations of pollutants which exceed the acute criteria for protection of aquatic life set forth in Appendix E, Table 1 shall not exist at any point within an assigned mixing zone or in the discharge itself unless a zone of initial dilution is assigned. A zone of initial dilution may be assigned on a case-by-case basis at the discretion of the Secretary. The zone of initial dilution is the area within the mixing zone where initial dilution of the effluent with the receiving water occurs, and where the concentration of the effluent will be its greatest in the water column. Where a zone of initial dilution is assigned by the Secretary, the size of the zone shall be determined using one of the four alternatives outlined in section 4.3.3 of US EPA's Technical Support Document for Water Quality-based Toxics Control (EPA/505/2-90-001 PB91-127415, March 1991). Concentrations of pollutants shall not exceed the acute criteria at the edge of the assigned zone of initial dilution. Chronic criteria for the protection of aquatic life may be exceeded within the mixing zone but shall be met at the edge of the assigned mixing zone.

5.2.c. Concentrations of pollutants which exceed the criteria for the protection of

human health set forth in Appendix E, Table 1 shall not be allowed at any point unless a mixing zone has been assigned by the Secretary after consultation with the Commissioner of the West Virginia Bureau for Public Health. Human health criteria may be exceeded within an assigned mixing zone, but shall be met at the edge of the assigned mixing zone. Mixing zones for human health criteria shall be sized to prevent significant human health risks and shall be developed using reasonable assumptions about exposure pathways. In assessing the potential human health risks of establishing a mixing zone upstream from a drinking water intake, the Secretary shall consider the cumulative effects of multiple discharges and mixing zones on the drinking water intake. No mixing zone for human health criteria shall be established on a stream which has a seven (7) day, ten (10) year return frequency of 5 cfs or less.

5.2.d. Mixing zones, including zones of initial dilution, shall not interfere with fish spawning or nursery areas or fish migration routes; shall not overlap public water supply intakes or bathing areas; cause lethality to or preclude the free passage of fish or other aquatic life; nor harm any threatened or endangered species, as listed in the Federal Endangered Species Act, 15 U.S.C. §1531 et seq.

5.2.e. The mixing zone shall not exceed one-third (1/3) of the width of the receiving stream, and in no case shall the mixing zone exceed one-half (1/2) of the cross-sectional area of the receiving stream.

5.2.f. In lakes and other surface impoundments, the volume of a mixing zone shall not affect in excess of ten (10) percent of the volume of that portion of the receiving waters available for mixing.

5.2.g. A mixing zone shall be limited to an area or volume which will not adversely alter the existing or designated uses of the receiving water, nor be so large as to adversely affect the integrity of the ~~water body~~ water.

5.2.h. Mixing zones shall not:

5.2.h.1. Be used for, or considered as, a substitute for technology-based requirements of the Act and other applicable state and federal laws.

5.2.h.2. Extend downstream at any time a distance more than five times the width of the receiving watercourse at the point of discharge.

5.2.h.3. Cause or contribute to any of the conditions prohibited in section 3, herein.

5.2.h.4. Be granted where instream waste concentration of a discharge is greater than 80%.

5.2.h.5. Overlap one another.

5.2.h.6. Overlap any 1/2 mile zone described in section 7.2.a.2 herein.

5.2.i. In the case of thermal discharges, a successful demonstration conducted under section 316(a) of the Act shall constitute compliance with all provisions of this section.

5.2.j. The Secretary may waive the requirements of subsections 5.2.e and 5.2.h.2 above if a discharger provides an acceptable demonstration of:

5.2.j.1. Information defining the actual boundaries of the mixing zone in question; and

5.2.j.2. Information and data proving no violation of subsections 5.2.d and 5.2.g above by the mixing zone in question.

5.2.k. Upon implementation of a mixing zone in a permit, the permittee shall provide documentation that demonstrates to the satisfaction of the Secretary that the mixing zone is in compliance with the provisions outlined in subsections 5.2.b, 5.2.c, 5.2.e, and 5.2.h.2, herein.

5.2.l. In order to facilitate a determination or assessment of a mixing zone pursuant to this section, the Secretary may require a permit applicant or permittee to submit such information as deemed necessary.

§47-2-6. Water Use Categories.

6.1. These rules establish general Water Use Categories and Water Quality Standards for the waters of the State. Unless otherwise

designated by these rules, at a minimum all waters of the State are designated for the Propagation and Maintenance of Fish and Other Aquatic Life (Category B) and for Water Contact Recreation (Category C) consistent with Federal Act goals. Incidental utilization for whatever purpose may or may not constitute a justification for assignment of a water use category to a particular stream segment.

6.1.a. Waste assimilation and transport are not recognized as designated uses. The classification of the waters must take into consideration the use and value of water for public water supplies, protection and propagation of fish, shellfish and wildlife, recreation in and on the water, agricultural, industrial and other purposes including navigation.

Subcategories of a use may be adopted and appropriate criteria set to reflect varying needs of such subcategories of uses, for example to differentiate between trout water and other waters.

6.1.b. At a minimum, uses are deemed attainable if they can be achieved by the imposition of effluent limits required under section 301(b) and section 306 of the Federal Act and use of cost-effective and reasonable best management practices for non-point source control. Seasonal uses may be adopted as an alternative to reclassifying a ~~water body~~ water or segment thereof to uses requiring less stringent water quality criteria. If seasonal uses are adopted, water quality criteria will be adjusted to reflect the seasonal uses; however, such criteria shall not preclude the attainment and maintenance of a more protective use in another season. A designated use which is not an existing use may be removed, or subcategories of a use may be established if it can be demonstrated that attaining the designated use is not feasible because:

6.1.b.1. Application of effluent limitations for existing sources more stringent than those required pursuant to section 301 (b) and section 306 of the Federal Act in order to attain the existing designated use would result in substantial and widespread adverse economic and social impact; or

6.1.b.2. Naturally-occurring pollutant concentrations prevent the attainment of the use; or

6.1.b.3. Natural, ephemeral, intermittent or low flow conditions of water levels prevent the attainment of the use, unless these conditions may be compensated for by the discharge of sufficient volume of effluent discharges to enable uses to be met; or

6.1.b.4. Human-caused conditions or sources of pollution prevent the attainment of the use and cannot be remedied or would cause more environmental damage to correct than to leave in place; or

6.1.b.5. Dams, diversions or other types of hydrologic modifications preclude the attainment of the use, and it is not feasible to restore the ~~water body~~ water to its original condition or to operate such modification in a way that would result in the attainment of the use; or

6.1.b.6. Physical conditions related to the natural features of the ~~water body~~ water, such as the lack of a proper substrate, cover, flow, depth, pools, riffles, and the like, unrelated to water quality, preclude attainment of aquatic life protection uses.

6.1.c. The State shall take into consideration the quality of downstream waters and shall assure that its water quality standards provide for the attainment of the water quality standards of downstream waters.

6.1.d. In establishing a less restrictive use or uses, or subcategory of use or uses, and the water quality criteria based upon such uses, the Secretary shall follow the requirements for revision of water quality standards as required by W. Va. Code §22-11-7b and section 303 of the Federal Act and the regulations thereunder. Any revision of water quality standards shall be made with the concurrence of EPA. The Secretary's administrative procedural regulations for applying for less restrictive uses or criteria shall be followed.

6.2. Category A -- Water Supply, Public. -- This category is used to describe waters which, after conventional treatment, are used for human

consumption. This category includes streams on which the following are located:

6.2.a. All community domestic water supply systems;

6.2.b. All non-community domestic water supply systems, (i.e. hospitals, schools, etc.);

6.2.c. All private domestic water systems;

6.2.d. All other surface water intakes where the water is used for human consumption. (See Appendix B for partial listing of Category A waters; see section 7.2.a.2, herein for additional requirements for Category A waters.) The manganese human health criterion shall only apply within the five-mile zone immediately upstream above a known public or private water supply used for human consumption.

6.3. Category B -- Propagation and maintenance of fish and other aquatic life. --

This category includes:

6.3.a. Category B1 -- Warm water fishery streams. -- Streams or stream segments which contain populations composed of all warm water aquatic life.

6.3.b. Category B2 -- Trout Waters. -- As defined in section ~~2.20~~ 2.19, herein (See Appendix A for a representative list.)

6.3.c. Category B4 -- Wetlands. -- As defined in section ~~2.24~~ 2.23, herein; certain numeric stream criteria may not be appropriate for application to wetlands (see Appendix E, Table 1).

6.4. Category C -- Water contact recreation. -- This category includes swimming, fishing, water skiing and certain types of pleasure boating such as sailing in very small craft and outboard motor boats. (See Appendix D for a representative list of category C waters.)

6.5. Category D. -- Agriculture and wildlife uses.

6.5.a. Category D1 -- Irrigation. -- This category includes all stream segments used for irrigation.

6.5.b. Category D2 -- Livestock watering. -- This category includes all stream segments used for livestock watering.

6.5.c. Category D3 -- Wildlife. -- This category includes all stream segments and wetlands used by wildlife.

6.6. Category E -- Water supply industrial, water transport, cooling and power. -- This category includes cooling water, industrial water supply, power production, commercial and pleasure vessel activity, except those small craft included in Category C.

6.6.a. Category E1 -- Water Transport. -- This category includes all stream segments modified for water transport and having permanently maintained navigation aides.

6.6.b. Category E2 -- Cooling Water. -- This category includes all stream segments having one (1) or more users for industrial cooling.

6.6.c. Category E3 -- Power production. -- This category includes all stream segments extending from a point 500 feet upstream from the intake to a point one half (1/2) mile below the wastewater discharge point. (See Appendix C for representative list.)

6.6.d. Category E4 -- Industrial. -- This category is used to describe all stream segments with one (1) or more industrial users. It does not include water for cooling.

§47-2-7. West Virginia Waters.

7.1. Major River Basins and their Alphanumeric System. All streams and their tributaries in West Virginia shall be individually identified using an alphanumeric system as identified in the "Key to West Virginia Stream Systems and Major Tributaries" (1956) as published by the Conservation Commission of West Virginia and revised by the West Virginia Department of Natural Resources, Division of Wildlife (1985).

7.1.a. J - James River Basin. All tributaries to the West Virginia - Virginia State line.

7.1.b. P - Potomac River Basin. All tributaries of the main stem of the Potomac River to the West Virginia - Maryland - Virginia State line to the confluence of the North Branch and the South Branch of the Potomac River and all tributaries arising in West Virginia excluding the major tributaries hereinafter designated:

7.1.b.1. S - Shenandoah River and all its tributaries arising in West Virginia to the West Virginia - Virginia State line.

7.1.b.2. PC - Cacapon River and all its tributaries.

7.1.b.3. PSB - South Branch and all its tributaries.

7.1.b.4. PNB - North Branch and all tributaries to the North Branch arising in West Virginia.

7.1.c. M - Monongahela River Basin. The Monongahela River Basin main stem and all its tributaries excluding the following major tributaries which are designated as follows:

7.1.c.1. MC - Cheat River and all its tributaries except those listed below:

7.1.c.1.A. MCB - Blackwater River and all its tributaries.

7.1.c.2. MW - West Fork River and all its tributaries.

7.1.c.3. MT - Tygart River and all its tributaries except those listed below:

7.1.c.3.A. MTB - Buckhannon River and all its tributaries.

7.1.c.3.B. MTM - Middle Fork River and all its tributaries.

7.1.c.4. MY - Youghigheny River and all its tributaries to the West Virginia - Maryland State line.

7.1.d. O Zone 1 - Ohio River - Main Stem. The main stem of the Ohio River from the Ohio - Pennsylvania - West Virginia state line to the Ohio - Kentucky - West Virginia State line.

7.1.e. O Zone 2 - Ohio River - Tributaries. All tributaries of the Ohio River excluding the following major tributaries:

7.1.e.1. LK - Little Kanawha River. The Little Kanawha River and all its tributaries excluding the following major tributary which is designated as follows:

7.1.e.1.A. LKH - Hughes River and all its tributaries.

7.1.e.2. K - Kanawha River Zone 1. The main stem of the Kanawha River from mile point 0, at its confluence with the Ohio River, to mile point 72 near Diamond, West Virginia.

7.1.e.3. K - Kanawha River Zone 2. The main stem of the Kanawha River from mile point 72 near Diamond, West Virginia and all its tributaries from mile point 0 to the headwaters excluding the following major tributaries which are designated as follows:

7.1.e.3.A. KP - Pocatalico River and all its tributaries.

7.1.e.3.B. KC - Coal River and all its tributaries.

7.1.e.3.C. KE - Elk River and all its tributaries.

7.1.e.3.D. KG - Gauley River. The Gauley River and all its tributaries excluding the following major tributaries which are designated as follows:

7.1.e.3.D.1. KG-19 - Meadow River and all its tributaries.

7.1.e.3.D.2. KG-34 - Cherry River and all its tributaries.

7.1.e.3.D.3. KGC - Cranberry River and all its tributaries.

7.1.e.3.D.4. KGW -

Williams River and all its tributaries.

7.1.e.3.E. KN - New River. The New River from its confluence with the Gauley River to the Virginia - West Virginia State line and all tributaries excluding the following major tributaries which are designated as follows:

7.1.e.3.E.1. KNG - Greenbrier River and all its tributaries.

7.1.e.3.E.2. KNB - Bluestone River and all its tributaries.

7.1.e.3.E.3. KN-60 - East River and all its tributaries.

7.1.e.3.E.4. K(L)-81-(1) - Bluestone Lake.

7.1.e.4. OG - Guyandotte River. The Guyandotte River and all its tributaries excluding the following major tributary which is designated as follows:

7.1.e.4.1. OGM - Mud River and all its tributaries.

7.1.e.5. BS - Big Sandy River. The Big Sandy River to the Kentucky - Virginia - West Virginia State lines and all its tributaries arising in West Virginia excluding the following major tributary which is designated as follows:

7.1.e.5.1 BST - Tug Fork and all its tributaries.

7.2. Applicability of Water Quality Standards. The following shall apply at all times unless a specific exception is granted in this section:

7.2.a. Water Use Categories as described in section 6, herein.

7.2.a.1. Based on meeting those Section 6 definitions, tributaries or stream segments may be classified for one or more Water Use Categories. When more than one use exists, they shall be protected by criteria for the use category requiring the most stringent protection.

7.2.a.2. Each segment extending upstream from the intake of a water supply public (Water Use Category A), for a distance of one half (1/2) mile or to the headwater, must be protected by prohibiting the discharge of any pollutants in excess of the concentrations designated for this Water Use Category in section 8, herein. In addition, within that one half (1/2) mile zone, the Secretary may establish for any discharge, effluent limitations for the protection of human health that require additional removal of pollutants than would otherwise be provided by this rule. (If a watershed is not significantly larger than this zone above the intake, the water supply section may include the entire upstream watershed to its headwaters.) Until September 1, 2010, or until action by the Secretary to revise this provision, whichever comes first, the one-half (1/2) mile zone described in this section shall not apply to the Ohio River main channel (between Brown's Island and the left descending bank) between river mile points 61.0 and 63.5 for the Category A criterion for iron as set forth in §8 herein. Weirton Steel Corporation shall conduct monthly monitoring of the treated water at its drinking water plant for iron and submit the results of such monitoring to the West Virginia Bureau for Public Health and the Office of Water Resources of the West Virginia Department of Environmental Protection. In addition, Weirton Steel Corporation shall submit a written report regarding the status of its drinking water plant and the issues pertaining thereto to the Secretary on or before March 1, 2007.

7.2.b. In the absence of any special application or contrary provision, water quality standards shall apply at all times when flows are equal to or greater than the minimum mean seven (7) consecutive day drought flow with a ten (10) year return frequency (7Q10). NOTE: With the exception of section 7.2.c.5 listed herein exceptions do not apply to trout waters nor to the requirements of section 3, herein.

7.2.c. Exceptions: Numeric water quality standards shall not apply: (See section 7.2.d, herein, for site-specific revisions)

7.2.c.1. When the flow is less than 7Q10;

7.2.c.2. In wet weather streams (or intermittent streams, when they are dry or have no measurable flow): Provided, that the existing and designated uses of downstream waters are not adversely affected;

7.2.c.3. In any assigned zone of initial dilution of any mixing zone where a zone of initial dilution is required by section 5.2.b herein, or in any assigned mixing zone for human health criteria or aquatic life criteria for which a zone of initial dilution is not assigned; In zones of initial dilution and certain mixing zones: Provided, That all requirements described in section 5 herein shall apply to all zones of initial dilution and all mixing zones;

7.2.c.4. Where, on the basis of natural conditions, the Secretary has established a site-specific aquatic life water quality criterion that modifies a water quality criterion set out in Appendix E, Table 1 of this rule. Where a natural condition of a ~~waterbody~~ water is demonstrated to be of lower quality than a water quality criterion for the use classes and subclasses in section 6 of this rule, the Secretary, in his or her discretion, may establish a site-specific water quality criterion for aquatic life. This alternate criterion may only serve as the chronic criterion established for that parameter. This alternate criterion must be met at end of pipe. Where the Secretary decides to establish a site-specific water quality criterion for aquatic life, the natural condition constitutes the applicable water quality criterion. A site-specific criterion for natural conditions may only be established through the legislative rulemaking process in accordance with W.Va. Code §29A-3-1 et seq. and must satisfy the public participation requirements set forth at 40 C.F.R. 131.20 and 40 C.F.R. Part 25. Site-specific criteria for natural conditions may be established only for aquatic life criteria. A public notice, hearing and comment period is required before site-specific criteria for natural conditions are established.

Upon application or on its own initiative, the Secretary will determine whether a natural condition of a ~~waterbody~~ water should be approved as a site-specific water quality criterion. Before he or she approves a site-specific water quality criterion for a natural condition, the Secretary must find that the natural condition will fully protect existing and designated uses and ensure the protection of aquatic life. If a natural condition of a ~~waterbody~~ water varies with time, the natural condition will be determined to be the actual natural condition of the ~~waterbody~~ water measured prior to or concurrent with discharge or operation. The Secretary will, in his or her discretion, determine a natural condition for one or more seasonal or shorter periods to reflect variable ambient conditions; and require additional or continuing monitoring of natural conditions.

An application for a site-specific criterion to be established on the basis of natural conditions shall be filed with the Secretary and shall include the following information:

7.2.c.4.A. A U.S.G.S. 7.5 minute map showing the stream segment affected and showing all existing discharge points and proposed discharge point;

7.2.c.4.B. The alphanumeric code of the affected stream, if known;

7.2.c.4.C. Water quality data for the stream or stream segment. Where adequate data are unavailable, additional studies may be required by the Secretary;

7.2.c.4.D. General land uses (e.g. mining, agricultural, recreation, residential, commercial, industrial, etc.) as well as specific land uses adjacent to the waters for the affected segment or stream;

7.2.c.4.E. The existing and designated uses of the receiving waters into which the segment in question discharges and the location where those downstream uses begin to occur;

7.2.c.4.F. General physical characteristics of the stream segment, including, but not limited to width, depth, bottom composition and slope;

7.2.c.4.G. Conclusive information and data of the source of the natural condition that causes the stream to exceed the water quality standard for the criterion at issue.

7.2.c.4.H. The average flow rate in the segment and the amount of flow at a designated control point and a statement regarding whether the flow of the stream is ephemeral, intermittent or perennial;

7.2.c.4.I. An assessment of aquatic life in the stream or stream segment in question and in the adjacent upstream and downstream segments; and

7.2.c.4.J. Any additional information or data that the Secretary deems necessary to make a decision on the application.

7.2.c.5. For the upper Blackwater River from the mouth of Yellow Creek to a point 5.1 miles upstream, when flow is less than 7Q10. Naturally occurring values for Dissolved Oxygen as established by data collected by the dischargers within this reach and reviewed by the Secretary shall be the applicable criteria.

7.2.d. Site-specific applicability of water use categories and water quality criteria - State-wide water quality standards shall apply except where site-specific numeric criteria, variances or use removals have been approved following application and hearing, as provided in 46 C.S.R. 6. (See section ~~8.3~~ 8.4 and section ~~8.4~~ 8.5, herein) The following are approved site-specific criteria, variances and use reclassifications:

7.2.d.1. James River - (Reserved)

7.2.d.2. Potomac River

7.2.d.2.1. ~~Except that a~~ A site-specific numeric criterion for aluminum, not to exceed 500 ug/l, shall apply to the section of Opequon Creek from Turkey Run to the Potomac River.

7.2.d.3. Shenandoah River - (Reserved)

7.2.d.4. Cacapon River - (Reserved)

7.2.d.5. South Branch - (Reserved)

7.2.d.6. North Branch - (Reserved)

~~7.2.d.6.1 Except that the Stony River downstream from the limit of the thermal mixing zone (as established by Environmental Quality Board Order of 11/20/75) for the Mount Storm Lake wastewater treatment facility to its confluence with the North Branch of the Potomac River is exempt from the 5°F above natural temperature rise; however, the maximum temperature outside the mixing zone shall not exceed 87°F at any time during the months of May through November and not exceed 73°F at any time during the months of December through April. This exception shall apply until the successful completion of a study conducted pursuant to section 316(a) of the Federal Act or December 31, 1998, whichever comes first.~~

7.2.d.7. Monongahela River

7.2.d.7.1. ~~Except that flow~~ Flow in the main stem of the Monongahela River, as regulated by the Tygart Reservoir, operated by the U. S. Army Corps of Engineers, is based on a minimum flow of 345 cfs at Lock and Dam No. 8, river mile point 90.8. This exception does not apply to tributaries of the Monongahela River.

7.2.d.8. Cheat River

7.2.d.8.1. ~~Except that in~~ In the unnamed tributary of Daugherty Run, approximately one mile upstream of Daugherty Run's confluence with the Cheat River, a site-specific numeric criterion for iron of 3.5 mg/l shall apply and the following frequency and duration requirements shall apply to the chronic numeric criterion for selenium (5ug/l): the four-day average concentration shall not be exceeded more than three times every three years (36 months), on average. Further, the following site-specific numeric criteria shall apply to Fly Ash Run of Daugherty Run: acute numeric criterion for aluminum: 888.5 ug/l and manganese: 5 mg/l.

7.2.d.9. Blackwater River - ~~The Blackwater River below Davis, West Virginia shall be classified as a trout water, Category B2.~~ (Reserved)

7.2.d.10. West Fork River - (Reserved)

7.2.d.11. Tygart River - (Reserved)

7.2.d.12. Buckhannon River - (Reserved)

7.2.d.13. Middle Fork River - (Reserved)

7.2.d.14. Youghiogheny River - (Reserved)

~~7.2.d.14.1 Water Use Categories A and E are excluded from the tributaries of the Youghiogheny River in West Virginia which flow into Maryland.~~

7.2.d.15. Ohio River Main Stem - (Reserved)

7.2.d.16. Ohio River Tributaries.

7.2.d.16.1. ~~Except that site-specific~~ Site-specific numeric criteria shall apply to the stretch of Conners Run (0-77-A), a tributary of Fish Creek, from its mouth to the discharge from Conner Run impoundment, which shall not have the Water Use Category A and may contain selenium not to exceed 62 ug/1; and iron not to exceed 3.5 mg/1 as a monthly average and 7 mg/1 as a daily maximum.

7.2.d.16.2. ~~Except that a~~ A socio-economic variance shall apply to that segment of Harmon Creek (0-97) from its confluence with the Ohio River to a point 2.2 miles upstream, which shall not have water use Category A designation, and which shall have the following instream criteria: Lead 14 ug/l, Daily Maximum, Temperature 100 degree F (monitored per Footnote 12 of the permit); Iron 4.0 mg/l, monthly average and 8.0 mg/l Daily Maximum (monitored per Footnote 12 of the permit). Weirton Steel Corporation shall continue to submit to the Secretary, on an annual basis summary reports on the water quality of the discharge from Outlet 004 and the efforts made by Weirton Steel Corporation during the previous year to improve the quality of the discharge. These exceptions shall be in effect until action by the Secretary to revise the exceptions or until July 1, ~~2007~~ 2009, whichever comes first.

7.2.d.17. Little Kanawha River - (Reserved)

7.2.d.18. Hughes River - (Reserved)

7.2.d.19. Kanawha River Zone 1 - Main Stem

7.2.d.19.1. For the Kanawha River main stem, Zone 1, Water Use Category A shall not apply; and

7.2.d.19.2. The minimum flow shall be 1,960 cfs at the Charleston gauge.

7.2.d.19.3. ~~Except that a~~ A variance pursuant to 46 CSR 6, Section 5.1, based on naturally occurring pollutant concentrations, shall apply to Union Carbide Corporation's discharge to Ward Hollow of Davis Creek, which shall have the instream criteria for chlorides of 310 mg/l for Category A and C waters and for Category B1 (chronic aquatic life protection). This exception shall be in effect until action by the ~~appropriate rulemaking authority~~ Secretary to revise the exception or until July 1, ~~2008~~ 2010, whichever comes first.

7.2.d.20. Kanawha River Zone 2 and Tributaries.

7.2.d.20.1. For the main stem of the Kanawha River only, the minimum flow shall be 1,896 cfs at mile point 72.

7.2.d.20.2. ~~Except the~~ The stretch between the mouth of Little Scary Creek (K-31) and the Little Scary impoundment shall not have Water Use Category A. The following site-specific numeric criteria shall apply to that section: selenium not to exceed 62 ug/1 and copper not to exceed 105 ug/1 as a daily maximum nor 49 ug/1 as a 4-day average.

~~7.2.d.20.3. Except for Simmons Creek (K-54) from its mouth to a point 1200 feet upstream to which the following site-specific numeric criteria shall apply: a maximum daily temperature not to exceed 38°C (100°F) nor a monthly average temperature to exceed 34°C. This exception shall apply until the successful completion of a study conducted pursuant to section 316(a) of the Federal Act or May 30, 1998, whichever comes first.~~

7.2.d.21. Pocatalico River - (Reserved)

7.2.d.22. Coal River - (Reserved)

7.2.d.23. Elk River - (Reserved)

7.2.d.24. Gauley River - (Reserved)

7.2.d.25. Meadow River - (Reserved)

7.2.d.26. Cherry River - (Reserved)

7.2.d.27. Cranberry River - (Reserved)

7.2.d.28. Williams River - (Reserved)

7.2.d.29. New River - (Reserved)

7.2.d.30. Greenbrier River - (Reserved)

7.2.d.31. Bluestone River - (Reserved)

7.2.d.32. Bluestone Lake - (Reserved)

7.2.d.33. East River - (Reserved)

7.2.d.34. Guyandotte River - ~~(Reserved)~~

7.2.d.34.1. Pats Branch from its confluence with the Guyandotte River to a point 1000 feet upstream shall not have Water Use Category A and Category D1 designation.

7.2.d.35. Mud River - (Reserved)

7.2.d.36. Big Sandy River - (Reserved)

7.2.d.37. Tug Fork River - (Reserved)

§47-2-8. Specific Water Quality Criteria.

8.1. Charts of specific water quality criteria are included in Appendix E, Table 1.

8.1.a. Specific state (i.e. total, total recoverable, dissolved, valence, etc.) of any parameter to be analyzed shall follow 40 CFR 136, Guidelines Establishing Test Procedures for Analysis of Pollutants Under the Clean Water Act, as amended, June 15, 1990. (See also 47 C.S.R. 10, section 7.3 - National Pollutant Discharge Elimination System (NPDES) Program.)

8.1.b. Compliance with aquatic life water quality criteria expressed as dissolved metal shall be determined based on dissolved metals concentrations.

8.1.b.1. The aquatic life criteria for all metals listed in Appendix E, Table 2 shall be converted to a dissolved concentration by multiplying each numerical value or criterion equation from Appendix E, Table 1 by the appropriate conversion factor (CF) from Appendix E, Table 2.

8.1.b.2. Permit limits based on dissolved metal water quality criteria shall be prepared in accordance with the U.S. EPA document "The Metals Translator: Guidance For Calculating A Total Recoverable Permit Limit From A Dissolved Criterion, EPA 823-B-96-007 June 1996.

8.1.b.3. NPDES permit applicants may petition the Secretary to develop a site-specific translator consistent with the provisions in this section. The Secretary may, on a case-by-case basis require an applicant applying for a translator to conduct appropriate sediment monitoring through SEM/AVS ratio, bioassay or other approved methods to evaluate effluent limits that prevent toxicity to aquatic life.

8.1.c. An "X" or numerical value in the use columns of Appendix E, Table 1 shall represent the applicable criteria.

8.1.d. Charts of water quality criteria in Appendix E, Table 1 shall be applied in accordance with major stream and use applications, sections 6 and 7, herein.

8.2. Criteria for Toxicants

8.2.a. Toxicants which are carcinogenic

have human health criteria (Water Use Categories A and C) based upon an estimated risk level of one additional cancer case per one million persons (10^{-6}) and are indicated in Appendix E, Table 1 with an endnote ([b]).

8.2.b. A final determination on the critical design flow for carcinogens is not made in this rule, in order to permit further review and study of that issue. Following the conclusion of such review and study, the Legislature may again take up the authorization of this rule for purposes of addressing the critical design flow for carcinogens: Provided, That until such time as the review and study of the issue is concluded or until such time as the Legislature may again take up the authorization of this rule, the regulatory requirements for determining effluent limits for carcinogens shall remain as they were on the date this rule was proposed.

8.3. Criteria for Nutrients in Lakes

8.3.a. This subsection establishes nutrient criteria designed to protect Water Use Categories B and C. The following cool water nutrient criteria shall apply to cool water lakes. (See Appendix F for a representative list.) The following warm water nutrient criteria shall apply to all other lakes with a summer residence time greater than 14 days.

8.3.b. Total phosphorus shall not exceed 50 µg/l for warm water lakes and 30 µg/l for cool water lakes based on an average of four or more samples collected during the period May 1–October 31. In lieu of such sampling, impairment may be evidenced at any time by noncompliance with section 3.2, as determined by the Secretary. Chlorophyll-a shall not exceed 30 µg/l for warm water lakes and 15 µg/l for cool water lakes based on an average of four or more samples collected during the period May 1–October 31. In lieu of such sampling, impairment may be evidenced at any time by noncompliance with section 3.2, as determined by the Secretary.

~~8.3.~~ 8.4. Variances from Specific Water Quality Criteria. A variance from numeric criteria may be granted to a discharger if it can be demonstrated that the conditions outlined in ~~subsections 6.1.b.A F~~ paragraphs 6.1.b.1 through 6.1.b.6, herein, limit the attainment of one or more specific water quality criteria. Variances shall apply only to the discharger to whom they are granted and shall be reviewed by the Secretary at least every three years. In granting a variance, the requirements for revision of water quality standards in 46 CSR 6 shall be followed.

~~8.4.~~ 8.5. Site-specific numeric criteria. The Secretary may establish numeric criteria different from those set forth in Appendix E, Table 1 for a stream or stream segment upon a demonstration that existing numeric criteria are either over-protective or under-protective of the aquatic life residing in the stream or stream segment. A site-specific numeric criterion will be established only where the numeric criterion will be fully protective of the aquatic life and the existing and designated uses in the stream or stream segment. The site-specific numeric criterion may be established by conducting a Water Effect Ratio study pursuant to the procedures outlined in US EPA's "Interim Guidance on the Determination and Use of Water-Effect Ratios for Metals" (February 1994); other methods may be used with prior approval by the Secretary. In adopting site-specific numeric criteria, the requirements for revision of water quality standards set forth in 46 CSR 6 shall be followed.

§47-2-9. Establishment Of Safe Concentration Values.

When a specific water quality standard has not been established by these rules and there is a discharge or proposed discharge into waters of the State, the use of which has been designated a Category B1, B2, B3 or B4, such discharge may be regulated by the Secretary where necessary to protect State waters through establishment of a safe concentration value as follows:

9.1. Establishment of a safe concentration value shall be based upon data obtained from relevant aquatic field studies, standard bioassay test data which exists in substantial available scientific literature, or data obtained from specific tests utilizing one (1) or more representative important species of aquatic life designated on a case-by-case basis by the Secretary and conducted in a water environment which is equal to or closely approximates that of the natural quality of the receiving waters.

9.2. In those cases where it has been determined that there is insufficient available data to establish a safe concentration value for a pollutant, the safe concentration value shall be determined by applying the appropriate application factor as set forth below to the 96-hour LC 50 value. Except where the Secretary determines, based upon substantial available scientific data that an alternate application factor exists for a pollutant, the following appropriate application factors shall be used in the determination of safe concentration values:

9.2.a. Concentrations of pollutants or combinations of pollutants that are not persistent and not cumulative shall not exceed 0.10 (1/10) of the 96-hour LC 50.

9.2.b. Concentrations of pollutants or combinations of pollutants that are persistent or cumulative shall not exceed 0.01 (1/100) of the 96-hour LC 50.

9.3. Persons seeking issuance of a permit pursuant to these rules authorizing the discharge of a pollutant for which a safe concentration value is to be established using special bioassay tests pursuant to subsection 9.1 of this section shall perform such testing as approved by the Secretary and shall submit all of the following in writing to the Secretary:

9.3.a. A plan proposing the bioassay testing to be performed.

9.3.b. Such periodic progress reports of the testing as may be required by the Secretary.

9.3.c. A report of the completed results of such testing including, but not limited to, all data obtained during the course of testing, and all calculations made in the recording, collection, interpretation and evaluation of such data.

9.4. Bioassay testing shall be conducted in accordance with methodologies outlined in the following documents: U.S. EPA Office of Research and Development Series Publication, Methods for Measuring the Acute Toxicity (EPA/600/4-90/027F, August 1993, 4th Edition) or Short Term Methods for Estimating Chronic Toxicity of Effluents and Receiving Waters to Freshwater Organisms (EPA/600/4-89/001), March 1989; Standard Methods for the Examination of Water and Wastewater (18th Edition); or ASTM Practice E 729-88 for Conducting Acute Toxicity Tests with Fishes, Macroinvertebrates and Amphibians as published in Volume 11.04 of the 1988 Annual Book of ASTM Standards. Test waters shall be reconstituted according to recommendations and methodologies specified in the previously cited references or methodologies approved in writing by the Secretary.

APPENDIX A
CATEGORY B-2 - TROUT WATERS

This list contains known trout waters and is not intended to exclude any waters which meet the definition in Section ~~2.20~~ 2.19.

River Basin	County	Stream
James River		
J-1-A	Mercer	Ewin Run
J-3	Monroe	Cove Creek
J-1-D	Monroe	North Fork of Potts Creek
J-1-E	Monroe	South Fork Potts Creek
Potomac River		
P-5	"Berkeley	~~Hartland~~Harland Run
P-4-J	"Berkeley	Middle Creek (Above Route 30 Bridge)
P-4-M	"Berkeley	Mill Creek
P-6-B	"Berkeley	Mill Run
P-4	Berkeley	Opequon Creek
P-6-A	"Berkeley	Tillance Creek
P-4-C	"Berkeley	Tuscarora Creek (Above Martinsburg)
P-3	"Jefferson	Rocky Marsh Run
P-2.3	Jefferson	Town Run
P-9-B	Morgan	Meadow Branch
SNF-1	Hardy	Capon Run
~~P~~S-6	"Jefferson	Big Bullskin Run
~~P~~S-2	"Jefferson	Cattail Run
~~P~~S-4	"Jefferson	Evitt's Run
~~P~~S-1	Jefferson	Flowing Springs Run (Above Halltown)
~~P~~S-7	"Jefferson	Long Marsh Run
PC-9	Hampshire	Cold Stream
PC-11	"Hampshire	Dillons Run
PC-10	"Hampshire	Edwards Run ~~and Impoundment~~
PC-17	Hampshire	Hawk Run of Cacapon
PC-24-E-1	"Hardy	Camp Branch
PC-24	Hardy	Lost River
PC-24-H	"Hardy	Lower Cove Run of Lost River
PC-20	"Hardy	Moores Run
PC-7	"Hardy	North River (Above Rio)
PC-23-A-1-(L1)	"Hardy	Rock Cliff Lake (Impoundment)
PC-23-A-1-(L2)	"Hardy	Trout Pond (Impoundment)
PC-23	"Hardy	Trout Run of Cacapon
PC-22	"Hardy	Waites Run
~~PG~~	"	~~Warden Lake (Impoundment)~~
PSB-28-A-1	Grant	Big Run of Jordan Run
PSB-28-E	Grant	High Ridge Run of North Fork
PSB-28-A-2	Grant	Laurel Run of Jordan
PSB-26-E	Grant	North Fork Lunice Creek
PSB-29	Grant	Redman Run
PSB-28-B	Grant	Samuel Run of North Fork
PSB-25-C-2	"Grant	Spring Run of South Mill Creek

River Basin	County	Stream
Potomac River		
PSB-26-D	"Grant	South Fork Lunice Creek
PSB-25-C	"Grant	South Mill Creek (Above Hiser)
PSB-28	Grant-Pendleton	North Fork South Branch
PSB	Grant- "Pendleton	South Branch (Above North Fork)
PSB-9	Hampshire	Mill Creek
PSB-13	"Hampshire	Mill Run of South Branch
PSB-21-F	Hardy	Dumpling ~~Creek~~ Run
PSB-28-EE-2-A	Pendleton	Back Run of Sawmill Branch
PSB-28-EE	"Pendleton	Big Run of North Fork
PSB-28-R	Pendleton	Blizzard Run
PSB-28-S	Pendleton	Brier Gap Run
PSB-32	Pendleton	Briggs Run of South Branch
PSB-28-C	Pendleton	Broad Run of North Fork
PSB-28-K-1	Pendleton	Brushy Run of Seneca Creek
PSB-28-EE-4	Pendleton	Elk Run of Big Run
PSB-21-X	Pendleton	Hawes Run (Impoundment)
PSB-28-K-3	Pendleton	Horsecamp Run of Seneca Creek
PSB-28-GG	"Pendleton	Laurel Fork of North Fork - to VA line
PSB-28-T	Pendleton	Laurel Run of North Fork
PSB-21-GG	"Pendleton	Little Fork
PSB-28-GG-1-B	Pendleton	Little Low Place Hollow of Laurel Fork
PSB-28-K-2-B	Pendleton	Long Run of Roaring Creek
PSB-28-I	Pendleton	Powdermill Run of North
PSB-33	Pendleton	Reeds Creek
PSB-28-K-2	Pendleton	Roaring Creek of Seneca Creek
PSB-21-K	Pendleton	Rough Run of South Branch
PSB-28-GG-1-A	Pendleton	Sams Run of Laurel Fork
PSB-28-EE-2	Pendleton	Sawmill Branch of Big Run
PSB-28-EE-3	Pendleton	Teeter Camp Run
PSB-28-K	"Pendleton	~~Senena~~ Seneca Creek
PSB-28-K-4	Pendleton	Strader Run of Seneca Creek
PSB-47	Pendleton	Thorn Creek
PSB-28-K-6-B	Pendleton	Upper Gulf Run of Whites Run
PSB-28-GG-1	Pendleton	Vance Run of Laurel Fork
PSB-28-K-3-B	Pendleton	Wamsley Run
PSB-28-K-6	Pendleton	Whites Run of Seneca Creek
PSB-21-I-1	Pendleton	Wilson Run of Kettle Creek
PNB-18	Grant	Difficult Creek of North Branch
PNB-17	Grant	Stony River Upstream of Mount Storm Lake
PNB-23	Grant	Wilsonia Run of North Branch
PNB-16-B-1	Grant	Wycroff Run of Abrams Creek
PNB-15-A	Mineral	Cranberry Run of Deep Creek Run
PNB-15	Mineral	Deep Run of North Branch
~~PNB~~	"	~~Fort Ashby (Impoundment)~~
PNB-14	Mineral	Howell Run of North Branch
PNB-4-S	"Mineral	Mill Creek (Above Markwood)
PNB-7	"Mineral	New Creek
PNB-7-H-(L1)	"Mineral	New Creek Dam 14 (Impoundment)
PNB-4-EE	Mineral	North Fork Patterson Creek
PNB	Pendleton	North Branch of Potomac
PNB-16-B	Grant	Johnnycake Run of Wycroff Run

River Basin	County	Stream
Ohio River		
O-98-A	Hancock	North Fork of Kings Creek
O-88-D-2	Ohio	Middle Wheeling Creek
Monongahela River		
M-16	Monongalia-Marion	Whiteday Creek (Above Smithtown)
MC-2-0.5A	"Monongalia	Blaney Hollow
MC-6-(L1)	"Monongalia	Coopers Rock (Impoundment)
MC-2	Monongalia	Morgan Run
MCS-56	Pocahontas	Oats Run of Shavers Fork
MC-12	Preston	Big Sandy
MC-33	"Preston	Buffalo Creek
MC-12-B-5	Preston	Cherry Run of Little Sandy
MC-20	"Preston	Elsey Run
MC-33-A	Preston	Flag Run of Buffalo Creek
MC-12-A	Preston	Laurel Run of Big Sandy
MC-12-B	Preston	Little Sandy
MC-12-B-6	Preston	Mill Run of Little Sandy
MC-17	Preston	Muddy Creek
MC-12-B-4.5	Preston	Piney Run of Little Sandy
~~MT~~ MC-18	Preston	Roaring Creek (Above Little Lick Branch)
MC-32	"Preston	Saltlick Creek
MC-36	"Preston	Wolf Creek
MC-41	Preston-Tucker	Long Run
MC-54-K	Preston-Tucker	Twelvemile Run of Clover
MC-60-K-6	Randolph	Baker Camp Run
MC-60-T-8	Randolph	Big Run of Gandy
MC-60-T-13	Randolph	Big Run of Gandy (above the sinks)
MC-60-O-1	Randolph	Big Run of Red Creek
MC-60-N-10	Randolph	Camp Five Run
MC-60-K-14	Randolph	Daniels Creek
MC-60-T-10.5	Randolph	Devers Run of Gandy
MC-60	"Randolph	Dry Fork (Above Otter Creek)
MC-60-K-17	"Randolph	East Fork Glady Fork (Above C & P Compressor Station)
MC-60-K-4	Randolph	Five Lick
MC-60-O-2	Randolph	Flatrock Run
MC-60-T-(S)	"Randolph	Gandy Creek ~~(Above Whitmer)~~
MC-60-K	"Randolph	Glady Fork
MC-60-T-9	Randolph	Grants Branch
MC-60-Q	Randolph	Horsecamp Run
MC-60-N	"Randolph	Laurel Fork
MC-60-T-1	Randolph	Lower Two Spring Run
MC-60-K-11	Randolph	McCray Creek
MC-60-T-10	Randolph	Narrow Ridge Run
MC-60-K-2	Randolph	Panther Camp Run
MC-60-T-10-(L1)	"Randolph	Spruce Knob Lake (Impoundment)
MC-60-P	Randolph	Spruce Run
MC-60-T-3	Randolph	Swallow Rock Run
MC-60-T-6	Randolph	Taylor Run
MC-60-K-1	"Randolph	Three Spring Run
MC-60-R	Randolph	Tory Camp Run
MC-60-T-2	Randolph	Upper Two Spring Run

River Basin	County	Stream
Monongahela River		
MC-60-T-11	Randolph	Warner Run
MC-60-K-16	Randolph	West Fork of Glady - exclude lower 2 miles
MC-60-K-5	Randolph	Woodford Run
MCS	Randolph-Pocahontas	Shavers Fork (Above Little Black Fork)
MC-60-K-17-0.5A	Randolph	White Run of East Fork of Glady
MC-60-L	Tucker	Big Run of Dry Fork
~~MC~~	"	~~Blackwater River (Above Davis)~~
MC-60-D	"Tucker	Blackwater River ~~(Below Davis)~~
MCS-7.5	Tucker	Canoe Run
MC-51	Tucker	Clover Run
MC-55	Tucker	Dry Run
MC-60-C	"Tucker	Elklick Run of Black Fork
MC-60-J	Tucker	Elklick Run of Dry Fork
MC-60-O-3	Tucker	Gandy Run of Red Creek
MC-54-D	Tucker	Hyle Run of Horseshoe Run
MC-51-B-5	Tucker	Indian Run
MC-54-I	Tucker	Leadmine Run of Horseshoe Run
MC-51-B	Tucker	Left Fork of Clover Run
MC-54-E	Tucker	Lick Drain
MC-54-G	Tucker	Lynn Run
MC-54-C	"Tucker	Maxwell Run of Horseshoe
MC-54-A	Tucker	Mike Run of Horseshoe
MC-56	Tucker	Mill Run of Cheat River
MC-60-I	Tucker	Mill Run of Dry Fork
MC-51-B-2	Tucker	Mill Run of Left Fork of Clover
MC-52	Tucker	Minear Run of Cheat
MC-60-O	"Tucker	Red Creek
MC-60-G	Tucker	Red Run
MC-46-B	Tucker	Right Fork of Bull Run
MC-51-A	Tucker	Right Fork of Clover Run
MC-60-D-10	Tucker	Sand Run
MC-56-B	"Tucker	Slip Hill Mill Branch
MC-60-D-3-(L1)	"Tucker	Thomas Park (Impoundment)
MC-54-H	Tucker	Thunderstruck Run of Horseshoe
MC-45	Tucker	Tobes Run
MC-60-K-0.5	Tucker	Two Spring Run of Glady Fork
MC-51-B-4	Tucker	Valley Fork
MC-57	Tucker	Wolf Run of Cheat River
MC-60-D-11	Tucker	Yoakum Run
MC-54	"Tucker-Preston	Horseshoe Run (Headwaters) to Leadmine
MCS-54	Pocahontas	Second Fork
MCS-53	Randolph	Beaver Creek
MCS-57	Randolph	Black Run
MCS-47	Randolph	Blister Run
MCS-14	Randolph	Clifton Run
MCS-50	Randolph	First Fork
MCS-48	Randolph	Fish Hatchery Run
MCS-33	Randolph	Fishing Hawk Creek
MCS-43	Randolph	Glade Run
MCS-16	Randolph	Johns Run
MCS-49	Randolph	Lambert Run

River Basin	County	Stream
Monongahela River		
MCS-13	Randolph	Little Black Fork
MCS-12	Randolph	Little Laurel Run
MCS-9	Randolph	Nail Run
MCS-15	Randolph	Rattlesnake Run
MCS-46	Randolph	Red Run of Shavers Fork
MCS-22-A	Randolph	Stalnaker Run
MCS-22	Randolph	Taylor Run
MCS-44	Randolph	Whitmeadow Run
MCS-40	Randolph	Yokum Run
MCS-4	Tucker	Jobs Run
MCS-5	Tucker	Laurel Run of Shavers Fork
MCS-3-A	Tucker	South Branch of Haddix Run
MCS-6-B	Tucker	Aarons Run
MCS-7	Tucker	Stonelick Run
~~MW~~	~~Harrison~~	~~Dog Run (Pond)~~
MW-38-(L1)	Lewis	Stonecoal Lake
MT-23-C	Barbour	Brushy Fork (Above Valley Furnace)
MT-23-F	" Barbour	Mill Run
MT-23-H	Barbour	Mill Run of Teter Creek
~~MT~~	"	~~Teter Creek Lake (Impoundment)~~
MT-38	Barbour	Zebs Creek
MT-12-G-3	Preston	Boyds Run
MT-12-G	Preston	Fields Creek
MT-18-E-4-B	Preston	Frog Run
MT-12-D	Preston-Taylor-Monongalia	Laurel Run of Threeforks
MT-66-C	Randolph	Back Fork of Riffle Creek
MT-47	Randolph	Beaver Creek
MT-50-A	Randolph	Right Fork Files Creek
MT-68	Randolph	Becky Creek from secondary Rt 56 bridge upstream
MT-68-A	Randolph	Big Branch of Becky Creek
MT-81	" Randolph	Big Run of Tygart
MT-73	Randolph	Clay Run
MT-77	Randolph	Conley Run
MT-74	" Randolph	Elkwater Fork above Mowry Run
MT-50	Randolph	Files Creek (Rt. FK-MT-50-A) from compressor station upstream
MT-64-C	Randolph	Glade Run
MT-72	Randolph	Hamilton Run
MT-50-B	Randolph	Left Fork of Files Creek
MT-50-A-1	Randolph	Limekiln Run
MT-74-B	Randolph	Limekiln Run of Elkwater
MT-80	Randolph	Logan Run
MT-44	Randolph	Mathais Run
MT-66-B	Randolph	McGee Run
MT-64-E	Randolph	Meatbox Run
MT-64	Randolph	Mill Creek upstream at end of Co. Rt. 46/4
MT-50-A-2	Randolph	Millstone Run Right Fork of Files Creek
MT-74-A	Randolph	Mowry Run
MT-64-F	Randolph	Potatohole Fork
MT-67	Randolph	Rafe Run
MT-78	Randolph	Ralston Run

River Basin	County	Stream
Monongahela River		
MT-66	Randolph	Riffle Creek - above McGee Run
MT-45-C	Randolph	Right Fork of Chenoweth Creek
MT-61	Randolph	Shavers Run
MT-75	Randolph	Stewart Run
MT	Randolph	Tygart River (Above Huttonsville)
MT-79	Randolph	Windy Run
MT-(T1)	Taylor-Barbour	Tygart Lake Tailwaters (Above Route 119 Bridge)
MTB-32-H	Randolph	Beech Run
MTB-31-I	Randolph	Devil Fork
MTB-31-C	Upshur	Alec Run
MTB-28	Upshur	Big Run of Buckhannon (Above DLM drain)
MTB	Upshur	Buckhannon River (Above Beans Mill)
MTB-18	Upshur	French Creek
MTB-32-E	Upshur	Lick Run
MTB-31-D	Upshur	Millsite Run
MTB-27	Upshur	Panther Fork (headwaters) - from 2 miles above Co. Rt. 32
MTB-31-B	Upshur	Reger Run
MTB-25-A	Upshur	Right Fork of Tenmile Creek - except lower ½ mile
MTB-32-D	Upshur-Randolph	Bearcamp Run
MTB-32	Upshur-Randolph	Left Fork Buckhannon
MTB-31-F	Upshur-Randolph	Left Fork Right Fork
MTB-31	Upshur-Randolph-Lewis	Right Fork Buckhannon River
MTM-26	Randolph	Birch Fork of Middle Fork
MTM-16	Randolph	Cassity Fork (Upper) - above Mulberry Run
MTM-28	Randolph	Kittle Creek
MTM-23	Randolph	Laurel Branch
MTM-22	Randolph	Laurel Run of Middle Fork
MTM-13	Randolph	Long Run
MTM	Randolph	Middle Fork River (Above Cassity)
MTM-27	Randolph	Mitchell Lick Fork
MTM-16-A	Randolph	Panther Run of Cassity Fork (Upper) except lower 1/4 mile
MTM-21	Randolph	Pleasants Run
MTM-26-B	Randolph	Rocky Run of Birch Fork
MTM-25	Randolph	Schoolcraft Run
MTM-24-A	Randolph	Spice Run
MTM-24	Randolph	Sugar Run
MTM-11-E	Upshur	Jenks Fork
~~MTN~~ MTM-11	Upshur	Right Fork Middle Fork River
MTM-11-D	Upshur-Randolph	Jackson Fork
MY-5	Preston	Maple Run
MY-4	Preston	Rhine Creek
MY-2	Preston	Snowy Creek
MY	Preston	Youghiogheny River
Little Kanawha River		
LK-131	Upshur	Getout Run
LK-115-H	Upshur	Left Fork-Right Fork (Little Kanawha River)
LK	Upshur-Lewis	Little Kanawha River (Above Wildcat)

River Basin	County	Stream
Kanawha River		
K-80	Fayette	Falls Creek
K-76	Fayette	Loop Creek
K-65-H	Fayette	Ash Branch
K-76-M	Fayette	Open Fork
K-65	Fayette	Paint Creek(Pax to Burnwell)
K-76-N-1	Fayette	Taylor Branch
KC-31-B	Boone	Hopkins Fork
KC-47	Raleigh	Clear Fork
KC-46	"Raleigh	Marsh Fork (Above Sundial)
KC-46-Q-1-(L1)	Raleigh	Stephens Lake (Impoundment)
KE-102-A	Braxton	Camp Creek (Centralia)
~~KE~~	"	~~Sutton Lake Tailwaters (Above Route 38/5 Bridge)~~
~~KE~~	~~Braxton~~	~~Sutton Reservoir~~
KE-91	Braxton	Wolf Creek (Centralia)
KE-43	Clay	Blue Knob Creek
KE-69	Clay	Groves Creek
KE-50-I	Clay	Rockcamp Run
KE-74	Clay	Strange Creek
KE-76-O	Nicholas	Poplar Creek
KE-76-L-5	Nicholas	Tug Fork
KE-135	Pocahontas	Big Run of Elk
KE-138	Pocahontas	Big Spring Fork
KE-139-B	Pocahontas	Crooked Fork
KE-138-B	Pocahontas	Cup Run
KE-133	Pocahontas	Dry Fork
KE-137	Pocahontas	Laurel Run of Elk
KE-136	Pocahontas	Props Run
KE-139-0.5A	Pocahontas	Slaty Fork
KE-130	Randolph	Chimney Rock Run
KE-129	Randolph	Valley Fork
KE-117-B	Randolph-Webster	Right Fork of Leatherwood
KE-111	Webster	Back Fork of Elk
KE-127	Webster	Big Run of Elk
KE-98-B-16	"Webster	Desert Fork (Headwaters) above Roaring Run
KE	"Webster	Elk River (Above Webster Springs)
KE-98-C-14	"Webster	Fall Run
KE-102	Webster	Laurel Creek (Erbacon)
KE-98-C-11	"Webster	Laurel Fork of Left Fork of Holly
KE-98-C	"Webster	Left Fork Holly River
KE-111-K-2	Webster	Little Sugar Creek
KE-111-K	"Webster	Sugar Creek (Headwaters) above Little Sugar
KE-118	Webster-Randolph	Bergoo Creek
KG-19-J	Fayette	Brackens Creek
KG-19-A	Fayette	Dogwood Creek
KG-19-E	Fayette	Glade Creek
KG-6	Fayette	Rich Creek
KG-19-O.7	Fayette	Surbaugh Creek

River Basin	County	Stream
Kanawha River		
KG-34-H-14	Greenbrier	Bear Run
KG-34-G-8	Greenbrier	Becky Run
KG-34-E-8	Greenbrier	Beech Run
KG-19-U	Greenbrier	Big Clear Creek
KG-34-G-13	Greenbrier	Big Run of South Fork of Cherry
KG-34-G-2	Greenbrier	Briery Run
KG-19-U-1	Greenbrier	Brown Creek
KG-34-H-5	Greenbrier	Coats Run
KG-34-G-10	Greenbrier	Cold Knob Fork
KG-34-E-13	Greenbrier	Cold Spring Branch
KG-34-G-5	Greenbrier	Elklick Run
KG-34-E-9	Greenbrier	Hogcamp Run
KG-34-F-2	Greenbrier	Improvement Branch
KG-19-U-2-D	Greenbrier	Job Knob Branch
KG-19-V-7	Greenbrier	Kuhn Branch
KG-19-V	"Greenbrier	Little Clear Creek ~~and Laurel Run~~
KG-19-V-5	Greenbrier	Laurel Creek
~~KG~~KNG-28-P	"Greenbrier	Meadow Creek
KG-34-E-11	Greenbrier	Middle Branch
KG-19-U-2-C	Greenbrier	Old Field Branch
KG-34-G-6	Greenbrier	Rocky Run
KG-19-U-3	Greenbrier	Sam Creek
KG-34-H-5-(L1)	Greenbrier	Summit Lake
KG-34-E	Greenbrier-Nicholas	Laurel Creek
KG-34-H	"Greenbrier-Nicholas	North Fork Cherry River
KG-34-G	Greenbrier-Nicholas	South Fork Cherry River
KG-19-G	"Nicholas	Anglins Creek (Headwaters) - 41/9 bridge upstream
KG-26-K	Nicholas	Brushy Fork
KG-24-E-2	Nicholas	Brushy Meadow Creek
KG-34	Nicholas	Cherry River
KG-20	Nicholas	Collison Creek
KG-32-J	Nicholas	Cranenest Run
KG-24-B	Nicholas	Deer Creek
KG-24-E	Nicholas	Grassy Creek
KG-24	Nicholas	Hominy Creek
KG-32	Nicholas	Panther Creek
KG-13	Nicholas	Peters Creek
KG-24-H.8	Nicholas	Price Fork
KG-(L1)	Nicholas	Summersville Reservoir (Impoundment)
KG-(T)	"Nicholas	Summersville Tailwaters (Above Collison Creek)
KG-34-F	Nicholas-Greenbrier	Little Laurel Creek
KG-34-H-4	Nicholas-Randolph	Hunters Run
KG-34-H-17	Pocahontas	Darnell Run of North Fork of Cherry
KG-72	Randolph-Pocahontas	Middle Fork of Gauley
KG-73	Randolph-Pocahontas	North Fork of Gauley
KG	Randolph-Webster	Gauley River (Above Moust Coal Tipple)
KG-45	Webster	Big Laurel Creek
KG-59	Webster	Big Run of Gauley
KG-70	Webster	Big Run of Gauley
KG-61	Webster	Hughes Run
KG-58	Webster	Laurel Creek of Gauley
KG-57	Webster	Miller Mill Run

River Basin	County	Stream
Kanawha River		
KG-60-A	Webster	Right Fork of Turkey Creek of Gauley
KG-67	Webster	Straight Creek of Gauley
KG-60	Webster	Turkey Creek
KG-65	Webster	Williams Camp Run
KGC-3	Nicholas	Jakeman Run
KGC-4-A	Nicholas	Little Barrenshe
KGC-4	Pocahontas	Barrenshe Run
KGC-24	Pocahontas	North Fork of Cranberry (Only the Catch & Release Area)
KGC-23-C	Pocahontas	Red Run of South Fork of Cranberry
KGC-23	Pocahontas	South Fork Cranberry River
KGC	Pocahontas-Webster-Nicholas	Cranberry River
KGC-19	Randolph	Dogway Fork
KGC-9	Webster	Aldrich Run
KGC-8	Webster	Foxtree Run
KGC-15	Webster	Hanging Rock Branch
KGC-7	Webster-Nicholas	Bee Run
KGW-26	Pocahontas	Black Mountain Run
KGW-25	Pocahontas	Day Run
KGW-20-A	Pocahontas	Lick Creek
KGW-22	Pocahontas	Little Laurel Creek
KGW-27	Pocahontas	Mountain Lick Run
KGW-21	Pocahontas	Sugar Creek
KGW-20	Pocahontas	Tea Creek
KGW-10	Pocahontas-Webster	Middle Fork of Williams
KGW	Pocahontas-Webster	Williams River ~~(Above Dyer)~~
KGW-1	Webster	Craig Run
KGW-2	Webster	Jonathan Run
KGW-9	Webster	Lick Branch
KGW-3	Webster	Sawyer Run
KGW-4	Webster	Spice Run
KGW-8	Webster	White Oak Fork
KN-23	Fayette	Buffalo Creek
KN-27-C	Fayette	Chestnut Knob Fork of Laurel
KN-22	Fayette	Dunloup Creek ~~(Downstream from Harvey Sewage Treatment Plant)~~
KN-17-A	Fayette	Glade Creek of Manns
KN-27	"Fayette	Laurel Creek ~~(Above Cotton Hill)~~ of New River
KN-7	Fayette	Mill Creek
~~KG~~ KN-10	Fayette	Wolf Creek
KN-60	Mercer	East River (Above Kelleysville)
KN-60-B	"Mercer	Pigeon Creek
KN-51-H-(S)	Monroe	Laurel Creek
KN-61	Monroe	Rich Creek
KN-51-O	"Monroe	Turkey Creek
KN-26-F	Raleigh	Beaver Creek
KN-26-B	Raleigh	Fat Creek
KN-29	Raleigh	Glade Creek of New River
KN-29-E	Raleigh	Pinch Creek
KN-26	Raleigh	Piney Creek
KN-32	Summers	Meadow Creek

River Basin	County	Stream
Kanawha River		
KNB-13	"Mercer	Camp Creek
KNB-30	Mercer	Crane Creek
KNB-12-B	Mercer	Laurel Creek (Bluestone)
KNB-13-D-1	Mercer	Marsh Fork
KNB-3	Summers	Little Bluestone River
KNG-28	"Greenbrier	Anthony Creek (Above Big Draft)
KNG-30-0.5A-1-A	Greenbrier	Burns Run
KNG-30-0.5A-1-(S)	Greenbrier	Culverson Creek
KNG-22-E-1-B	Greenbrier	Flynn Creek
KNG-22-E-1-A-(S)	Greenbrier	Hughart Creek
KNG-22.7-A-1-(S)	"Greenbrier	Milligan Creek
KNG-28-P	Greenbrier	North Fork Anthony Creek
KNG-30-0.5A-1-C-1-(S)	Greenbrier	Roaring Creek
KNG-30	"Greenbrier	Spring Creek
KNG-28-P-2	Greenbrier	Twomile Run
KNG-23	Greenbrier-Monroe	Second Creek (Rt. 219 Bridge to Nickell's Mill)
KNG-23-G	Monroe	Kitchen Creek (Above Gap Mills)
KNG-78-L	"Pocahontas	Abes Run
KNG-53-G	Pocahontas	Barclay Run
KNG-47	"Pocahontas	Beaver Creek
KNG-68-A-5	Pocahontas	Black Run
KNG-78-C-1-(L1)	"Pocahontas	Buffalo Fork (Impoundment)
KNG-79-C-2	Pocahontas	Clubhouse Run
KNG-68	"Pocahontas	Deer Creek
KNG-53-H	Pocahontas	Douthat Creek
KNG-78	Pocahontas	East Fork of Greenbrier
KNG-68-A-6	Pocahontas	Elleber Run
KNG-79-B	Pocahontas	Fill Run
KNG-78-G	"Pocahontas	Five Mile Run
KNG	"Pocahontas	Greenbrier River (Above Hosterman)
KNG-68-A-6-A	Pocahontas	Griffin Run
KNG-30-0.7A-1-(S)	"Pocahontas	Hills Creek
KNG-78-A	Pocahontas	Johns Run
KNG-53	"Pocahontas	Knapp's Creek
KNG-60	Pocahontas	Laurel Run of Greenbrier
KNG-70	Pocahontas	Leatherbark Run
KNG-78-C	"Pocahontas	Little River-East Fork
KNG-79-C	"Pocahontas	Little River-West Fork
KNG-38	Pocahontas	Locust Creek
KNG-78-H-1	Pocahontas	Long Run
KNG-78-K	"Pocahontas	Mullenax Run
KNG-68-A	"Pocahontas	North Fork Deer Creek ~~(Above Route 28/5)~~ FS bridge below Sutton Run to head
KNG-78-H	Pocahontas	Poca Run
KNG-59-D-(L1)	"Pocahontas	Seneca (Impoundment)
KNG-66-D	Pocahontas	Shock Run
KNG-66	"Pocahontas	Sitlington Creek
KNG-79-C-1	Pocahontas	Spanoak
KNG-55	"Pocahontas	Stoney Creek
KNG-68-A-3	Pocahontas	Sutton Run of North Fork of Deer Creek
KNG-49	"Pocahontas	Swago Creek

River Basin	County	Stream
Kanawha River		
KNG-68-A-4	Pocahontas	Tacker Fork
KNG-59	Pocahontas	Thorny Creek
KNG-74	Pocahontas	Trout Run of Greenbrier
KNG-43-(L1)	Pocahontas	Watoga Lake
KNG-79	"Pocahontas	West Fork Greenbrier ~~(Above the impoundment at the tannery)~~
OG-124	Wyoming	Pinnacle Creek ~~creek~~
OG-131	Wyoming	Barker's Creek
OG-137	Wyoming	Devil's Fork
OG-131-F	Wyoming	Gooney Otter Creek
OG-134	Wyoming	Slab Fork
OG-139	Wyoming	Stonecoal Creek
OG-138	Wyoming	Winding Gulf
Tug Fork of Big Sandy River		
BST-70	McDowell	Dry Fork ~~(Above Canebrake)~~ of Tug
BST-99	McDowell	Elkhorn Creek
BST-70-W	McDowell	Jacob Fork

APPENDIX B

This list contains known waters used as public water supplies and is not intended to exclude any waters as described in section 6.2, herein.

River Basin	County	Operating Company	Source
Shenandoah River			
S	Jefferson	Charlestown Water	Shenandoah River
Potomac River			
P	Jefferson	3-M Company	Turkey Run
P	"	Shepherdstown Water	Potomac River
P	"	Harpers Ferry Water	Elk Run
P	Berkeley	DuPont Potomac River Works	Potomac River
P	"	Berkeley County PSD	Le Feure Spring
P		Opequon PSD	Quarry Spring
P	"	Hedgesville PSD	Speck Spring
P	Morgan	Paw Paw Water	Potomac River
PSB	Hampshire	Romney Water	South Branch Potomac River
PSB	"	Peterkin Conference Center	Mill Run
PSB	Hardy	Moorefield Municipal Water	South Fork River
PSB	Pendleton	U.S. Naval Radio Sta.	South Fork River
PSB	"	Circleville Water Inc.	North Fork of South Branch, Potomac River
PSB	Grant	Mountain Top PSD	Mill Creek, Impoundment
PSB	"	Petersburg Municipal Water	South Branch, Potomac River
PNB	Grant	Island Creek Coal	Impoundment
PNB	Mineral	Piedmont Municipal Water	Savage River, Maryland
PNB	"	Keyser Water	New Creek
PNB	"	Fort Ashby PSD	Lake
Monongahela River			
M	Monongalia	Morgantown Water Comm.	Colburn Creek & Monongahela River
M	"	Morgantown Ordinance Works	Monongahela River
M	Preston	Preston County PSD	Deckers Creek
M	Monongalia	Blacksville # 1 Mine	Impoundment
M	"	Loveridge Mine	Impoundment
M	"	Consolidation Coal Co.	Impoundment
M	Preston	Mason Town Water	Block Run
MC	Preston	Fibair Inc.	Impoundment
MC	Monongalia	Cheat Neck PSD	Cheat Lake
MC	"	Lakeview County Club	Cheat Lake-Lake Lynn
MC	"	Union Districk PSD	Cheat Lake-Lake Lynn
MC	"	Cooper's Rock State Park	Impoundment

River Basin	County	Operating Company	Source
Monongahela River			
MC	Preston	Kingwood Water	Cheat River
MC	Preston	Hopemount State Hosp.	Snowy Creek
MC	"	Rowlesburg Water	Keyser Run & Cheat River
MC	"	Albright	Cheat River
MC	Tucker	Parsons Water	Shavers & Elk Lick Fork
MC	"	Thomas Municipal	Thomas Reservoir
MC	"	Hamrick PSD	Dry Fork
MC	"	Douglas Water System	Long Run
MC	"	Davis Water	Blackwater River
MC	"	Hambleton Water System	Roaring Creek
MC	"	Canaan Valley State Park	Blackwater River
MC	Pocahontas	Cheat Mt. Sewer	Shavers Lake
MC	"	Snowshoe Co. Water	Shavers Fork
MC	Randolph	Womelsdorf Water	Yokum Run
MW	Harrison	Lumberport Water	Jones Run
MW	"	Clarksburg Water Bd.	West Fork River
MW	"	Bridgeport Mun. Water	Deecons & Hinkle Creek
MW	"	Salem Water Board	Dog Run
MW	"	West Milford Water	West Fork River
MW	Lewis	W.V. Water-Weston District	West Fork River
MW	"	Jackson's Mill Camp	Impoundment
MW	"	West Fork River PSD	West Fork River
MW	"	Kennedy Compresssor Station	West Fork River
MW	"	Jane Lew Water Comm.	Hackers Creek
MW	Harrison	Bel-Meadow Country Club	Lake
MW	"	Harrison Power Station	West Fork River
MW	"	Oakdale Portal	Impoundment
MW	"	Robinson Port	Impoundment
MT	Marion	Fairmont Water Comm.	Tygart River
MT	"	Mannington Water	Impoundment
MT	"	Monongah Water Works	Tygart River
MT	"	Eastern Assoc.	Coal Corp Impoundment
MT	"	Four States Water	Impoundment
MT	Harrison	Shinnston Water Dept.	Tygart River
MT	Taylor	Grafton Water	Tygart River-Lake
MT	Barbour	Phillippi Water	Tygart River
MT	"	Bethlehem Mines Corp.	Impoundment
MT	"	Belington Water Works	Tygart River & Mill Run Lake
MT	Randolph	Elkins Municipal Water	Tygart River
MT	"	Beverly Water	Tygart River
MT	"	Valley Water	Tygart River
MT	"	Huttonsville Medium Security Prison	Tygart River
MT	"	Mill Creek Water	Mill Creek
MTB	Upshur	Buckhannon Water Board	Buckhannon River

River Basin		County	Operating Company	Source
Ohio River				
O	Zone 1	Hancock	Chester Water & Sewer	Ohio River
O	"	Brooke	City of Weirton	Ohio River
O	Zone 1	Brooke	Weirton Steel Division	Ohio River
O	"	Ohio	Wheeling Water	Ohio River
O	"	Tyler	Sistersville Mun. Water	Ohio River
O	"	Pleasants	Pleasants Power Station	Ohio River
O	"	Cabell	Huntington Water Corp.	Ohio River
O	"	Marshall	Mobay Chemical Co.	Ohio River
O	"	Wood	E. I. DuPont	Ohio River
O	Zone 2	Marshall	Meron Water	Glass House Hollow
O	"	"	New Urindahana Water	Wheeling Creek System
O	"	Wetzel	Pine Grove Water	North Fork, Fishing Creek
O	"	Marshall	Consolidated Coal Co.	Impoundment
O	"	Tyler	Middlebourne Water	Middle Island Creek
O	"	Doddridge	West Union Mun. Water	Middle Island Creek
O	"	Mason	Hidden Valley Country	Lake/Impoundment
O	"	Jackson	Ripley Water	Mill Creek
O	"	Wayne	Wayne Municipal Water	Twelve Pole Creek
O	"	"	East Lynn Lake	East Lynn Lake
O	"	"	Monterey Coal Co.	Impoundment
Little Kanawha				
	LK	Wood	Claywood Park PSD	Little Kanawha River
	LK	Calhoun	Grantsville Mun. Water	Little Kanawha River
	LK	Gilmer	Glenville Utility	Little Kanawha River
	LK	"	Consolidated Gas Compressor	Steer Creek
	LK	Braxton	Burnsville Water Works	Little Kanawha River
	LK	Roane	Spencer Water	Spring Creek Mile Tree Reservoir
	LK	Wirt	Elizabeth Water	Little Kanawha River
	LKH	Ritchie	Cairo Water	North Fork Hughes River
	LKH	"	Harrisville Water	North Fork Hughes River
	LKH	"	Pennsboro Water	North Fork Hughes River
Kanawha River				
	K	Putnam	Buffalo Water	Cross Creek
	K	"	Winfield Water	Poplar Fork & Crooked Creek
	K	"	South Putnam PSD	Poplar Fork & Crooked Creek
	K	Kanawha	Cedar Grove Water	Kanawha River
	K	"	Pratt Water	Kanawha River
	K	Fayette	Armstrong PSD PO-K1-CO-EL	Kanawha River & Gum Hollow
	K	"	Kanawha Water Co.-	Unnamed Tributary Kanawha Beards Fork

River Basin	County	Operating Company	Source
Kanawha River			
K	Kanawha	Midland Trail School	Impoundment
K	"	Cedar Coal Co.	Impoundment
K	Fayette	Elkem Metals Co.	Kanawha River
K	Fayette	Deepwater PSD	Kanawha River
K	"	Kanawha Falls PSD	Kanawha River
K	"	W.V. Water-Montgomery	Kanawha River
Pocatalico River			
KP	Kanawha	Sissonville PSD	Pocatalico River
KP	Roane	Walton PSD	Silcott Fork Dam
Coal River			
KC	Kanawha	St. Albans Water	Coal River
KC	"	Washington PSD	Coal River
KC	Lincoln	Lincoln PSD	Coal River
KC	Boone	Coal River PSD	Coal River
KC	"	Whitesville PSD	Coal River
KC	Raleigh	Armco Mine 10	Marsh Fork
KC	"	Armco Steel-Montc. Stickney	Coal River
KC	Raleigh	Peabody Coal	Coal River
KC	"	Stephens Lake Park	Lake Stephens
KC	Boone	W.V. Water-Madison Dist.	Little Coal River
KC	"	Van PSD	Pond Fork
KC	Raleigh	Consol. Coal Co.	Workmans Creek
KC	Boone	Water Ways Park	Coal River
Elk River			
KE	Kanawha	Clendenin Water	Elk River
KE	"	W.V. Water-Kanawha Valley District	Elk River
KE	Kanawha	Pinch PSD	Elk River
KE	Clay	Clay Waterworks	Elk River
KE	"	Procious PSD	Elk River
KE	Braxton	Flatwoods-Canoe Run PSD	Elk River
KE	"	Sugar Creek PSD	Elk River
KE	"	W.V. Water-Gassaway Dist.	Elk River
KE	"	W.V. Water-Sutton Dist.	Elk River
KE	Webster	W.V. Water-Webster Springs	Elk River
KE		Holly River State Park	Holly River
Gauley River			
KG	Nicholas	Craigsville PSD	Gauley River
KG	"	Summersville Water	Impoundment/ Muddlety Creek
KG	"	Nettie-Leivasy PSD	Jim Branch
KG	Webster	Cowen PSD	Gauley River
KG	Nicholas	Wilderness PSD	Anglins Creek & Meadow River
KG	"	Richwood Water	North Fork Cherry River

River Basin	County	Operating Company	Source
New River			
KN	Fayette	Ames Heights Water	Mill Creek
KN	"	Mt. Hope Water	Impounded Mine (Surface)
KN	Fayette	Ansted Municipal Water	Mill Creek
KN	"	Fayette Co. Park	Impoundment
KN	"	New River Gorge Campground	Impoundment
KN	"	Fayetteville Water	Wolfe Creek
KN	Raleigh	Beckley Water	Glade Creek
KN	"	Westmoreland Coal Co.	Farley Branch
Bluestone River			
KNB	Summers	Jumping Branch-Nimitz	Mt. Valley Lake
KNB	"	Bluestone Conf. Center	Bluestone Lake
KNB	"	Pipestem State Park	Impoundment
KNB	Mercer	Town of Athens	Impoundment
KNB	"	Bluewell PSD	Impoundment
KNB	"	Bramwell Water	Impoundment
KNB	"	Green Valley-Glenwood PSD	Bailey Reservoir
KNB	"	Kelly's Tank	Spring
KNB	"	W.V. Water Princeton	Impoundment/ Brusch Creek
KNB	"	Lashmeet PSD	Impoundment
KNB	"	Pinnacle Water Assoc.	Mine
KNB	"	W.V. Water Bluefield	Impoundment
Greenbrier River			
KNG	Summers	W.V. Water Hinton	Greenbrier River & New River
KNG	"	Big Bend PSD	Greenbrier River
KNG	Greenbrier	Alderson Water Dept.	Greenbrier River
KNG	"	Ronceverte Water	Greenbrier River
KNG	"	Lewisburg Water	Greenbrier River
KNG	Pocahontas	Denmar State Hospital Water	Greenbrier River
KNG	"	City of Marlinton Water	Knapp Creek
KNG	"	Cass Scenic Railroad	Leatherbark Creek
KNG	"	Upper Greenbrier PSD	Greenbrier River
KNG	"	The Hermitage	Greenbrier River
Guyandotte River			
OG	Cabell	Salt Rock PSD	Guyandotte River
OG	Lincoln	West Hamlin Water	Guyandotte River
OG	Logan	Logan Water Board	Guyandotte River
OG	"	Man Water Works	Guyandotte River
OG	"	Buffalo Creek PSD	Buffalo Creek/ Mine/Wells
OG	Logan	Chapmanville	Guyandotte River
OG	"	Logan PSD	Whitman Creek/ Guyandotte River
OG	Mingo	Gilbert Water	Guyandotte River
OG	Wyoming	Oceana Water	Laurel Fork
OG	"	Glen Rogers PSD	Impoundment

River Basin	County	Operating Company	Source
Guyandotte River			
OG	Wyoming	Pineville Water	Pinnacle Creek/
OG	Raleigh	Raleigh Co. PSD-Amigo	Tommy Creek
OMG	Cabell	Milton Water Works	Guyandotte River
OMG	"	Culloden PSD	Indian Fork Creek
OMG	Putnam	Hurricane Municipal Water	Impoundment
OMG	Putnam	Lake Washington PSD	Lake Washington
Big Sandy River			
BS	Wayne	Kenova Municipal Water	Big Sandy River
BS	"	Fort Gay Water	Tug Fork
BST	Mingo	Kermit Water	Tug Fork
BST	"	Matewan Water	Tug Fork
BST	"	A & H Coal Co., Inc.	Impoundment
BST	"	Williamson Water	Impoundment
BST	McDowell	City of Welch	Impoundment/Wells
BST	"	City of Gary	Impoundment/Mine

APPENDIX C
CATEGORY E-3 - POWER PRODUCTION

This list contains known power production facilities and is not intended to exclude any waters as described in section 6.6.c, herein.

River Basin	County	Station Name	Operating Company
Monongahela River			
M	Monongalia	Fort Martin Power Station	Monongahela Power
M	Marion	Rivesville Station	Monongahela Power
MC	Preston	Albright Station	Monongahela Power
Potomac	Grant	Mt. Storm Power Station	Virginia Electric & Power Company
Ohio River			
O - Zone 1	Wetzel	Hannibal (Hydro)	Ohio Power
O " "	Marshall	Kammer	Ohio Power
O " "	"	Mitchell	Ohio Power
O " "	Pleasants	Pleasants Station	Monongahela Power
O " "	"	Willow Island Station	Monongahela Power
O " "	Mason	Phillip Sporn Plant	Central Operating (AEP)
O " "	"	Racine (Hydro)	Ohio Power
O " "	"	Mountaineer	Appalachian Power Co.
K	Putnam	Winfield (Hydro)	Appalachian Power Co.
K	Kanawha	Marmet (Hydro)	Appalachian Power Co.
K	"	London (Hydro)	Appalachian Power Co.
K	"	Kanawha River	Appalachian Power Co.
K	"	John E. Amos	Appalachian Power Co.

APPENDIX D
CATEGORY C - WATER CONTACT RECREATION

This list contains waters known to be used for water contact recreation and is not intended to exclude any waters as described in section 6.4, herein.

River Basin	Stream Code	Stream	County
Shenandoah	S	Shenandoah River	Jefferson
Potomac	P	Potomac River	Jefferson
	P	" "	Hampshire
	P	" "	Berkeley
	P	" "	Morgan
	P-9	Sleepy Creek & Meadow Branch	Berkeley
	P-9-G-1	North Fork of Indian Run	Morgan
South Branch	PSB	South Branch of Potomac River	Hampshire
	PSB	" "	Hardy
	PSB	" "	Grant
	PSB-21-X	Hawes Run	Pendleton
	PSB-25-C-2	Spring Run	Grant
	PSB-28	North Fork South Branch Potomac River	Grant
North Branch	PNB	North Branch of Potomac River	Mineral
	PNB-4-EE	North Fork Patterson Creek	Grant
	PNB-7-H	Linton Creek	Grant
	PNB-17	Stoney River-Mt. Storm Lake	Grant
	PC	Cacapon River	Hampshire
Monongalia			
Cheat	MC	Cheat Lake/Cheat river	Monongalia/Preston
	MC	Alpine Lake	Preston
	MC-6	Coopers Rock Lake/ Quarry Run	Monongalia
	MC-12	Big Sandy Creek	Preston
	MSC	Shavers Fork	Randolph
	MTN	Middle Fork River	Barbour/Randolph/ Upshur
	MW	West Fork River	Harrison
	MW-18	Stonecoal Creek/ Stonecoal Lake	Lewis

River Basin	Stream Code	Stream	County
Ohio	O	OhioRiver	Brooke/Cabell/ Hancock/Jackson/ Marshall/Mason/Ohio/ Pleasants/Tyler/ Wayne/Wood/Wetzel
	O-2-H	Beech Fork of Twelvepole Creek/Beech Fork Lake	Wayne
	O-2-Q	East Fork of Twelvepole Creek/East Lynn Lake	Wayne
	O-3	Fourpole Creek	Cabell
	O-21	Old Town Creek/ McClintic Ponds	Mason
	OMI	Middle Island Creek/ Crystal Lake	Doddridge
	OG	Guyandotte River	Cabell
	OG	Guyandotte River/ R. D. Bailey Lake	Wyoming
	OGM	Mud River	Cabell
Little Kanawha	LK	Little Kanawha River/ Burnsville Lake	Braxton
Kanawha	K	Kanawha River	Fayette/Kanawha/ Mason/Putnam
	K-1	Unnamed Tributary Krodel Lake	Mason
	KC	Coal River	Kanawha
	KC-45-Q	Stephens Branch/ Lake Stephens	Raleigh
	KE	Elk River	Kanawha/Clay/ Braxton/Webster/ Randolph
	KE	Sutton lake	Braxton
	KN	New River	Fayette/Raleigh/ Summers
	KN-26-F	Little Beaver Creek	Raleigh
	KNG	Greenbrier River	Greenbrier/ Pocahontas/Summers
	KNG-23-E-1	Little Devil Creek/ Moncove Lake	Monroe
	KNG-28	Anthony Creek	Greenbrier
	KNG-28-P	Meadow Creek/ Lake Sherwood	Greenbrier
	KNB	Bluestone River/ Bluestone Lake	Summers
	KG	Gauley River	Webster

River Basin	Stream Code	Stream	County
Kanawha	KG	Gauley River/ Summersville Lake	Nicholas
	KGW	Williams River	Webster

47CSR2
APPENDIX E, TABLE 1

PARAMETER	USE DESIGNATION						
	AQUATIC LIFE				HUMAN HEALTH		ALL OTHER USES
	B1, B4		B2		C[3]	A[4]	
	ACUTE[1]	CHRON[2]	ACUTE[1]	CHRON[2]			
8.1 Dissolved Aluminum (ug/l) ~~Not to exceed [e]~~:	750xCF[5]	~~87~~ 750xCF[5] [e]	750xCF[5]	87xCF[5] [e]			
8.2. Acute and chronic aquatic life criteria for ammonia shall be determined using the National Criterion for Ammonia in Fresh Water[d] from USEPA's 1999 Update of Ambient Water Quality Criteria for Ammonia (EPA-822-R-99-014, December 1999)	X	X	X	X			
8.3 Antimony (ug/l) ~~Not to exceed:~~					4300	14	
8.4 Arsenic[b] (ug/l) ~~Not to exceed:~~					~~50~~ 10	~~50~~ 10	100
8.4.1 Dissolved Trivalent Arsenic (ug/l) ~~Not to exceed:~~	340 ~~360 x CF[5]~~	150 ~~190 x CF[5]~~	340 ~~360 x CF[5]~~	150 ~~190 x CF[5]~~			
8.5 Barium (mg/l) ~~Not to exceed:~~						1.0	
8.6 Beryllium (ug/l)	130		130			.0077	
8.7 Cadmium (ug/l) Hardness (mg/l $CaCO_3$) — Soluble Cd 0 - 35 — 1.0 36 - 75 — 2.0 76 - 150 — 5.0 > 150 — 10.0						X	

47CSR2
APPENDIX E, TABLE 1

PARAMETER	USE DESIGNATION						
	AQUATIC LIFE				HUMAN HEALTH		ALL OTHER USES
	B1, B4		B2		C[3]	A[4]	
	ACUTE[1]	CHRON[2]	ACUTE[1]	CHRON[2]			
8.7.1 ~~Not to exceed~~ 10 ug/l in the Ohio River (O Zone 1) main stem (see section 7.1.d, herein)						X	
8.7.~~3~~ 2 The four-day average concentration of dissolved cadmium ~~shall not exceed the value~~ determined by the following equation: ~~$Cd = e^{(0.7852[ln(hardness)]-3.490)} \times CF^5$~~ $Cd = e^{(0.7409[ln(hardness)]-4.719)} \times CF^5$		X		X			
8.7.~~4~~ 3 The one-hour average concentration of dissolved cadmium ~~shall not exceed the value~~ determined by the following equation: ~~$Cd = e^{(1.128[ln(hardness)]-3.828)} \times CF^5$~~ $Cd = e^{(1.0166[ln(hardness)]-3.924)} \times CF^5$	X		X				
8.8 Chloride (mg/l)	860	230	860	230	250	250	
8.9.1 Chromium, dissolved hexavalent (ug/l): ~~Not to exceed:~~	16 ~~x CF[5]~~	11 ~~x CF[5]~~	16 ~~x CF[5]~~	7.2 ~~x CF[5]~~		50	
8.9.2 Chromium, trivalent (ug/l) The one-hour average concentration of dissolved trivalent chromium ~~shall not exceed the value~~ determined by the following equation: ~~$exp\{0.8190[ln(hardness)]+3.7256\} \times (CF^5)$~~ $CrIII = e^{(0.8190[ln(hardness)]+3.7256)} \times CF^5$	X		X				
8.9.3 The four-day average concentration of dissolved trivalent chromium ~~shall not exceed the value~~ determined by the following concentration: ~~$exp\{0.8190[ln(hardness)]+0.6848\} \times (CF^5)$.~~ $CrIII = e^{(0.8190[ln(hardness)]+0.6848)} \times CF^5$		X		X			

47CSR2
APPENDIX E, TABLE 1

PARAMETER	USE DESIGNATION						
	AQUATIC LIFE				HUMAN HEALTH		ALL OTHER USES
	B1, B4		B2		C[3]	A[4]	
	ACUTE[1]	CHRON[2]	ACUTE[1]	CHRON[2]			
8.10 Copper (ug/l) ~~Not to exceed:~~						1000	
8.10.1 The four-day average concentration of dissolved copper ~~shall not exceed the value~~ determined by the following equation[a]: ~~$Cu = e^{(0.8545[\ln(hardness)]-1.465)} \times CF^5$~~ $Cu = e^{(0.8545[\ln(hardness)]-1.702)} \times CF^5$		X		X			
8.10.2 The one-hour average concentration of dissolved copper ~~shall not exceed the value~~ determined by the following equation[a]: ~~$Cu = e^{(0.9422[\ln(hardness)]-1.464)} \times CF^5$~~ $Cu = e^{(0.9422[\ln(hardness)]-1.700)} \times CF^5$	X		X				
8.11 Cyanide (ug/l) (As free cyanide $HCN+CN^-$) ~~Not to exceed:~~	22	5.0	22	5.0	5.0	5.0	
8.12 Dissolved Oxygen[c]: not less than 5 mg/l at any time.	X				X	X	X
8.12.1 Kanawha River main stem, Zone 1 - Not less than 4.0 mg/l at any time.	X						
8.12.2 Ohio River main stem - the average concentration shall not be less than 5.0 mg/l per calendar day and shall not be less than 4.0 mg/l at any time or place outside any established mixing zone - provided that a minimum of 5.0 mg/l at any time is maintained during the April 15-June 15 spawning season.	X						

47CSR2
APPENDIX E, TABLE 1

PARAMETER	USE DESIGNATION						
	AQUATIC LIFE				HUMAN HEALTH		ALL OTHER USES
	B1, B4		B2		C[3]	A[4]	
	ACUTE[1]	CHRON[2]	ACUTE[1]	CHRON[2]			
8.12.3 Not less than 7.0 mg/l in spawning areas and in no case less than 6.0 mg/l at any time.			X				
8.13 Fecal Coliform: Maximum allowable level of fecal coliform content for ~~Primary~~ Water Contact Recreation (either MPN or MF) shall not exceed 200/100 ml as a monthly geometric mean based on not less than 5 samples per month; nor to exceed 400/100 ml in more than ten percent of all samples taken during the month.					X	X	
8.13.1 Ohio River main stem (zone 1) - During the non-recreational season (November through April only) the maximum allowable level of fecal coliform for the Ohio River (either MPN or MF) shall not exceed 2000/100 ml as a monthly geometric mean based on not less than 5 samples per month.					X	X	
8.14 Fluoride (mg/l) ~~Not to exceed:~~						1.4	
8.14.1 Not to exceed 2.0 for category D1 uses.							X
8.15 Iron[c] (mg/l) ~~Not to exceed:~~		1.5		0.5		1.5	
8.16 Lead (ug/l) ~~Not to exceed:~~						50	
8.16.1 The four-day average concentration of dissolved lead ~~shall not exceed the value~~ determined by the following equation[a]: $Pb = e^{(1.273[\ln(\text{hardness})]-4.705)} \times CF^{5}$		X		X			

APPENDIX E, TABLE 1

PARAMETER	USE DESIGNATION						
	AQUATIC LIFE				HUMAN HEALTH		ALL OTHER USES
	B1, B4		B2		C[3]	A[4]	
	ACUTE[1]	CHRON[2]	ACUTE[1]	CHRON[2]			
8.16.2 The one-hour average concentration of dissolved lead ~~shall not exceed the value~~ determined by the following equation[a]: $Pb = e^{(1.273[\ln(hardness)]-1.46)} \times CF^5$	X		X				
8.17 Manganese (mg/l) (see §6.2.d) ~~Not to exceed:~~						1.0	
8.18 Mercury The total organism body burden of any aquatic species shall not exceed 0.5 ug/g as methylmercury.					0.5	0.5	
8.18.1 Total mercury in any unfiltered water sample ~~shall not exceed~~ (ug/l):	2.4		2.4		0.15	0.14	
8.18.2 Methylmercury (water column) ~~Not to exceed~~ (ug/l):		.012		.012			
Nickel (ug/l) ~~Not to exceed:~~					4600	510	
8.19.1 The four-day average concentration of dissolved nickel ~~shall not exceed the value~~ determined by the following equation[a]: ~~$Ni = e^{(0.846[\ln(hardness)]+1.1645)} \times CF^5$~~ $Ni = e^{(0.846[\ln(hardness)]+0.0584)} \times CF^5$		X		X			
8.19.2 The one-hour average concentration of dissolved nickel ~~shall not exceed the value~~ determined by the following equation[a]: ~~$Ni = e^{(0.846[\ln(hardness)]+3.361)} \times CF^5$~~ $Ni = e^{(0.846[\ln(hardness)]+2.255)} \times CF^5$	X		X				
8.20 Nitrate (as Nitrate-N) (mg/l)						10	

47CSR2
APPENDIX E, TABLE 1

PARAMETER	USE DESIGNATION						
	AQUATIC LIFE				HUMAN HEALTH		ALL OTHER USES
	B1, B4		B2		C[3]	A[4]	
	ACUTE[1]	CHRON[2]	ACUTE[1]	CHRON[2]			
8.21 Nitrite (as Nitrite-N) (mg/l) ~~Not to exceed:~~	1.0		.060				
8.22 Nutrients							
Chlorophyll –a (µg/l) (see §47-2-8.3)							
Total Phosphorus (µg/l) (see §47-2-8.3)							
~~8.22~~ 8.23 Organics							
Chlordane[b] (ng/l)	2400	4.3	2400	4.3	0.46	0.46	0.46
DDT[b] (ng/l)	1100	1.0	1100	1.0	0.024	0.024	0.024
Aldrin[b] (ng/l)	3.0		3.0		0.071	0.071	0.071
Dieldrin[b] (ng/l)	2500	1.9	2500	1.9	0.071	0.071	0.071
Endrin (ng/l)	180	2.3	180	2.3	2.3	2.3	2.3
Toxaphene[b] (ng/l)	730	0.2	730	0.2	0.73	0.73	0.73
PCB[b] (ng/l)		14.0		14.0	0.045	0.044	0.045
Methoxychlor (ug/l)		0.03		0.03	0.03	0.03	0.03
Dioxin (2,3,7,8- TCDD)[b] (pg/l)					0.014	0.013	0.014
Acrylonitrile[b] (ug/l)					0.66	0.059	
Benzene[b] (ug/l)					~~71~~ 51	0.66	
1,2-dichlorobenzene (mg/l)					17	2.7	
1,3-dichlorobenzene (mg/l)					2.6	0.4	
1,4-dichlorobenzene (mg/l)					2.6	0.4	
2,4-dinitrotoluene[b] (ug/l)					9.1	0.11	

47CSR2
APPENDIX E, TABLE 1

PARAMETER	USE DESIGNATION						
	AQUATIC LIFE				HUMAN HEALTH		ALL OTHER USES
	B1, B4		B2		C[3]	A[4]	
	ACUTE[1]	CHRON[2]	ACUTE[1]	CHRON[2]			
Hexachlorobenzene[b] (ng/l)					0.77	0.72	
Carbon tetrachloride[b] (ug/l)					4.4	0.25	
Chloroform[b] (ug/l)					470	5.7	
~~Halomethanes (ug/l)~~					~~15.7~~	~~0.19~~	
Bromoform[b] (ug/l)					140	4.3	
Dichlorobromomethane[b] (ug/l)					17	0.55	
Methyl Bromide (ug/l)					1500	47	
Methylene Chloride[b] (ug/l)					590	4.6	
1,2-dichloroethane[b] (ug/l)					99	0.035	
1,1,1- trichloroethane[b] (mg/l)						12	
1,1,2,2-tetrachloroethane (ug/l)					11	0.17	
1,1-dichloroethylene[b] (ug/l)					3.2	0.03	
Trichloroethylene[b] (ug/l)					81	2.7	
Tetrachloroethylene[b] (ug/l)					8.85	0.8	
Toluene[b] (mg/l)					200	6.8	
~~Polynuclear Aromatic Hydrocarbons (PAH)[b] (ug/l)~~					~~0.031~~	~~.0028~~	
Acenaphthene (ug/l)					990	670	

47CSR2
APPENDIX E, TABLE 1

PARAMETER	USE DESIGNATION						
	AQUATIC LIFE				HUMAN HEALTH		ALL OTHER USES
	B1, B4		B2		C[3]	A[4]	
	ACUTE[1]	CHRON[2]	ACUTE[1]	CHRON[2]			
Anthracene (ug/l)					40,000	8,300	
Benzo(a) Anthracene[b] (ug/l)					0.018	0.0038	
Benzo(a) Pyrene[b] (ug/l)					0.018	0.0038	
Benzo(b) Fluoranthene[b] (ug/l)					0.018	0.0038	
Benzo(k) Fluoranthene[b] (ug/l)					0.018	0.0038	
Chrysene[b] (ug/l)					0.018	0.0038	
Dibenzo(a,h)Anthracene[b] (ug/l)					0.018	0.0038	
Fluorene (ug/l)					5300	1100	
Ideno(1,2,3-cd)Pyrene[b] (ug/l)					0.018	0.0038	
Pyrene (ug/l)					4000	830	
2-Chloronaphthalene (ug/l)					1600	1000	
Phthalate esters[6] (ug/l)		3.0		3.0			
Vinyl chloride[b] (chloroethene) (ug/l)					525	2.0	
alpa-BHC (alpha- Hexachloro-cyclohexane)[b] (ug/l)					0.013	.0039	
beta-BHC(beta- Hexachloro-cyclohexane)[b] (ug/l)					0.046	0.014	
gamma-BHC (gamma- Hexachloro-cyclohexane)[b] (ug/l)	2.0	0.08	2.0	0.08	0.063	0.019	
Chlorobenzene (mg/l)					21	0.68	
Ethylbenzene (mg/l)					29	3.1	
Heptachlor[b] (ng/l)	520	3.8	520	3.8	0.21	0.21	

47CSR2
APPENDIX E, TABLE 1

PARAMETER	USE DESIGNATION						
	AQUATIC LIFE				HUMAN HEALTH		ALL OTHER USES
	B1, B4		B2		C[3]	A[4]	
	ACUTE[1]	CHRON[2]	ACUTE[1]	CHRON[2]			
2-methyl-4,6-Dinitrophenol (ug/l)					765	13.4	
Fluoranthene (ug/l)					370	300	
~~8.22.1~~ 8.23.1 ~~The organic chemicals listed in §8.22 shall not exceed the specified water quality criteria.~~ When the specified criteria for organic chemicals listed in §8.23 are less than the practical laboratory quantification level, instream values will be calculated from discharge concentrations and flow rates, where applicable.							
~~8.23~~ 8.24 pH[c] No values below 6.0 nor above 9.0. Higher values due to photosynthetic activity may be tolerated.	X	X	X	X	X	X	X
~~8.24~~ 8.25 Phenolic Materials							
~~8.24.1~~ 8.25.1 Phenol (ug/l) ~~Not to exceed:~~					4,600,000	21,000	
~~8.24.2~~ 8.25.2 2-Chlorophenol (ug/l) ~~Not to exceed:~~					400	120	
~~8.24.3~~ 8.25.3 2,4-Dichlorophenol (ug/l) ~~Not to exceed:~~					790	93	
~~8.24.4~~ 8.25.4 2,4-Dimethylphenol (ug/l) ~~Not to exceed:~~					2300	540	
~~8.24.5~~ 8.25.5 2,4-Dinitrophenol (ug/l) ~~Not to exceed:~~					14,000	70	
~~8.24.6~~ 8.25.6 Pentachlorophenol[b] (ug/l)					8.2	0.28	

47CSR2
APPENDIX E, TABLE 1

PARAMETER	USE DESIGNATION						
	AQUATIC LIFE				HUMAN HEALTH		ALL OTHER USES
	B1, B4		B2		C[3]	A[4]	
	ACUTE[1]	CHRON[2]	ACUTE[1]	CHRON[2]			
~~8.24.6.a~~ 8.25.6.a The one-hour average concentration of pentachlorophenol ~~shall not exceed the value~~ determined by the following equation: exp(1.005(pH)-4.869)	X		X				
~~8.24.6.b~~ 8.25.6.b The 4-day average concentration of pentachlorophenol ~~shall not exceed the value~~ determined by the following equation: exp(1.005(pH)-5.134).		X		X			
~~8.24.7~~ 8.25.7 2,4,6-Trichlorophenol[b] (ug/l) ~~Not to exceed:~~					6.5	2.1	
~~8.25~~ 8.26 Radioactivity: Gross Beta activity not to exceed 1000 picocuries per liter (pCi/l), nor shall activity from dissolved strontium-90 exceed 10 pCi/l, nor shall activity from dissolved alpha emitters exceed 3 pCi/l.	X		X		X	X	X
~~8.25.1~~ 8.26.1 Gross total alpha particle activity (including radium-226 but excluding radon and uranium shall not exceed 15 pCi/l and combined radium-226 and radium-228 shall not exceed 5pCi/l; provided that the specific determination of radium-226 and radium-228 are not required if dissolved particle activity does not exceed 5pCi/l; the concentration of tritium shall not exceed 20,000 pCi/l; the concentration of total strontium-90 shall not exceed 8 pCi/l in the Ohio River main stem.	X		X		X	X	X

47CSR2
APPENDIX E, TABLE 1

PARAMETER	USE DESIGNATION						
	AQUATIC LIFE				HUMAN HEALTH		ALL OTHER USES
	B1, B4		B2		C^3	A^4	
	ACUTE[1]	CHRON[2]	ACUTE[1]	CHRON[2]			
~~8.26~~ 8.27 Selenium (ug/l) ~~Not to exceed:~~	20	5	20	5		~~10~~ 50	
~~8.27~~ 8.28 Silver (ug/l) Hardness / Silver 0-50 / 1 51-100 / 4 101-200 / 12 >201 / 24				X		X	
~~8.27.1~~ 8.28.1 0-50 / 1 51-100 / 4 101-200 / 12 201-400 / 24 401-500 / 30 501-600 / 43		X					
~~8.27.2~~ 8.28.2 The one-hour average concentration of dissolved silver ~~shall not exceed the value~~ determined by the following equation: ~~$Ag=e^{(1.72[\ln(hardness)]-6.52)} \times CF^5$~~ $Ag=e^{(1.72[\ln(hardness)]-6.59)} \times CF^5$	X		X				

47CSR2
APPENDIX E, TABLE 1

PARAMETER	USE DESIGNATION						
	AQUATIC LIFE				HUMAN HEALTH		ALL OTHER USES
	B1, B4		B2		C[3]	A[4]	
	ACUTE[1]	CHRON[2]	ACUTE[1]	CHRON[2]			
~~8.28~~ 8.29 Temperature Temperature rise shall be limited to no more than 5°F above natural temperature, not to exceed 87°F at any time during months of May through November and not to exceed 73°F at any time during the months of December through April. During any month of the year, heat should not be added to a stream in excess of the amount that will raise the temperature of the water more than 5°F above natural temperature. In lakes and reservoirs, the temperature of the epilimnion should not be raised more than 3°F by the addition of heat of artificial origin. The normal daily and seasonable temperature fluctuations that existed before the addition of heat due to other natural causes should be maintained.	X						
~~8.28.1~~ 8.29.1 For the Kanawha River Main Stem (K-1): Temperature rise shall be limited to no more than 5°F above natural temperature, not to exceed 90°F in any case.	X						

47CSR2
APPENDIX E, TABLE 1

PARAMETER	USE DESIGNATION						
	AQUATIC LIFE				HUMAN HEALTH		ALL OTHER USES
	B1, B4		B2		C[3]	A[4]	
	ACUTE[1]	CHRON[2]	ACUTE[1]	CHRON[2]			
~~8.28.2~~ 8.29.2 For the Bluestone R (KNB), Bluestone Lake (KN-60) East River (KNE), New River (KN), Gauley R. (KG) and Greenbrier River (KNG): Temperature rise shall be limited to no more than 5°F above natural temperature, not to exceed 81°F at any time during the months of May through November and not to exceed 73°F at any time during December through April.			X				
~~8.28.3~~ 8.29.3 No heated effluents will be discharged in the vicinity of spawning areas. The maximum temperatures for cold waters are expressed in the following table:			X				

	Daily Mean °F	Hourly Max °F
Oct-Apr	50	55
Sep-May	58	62
Jun-Aug	66	70

47CSR2
APPENDIX E, TABLE 1

PARAMETER	USE DESIGNATION						
	AQUATIC LIFE				HUMAN HEALTH		ALL OTHER USES
	B1, B4		B2		C[3]	A[4]	
	ACUTE[1]	CHRON[2]	ACUTE[1]	CHRON[2]			
~~8.28.4~~ 8.29.4 For Ohio River Main Stem (01) (see section 7.1.d, herein): Dates — Period Ave. — Inst. Max. Jan 1-31 45°F 50°F February 45 50 March 1-15 51 56 March 16-31 54 59 April 1-15 58 64 April 16-30 64 69 May 1-15 68 73 May 16-31 75 80 June 1-15 80 85 June 16-30 83 87 July 1-31 84 89 August 1-31 84 89 Sept 1-15 84 87 Sept 16-30 82 86 Oct 1-15 77 82 Oct 16-31 72 77 Nov 1-30 67 72 Dec 1-31 52 57	X						
~~8.29~~ 8.30 Thallium (ug/l)					6.3	1.7	
~~8.30~~ 8.31 Threshold odor[c] Not to exceed a threshold odor number of 8 at 104°F as a daily average.		X		X	X	X	
~~8.31~~ 8.32 Total Residual Chlorine (ug/l - measured by amperometric or equivalent method) ~~Not to exceed:~~	19	11					

47CSR2
APPENDIX E, TABLE 1

PARAMETER	USE DESIGNATION						
	AQUATIC LIFE				HUMAN HEALTH		ALL OTHER USES
	B1, B4		B2		C[3]	A[4]	
	ACUTE[1]	CHRON[2]	ACUTE[1]	CHRON[2]			
~~8.31.1~~ 8.32.1 No chlorinated discharge allowed			X				
~~8.32~~ 8.33 Turbidity No point or non-point source to West Virginia's waters shall contribute a net load of suspended matter such that the turbidity exceeds 10 NTU's over background turbidity when the background is 50 NTU or less, or have more than a 10% increase in turbidity (plus 10 NTU minimum) when the background turbidity is more than 50 NTUs. This limitation shall apply to all earth disturbance activities and shall be determined by measuring stream quality directly above and below the area where drainage from such activity enters the affected stream. Any earth disturbing activity continuously or intermittently carried on by the same or associated persons on the same stream or tributary segment shall be allowed a single net loading increase.		X		X	X	X	
~~8.32.1~~ 8.33.1 This rule shall not apply to those activities at which Best Management Practices in accordance with the State's adopted 208 Water Quality Management Plan are being utilized, maintained and completed on a site-specific basis as determined by the appropriate 208 cooperative or an approved Federal or State Surface Mining Permit is in effect. This exemption shall not apply to Trout Waters.		X			X	X	

47CSR2
APPENDIX E, TABLE 1

PARAMETER	USE DESIGNATION						
	AQUATIC LIFE				HUMAN HEALTH		ALL OTHER USES
	B1, B4		B2		C[3]	A[4]	
	ACUTE[1]	CHRON[2]	ACUTE[1]	CHRON[2]			
~~8.33~~ 8.34 Zinc (ug/l) The four-day average concentration of dissolved zinc ~~shall not exceed the value~~ determined by the following equation[a]: ~~$Zn = e^{(0.8473[\ln(\text{hardness})]+0.7614)} \times CF^5$~~ $Zn = e^{(0.8473[\ln(\text{hardness})]+0.884)} \times CF^5$		X		X			
~~8.33.1~~ 8.34.1 The one-hour average concentration of dissolved zinc ~~shall not exceed the value~~ determined by the following equation[a]: ~~$Zn = e^{(0.8473[\ln(\text{hardness})]+0.8604)} \times CF^5$~~ $Zn = e^{(0.8473[\ln(\text{hardness})]+0.884)} \times CF^5$	X		X				

[1] One hour average concentration not to be exceeded more than once every three years on the average, unless otherwise noted.
[2] Four-day average concentration not to be exceeded more than once every three years on the average, unless otherwise noted.
[3] These criteria have been calculated to protect human health from toxic effects through fish consumption, unless otherwise noted. Concentration not to be exceeded, unless otherwise noted.
[4] These criteria have been calculated to protect human health from toxic effects through drinking water and fish consumption, unless otherwise noted. Concentration not to be exceeded, unless otherwise noted.
[5] The appropriate Conversion Factor (CF) is a value used as a multiplier to derive the dissolved aquatic life criterion is found in Appendix E, Table 2.
[6] Phthalate esters are determined by the summation of the concentrations of Butylbenzyl Phthalate, Diethyl Phthalate, Dimethyl Phthalate, Di-n-Butyl Phthalate and Di-n-Octyl Phthalate.
[a] Hardness as calcium carbonate (mg/l). The minimum hardness allowed for use is this equation shall not be less than 25 mg/l, even if the actual ambient hardness is less than 25 mg/l. The maximum hardness value for use in this equation shall not exceed 400 mg/l even if the actual hardness is greater than 400 mg/l.
[b] Known or suspected carcinogen. Human health standards are for a risk level of 10^{-6}.
[c] May not be applicable to wetlands (B4) - site-specific criteria are desirable.
[d] The early life stage equation in the National Criterion shall be used to establish chronic criteria throughout the state unless the applicant demonstrates that no early life stages of fish occur in the affected water(s).
[e] ~~Until July 4, 2007, the aluminum criteria will be implemented as follows: the chronic aluminum criterion shall be 87 ug/l for trout waters (as defined in section 2.20 of this rule) and shall be 750 ug/l for all other waters of the state. The implementation of the interim criteria provides time for a study to develop aluminum criteria for waters of the state which are based upon sound science and are protective of aquatic life.~~

APPENDIX E
TABLE 2

Conversion Factors

Metal	Acute	Chronic
Aluminum	1.000	1.000
Arsenic (III)	1.000	1.000
Cadmium	1.136672-[(ln hardness)(0.041838)]	1.101672-[(ln hardness)(0.041838)]
Chromium (III)	0.316	0.860
Chromium(VI)	0.982	0.962
Copper	0.960	0.960
Lead	1.46203-[(ln hardness)(0.145712)]	1.46203-[(ln hardness)(0.145712)]
Nickel	0.998	0.997
Silver	0.85	N/A
Zinc	0.978	0.986

APPENDIX F
COOL WATER LAKES

This list contains lakes to be managed for cool water fisheries and is not intended to exclude any waters which meet the definition in Section 2.2.

River Basin	County	Lake
Potomac River		
PC	Hardy Lost River	Trout Pond (Impoundment)
PC	Hardy Lost River	Rock Cliff Lake (Impoundment)
PSB	Pendleton	Hawes Run (Impoundment)
PNB	Mineral	New Creek Dam 14(Impoundment)
Monongahela River		
MC	Monongalia	Coopers Rock (Impoundment)
MC	Monongalia	Cheat Lake
MC	Tucker	Thomas Park (Impoundment)
MC	Randolph	Spruce Knob Lake (Impoundment)
MT	Taylor	Tygart Lake
MW	Lewis	Stonecoal Lake
Kanawha River		
KC	Raleigh	Stephens Lake (Impoundment)
KG	Nicholas	Summersville Reservoir (Impoundment)
KG	Greenbrier	Summit Lake (Impoundment)
KNG	Pocahontas	Watoga Lake
KNG	Pocahontas	Buffalo Fork (Impoundment)
KNG	Pocahontas	Seneca (Impoundment)
KCG	Pocahontas	Handley Pond
Guyandotte River		
OG	Wyoming/Mingo	RD Bailey Lake

INDUSTRY'S REVISIONS

45CSR42

TITLE 45
LEGISLATIVE RULE
DEPARTMENT OF ENVIRONMENTAL PROTECTION
DIVISION OF AIR QUALITY

SERIES 42
GREENHOUSE GAS EMISSIONS INVENTORY PROGRAM

§45-42-1.General.

1.1 Scope -- This rule establishes a greenhouse gas emissions inventory program in West Virginia which:

1.1.a. Requires the reporting and inventory of greenhouse gas emissions by stationary sources which emit more than a *de minimis* amount of greenhouse gases on an annual basis;

1.1.b Inventories greenhouse gas emissions from stationary, area, mobile and biogenic sources, and accounts for reductions and sequestration of greenhouse gas emissions;

1.1.c. Provides for a periodic compilation of a greenhouse gas emissions inventory and a determination whether West Virginia is a net sink or emitter of greenhouse gases;

1.1.d. Provides for development of a registry to record voluntary reductions of greenhouse gas emissions; and

1.1.e Provides for a determination whether the reduction and sequestration of greenhouse gas emissions can be developed as an asset for economic development.

1.2 Authority -- W Va Code §22-5-19.

1.3. Filing Date --

1.4. Effective Date -- June 1, 2008

§45-42-2. Definitions.

2.1. "Air pollutants" means solids, liquids, or gases which, if discharged into the air, may result in statutory air pollution

2.2. "Air pollution" or "statutory air pollution" means and is limited to the discharge into the air by the act of man substances (liquid, solid, gaseous, organic or inorganic) in a locality, manner and amount as to be injurious to human health or welfare, animal or plant life, or property, or which would interfere with the enjoyment of life or property.

2.3. "Anthropogenic" means a direct result of human activities or the result of natural processes that have been influenced significantly by human activities.

2.4. "Area source" means, for purposes of this rule, a collection of similar sources of air pollutants within a geographic area. Area sources collectively represent individual sources that are small and numerous, and that typically have not been inventoried as a stationary or mobile source

2.5. "Biogenic" means a naturally occurring biological source or process that is not significantly affected by human actions or activity.

2.6. "Capture" means the collection of greenhouse gas emissions from a stationary source

2.7. "*De minimis*" means emissions from a stationary source that are equal to or less than ten thousand tons per year for carbon dioxide, four hundred seventy-six tons per year for methane, thirty-two and six tenths tons per year for nitrous oxide, eight hundred fifty-five thousandths tons per year for hydrofluorocarbons, one and nine hundredths tons per year for perfluorocarbons and forty-two hundredths tons per year for sulfur hexafluoride.

2.8. "Emission" means the release, escape or discharge of regulated air pollutants or greenhouse gases into the air.

2.9. "Greenhouse gas" means the gaseous compounds: carbon dioxide, methane, nitrous oxide, hydrofluorocarbons, perfluorocarbons, and sulfur hexafluoride (SF_6)

2.10. "Mobile source" means a variety of onroad and nonroad vehicles, engines, locomotives, marine vessels, airplanes and other equipment that generate air pollutants and greenhouse gas emissions, and that move or can be moved from place to place

2.11. "Regulated air pollutant" means, for purposes of this rule, any air pollutant regulated under rules promulgated by the Secretary pursuant to W.Va. Code §22-5-4

2.12. "Reservoir" means a geological site where a greenhouse gas is securely stored.

2.13. "Secretary" means the Secretary of the Department of Environmental Protection or such other person to whom the Secretary has delegated authority or duties pursuant to W.Va Code §§22-1-6 or 22-1-8

2.14. "Sequestration" means the physical process by which emissions of a greenhouse gas are directly captured for storage in a reservoir, or the biologic process by which a greenhouse gas is indirectly removed from the atmosphere for storage in a sink

2.15. "Sink" means any process, activity or mechanism which removes a greenhouse gas from the atmosphere Forests are considered sinks because they remove carbon dioxide through photosynthesis.

2.16 "Source" means, for purposes of this rule, any process or activity which releases a greenhouse gas into the air.

2.17 "Stationary source" means any building, structure, facility, installation, stationary process or process equipment which emits or may emit any regulated air pollutant or greenhouse gas.

2.18 "Ton" means a short ton, or 2000 pounds.

2.19. Other words and phrases used in this rule, unless otherwise indicated, shall have the meaning ascribed to them in W.Va. Code §22-5-1 et seq

§45-42-3.Applicability.

3.1. Any stationary source that emits one or more greenhouse gases on an annual basis greater than the *de minimis* amounts listed in the table below, excluding biogenic emissions, and reports emissions of regulated air pollutants pursuant to the emissions inventory requirements of the Secretary under rule or W.Va. Code §22-5-4(a)(14), shall be an affected source required to report emissions of all greenhouse gases emitted above *de minimis* amounts to the Secretary under section 4:

Greenhouse Gas Compound	tons/year
carbon dioxide	10,000
methane	476

nitrous oxide	32.6
perfluorocarbons	1.09
sulfur hexafluoride	0.42
hydrofluorocarbons	0.855

3.2. Stationary sources which are regulated by the Secretary under W.Va. Code §22-3-1 et seq. and do not report emissions of regulated air pollutants pursuant to the emissions inventory requirements under W.Va. Code §22-5-4(a)(14) are not required to, but may voluntarily report their greenhouse gas emissions under section 4.

§45-42-4. Reporting Requirements.

4.1. ~~By March 31, 2009, and March 31 of each year thereafter, affected~~ Affected sources shall report to the Secretary the quantity of all greenhouse gases emitted above *de minimis* amounts in the previous calendar year at the same time such sources are to report emissions of regulated air pollutants pursuant to the emissions inventory requirements of the Secretary under rule or W.Va. Code §22-5-4(a)(14).

4.2. Affected sources shall only be required to report annual quantities of anthropogenic non-mobile source greenhouse gas emissions directly at the source, and shall not be required to report biogenic or mobile emissions of greenhouse gases, or indirect emissions of greenhouse gases, such as emissions occurring offsite from energy consumption.

4.3. The Secretary shall determine the form and format of the information reported by affected sources under subsection 4.1 to ensure that the information is consistent as possible with developing regional, national, or international greenhouse gas emissions programs.

4.4. Notwithstanding the provisions of subsection 4.3, to satisfy the greenhouse gas emission reporting requirements under this section, affected sources may submit greenhouse gas emissions inventory information from documented greenhouse gas inventories such as those provided to the Environmental Protection Agency's Climate Leaders Program, Chicago Climate Exchange Registry, the International Organization for Standardization and the SF_6 Emissions Reduction Partnership for Electric Power Systems. Greenhouse gas emissions inventory information from other widely recognized and verified greenhouse gas emissions inventory programs may be submitted by affected sources under this subsection, but shall be subject to approval by the Secretary on a case-by-case basis.

4.5. Reports of greenhouse gas emissions submitted to the Secretary under this section shall be signed by a responsible official and shall include the following certification statement: "I, the undersigned, hereby certify that the data transmitted to the West Virginia Department of Environmental Protection is true, accurate, and complete, based upon information and belief formed after reasonable inquiry."

4.6. Greenhouse gases reported under this section are not subject to fees under 45 CSR 30, unless the greenhouse gases are otherwise regulated by the Secretary.

§45-42-5. Greenhouse Gas Emissions Inventory.

5.1. The Secretary shall periodically compile an inventory of greenhouse gas emissions to:

5.1.a. Characterize the relative contributions of greenhouse gas emissions from stationary, area, mobile and biogenic sources in West Virginia; and

5.1 b. Determine the extent to which greenhouse gas emissions are offset by the rate of sequestration, and whether West Virginia is a net sink or emitter of greenhouse gases.

5.2. The greenhouse gas emissions inventory shall include the emissions from stationary sources reported under section 4, and other relevant information regarding significant emissions, reductions, and sequestration of greenhouse gases from stationary, area, mobile and biogenic sources requested by the Secretary under subsections 5.3 and 5.4.

5.3. To inventory greenhouse gas emissions reductions, the Secretary shall consult with the citizenry and other entities such as industry trade groups that have information relating to greenhouse gas emissions reductions, and sequestration ~~Upon request of the Secretary, such entities shall provide relevant information relating to greenhouse gas emissions reductions, capture and sequestration~~.

5.4 The Department of Agriculture, the Division of Forestry, Marshall University, West Virginia University, West Virginia Geological and Economic Survey, and the Department of Transportation shall enter into interagency agreements with the Secretary and at the Secretary's request provide:

5.4.a Relevant information relating to greenhouse gas emissions from area, mobile and biogenic sources;

5.4 b. Relevant information relating to greenhouse gas emissions reductions and sequestration; and

5.4.c. Any assistance the Secretary may request during the development of the greenhouse gas emissions inventory.

5.5. The Secretary shall determine the form and format of the information submitted by the entities under subsections 5.3 and 5.4 to ensure that the information is consistent as possible with developing regional, national, or international greenhouse gas emissions programs

§45-42-6.Greenhouse Gas Emissions Registry Program.

6.1. The Secretary shall develop a registry for the recordation of voluntary reductions of greenhouse gas emissions.

6.2. The greenhouse gas emissions registry program shall be as consistent as possible with developing regional, national, or international programs designed to monitor, quantify and register reductions in greenhouse gas emissions with respect to:

6.2.a Development of criteria, based on a set of standardized emissions accounting, reporting and verification protocols, to determine baseline emissions and quantification of voluntary reductions in emissions of greenhouse gases;

6.2 b Public recognition of such voluntary emissions reductions;

6.2.c Consideration of voluntary greenhouse gas emission reductions when determining baselines and reduction requirements under future federal greenhouse gas emission reduction programs; and

6.2.d The ability of sources to participate in future greenhouse gas emission trading programs.

§45-42-7.Economic Development Potential.

7.1 Using information obtained, gathered or developed under this rule, the Secretary will determine whether the reduction and sequestration of greenhouse gas emissions can be developed as an asset for net economic development or will result in a deterrent to net economic development in West Virginia.

§45-42-8. Inconsistency Between Rules.

8.1. In the event of any inconsistency between this rule and any other rule of the West Virginia Department of Environmental Protection, the inconsistency shall be resolved by the determination of the Secretary and the determination shall be based upon the application of the more stringent provision, term, condition, method or rule

Summary of Industry's Suggested Changes and Comments on 45 CSR 42, Greenhouse Gas Emissions Inventory Program

- Section 2.3. The definition of "anthropogenic" should be revised to state that it is the "result of natural processes that have been influenced significantly by human activities". Adding the term "significantly" makes the definition consistent with the definition of "biogenic" which means a "naturally occurring biological source or process that is not significantly affected by human actions or activity."

- Section 3.1. Applicability. This section should be revised to clarify that only individual greenhouse gases emitted above the *de minimis* amounts are required to be reported. Otherwise, affected sources that trigger any of the *de minimis* amounts could be required to report emissions of all of the greenhouse gases even if they are below the *de minimis* amounts. We do not believe that this is DEP's intent. Also, this section should be revised to clarify that the *de minimis* amounts do not include biogenic emissions.

- Section 4.1. Reporting Requirements. This section should be revised to require reporting of greenhouse gases at the same time the air emissions inventory reporting is required. Sources should not be required to report their emissions at two different times. This section should also be clarified so that only greenhouse gases emitted above the *de minimis* amounts are required to be reported.

- Section 4.2 should be revised so that "mobile" emissions of greenhouse gases are not required to be reported. This section should also be revised to clarify that only direct emissions and not indirect greenhouse gas emissions (e.g., emissions occurring offsite from electricity consumption) are required to be reported. The references in section 4.3 to programs like Climate Leaders could lead sources to include indirect and direct emissions in their reporting. This would lead to double counting of electric generation greenhouse gas emissions and to higher source emissions compared to the *de minimis* amounts.

- Section 4.6 should be added so that sources will not be subject to fees for reporting greenhouse gas emissions, as the purpose of such reporting is to create an inventory, not to generate fees.

- Section 5.3. This section should be revised to delete the requirement that certain entities, including trade associations, must provide relevant information on greenhouse gas emissions, reductions, capture and sequestration to the Secretary upon request. This requirement is not found in the statute and could be interpreted to require such entities to report reductions, which is also not required under the statute.

- Section 7.1 Economic Development Potential This section should be revised to require the DEP to also determine whether reduction and sequestration will result in a detriment to net economic development – not just whether it will be an asset

- Additional questions/issues:

    - A reasonable protocol for reporting greenhouse gas emissions from stationary sources should be developed. Affected sources should not be required to report emissions from individual units within a stationary source if such emissions are insignificant. Affected stationary sources should have the option to report all of its greenhouse gas emissions in the aggregate.

    - Over 30 states have signed on to "The Climate Registry". Does West Virginia intend on signing on? The rule indicates that West Virginia will have its own registry independent of "The Climate Registry" Does DEP intend to rely upon any greenhouse gas registry programs, such as the Chicago Climate Exchange Registry, in developing the registry program?

MEMORANDUM

TO: Karen Price

FROM: David L. Yaussy

DATE: May 29, 2007

SUBJECT: DEP Advisory Council Rules

A. Rules for Individual State Certification of Activities Requiring a Federal Permit.
Title 47, Series 5A.

No comment.

B. National Pollutant Discharge Elimination System (NPDES) Program.
Title 47, Series 10.

We would urge the DEP to update the rule. It still contains references to the Chief, rather than the Director. (See, for example, Sections 5.13.d.1, 6.2 and 9.1.a.)

Has the DEP updated this rule to reflect changes in the Code of Federal Regulations that were made since it was last comprehensively updated?

C. Antidegradation Implementation Procedures.
Title 60, Series 5

We agree that the State should do away with Section 6.2. There is no need for an initial presumptive listing procedure at this point. As for the 156 (I counted 157, but I may have miscounted) streams in Appendix A, we will disagree with all those listed except the 39 to which no objections were ever lodged.

D. Requirements Governing Water Quality Standards.

Title 57, Series 2.

There are a couple of minor errors – Section 2.2 has a "then" that should be "than" and Section 6.1 is missing text.

We remain disappointed that the State continues to interpret its water quality standards to apply all uses in all streams at all times. Section 6.1 clearly provides that B and C are the only default, or universal, uses.

Appendix D should be eliminated. Category C, Water Contact Recreation, is a default use, and listing all streams with that use assigned to them suggests that there are streams that do not have that designation.

Appendix A. The DEP is listing a huge number of trout streams with no justification for their listing. If streams meet the requirements of trout waters, they qualify as such; if they do not, there is no reason to list them. Unless the DEP can document that each stream has year round, multi-age populations, they should not be listed

DLY:shb