

Title 40—Protection of the Environment

CHAPTER I—ENVIRONMENTAL
PROTECTION AGENCYSUBCHAPTER N—EFFLUENT GUIDELINES AND
STANDARDSPART 429—TIMBER PRODUCTS PROC-
ESSING POINT SOURCE CATEGORY

On January 3, 1974, notice was published in the FEDERAL REGISTER (39 FR 938), that the Environmental Protection Agency (EPA or Agency) was proposing effluent limitations guidelines for existing sources and standards of performance and pretreatment standards for new sources within the barking, veneer, plywood, hardboard-dry process, hardboard-wet process, wood preserving, wood preserving-steam and wood preserving-boultonizing subcategories of the timber products processing category of point sources.

The purpose of this notice is to establish final effluent limitations guidelines for existing sources and standards of performance and pretreatment standards for new sources in the timber products processing category of point sources, by amending 40 CFR Chapter I, Subchapter N, to add a new Part 429. This final rulemaking is promulgated pursuant to sections 301, 304(b) and (c), 306(b) and (c) and 307(c) of the Federal Water Pollution Control Act, as amended, (the Act); 33 U.S.C. 1251, 1311, 1314(b) and (c), 1316(b) and (c) and 1317(c); 86 Stat. 816 et seq.; Pub. L. 92-500, Regulations regarding cooling water intake structures for all categories of point sources under section 316(b) of the Act will be promulgated in 40 CFR 402.

In addition, the EPA is simultaneously proposing a separate provision which appears in the proposed rules section of the FEDERAL REGISTER, stating the application of the limitations and standards set forth below to users of publicly owned treatment works which are subject to pretreatment standards under section 307(b) of the Act. The basis of that proposed regulation is set forth in the associated notice of proposed rulemaking.

The legal basis, methodology and factual conclusions which support promulgation of this regulation were set forth in substantial detail in the notice of public review procedures published August 6, 1973 (38 FR 21202) and in the notice of proposed rulemaking for the barking, veneer, plywood, hardboard-dry process, hardboard-wet process, wood preserving, wood preserving-steam and wood preserving-boultonizing subcategories. In addition, the regulations as proposed were supported by two other documents: (1) The document entitled "Development Document for Proposed Effluent Limitations Guidelines and New Source Performance Standards for the Plywood, Hardboard, and Wood Preserving Segment of the Timber Products Processing Point Source Category" (December 1973) and (2) the document entitled "Economic Analysis of Proposed Effluent Guidelines, Timber Products Processing Industry (Hardboard, Wood Preserving, Plywood and Veneer)" (August 1973).

Both of these documents were made available to the public and circulated to interested persons at approximately the time of publication of the notice of proposed rulemaking.

Interested persons were invited to participate in the rulemaking by submitting written comments within 30 days from the date of publication. Prior public participation in the form of solicited comments and responses from the States, Federal agencies, and other interested parties were described in the preamble to the proposed regulation. The EPA has considered carefully all of the comments received and a discussion of these comments with the Agency's response there-to follows.

(a) Summary of comments.

The following responded to the request for written comments contained in the preamble to the proposed regulation: EPA, Region X; EPA, Region VIII; U.S. Water Resources Council; L. D. McFarland Company; American Plywood Association; National Forest Products Association; Koppers Company, Inc.; American Hardboard Association; State of New York Department of Environmental Conservation; Abitibi Corporation, Roaring River, North Carolina; Weyerhaeuser Company; American Wood Preservers Association; Society of American Wood Preservers; Maine Department of Environmental Protection; U.S. Plywood; U.S. Department of Commerce; Washington State Department of Ecology and the U.S. Department of the Interior. Each of the comments received was carefully reviewed and analyzed. The following is a summary of the significant comments and the Agency's response to those comments.

(1) One commenter indicated that new source performance standards should be no discharge of waste water pollutants for the barking subcategory.

New Source Performance Standards are to be based on the "best available demonstrated control technology, processes, operating methods, or other alternatives." The accomplishment of no discharge from this operation has not been adequately demonstrated. While at least one hydraulic barking operation has achieved almost complete recycle of process water, the system has not been in operation long enough to exhibit the reliability necessary to fulfill the Act's requirements.

(2) Two commenters indicated that the State of Washington is implementing state regulations that result in a more stringent allowable discharge for hydraulic braking operations than presented here.

The limitations presented here are based on a raw waste effluent of about 100 mg/l BOD₅, whereas biological treatment in the State of Washington is usually applied to higher concentration waste waters because of the proximity of other waste water generators, e.g., pulp and paper mills, with higher waste concentrations. Because biological treatment is at least partially concentration dependent, removal efficiency is higher at higher influent concentrations.

(3) Commenters said that the disposal of process waste water into a log pond or mill pond, if available would be a practical method of control.

The regulations promulgated here exclude those facilities that include wet storage and/or handling or part of this normal operating practice. Further data is being developed, and guidelines and standards for these facilities will be established at a later date. For wet storage facilities the disposal of process waste water into a log pond or mill pond is one method of control. It should be noted that the Development Document provides information to show that with reasonable unit operation and process management individual unit operations within the manufacturing process can eliminate the discharge of pollutants, whereas the discharge of pollutants to a pond may result in discharge to navigable waters.

(4) A commenter indicated that it has never been substantiated that log conditioning, veneer dryer washdown and glue equipment clean-up can take place with no discharge of waste water or sludge.

Chapter VII of the Development Document discusses procedures for log conditioning such as indirect steaming, hot water spray systems, and modified steaming. Water requirements for the cleaning of veneer dryers can be reduced significantly by manual preliminary cleaning and the use of air to remove a major part of the waste material. About sixty percent of the plants visited during the development of guidelines and standards have implemented practices that eliminate the discharge of pollutants.

(5) A commenter indicated that recommended control technologies of irrigation, containment, or disposal in a bark incinerator are not the same as zero discharge and seem to indicate that technology does not exist to achieve zero discharge from these operations.

The objective of the Act is eliminate the discharge of pollutants to navigable water if it is achievable under the constraints of BPCTCA, BATEA and/or NSPS. The suggested control techniques do eliminate the discharge of pollutants to navigable waters from specified process waste water flows; even though waste waters are not recycled and must be disposed of, these techniques do eliminate discharges to the navigable waters.

(6) A commenter indicated that "no discharge of waste water pollutants" in some subcategories may be based on requirements of land which is not available to many plants.

In all cases where "no discharge" is specified, the supporting Development Document in Section V presents data showing that the volumes of waste water or sludge either can be eliminated or the amount required to be disposed of is minor (less than 1000 gallons per week). A variety of opportunities for disposal exist. Among these are: Disposal in the hog fuel burner; incorporation into the product; and/or recycling; evaporation; percolation; and disposal in approved landfill facilities, either by the permittee or by contract service.

(7) One comment stated that fire deluge water should be excluded from the regulation presented for the veneer manufacturing subcategory.

Fires are a fairly frequent occurrence in the veneer drying operation and they are, of course, unscheduled. The Agency agrees with this comment and has so modified the regulation. While it was not possible to characterize or quantify this waste water source on a broad based segment of the industry it is acknowledged that it is a potential source of waste water pollutants in the veneer, plywood, and hardboard dry process subcategories and should be considered by the permit issuing authority.

(8) Commenters indicated that the use of ponds and lagoons is not practical in some southern areas and unrealistic when rainfall exceeds evaporation; also, subsurface springs and surface drainage may result in overflow.

Sections VII, IX and XI of the Development Document, describes the use of land disposal techniques for the disposal of waste water. It is appropriate only where the volumes of water requiring disposal are, with reasonable management practices, less than 1000 gallons per week. The use of holding ponds is presented only as an option, not as required technology. The Agency recognizes that this option may not be applicable to all establishments. The use of this option requires judicious water use and good design of water retention facilities and adjacent areas, as well as the control of spills and drainage into holding areas.

(9) Two commenters indicated the cost/benefit analysis method presented is inappropriate because the environmental benefits attributed to such activities are assumed to be commensurate with the cost of compliance.

In establishing as a national goal that the discharge of pollutants into the navigable waters be eliminated by 1985, the Congress made it irrelevant to attempt to quantify total environmental benefits. Accordingly, although costs and associated economic impacts were considered as carefully as possible in arriving at determinations on levels of controls, benefits were primarily expressed as quantities of pollutants removed. As Section IX of the Development Document notes, however, the Agency did consider known health hazards and other environmental damage associated with specific parameters as a factor in selecting the ones to be controlled. It is not possible, however, to quantify specifically these factors.

(10) Comments were received that said, the costs presented in the development document for pollution control activities were unrealistically low, and that operating costs were omitted.

The cost estimates presented in the Development Document were based upon the actual costs of pollution control experienced by the facilities surveyed and upon engineering estimates. All costs were adjusted to 1971 dollars using cost indices. Operating costs were included in the Development Document and were considered in the economic impact study.

(11) Commenters expressed concern that the economic impact study did not consider the costs involved in controlling pollutant discharge from log handling and storage operations.

The regulations promulgated here exclude those facilities that include wet storage and/or handling as part of their normal operating practice. Further data is being developed and guidelines and standards for those facilities will be established at a later date. The impact of implementing the guidelines promulgated here will be considered in the development of future guidelines.

(12) It was reported that costs, as presented in the preamble to the proposed regulation did not accurately reflect the magnitude of actual cost to the dry process hardboard subcategory because they were based on 250 gallons per week.

Fifteen dry process hardboard manufacturing plants were surveyed to determine process water requirements and use, treatment and control technologies and cost information. Although total water use (including cooling water, boiler blowdown, runoff, fire control water) is substantial, the process waste water being controlled is approximately 250 gallons per week. The economic impact study referred to above determined that the implementation of best practicable control technology will result on an annual yearly cost of \$0.02 per thousand square feet. The economic impact study anticipates no plant closures by 1977.

(13) Comments were received that the energy requirements included in some treatment and control technologies will be a significant factor in the current energy "crisis."

In all but the hydraulic barking and possibly the wood preserving—Boultonizing subcategories, the percentage of the total process energy requirements related to pollution control is less than one percent. Hydraulic barking operations are usually already tied into treatment systems so additional energy requirements will be minor. Energy usage is discussed in Section VIII of the Development Document.

(14) It was suggested that an allowance be given for the effect of temperature on the efficiency of a biological system.

The effluent limitations as presented in this regulation are based on performance of treatment systems located in northern latitudes as well as southern latitudes. As a result the effects of temperature are taken into account in developing the limitations and therefore no temperature allowance is necessary.

(15) Commenters noted that a procedure or mechanism for handling situations where a number of different timber products processing operations are conducted at the same location is not addressed.

The approach used to develop the effluent limitations for the segments of the timber products processing industry covered by these regulations was to de-

termine the procedures available to reduce the generation of waste water. It was determined that for some subcategories best practicable control technology, best available technology and/or new source performance standards were no discharge of waste water pollutants to navigable water. A "no discharge of process waste water" limitation does allow a plant to discharge waste water to an available treatment system which might be present where a number of timber products processing operations are conducted; however, no credit will be given for the waste water pollutants attributable to the point source categories included in Part 429 that have a no discharge limitation.

(16) Commenters suggested that "guidelines" should be defined as encompassing a range of numbers rather than a specific number. The use of guidelines should also be interpreted to allow plant managers to select the technical approach best meeting their needs.

The present guidelines take differences within an industry into account through subcategorization, rather than by use of ranges of numbers to be varied at the discretion of the office issuing permits. The 28 industries noted in section 306 of the Act, for example, have already broken some of the broad industrial groups into subgroups such as inorganic chemicals, organic chemicals, petrochemicals, soaps and detergents, fertilizers and rubber. The timber products processing industry has been broken into 8 initial subcategories with 24 sets of limitations. In addition, a second phase of guideline issuance will establish further subcategories. Such division of the industry results in the regulations establishing achievable limitations for all facilities within that subcategory.

(17) Commenters suggested that the use of the "Matrix Method" as proposed by the Effluent Standards and Water Quality Information Advisory Committee would be appropriate for determining effluent guidelines.

The committee's proposal is under evaluation as a contribution toward future refinements on guidelines for some industries. The committee has indicated that their proposed methodology could not be developed in sufficient time to be available for the current phase of guideline promulgation, which is proceeding according to a court-ordered schedule. Its present state of development does not provide sufficient evidence to warrant the Agency's delaying issuance of any standard in hopes that an alternative approach might be preferable.

(18) Comments were received that indicated that definitions were, in some cases, unclear and that the regulations for each subcategory should more clearly define the flows that are subject to the limitations.

The regulation promulgated below contains expanded special definition sections.

(19) A commenter indicated that the guidelines for a wide spectrum of timber