



Department of Energy
Richland Operations Office
P.O. Box 550
Richland, Washington 99352

0050009

NOV 9 1998

99-EAP-026

Ms. Laura J. Cusack
Hanford Facility RCRA Permit Manager
Nuclear Waste Program
State of Washington
Department of Ecology
1315 West Fourth Avenue
Kennewick, Washington 99336



Dear Ms. Cusack:

ADDITIONAL HANFORD SITE COMMENTS ON THE MODIFICATION PACKAGE
ISSUED FOR PUBLIC COMMENT ON AUGUST 10, 1998, FOR THE HANFORD
FACILITY RESOURCE CONSERVATION AND RECOVERY ACT (RCRA) PERMIT,
DANGEROUS WASTE PORTION

The U.S. Department of Energy, Richland Operations Office (RL) and Fluor Daniel Hanford, Inc. (FDH) are submitting "Additional Hanford Site Comments on the Modification Package Issued for Public Comment on August 10, 1998, for the Hanford Facility Resource Conservation and Recovery Act (RCRA) Permit, Dangerous Waste Portion" (hereinafter termed the "Comment Document").

The State of Washington Department of Ecology (Ecology) issued proposed modifications to the Hanford Facility RCRA Permit on August 3, 1998, for a 45-day public comment period beginning on August 10, 1998. RL formally requested, and was granted, a 45-day extension to the public comment period for certain conditions written on the Waste Receiving and Processing Facility, Central Waste Complex, and 616 Nonradioactive Dangerous Waste Storage Facility portions of the proposed modification. The first Comment Document package was transmitted to Ecology on September 24, 1998, the completion of the original 45-day public comment period. The enclosed Comment Document includes conditions that required additional time to finalize.

In the spirit of continuing open communication with, and responsiveness to your organization, we request incorporation of these comments.

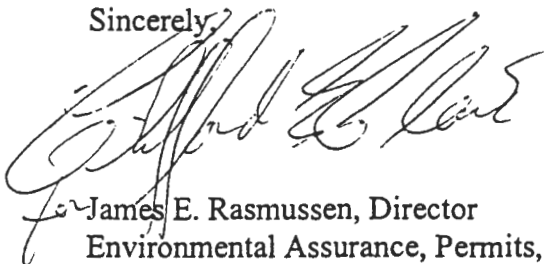
NOV 9 1998

Ms. Laura J. Cusack
99-EAP-026

-2-

Should you have any questions regarding this information, please contact Ellen M. Mattlin, RL, on (509) 376-2385, or Susan M. Price, FDH, on (509) 376-1653.

Sincerely,



James E. Rasmussen, Director
Environmental Assurance, Permits,
and Policy Division
DOE Richland Operations Office

EAP:EMM



William D. Adair, Director
Environmental Protection
Responsible party for
Fluor Daniel Hanford, Inc.

Enclosure:
Hanford Site Comments on the
Modification Package Issued for Public
Comment On August 10, 1998, for the
Hanford Facility RCRA Permit,
DW Portion

cc w/encl:
Administrative Record, H6-08
J. R. Wilkinson, CTUIR
S. M. Price, FDH
S. A. Thompson, FDH
Donna L. Powauke, NPT
Russell Jim, YIN

cc w/o encl:
M. C. Hughes, BHI
L. M. Johnson, BHI
R. J. Landon, BHI
E. R. Skinnarland, Ecology
D. R. Sherwood, EPA
W. D. Adair, FDH
A. K. Ikenberry, PNNL
R. S. Watkins, PNNL

**ADDITIONAL HANFORD SITE COMMENTS ON THE MODIFICATION 'D' PACKAGE
ISSUED FOR PUBLIC COMMENT ON AUGUST 10, 1998, FOR THE
HANFORD FACILITY RESOURCE CONSERVATION AND RECOVERY ACT
PERMIT, DANGEROUS WASTE PORTION**

PREAMBLE

These comments were prepared by the U.S. Department of Energy, Richland Operations Office and Fluor Daniel Hanford, Inc. (hereinafter referred to in this document as the Permittees) in response to the Draft Permit conditions contained in Modification D of the Hanford Facility Resource Conservation and Recovery Act Permit issued for public comment by the Washington State Department of Ecology (Department of Ecology) on August 10, 1998.

The Department of Ecology originally requested that comments be submitted for Modification D by September 24, 1998. However, because of complexities associated with the Draft Permit conditions and related concerns expressed by the Permittees, the Department of Ecology agreed to extend the comment period for certain Draft Permit conditions until November 9, 1998. Attached are the comments on the conditions for which the Department of Ecology granted the extension.

The attached comments are specific to conditions proposed by the Department of Ecology for the Central Waste Complex, the Waste Receiving and Processing Facility, and the 616 Nonradioactive Dangerous Waste Storage Facility. The Permittees believe these proposed conditions either should be deleted or significantly amended before the issuance of the permit. The Permittees' comments are based on a review of the *Dangerous Waste Regulations* [Washington Administrative Code (WAC) 173-303] and associated guidance and interpretative documents. Comment Criteria were established as a basis for defining five Key Comment Areas. The comment package is organized by condition, with each comment containing reference to one or more of the Key Comment Areas.

The Permittees believe that final permit conditions meeting the Comment Criteria are critical to the achievement of an effective, yet efficient final permit. The Permittees look forward to working with the Department of Ecology to obtain final permit conditions that will ensure compliance with the final status standards, satisfy the criteria used to prepare these comments, allow for efficient operations, and allow completion of cleanup milestones on the Hanford Facility. The initial 1994 Hanford Facility Resource Conservation and Recovery Act Permit, and three subsequent modification packages issued before Modification D, have been consistent with the Comment Criteria. Because the Modification D package issued for public comment significantly departs from these Comment Criteria, the Permittees believe there is a need to restate these criteria in this Preamble.

COMMENT CRITERIA

The underlying basis for the Comment Criteria is the need to protect human health and the environment in a manner that is as cost effective as possible so that cleanup dollars are used most efficiently. WAC 173-303 is based on, yet more stringent and has a broader scope of coverage than, the corresponding federal regulations. The Permittees believe that WAC 173-303 provides sufficient protection of human health and the environment. Thus, the Permittees request that any Draft Permit conditions that go beyond regulatory requirements be carefully re-evaluated in the interest of management efficiency.

The following Comment Criteria form the root basis for the Key Comment Areas.

- **Achieve Consistency with the Hanford Federal Facility Agreement and Consent Order**

The Hanford Facility Resource Conservation and Recovery Act Permit must be consistent with the Hanford Federal Facility Agreement and Consent Order. The Hanford Federal Facility Agreement and Consent Order is the governing document for all Resource Conservation and Recovery Act/Comprehensive Environmental Response, Compensation, and Liability Act cleanups and for all Resource Conservation and Recovery Act permitting on the Hanford Facility. The Hanford Federal Facility Agreement and Consent Order is binding on the Department of Ecology, the U.S. Environmental Protection Agency, and U.S. Department of Energy, Richland Operations Office. Permit conditions developed by the Department of Ecology must be compatible with the provisions of the Hanford Federal Facility Agreement and Consent Order. All schedules of compliance must be maintained and controlled in the Hanford Federal Facility Agreement and Consent Order to ensure consistency and proper prioritization of work. The permit conditions must not place the U.S. Department of Energy, Richland Operations Office or its contractors in a position where the conditions of the permit only can be met by a failure to comply with the Hanford Federal Facility Agreement and Consent Order.

- **Regulate Within the Scope of Regulatory Authority and Achieve Responsible Interpretation of Requirements**

The permit conditions must be based on clear regulatory authority. Federal and state environmental regulations are comprehensive and complex. While the regulated community has an obligation to comply with applicable environmental requirements, enforcement agencies such as the Department of Ecology also have an obligation to regulate within the bounds of their authority in accordance with the federal Administrative Procedures Act and its implementing regulations.

The following general principles apply to administrative agencies:

- Administrative agencies do not inherently have authority, but are instead only allowed to act pursuant to authority delegated to them through statutes enacted by legislative bodies. Any actions by an administrative agency that exceed the scope of its delegated authority are illegal and void.
- Administrative agencies must follow the procedures specified in the applicable enabling legislation. If such procedures do not exist, agencies must comply with the Administrative Procedures Act.
- Agencies are required by law to act in accordance with their own rules and regulations. If agencies do not comply with such rules, their actions are invalid.
- Agencies must maintain an official record that supports actions they take and there must be evidence in the record that supports agency actions. Agencies must not take actions that are 'arbitrary and capricious'.

40 Code of Federal Regulations, Part 271.4, requires that a State program "must be consistent with the Federal program". In 1988, Washington State passed its own Administrative Procedures Act, Revised Code of Washington 34.05, which contains rules that administrative agencies in Washington State must follow. Specific excerpts are provided in the following.

- Revised Code of Washington 34.05.220(1) allows agencies to adopt rules and requires agencies to adopt as a rule "a description of its organization, stating the general course and method of its operations and the methods whereby the public may obtain information and make submissions or requests." The rule also provides that *"no person may be required to comply with agency procedure not adopted as a rule as herein required"* (emphasis added).
- Agency interpretive and policy statements are governed by Revised Code of Washington 34.05.230. In the absence of specific rules, agencies are encouraged to "advise the public of its current opinions, approaches, and likely courses of action by means of interpretive or policy statements". Pursuant to Revised Code of Washington 34.05.230(1), *"current interpretive and policy statements are advisory only"* (emphasis added).
- Statements describing the subject matter of interpretive and policy statements must be submitted to the code reviser for publication in the Washington State Register in accordance with Revised Code of Washington 34.05.230(4).

Additional requirements applicable to Washington State Administrative Agencies can be found in the Regulatory Reform Act of 1995, Chapter 403(2)(a) and (b). Therein, the authority of the legislature is affirmed by stating that:

"(a) Unless otherwise authorized, substantial policy decisions affecting the public be made by those directly accountable to the public, namely the legislature, and that *state agencies not use their administrative authority to create or amend regulatory programs.*

(b) When an agency is authorized to adopt rules imposing obligations on the public, that it do so responsibly. The rules it adopts should be justifiable and reasonable, with the agency having determined, *based on common sense criteria established by the legislature*, that the obligations are truly in the public interest" (emphasis added).

The Department of Ecology is required to administer its program within certain parameters. The Department of Ecology does not have the authority to create or amend existing requirements without specific delegation from the legislature. The legislature is directly responsible for authorizing others or personally making substantial policy decisions affecting the public.

- **Achieve Consistency with Existing Regulatory Requirements**

The permit must be consistent with regulatory requirements that form the basis for permitting. WAC 173-303 contains comprehensive U.S. Environmental Protection Agency-approved requirements for applying for Resource Conservation and Recovery Act permits. WAC 173-303 also contains additional requirements imposed by Washington State pursuant to state law. Specifically, WAC 173-303-600 contains sufficient final status standards, and WAC 173-303-800 contains sufficient criteria for issuance of permits. These regulations have been properly proposed before the public, and promulgated after response to public comments. The Department of Ecology should ensure that permits do not impose excessively prescriptive or ambiguous conditions. Such conditions present unnecessary compliance issues and drive costs up without basis. The Department of Ecology must act in accordance with the requirements of the Administrative Procedures Act in establishing permit conditions. The Department of Ecology cannot legally impose restrictions that go beyond the regulations. Substantial

shifts in policy from existing regulatory programs must be accomplished through legislation. The Department of Ecology cannot create new or amend existing permit programs without following Administrative Procedures Act procedures. Any interpretive or policy statements must be in accordance with Revised Code of Washington 34.05.230 and "are advisory only".

The Hanford Facility Resource Conservation and Recovery Act Permit should be consistent with other Resource Conservation and Recovery Act permits. Though permits are issued with specific provisions for unique situations that might exist at a given site, the Department of Ecology cannot establish unique conditions without substantive justification in responsiveness summaries and fact sheets in accordance with WAC 173-303-840. The focus sheet published by the Department of Ecology in August 1998 states, "Washington State Dangerous Waste Regulations require Ecology to prepare a 'statement of basis' when a fact sheet is not prepared for the proposed permit modification(s). An extensive fact sheet was prepared for the Hanford Dangerous Waste Permit in September 1994. Modifications are being made in accordance with Washington Administrative Code (WAC) 173-303-840(3)(a). This focus sheet satisfies the purposes of both the fact sheet and the statement of basis". The Permittees believe that although an extensive fact sheet was prepared for the initial permit in September 1994, many of the conditions proposed in Modification D warrant extensive justification in accordance with WAC 173-303-840. Specifically:

- WAC 173-303-840(2)(e) states "All draft permits must be accompanied by a fact sheet that is supported by administrative record and made available for public comment". These Draft Permit conditions have been proposed without being supported by information in the administrative record.
- WAC 173-303-840(2)(f)(i) states "A fact sheet will be prepared for every draft permit for a major dangerous waste management facility, and for every draft permit which the department finds is the subject of wide-spread public interest or raises major issues". The Hanford Facility is a major dangerous waste management facility in Washington, and is the subject of wide-spread public interest. Furthermore, many of the Draft Permit conditions in this modification raise major issues because the conditions are not firmly rooted in regulation.
- WAC 173-303-840(2)(f)(iii)(C) states "The fact sheet will include, where applicable:....A brief summary of the basis for the draft permit conditions including supporting references". Many of the Draft Permit conditions do not have a statement of basis or supporting references.
- WAC 173-303-840(2)(f)(iv) states "The department will prepare a statement of basis for every draft permit for which a fact sheet is not prepared. The statement of basis will briefly describe the derivation of the conditions of the draft permit and the reasons for them...". The focus sheet does not describe the derivation of many of the Modification D Draft Permit conditions or provide legal reasons for the conditions.

- **Support Safe, Cost Effective, and Efficient Management**

The Permittees are committed to ensuring that all waste management activities are performed in a safe and cost-effective manner. To maximize efficient management in implementation of the permit, the permit conditions must adhere closely to the specific applicable governing regulations. The governing regulations for permits have been repeatedly subjected to the rulemaking process and the existing standards are by law adequate for protection of human health and the environment. The Permittees believe that overly restrictive conditions only should be imposed when backed by the retention of supporting information in the Department of Ecology's administrative record, which is available to the public for inspection.

FIVE KEY COMMENT AREAS

Five Key Comment Areas have been developed through application of the aforementioned Comment Criteria. The five resulting Key Comment Areas are as follows: (1) Exceeds Delegated Regulatory Authority, (2) Reflects Approach Inconsistent With Regulations, (3) Imposes Potential for Unnecessary Compliance Issues, (4) Hinders Cost-Effectiveness Without Added Protection, and (5) Imposes Redundant or Nonenforceable conditions. These Key Comment Areas are based on one or more of the Comment Criteria.

1. **Exceeds Delegated Regulatory Authority:** Some Draft Permit conditions include requirements and restrictions that exceed statutory authority. The Department of Ecology cannot arbitrarily conclude that WAC 173-303 is insufficient for permitting of the Hanford Facility. If the Department of Ecology believes that special rules are needed to issue and enforce the Hanford Facility Resource Conservation and Recovery Act Permit, such rules must be promulgated and must be consistent with the authority delegated by the legislature. This Key Comment Area is used to identify Draft Permit conditions that appear to have been developed without statutory or regulatory authority.
2. **Reflects Approach Inconsistent with Regulatory Requirements:** Some Draft Permit conditions include requirements and restrictions that contradict or expand on regulatory intent. This Key Comment Area is used to identify Draft Permit conditions that have been developed in a manner that is inconsistent with or expand on applicable regulations.
3. **Imposes Potential for Unnecessary Compliance Issues:** Some Draft Permit conditions include requirements and restrictions that are excessively detailed and/or ambiguous. This Key Comment Area is used to identify Draft Permit conditions that are overly detailed without basis, present compliance issues because of ambiguity regarding interpretation, or that might be subject to disagreement by the Permittees regarding intent and/or consistency with applicable laws and regulations.
4. **Hinders Cost-Effectiveness without Added Protection:** Some Draft Permit conditions include requirements that impose unnecessary activities. Such conditions would add costs to compliance efforts without regulatory basis or benefit to protection of human health and the environment. This Key Comment Area is used to identify Draft Permit conditions that would hinder the Permittees' ability to manage waste in a cost-effective manner.
5. **Imposes Redundant or Nonenforceable Conditions:** Some Draft Permit conditions include requirements and restrictions that are redundant to existing requirements in the Hanford Facility Resource Conservation and Recovery Act Permit. Some Draft Permit conditions impose requirements that have been met through submittal of the permit applications. Other Draft Permit conditions as written do not seem to impose requirements at all. This Key Comment Area is used to identify Draft Permit conditions that would have no substantial impact on the operation of the Hanford Facility or would create controversy regarding intent and/or implementation.

SUMMARY OF APPROACH

The Permittees believe that in addition to being protective of human health and the environment, the Hanford Facility Resource Conservation and Recovery Act Permit should be based firmly on legitimate regulatory authority with appropriate consideration given to meeting the Comment Criteria presented as the basis for these comments. The Permittees believe that the five Key Comment Areas used to categorize these comments will be useful in determining resolution to the significant issues that have been identified. Although all comments are provided in the interest of safe and cost-effective permit

implementation, the Permittees particularly are concerned about Draft Permit conditions related to waste analysis, recordkeeping, and closure because of the excessive level of detail in these conditions, and the associated unnecessary costs in implementing the conditions.

In summary, these comments are provided to help ensure that an appropriate level of control is established in the final permit. The Permittees request the following from the Department of Ecology:

- Examine the basis for its authority and ensure that its position in this permit modification is consistent with, and does not exceed, the authority that has been delegated by the legislature
- Evaluate its position on these Draft Permit conditions, and upon final permit issuance, ensure that such conditions are consistent with the regulatory intent of the applicable rule(s) and impose reasonable requirements that are enforceable
- Ensure that the permit provides protection of human health and the environment and facilitates cost-effective operations and cleanup on the Hanford Facility to the extent allowed by regulation.

CONDITION/COMMENT/JUSTIFICATION

1. Condition III.7.B.a.1.

Key Comment: Inconsistent with Regulations

Draft Permit condition as proposed by the Department of Ecology:

At the end of the paragraph, after "...basis" on Page 2-1, Line 24, add, "provided that procedures are implemented resulting in the safe management of these boxes at WRAP. Prior to acceptance at WRAP boxes weighing more than 3,175 kilograms will be evaluated to determine if appropriate restrictions and protective measures can be implemented to ensure that safe processing can occur at WRAP. Ecology's Project Manager will be verbally notified prior to receiving such boxes."

Condition Impact Statement: This condition would impose procedures, evaluations, and notifications on WRAP without regulatory basis.

Requested Action: Delete this condition. Alternatively, strike all text following the first sentence and modify the text so that the condition reads: "Before receipt of boxes heavier than 3,175 kilograms and drums heavier than 455 kilograms, an evaluation will be performed and documented."

Comment Justification: WAC 173-303-806(4)(b) states that "owners or operators of facilities that store containers of dangerous waste must provide the following additional information:...(i) a description of the containment system to demonstrate compliance with WAC 173-303-630(7). Show at least the following: (A) basic design parameters, dimensions, and materials of construction..." There is nothing in WAC 173-303-630(7) or WAC 173-303-806(4)(b) that requires or implies that load limits should be imposed through permits.

WAC 173-303-395(4) requires treatment, storage, and/or disposal loading and unloading areas to "be designed, constructed, operated and maintained to: (a) contain spills and leaks that might occur during loading or unloading; (b) prevent release of dangerous waste or dangerous waste constituents to ground or surface waters; (c) contain wash waters (if any) resulting from the cleaning or contaminated transport vehicles and load/unload equipment; and (d) allow for removal, as soon as possible, of collected wastes resulting from spills, leaks and equipment cleaning (if any) in a manner which assures compliance with (b) of this subsection." There are no requirements in WAC 173-303-395(4) regarding establishment of load limits for treatment, storage and/or disposal loading and unloading areas.

Owners/operators are required by WAC 173-303-810(6) to "at all times properly operate and maintain all facilities and systems of treatment and control which are installed or used by the permittee to achieve compliance with the conditions of the permit. Proper operation and maintenance includes effective performance, adequate funding, adequate operator staffing and training, and adequate laboratory and process controls, including appropriate quality assurance procedures." The Permittees also are required by Hanford Facility Resource Conservation and Recovery Act Condition II.L.1 to ensure that their facilities are capable of providing for proper management of waste. The regulatory burden is on the Permittees to ensure that physical design, construction, operation, and maintenance are such that spills are contained and releases to ground or surface waters are prevented.

This condition as drafted would impose unnecessary restrictions on receipt of containers at WRAP. It is the Permittees intent that all containerized waste will be managed properly in accordance with WAC 173-303-630 and the permit.

This condition has been drafted against a portion of the application (Section 2.1) that the Department of Ecology previously had identified as nonenforceable information in accordance with its guidance document, "Dangerous Waste Permit Application Requirements", Publication #95-402, dated 6/96. Section 2.2 contains information determined by the Department of Ecology as enforceable. The Permittees request that the Department of Ecology use the same approach as was taken for Chapters 4 through 6 of the Hanford Facility Resource Conservation and Recovery Act Permit, Dangerous Waste Portion.

The Permittees submitted a comment on September 24, 1998, requesting removal of Section 2.1 from the list of enforceable Permit Application Sections found in III.7.A. The Permittees again request removal of Section 2.1 conditions from the Permit and ask the Department of Ecology to replace this text with Section 2.2 (Topographic Map) as previously intended.

CONDITION/COMMENT/JUSTIFICATION

2. Condition III.7B.a.9.

Key Comment: Inconsistent with Regulations

Draft Permit condition as proposed by the Department of Ecology:

In Section 2.1, add the following text: "If WRAP is performing physical and chemical screening activities for another on-site TSD, only those containers which are being screened will be received at WRAP."

Condition Impact Statement: This condition would unnecessarily restrict WRAP from receiving waste that could be managed in accordance with applicable standards of WAC 173-303-300.

Requested Action: Delete this condition. Alternatively, modify the condition to read as follows:

"Physical and chemical screening may be performed at WRAP for other onsite TSD units, provided that the waste number for the waste being screened is identified on the WRAP Part A, Form 3, and such waste can be safely and properly managed at WRAP."

Comment Justification: WAC 173-303-300(2) states that "the owner or operator must obtain a detailed chemical, physical, and/or biological analysis of a dangerous waste...before he stores, treats or disposes of it." There is nothing in WAC 173-303-300(2) that prohibits the receipt of waste at a unit by incorporating internal constraints into a permit. This condition should not limit waste receipt at WRAP, provided that the appropriate analysis is obtained and the waste can be managed properly. The WRAP Part A, Form 3, allows waste to be received provided that the associated dangerous waste numbers are identified.

It is the Permittees' intent that only containerized waste that can be managed appropriately will be received at WRAP. Flexibility to receive waste at WRAP that can be managed safely should not be denied because it could be necessary to accommodate circumstances that cannot be predicted. WRAP was designed to accommodate such situations; therefore, WRAP should not be restricted from receiving waste for which sufficient information exists to properly manage the waste.

This condition has been drafted against a portion of the application (Section 2.1) that the Department of Ecology previously had identified as nonenforceable information in accordance with its guidance document, Publication #95-402, dated 6/96. Section 2.2 contains information determined by the Department of Ecology as enforceable. Refer to related comment in response to Draft Permit Condition III.7.B.a.1.

3. Condition III.7.B.a.10.

Key Comment: Inconsistent with Regulations, Hinders Cost-Effectiveness

Draft Permit condition as proposed by the Department of Ecology:

On Page 2-2, Line 46, add the following text as an additional bulleted item: "Retrieved waste shall be managed as incompatible waste until it has been characterized at WRAP."

Condition Impact Statement: This condition arbitrarily would restrict WRAP in management of all retrieved waste, irrespective of available knowledge regarding retrieved waste characteristics.

Requested Action: Delete this condition. Alternatively, modify the condition to read as follows:

"Retrieved waste with the potential to be incompatible with other stored waste at WRAP shall be managed in accordance with the special requirements of WAC 173-303-630(9) for incompatible waste. Retrieved waste that is sufficiently characterized to ensure compatibility with other waste is not subject to this requirement."

Comment Justification: WAC 173-303-630(9) states that "a storage container holding a dangerous waste that is incompatible with any waste or other materials stored nearby in other containers...must be separated from the other materials or protected from them by means of a dike, berm, wall, or other device. Containment systems for incompatible wastes must be separate". WAC 173-303-395(1)(b) places limitations on "the mixing or commingling of incompatible wastes, or incompatible wastes and materials". WAC 173-303-630(9) and WAC 173-303-395(1)(b) requirements are by necessity based on knowledge concerning a waste and its compatibility with other waste or materials so that incompatibility hazards can be avoided. This condition as drafted would result in the application of an arbitrary measure for ensuring waste is stored safely. The WRAP operating organization will have some level of knowledge regarding compatibility of most retrieved waste with

CONDITION/COMMENT/JUSTIFICATION

other retrieved waste and with other waste stored at WRAP. The Permit should allow the flexibility to manage waste based on the degree of characterization available. In many cases, adequate knowledge will be available that would allow for safe management without considering the waste as incompatible with everything at WRAP.

This condition also would restrict the locations where retrieved waste could be characterized. Management of retrieved waste, including characterization activities, should be based on pertinent, available knowledge regarding waste characteristics. Characterization of retrieved waste should be allowed to occur at other locations within the Solid Waste Project (e.g., in the Low-Level Burial Grounds trenches or at T Plant Complex) when knowledge concerning incompatibilities is adequate.

It is the Permittees' intent to manage all retrieved wastes safely and in such a manner that incompatible waste is properly segregated at WRAP. Flexibility must be retained by WRAP operations to allow for safe and cost-effective management of waste without unnecessary time and expenditure in seeking permit revisions.

This condition has been drafted against a portion of the application (Section 2.1) that the Department of Ecology previously had identified as nonenforceable information in accordance with its guidance document, Publication #95-402, dated 6/96. Refer to related comment in response to Draft Permit Condition III.7.B.a.1.

4. **Condition III.7.B.b.3.**

Key Comment: Lack of Regulatory Authority, Inconsistent with Regulations, Hinders Cost-Effectiveness

Draft Permit condition as proposed by the Department of Ecology:

WRAP is permitted for the treatment of waste that meets the WRAP acceptance criteria and for the storage of waste that will be, or has been, treated in WRAP or was generated in WRAP. WRAP is not permitted for storage of waste that does not meet this description.

Condition Impact Statement: This condition would:

- Prohibit the receipt of waste for storage at WRAP unless such waste also is treated at WRAP
- Deny the acceptance of waste that does not meet all specific acceptance criteria, irrespective of the capability of WRAP to manage the waste in accordance with applicable WAC 173-303 standards.

Requested Action: Delete this condition. Alternatively, replace this condition with the following text:

"Dangerous and/or mixed waste with waste numbers not identified on the WRAP Part A, Form 3, will not be managed at WRAP. Additionally, waste for which WRAP is unable to obtain the information required by WAC 173-303-300 will not be managed in WRAP."

Comment Justification: WAC 173-303-300 provides the analysis requirements for ensuring that waste is managed properly. The Permittees have provided the Department of Ecology with the required descriptions of procedures used to comply with WAC 173-303-300(1) through (3) for confirmation. WAC 173-303-630 provides standards for treatment and storage in containers. WRAP acceptance criteria include internal restrictions that are not required by regulation. This condition would improperly expand the scope of the waste analysis plan by including text regarding waste acceptance parameters that *include all constraints on waste receipt for any purpose*. Many constraints on waste acceptance are unrelated to results of waste analysis and therefore are beyond the scope of a waste analysis plan (e.g., constraints associated with WRAP acceptance of mixed waste based on the radioactive component).

There is no regulatory basis for incorporating internal constraints into a plan that is, by regulation, intended for identification of parameters, methods, and frequency of analysis for the purpose of ensuring proper management of dangerous and/or mixed waste. WRAP operating organization must retain flexibility to establish and modify, as appropriate, waste acceptance criteria as allowed by regulation, without unnecessary time and cost impacts associated with excessive permit conditions.

This condition also would prohibit the storage of waste at WRAP that meets the acceptance criteria, but ultimately might not be treated at WRAP. WAC 173-303-630 contains standards for management of waste in containers, regardless of whether the containers are used for treatment or just storage. There is no basis for requiring waste to

CONDITION/COMMENT/JUSTIFICATION

be treated in a given unit just because waste has been stored there. In fact, WRAP might not be capable of treating some retrieved waste. The Permittees require flexibility to treat wastes at the most appropriate compliant locations on the Hanford Facility, without requiring all waste stored at WRAP also to be treated at WRAP.

This condition would regulate waste acceptance criteria related to the radioactive component of mixed waste. The U.S. Department of Energy must retain jurisdiction over the source, special nuclear, and byproduct material components of mixed waste in accordance with the Atomic Energy Act.

The inappropriateness of any state effort to unilaterally assert authority over radioactive materials is dictated by the exclusion of source, special nuclear, and byproduct materials from the definition of solid waste set forth at Resource Conservation and Recovery Act 1004; the overriding and preemptive Atomic Energy Act; Resource Conservation and Recovery Act 1006(a) (the inconsistency provision); U.S. Department of Energy's Byproduct Rule (10 Code of Federal Regulation 962); the U.S. Environmental Protection Agency Notice Regarding State Authorization (51 Federal Register 24504, July 3, 1986); the U.S. Environmental Protection Agency Notice on Clarification of Interim Status Qualification Requirements for the Hazardous Components of Radioactive Mixed Waste (53 Federal Register 37045, September 23, 1988); the State's recognition of possible preemption in its Hazardous Waste Management Act, Revised Code of Washington 70.105.109; the limitations of the waiver of sovereign immunity in Section 6001 of Resource Conservation and Recovery Act to materials within the Resource Conservation and Recovery Act definition of solid waste (thereby excluding source, special nuclear, and byproduct materials); and the Hanford Federal Facility Agreement and Consent Order.

5. **Condition III.7.B.b.6.** **Key Comment:** Potential for Compliance Issues,
Redundant/Nonenforceable

Draft Permit condition as proposed by the Department of Ecology:

Delete lines 19 through 21 on page 3-1 from this section.

Condition Impact Statement: This condition as drafted does not appear to impose any restrictions or requirements upon the Permittees.

Requested Action: Delete this condition. Alternatively, leave the condition as is, provided that the intent is not to prohibit receipt of the waste discussed in the text.

Comment Justification: There are no regulatory restrictions regarding the subject waste. The text that would be deleted by this condition was provided in the application for informational purposes only. The Permittees believe that removal of the text does not imply that receipt of the subject waste at WRAP will be prohibited. The Permittees believe the subject waste could be received at WRAP in accordance with the regulatory requirements and the terms of the Permit.

6. **Condition III.7.B.b.7.** **Key Comment:** Lack of Regulatory Authority, Hinders Cost-
Effectiveness

Draft Permit condition as proposed by the Department of Ecology:

Delete the following text from lines 24 and 25 on page 3-1: "and standard waste boxes. Waste also could be received in other U.S. Department of Transportation-approved containers." These containers are not permitted because they are not addressed in section 1.1.3 on page 1-5 of the waste analysis plan.

Condition Impact Statement: This condition would restrict WRAP from receiving waste that has been packaged in containers as allowed by WAC 173-303-190 and transported as allowed by WAC 173-303-240.

Requested Action: Delete this condition.

Comment Justification: The language found on lines 24 and 25, page 3-1 of the WRAP permit application is accurate, provides necessary operational flexibility, and should not be arbitrarily changed or deleted. This condition would limit the ability of WRAP to receive waste contained in standard waste boxes and other U.S. Department of Transportation-approved containers without regulatory basis. This condition would deny management of waste that is appropriate for treatment and/or storage at WRAP.

CONDITION/COMMENT/JUSTIFICATION

WAC 173-303-190(1) states that "the generator must package all dangerous waste for transport in accordance with United States DOT regulations on packaging, 49 CFR Parts 173, 178, and 179". WAC 173-303-240 (2) states that "any person who transports a dangerous waste must comply with the requirements of WAC 173-303-240 through 173-303-270, when such dangerous waste is required to be manifested by WAC 173-303-180".

WAC 173-303-240(4) states that "these requirements do not apply to on-site (as defined in WAC 173-303-040) transportation of dangerous waste by generators, or by owners/operators of permitted TSD facilities". These requirements allow for use of waste containers for offsite shipments if the containers meet U.S. Department of Transportation regulations. These requirements exempt transportation in containers from regulatory control if the containers are transported onsite.

The rationale provided by the Department of Ecology for prohibiting waste in standard waste boxes and other U.S. Department of Transportation-approved containers from management at WRAP is inadequate. The Department of Ecology plans to disallow receipt in such containers because the containers are not discussed in Section 1.1.3 on page 1-5 of the waste analysis plan. The permit application discussion concerning these containers pertains to the process area and is for informational purposes and should not be included as an enforceable waste analysis plan condition. Furthermore, the Permittees believe the language in Section 1.1.3 has been taken out of context by the Department of Ecology. The intent of the text is to restrict container types taken into the process area of WRAP, not WRAP.

7. Condition III.7.B.b.8.

Key Comment: Inconsistent with Regulations,
Redundant/Nonenforceable

Draft Permit condition as proposed by the Department of Ecology:

The Permittees shall prepare an attachment to the WAP which describes the waste tracking procedures as specified in lines 33 and 34 on page 3-1. This text shall be submitted to the Department for review and approval within thirty (30) days of issuance of this Permit. Subsequent to any revisions required by the Department, the description will be added to the text of Section 1.1.1. of the Waste Analysis Plan (WAP), also identified as Appendix 3A, as a Class 1 modification. If necessary, the Department will amend the requirements through a Class 2 or 3 Permit modification.

Condition Impact Statement: This condition is redundant to Draft Permit Condition III.7.B.d.3., which addresses waste tracking.

Requested Action: Delete this condition.

Comment Justification: Waste tracking requirements of WAC 173-303-380(1) and (2) can be met by incorporating suggested language from the requested action on Draft Permit Condition III.7.B.d.3. The Permittees submitted information in the WRAP permit application stating that the waste analysis plan contains waste tracking and recordkeeping procedures. Upon reconsideration, the Permittees believe that this information is outside the scope of, and therefore inappropriate for inclusion in, the waste analysis plan. The Permittees recommend that any condition pertaining to waste tracking be incorporated into Chapter 3.0 instead of Appendix 3A.

The permit conditions in this modification *will not become effective until 30 days after issuance*. Hence, requiring submittals based on the issuance date would impose permit conditions before the effective date of the permit.

8. Condition III.7.B.c.3.

Key Comment: Potential for Compliance Issues,
Redundant/Nonenforceable

Draft Permit condition as proposed by the Department of Ecology:

Footnotes 1, 2, and 3 on page 1-1 are deleted.

CONDITION/COMMENT/JUSTIFICATION

Condition Impact Statement: This condition as drafted does not appear to impose any requirements or restrictions upon the Permittees.

Requested Action: Delete this condition. Alternatively, leave the condition as is, provided that the condition is not intended to countermand the information provided in the footnotes.

Comment Justification: The Permittees believe that removal of the text cannot be used to imply that the text is irrelevant or erroneous. The Permittees question the Department of Ecology's intent by removing the text, as it appears that such action will not constitute an enforceable condition because its removal does not impose any requirements or restrictions on the Permittees.

9. **Condition III.7.B.c.6.**

Key Comment: Potential for Compliance Issues

Draft Permit condition as proposed by the Department of Ecology:

Delete lines 6 through 10 on page 1-3, and replace with text to read as follows: Verification: Verification activities include container receipt inspection, physical screening, and chemical screening. All waste shipments and containers are subject to receipt inspection during the waste shipment acceptance process. In addition, a percentage of waste containers and shipments are selected for physical screening. Containers are opened and inspected visually or verified by NDE, NDA or dose rate profile. Of those containers subjected to physical screening, a percentage are required to be sampled for field or laboratory analysis. All information and data are evaluated to confirm that the waste matches the waste profile and container data/information supplied by the generator. Any . . ."

Condition Impact Statement: This condition as drafted could be misinterpreted to require that all containers must be subjected to physical and chemical screening.

Requested Action: Modify this condition to clarify that not all waste shipments and containers are subject to physical and chemical screening. Suggest changing the first sentence of the condition to read as follows:

"Verification activities include container receipt inspection and *also could include* physical and chemical screening."

Comment Justification: The Permittees believe that not all shipments and containers should be subjected to physical and chemical screening and request that the Department of Ecology clarify its intent.

10. **Condition III.7.B.c.8.**

Key Comment: Inconsistent with Regulations, Hinders Cost-Effectiveness

Draft Permit condition as proposed by the Department of Ecology:

Delete lines 32 through 46 on page 1-4 and replace with the following text: "conformance reports are used to complete an evaluation of the generator and to adjust the physical screening rate as indicated. At a minimum, an evaluation according to the following criteria shall be performed and the indicated scores shall be assigned based upon severity and justification:

1. Designation conformance issues
 - Regulatory violation, 7 – 10
 - Mismanagement of waste (e.g., conditions which would or did lead to placement of waste in the wrong storage location, the wrong treatment path, etc.), 4 – 6
 - No mismanagement of waste, 1 – 3
2. Characterization conformance issues
 - Safety issue, 7 – 10
 - Mismanagement of waste (see above), 4 – 6
 - No mismanagement of waste, 1 – 3
3. Paperwork inconsistencies
 - LDR form, 1 – 3
 - Shipping papers or waste tracking forms, 1 – 3

CONDITION/COMMENT/JUSTIFICATION

- Waste profile discrepancies, 1 – 3
- Incomplete shipment and/or transfer information, 1 – 3
- 4. Screening conformance issues
 - Regulatory violation and/or safety issue, 7 – 10
 - Mismanagement of waste (see above), 4 – 6
 - No mismanagement of waste, 1 – 3
- 5. Receipt conformance issues
 - Regulatory violation and/or safety issue, 7 – 10
 - Mismanagement of waste, 4 – 6
 - No mismanagement of waste, 1 – 3

A generator receiving a score of 10 or greater has demonstrated less than satisfactory performance and must be evaluated for corrective action by the WRAP operating organization. The physical screening rate is increased for that generator based upon the following criteria:

- A score of 10 to 15 – the physical screening frequency is increased to a minimum of 15%.
- A score of 16 to 20 – the physical screening frequency is increased to a minimum of 50%.
- A score greater than 20 – the physical screening frequency is increased to 100%.

Condition Impact Statement: This condition would specify a level of detail for adjusting physical screening rates that is unnecessary and in excess of established regulatory requirements of WAC 173-303-300.

Requested Action: Rewrite the condition to read as follows:

Delete lines 31 through 45 on page 1-4, beginning with “These conformance issues...” and replace with the following text: “The WRAP operating organization will: (1) perform monthly evaluations based on deficiencies and conformance issues identified, (2) evaluate unsatisfactory performance for corrective actions, and (3) adjust physical screening rates accordingly.”

Comment Justification: WAC 173-303-300(6) requires owners/operators to “specify the procedures which will be used to inspect and, if necessary, analyze each movement of hazardous waste received at the facility to ensure that it matches the identity of the waste designated on the accompanying manifest or shipping paper.” The condition as drafted would incorporate actual procedures used into the permit instead of specifying such procedures as required by regulation.

The Permittees recommend incorporation of the suggested text to replace the information originally provided in Section 1.1.1.3.2, lines 32 through 46. The suggested text provides for a condition that reflects an appropriate level of control regarding conformance reports.

11. Condition III.7.B.c.9.

Key Comment: Lack of Regulatory Authority, Potential for Compliance Issues, Hinders Cost-Effectiveness

Draft Permit condition as proposed by the Department of Ecology:

Paperwork inconsistencies or improperly completed and/or incorrect information must be corrected and resolved prior to acceptance of waste for management at this TSD unit.

Condition Impact Statement: This condition would require resolution of discrepancies to be handled in a manner that exceeds regulatory authority provided by WAC 173-303-370(4) and (5).

Requested Action: Delete this condition.

CONDITION/COMMENT/JUSTIFICATION

Comment Justification: WAC 173-303-370 does not deny owners/operators the opportunity to resolve paperwork inconsistencies associated with waste transfers in a reasonable manner. WAC 173-303-370(4)(b) states that "upon discovering a significant discrepancy, the owner or operator must attempt to reconcile the discrepancy with the waste generator or transporter". WAC 173-303-370(4) only applies to manifested waste. WAC 173-303-370(5) provides reasons why owners/operators "may decide that a dangerous shipment should not be accepted by his facility." This condition as drafted would impose requirements intended for offsite shipments to onsite transfers without regulatory authority. This condition as drafted also would be inconsistent with WAC 173-303-370(4) and (5) for receipt of waste from offsite by denying the owner/operator the ability to decide whether or not a shipment should be accepted. The Permittees require flexibility intended by regulation to resolve paperwork discrepancies. In some situations, to deny acceptance of waste might present a hazard to human health and the environment.

This condition would not allow WRAP to correct deficiencies or be commissioned to complete characterization for which WRAP was built to do. The gloveboxes are designed to have containers opened to resolve possible deficiencies or to repackage waste.

12. **Condition III.7.B.c.10.**

Key Comment: Potential for Compliance Issues

Draft Permit condition as proposed by the Department of Ecology:

Approved waste profiles and all supporting documentation from the initial submission through all re-evaluations must be retained in the TSD unit operating record as required by HF RCRA Permit Condition II.I.1. for waste managed, i.e., stored and/or treated, at this TSD unit. This documentation also must be retained in the WRAP operating record on the same schedule for those containers submitted by other TSD units for chemical screening only.

Condition Impact Statement: This condition as drafted is ambiguous regarding what "supporting documentation" needs to be retained in the operating record for compliance with this condition.

Requested Action: Rewrite the condition as follows: "Approved waste profiles will be retained in the Operating Record in accordance with Condition II.I.1 and will be made available to the Department of Ecology upon request."

Comment Justification: WAC 173-303-380(1)(c) requires retention of "records and results of waste analyses...required by WAC 173-303-300...and by 40 CFR...268.4(a), and 268.7." Hanford Facility Resource Conservation and Recovery Act Permit, Dangerous Waste Portion, Condition II.I.1.b. requires retention of "records and results of waste analyses required by WAC 173-303-300." There are no requirements in WAC 173-303 or the Hanford Facility Resource Conservation and Recovery Act Permit, Dangerous Waste Portion to retain "supporting documentation." The requested alternative text more accurately reflects the requirements of WAC 173-303 and the Hanford Facility Resource Conservation and Recovery Act Permit, Dangerous Waste Portion.

13. **Condition III.7.B.c.11.**

Key Comment: Lack of Regulatory Authority, Hinders Cost-Effectiveness

Draft Permit condition as proposed by the Department of Ecology:

Within thirty (30) days of the issuance of this Permit, the Permittees are required to submit, to the Department for review and approval, text describing all constraints which apply to the acceptance of waste at this TSD unit for any purpose, including physical examination and temporary storage in any portion of the building or within the boundaries of the TSD unit. Subsequent to any revisions required by the Department, the description will be added to the text of Section.1.1.3 of the WAP as a Class 1 modification. If necessary, the Department will amend the requirements through a Class 2 or 3 Permit modification.

CONDITION/COMMENT/JUSTIFICATION

Condition Impact Statement: This condition would place restrictions on waste acceptance at WRAP that exceed WAC 173-303-300 requirements by incorporating all internally-imposed restrictions (including restrictions associated with the radioactive component of mixed waste) into the waste analysis plan as enforceable requirements.

Requested Action: Delete this condition. Alternatively, replace this condition with the following text:

“Dangerous and/or mixed waste with waste numbers not identified on the WRAP Part A, Form 3, will not be managed at WRAP. Additionally, waste for which WRAP is unable to obtain the information required by WAC 173-303-300 will not be managed in WRAP.”

Comment Justification: The requirements for waste analysis are provided in WAC 173-303-300. The written waste analysis plan must describe procedures used to comply with -300(1) through (3) that pertain to confirmation about waste through analysis. This condition as drafted would incorporate waste acceptance criteria related to the radioactive component of mixed waste into the permit without regulatory authority. The U.S. Department of Energy must retain jurisdiction over the source, special nuclear, and byproduct material components of mixed waste in accordance with the Atomic Energy Act. This condition as drafted also would incorporate other internal waste acceptance criteria into the permit without regulatory authority. In summary:

- This condition seeks to expand the scope of the waste analysis plan by including text regarding waste acceptance parameters, *including all constraints on waste receipt for any purpose*
- Many constraints on waste acceptance are unrelated to results of waste analysis and therefore are beyond the scope of a waste analysis plan (e.g., constraints associated with WRAP acceptance of mixed waste based on the radioactive component)
- There is no regulatory basis for attempting to incorporate such internal constraints into a plan that is, by regulation, intended for identification of parameters, methods, and frequency of analysis for the purpose of ensuring proper management of dangerous and/or mixed waste
- The Permittees need to retain flexibility that allows for safe and cost-effective modification of waste acceptance criteria as allowed by regulation, without unnecessary time and cost impacts associated with excessive permit conditions.

The inappropriateness of any state effort to unilaterally assert authority over radioactive materials is dictated by the exclusion of source, special nuclear, and byproduct materials from the definition of solid waste set forth at Resource Conservation and Recovery Act 1004; the overriding and preemptive Atomic Energy Act; Resource Conservation and Recovery Act 1006(a) (the inconsistency provision); U.S. Department of Energy's Byproduct Rule (10 Code of Federal Regulation 962); the U.S. Environmental Protection Agency Notice Regarding State Authorization (51 Federal Register 24504, July 3, 1986); the U.S. Environmental Protection Agency Notice on Clarification of Interim Status Qualification Requirements for the Hazardous Components of Radioactive Mixed Waste (53 Federal Register 37045, September 23, 1988); the Washington State's recognition of possible preemption in its Hazardous Waste Management Act, Revised Code of Washington 70.105.109; the limitations of the waiver of sovereign immunity in Section 6001 of Resource Conservation and Recovery Act to materials within the Resource Conservation and Recovery Act definition of solid waste (thereby excluding source, special nuclear, and byproduct materials); and the Hanford Federal Facility Agreement and Consent Order.

Refer to related comments in response to Draft Permit Condition III.7.B.b.3.

The permit conditions in this modification *will not become effective until 30 days after issuance*. Hence, requiring submittals based on the issuance date would impose permit conditions before the effective date of the Permit.

14. **Condition III.7.B.c.12.**

Key Comment: Potential for Compliance Issues

Draft Permit condition as proposed by the Department of Ecology:

Insert the following text at line 32 on page 1-5: “1.1.1.3.4 Process for Reducing the Physical Screening Frequency. After the initial screening frequency has been established for a generator or that frequency has been adjusted due to poor performance, the physical screening frequency can be reduced in accordance with the

CONDITION/COMMENT/JUSTIFICATION

following:

- The physical screening frequency will be stepped down in three steps based upon the ability of the generator to implement the corrective action plan and/or demonstrate an ability to appropriately manage waste. At no time shall the physical screening frequency be reduced below 5% for onsite generators or below 10% for offsite generators.

Step 1) Reduce frequency by 66% the first month.

Step 2) Reduce frequency established in Step 1 by 50% or to the minimum allowable whichever results in a greater frequency.

Step 3) Reduce frequency to the minimum allowable.

- The reduction will be determined during the monthly evaluation process; however, the following minimum criteria must be met prior to reduction of the frequency:
 - (1) Five (5) containers from the waste stream in question (defined by a single waste profile) must pass verification, and
 - (2) The TSD unit must document an acceptable evaluation of the corrective action plan or that the generator's new waste management program has been implemented and is effective.

If the screening frequency was increased based upon conformance issues at the time of waste receipt, the corrective action plan must be fully implemented before the generator may return to the minimum physical screening frequency. However, waste streams from the same generator, which did not have conformance issues upon receipt at this TSD unit, may return to the minimum verification frequency if the TSD unit operating organization determines that the specific conformance issue is unlikely to affect the generator's other waste streams."

Condition Impact Statement: This condition as drafted is difficult to understand and is ambiguous regarding key aspects of the methodology for reduction in screening frequency.

Requested Action: Rewrite the condition to read as follows:

Insert the following text at line 32 on page 1-5: "1.1.1.3.4 Process for Reducing the Physical Screening Frequency. Screening rate frequencies and changes to those frequencies could be applied to a specific waste stream, to a specific contractor, or to a specific offsite generator based on the circumstances surrounding the conformance issue. After the initial screening frequency for a given waste stream has been established or increased, the physical screening frequency can be reduced in accordance with the following.

The physical screening frequency will be reduced in three steps. Reduction for all steps is based on the ability to demonstrate that five containers from the waste stream in question pass verification. In addition, reduction to the minimum frequency requires that the WRAP operating organization documents an acceptable evaluation of the corrective action plan, and the corrective action plan is fully implemented. At no time will the physical screening frequency be reduced below 5 percent for waste generated onsite or below 10 percent for offsite generators.

- Step 1. Reduce frequency by 66 percent after five containers from the waste stream in question pass verification.
- Step 2. Reduce frequency established in Step 1 by 50 percent or to the minimum allowable, whichever results in a greater frequency after five containers from the waste stream in question pass verification.
- Step 3. Reduce frequency to the minimum allowable after five containers from the waste stream in question pass verification. The WRAP operating organization documents an acceptable evaluation of the corrective action plan, and the corrective action plan is fully implemented.

The screening rate reduction will be established during periodic performance evaluation system team meetings."

In addition, delete the text in the WRAP permit application contained in Appendix 3A, page 1-5, lines 27-30.

CONDITION/COMMENT/JUSTIFICATION

Comment Justification: The Permittees discovered that the text regarding the methodology for reduction in verification rates inadvertently was omitted from the WRAP permit application. Subsequent efforts to provide appropriate information regarding reduction in verification rates have resulted in the development of a condition that is ambiguous regarding key aspects of the reduction methodology. The suggested text provides for a condition that accurately reflects the existing verification program. Therefore, the Permittees recommend incorporation of the suggested text to replace the information originally provided as Section 1.1.1.3.4. The Permittees also recommend deletion of related text contained in Appendix 3A, on page 1-5, lines 27-30.

15. **Condition III.7.B.c.13.**

Key Comment: Lack of Regulatory Authority, Hinders Cost-Effectiveness

Draft Permit condition as proposed by the Department of Ecology:

The following waste types are added in lines 10 through 14 on page 1-6 to the list of wastes prohibited from management at this TSD unit: (1) Bulk solids in trucks or roll-off boxes.

Condition Impact Statement: This condition arbitrarily would limit methods of transporting or transferring waste to WRAP that could be transported safely in accordance with WAC 173-303-190 and -240 and properly managed in accordance with WAC 173-303-630.

Requested Action: Delete this condition. Alternatively, reword the condition as follows: "The following waste type is added to the list of waste prohibited from management at WRAP: • Bulk solids in trucks"

Comment Justification: WAC 173-303-190(1) states that "the generator must package all dangerous waste for transport in accordance with United States DOT regulations on packaging, 49 CFR Parts 173, 178, and 179". WAC 173-303-240 (2) states that "any person who transports a dangerous waste must comply with the requirements of WAC 173-303-240 through 173-303-270, when such dangerous waste is required to be manifested by WAC 173-303-180". WAC 173-303-240(4) states that "these requirements do not apply to on-site (as defined in WAC 173-303-040) transportation of dangerous waste by generators, or by owners/operators of permitted TSD facilities". These requirements allow for transport of offsite shipments if the waste meets U.S. Department of Transportation regulations. These requirements exempt onsite transport activities from regulatory control. WAC 173-303-630 does not impose any requirements regarding transport of waste to treatment, storage, and/or disposal facilities.

This condition as drafted would prohibit acceptance of roll-off boxes at WRAP without regulatory basis. Flexibility must be retained to allow WRAP to manage waste in a safe and cost-effective manner without unnecessary restrictions.

16. **Condition III.7.E.c.15.**

Key Comment: Lack of Regulatory Authority, Potential for Compliance Issues, Hinders Cost-Effectiveness

Draft Permit condition as proposed by the Department of Ecology:

Toxic Substances Control Act-(TSCA-) regulated waste may not be treated at this TSD unit until such time that a TSCA Permit is obtained for treatment.

Condition Impact Statement: This condition would impose limitations that exceed the regulatory authority delegated to the Department of Ecology by Revised Code of Washington 70.105.

Requested Action: Delete this condition.

Comment Justification: WAC 173-303-071(3)(k) specifically excludes "PCB wastes whose disposal is regulated by EPA under 40 CFR 761.60..." Depending on the specific polychlorinated biphenyls waste, Toxic Substances Control Act regulations for polychlorinated biphenyl treatment may be self-implementing. There is no regulatory basis for attempting to regulate such waste (or the excluded polychlorinated biphenyl component of dangerous and/or mixed waste) through the *Dangerous Waste Regulations*, except as provided for certain polychlorinated biphenyl waste that is not managed pursuant to the Toxic Substances Control Act as specified in WAC 173-303-071(3)(k).

CONDITION/COMMENT/JUSTIFICATION

On August 22, 1988, the Attorney General of Washington provided explicit clarification regarding the inappropriateness of attempting to regulate excluded PCBs through the *Dangerous Waste Regulations* (refer to the Department of Ecology's Institutional Memory Compendium, memo 3145.880822). In that memo, Assistant Attorney General Jeffrey S. Myers provided Jon Neel, Enforcement Officer with information indicating that the WAC 173-303-071(3)(k) exclusion "covers all requirements of ch. 173-303 WAC...". Regarding regulation of excluded polychlorinated biphenyls, Mr. Myers indicated that "the law does not adequately support Ecology's position" and further stated "[I]n attempting to regulate such wastes..., Ecology is limited in its authority by RCW 70.105.105."

17. Condition III.7.B.c.16.

Key Comment: Inconsistent with Regulations

Draft Permit condition as proposed by the Department of Ecology:

Delete the text on page 1-6, line 43 through 1-7, line 13, and replace it with the following: "For waste that cannot be stored and treated in accordance with the requirements of this WAP (waste analysis plan), an alternative waste management plan (AWMP) may be submitted to the Department for review. Because the activities necessary to support such waste management may not be predictable, some flexibility in the timeframe for submitting, reviewing, and completing the AWMP may be necessary. The following schedule will be observed unless the Department and USDOE agree to an alternate schedule.

- Submit the AWMP to the Ecology Project Manager who is responsible for the TSD unit with a copy to the Hanford Facility RCRA Permit Coordinator at least 120 days before the project is expected to begin. The cover letter would summarize the nature of the request and state that "no reply within 35 working days constitutes approval."
- The Ecology Project Manager specified above review and provides comment within 35 working days after receiving the AWMP. At this time, the Department may request a longer comment period or receipt of additional information.
- Upon receipt of the comments by the Permittees, resolution of comments and issues would occur during project manager meetings or other meetings agreed to by the Permittees and the Department.
- For any additional information requested by the Department and for any resubmittal of a revised AWMP following resolution of the Department's comments, the same review timeframes are applicable.
- A final AWMP will be submitted to the Department for approval.
- If no comments are received from the Department within 35 working days after the original or final AWMP submittal, then the plan shall be approved.
- All submittals, including the Department's comments with resolution, shall be placed in the TSD unit operating record. If approval has been made by default, the Permittees shall provide a memo to the operating record so stating.

The Department has final authority to approve or deny the AWMP."

Condition Impact Statement: This condition would establish an inappropriate approach for determining proper storage and disposal options for situations not covered by the Permit.

Requested Action: Delete this condition and Section 1.2.1 of the waste analysis plan.

Comment Justification: WAC 173-303-300(2) states that "the owner or operator must obtain a detailed chemical, physical, and/or biological analysis of a dangerous waste...before he stores, treats or disposes of it." There is nothing in WAC 173-303-300(2) that prohibits the receipt of waste at a unit by incorporating internal constraints into a permit. WAC 173-303-300 is not intended for addressing treatment and storage options. This condition as drafted would establish protocols for *treating and storing* waste through the waste analysis plan. This condition would be inconsistent with WAC 173-303-300 and the Hanford Federal Facility Agreement and Consent Order.

Section 1.2.1 of the waste analysis plan discusses alternative storage and treatment options for newly encountered

CONDITION/COMMENT/JUSTIFICATION

situations. The activities discussed are outside the scope of WAC 173-303-300. Section 1.2.1 was intended to provide information concerning how WRAP would manage waste when unpredictable situations are encountered. Upon reconsideration, the Permittees believe that such situations would have to be addressed through other regulations (e.g., WAC 173-303-804, -646, or -830, depending on the specific scenario) and would have to be consistent with the Hanford Federal Facility Agreement and Consent Order. The Permittees request that the Department of Ecology allow for such scenarios to be managed pursuant to the appropriate provisions of WAC 173-303 and the Hanford Federal Facility Agreement and Consent Order and therefore not incorporate Section 1.2.1 within the waste analysis plan as a permit condition.

18. **Condition III.7.B.c.20.**

Key Comment: Redundant/Nonenforceable

Draft Permit condition as proposed by the Department of Ecology:

The text on page 2-3, lines 12 through 36, shall be deleted and replaced with text that is adequate to describe how containers are chosen for physical and chemical screening. Within thirty (30) days of issuance of this Permit, a description of this procedure must be submitted to the Department for review and approval; subsequent to any revisions required by the Department, the description will be added to the text of Section 2.1.2 of this WAP as a Class 1 modification. If necessary, the Department will amend the requirements through a Class 2 or 3 Permit modification.

Condition Impact Statement: This condition would require submittal of information that already has been provided to the Department of Ecology.

Requested Action: Delete this condition.

Comment Justification: There is no need for this condition. Draft Permit Condition III.7.A incorporates Attachment 41A of the Hanford Facility Resource Conservation and Recovery Act Permit, Dangerous Waste Portion as enforceable. Attachment 41A is a logic flow diagram of the "Waste Acceptance Process". The Permittees believe that Attachment 41A provides the appropriate level of detail regarding the verification program and the selection of containers. Additional text regarding how containers are chosen for physical and chemical screening is unnecessary because the requested description already is provided through Attachment 41A. The text originally submitted in the WRAP permit application is consistent with Attachment 41A and is sufficient for screening selection.

The permit conditions in this modification *will not become effective until 30 days after issuance*. Hence, requiring submittals based on the issuance date would impose permit conditions before the effective date of the Permit.

19. **Condition III.7.B.c.21.**

Key Comment: Lack of Regulatory Authority, Potential for Compliance Issues, Hinders Cost-Effectiveness

Draft Permit condition as proposed by the Department of Ecology:

Delete the text in lines 7 through 10 on page 2-4, and replace it with the following: "When the available information does not qualify as acceptable knowledge or is not sufficient to characterize a waste for management, the sampling and testing methods outlined in WAC 173-303-110 must be used by the generator to determine whether a waste designates as ignitable, corrosive, reactive, and/or toxic and whether the waste contains free liquids. If the analysis is performed to complete characterization after acceptance of the waste by the TSD unit, then this Permit governs the sampling and testing requirements."

Condition Impact Statement: This condition would contradict the exemption from permitting at WAC 173-303-600(3)(d), which allows generator activities to occur under self-implementing provisions.

Requested Action: Delete this condition.

Comment Justification: WAC 173-303-600(3)(d) provides that "final facility standards do not apply to: ... a generator accumulating waste on-site in accordance with WAC 173-303-200." There is no basis for imposing sampling and analysis permit conditions on generator activities.

The text in the waste analysis plan on page 2-4, lines 7-10 is a proper description regarding the use of acceptable knowledge for characterization and is consistent with Section 1.5 of the U.S. Environmental Protection Agency's

CONDITION/COMMENT/JUSTIFICATION

Office of Solid Waste Emergency Response 9938.4-03, dated April 1994, entitled, "*Waste Analysis at Facilities that Generate, Treat, Store, and Dispose of Hazardous Wastes*." WAC 173-303-110(1) "sets forth the testing methods to be used to comply with the requirements of this chapter". WAC 173-303-070(3)(c) states "for the purpose of determining if a solid waste is a dangerous waste...a person must either: (i) Test the waste according to the methods, or an approved equivalent method, set forth in WAC 173-303-110; or (ii) Apply knowledge of the waste in light of the materials or the process used, when: (A) Such knowledge can be demonstrated to be sufficient for determining whether or not it designated and/or designated properly; and (B) All data and records supporting this determination in accordance with WAC 173-303-210(3) are retained on-site". WAC 173-303-110 applies in situations where WAC 173-303 specifically calls for testing. WAC 173-303-070(3)(c) allows generators to use knowledge to designate. The Permittees intend to use methods of WAC 173-303-110 for treatment, storage, and/or disposal confirmation of knowledge when available information does not constitute acceptable knowledge. WAC 173-303-070(3)(c) clearly provides regulatory flexibility for generators in designating waste. It is inappropriate to preclude such flexibility by attempting to regulate generator activities through permit conditions.

20. Condition III.7.B.c.23.

Key Comment: Potential for Compliance Issues

Draft Permit condition as proposed by the Department of Ecology:

Delete lines 34 through 38 on page 2-4, beginning with the following text: "During waste retrieval . . ." Replace it with: "The following waste knowledge exceptions apply to waste accepted for management at the WRAP TSD unit:

- Hazardous debris as defined in WAC 173-303-040 that is managed in accordance with 40 CFR 268.45 (the "Debris Rule") is not required to be sampled. Management of debris in this manner is not dependent on the quantification of constituents to be federal and State-only LDR regulations.
- Wastes generated on-site may be shipped to the WRAP TSD unit provided the waste has been characterized for storage and a representative sample has been taken to characterize the waste for treatment and/or disposal.
- Waste which was previously disposed and then retrieved may be transferred to the WRAP TSD unit with only the necessary information to properly manage the waste at the storage unit.
- Waste which was received prior to the implementation of this guidance and has been characterized for storage only may be transferred between WRAP and permitted storage units without re-characterization; however, the pre-shipment review and verification requirements must be met.
- On-site generators may ship waste, that cannot be sampled by the generator, to the WRAP TSD unit for completion of characterization provided that the waste is characterized for storage."

Condition Impact Statement: This condition, as written, is ambiguous and fails to convey its intent.

Requested Action: Rewrite the condition to read as follows.

Delete lines 34 through 38 on page 2-4, beginning with the following text: "During waste retrieval," Replace with: "In some situations, full characterization of waste for cradle-to-grave management is not possible or feasible before receipt at WRAP for storage. For storage purposes, waste analysis requirements could be met through application of acceptable knowledge when such knowledge provides sufficient information to ensure that waste will be stored properly. Acceptable knowledge could be used to accommodate storage at WRAP for the following.

- Waste previously disposed before the effective date of the regulation that has been or will be retrieved for storage at WRAP, and for which adequate information has been obtained to ensure proper storage at WRAP.
- Waste placed in storage before the effective date of this permit for which adequate information has been obtained to ensure proper storage at WRAP.
- Newly-generated waste for which adequate information has been obtained to ensure proper storage at WRAP.

CONDITION/COMMENT/JUSTIFICATION

For situations in which acceptable knowledge has been used to accommodate storage, such information will be supplemented as necessary before treatment and/or disposal of the waste."

Comment Justification: WAC 173-303-300 contains adequate requirements for waste analysis. Specifically, WAC 173-303-300(2) states:

"The owner or operator must obtain a detailed chemical, physical, and/or biological analysis of a dangerous waste...before he stores, treats, or disposes of it. This analysis must contain the information necessary to manage the waste in accordance with the requirements of this chapter 173-303 WAC. The analysis may include or consist of existing published or documented data on the dangerous waste, or on waste generated from similar processes, or data obtained by testing, *if necessary*."

The Permittees believe WAC 173-303-300(2) is intended to require the following.

- Detailed analyses are required before treating, storing, or disposing of waste.
- These analyses must be sufficient to manage the waste in accordance with WAC 173-303.
- Analyses required for treatment or disposal typically are more extensive than analyses for storage.
- Although ideal, analyses do not *necessarily* have to be obtained through direct testing of the waste being analyzed.

Direct testing before storage in WRAP might not be appropriate for some waste. The U.S. Environmental Protection Agency provides guidance regarding the use of acceptable knowledge for waste managed at treatment, storage, and/or disposal facilities in Section 1.5 of Office of Solid Waste Emergency Response 9938.4-03, dated April 1994, entitled, "*Waste Analysis at Facilities that Generate, Treat, Store, and Dispose of Hazardous Wastes*." Specifically, one situation identified by the U.S. Environmental Protection Agency in which it might be appropriate to apply acceptable knowledge is when "health and safety risks to personnel would not justify sampling and analysis (e.g., mixed waste)." Waste where sufficient information exists to ensure safe storage should not be subject to testing before such storage. Testing for such waste subsequently will be performed to ensure proper treatment and/or disposal as appropriate in accordance with the land disposal restrictions of WAC 173-303-140 and treatment unit waste acceptance criteria. The Permittees must retain the flexibility to obtain treatment and disposal information on a schedule that allows for safe and efficient management of mixed waste.

21. **Condition III.7.B.c.24.**

Key Comment: Lack of Regulatory Authority, Inconsistent with Regulations, Potential for Compliance Issues, Hinders Cost-Effectiveness

Draft Permit condition as proposed by the Department of Ecology:

Delete the text on page 2-5, lines 38 through 42 (Section 2.2.1) and replace it with the following: "... 100 percent of each shipment (including onsite transfers) are inspected at the TSD unit for possible damage or leaks, complete labeling, intact tamper seals (if waste has been subjected to physical or chemical screening at another location), and piece count. This is to ensure that the shipment: (1) is received in good condition, (2) is the waste indicated on the manifest or shipping papers, (3) has not been opened after physical and/or chemical screening was performed, and (4) is complete. Any issue resolution, including correction of document discrepancies, re-labeling, overpacking of leaking or deteriorated drums, must occur before verification activities may continue. Documentation of issue resolutions must be maintained in the TSD unit operating record. The container receipt inspection is performed by the WRAP operating organization at WRAP. It must be completed within 24 hours of receipt of the shipment and the shipment must be moved to storage or, if discrepancies exist, into a temporary holding area within the next 24 hours. Action must be taken to overpack any leaking or damaged containers immediately upon discovery. Any paperwork discrepancies for shipments from both offsite and onsite generators must be resolved as required by WAC 173-303-370(4)."

CONDITION/COMMENT/JUSTIFICATION

Condition Impact Statement: This condition would exceed regulatory requirements of WAC 173-303-370 for receipt of waste and would increase the scope of WAC 173-303-395(4) for loading and unloading areas.

Requested Action: Replace the condition by retaining the original text in the WRAP permit application and amending the text by adding the following text at the end of the paragraph at line 42:

“The WRAP operating organization will ensure that the shipment: (1) is received in good condition, (2) is the waste indicated on the manifest or shipping papers, (3) has not been opened improperly after physical and/or chemical screening was performed, and (4) is complete.”

Comment Justification: WAC 173-303-370(4) requires that if “the [significant] discrepancy is not resolved within fifteen days after receiving the waste, the owner or operator must immediately submit to the Department a letter describing the discrepancy and attempts to reconcile it, and a copy of the manifest or shipping paper at issue.”

WAC 173-303-370(5) states that “the owner or operator may decide that a dangerous shipment should not be accepted by his facility”. WAC 173-303-370(5) does not specify when a shipment cannot be accepted, but does give permission to the owner or operator to deny a shipment based on his own discretion regarding discrepancies. By regulation, WAC 173-303-370(5)(a)(ii) allows the owner/operator to determine whether or not significant discrepancies between waste and documentation result in the need for rejecting the shipment.

This condition as drafted would deny the opportunity to resolve paperwork inconsistencies regarding waste transfers in a reasonable manner. WAC 173-303-370 does not require halting verification activities at WRAP because of minor paperwork problems. Additionally, there is no basis for extending any requirements of WAC 173-303-370 to receipt of waste from onsite.

This condition as drafted would impose requirements for onsite transfers that are inconsistent with WAC 173-303-370. There are no requirements in WAC 173-303-370 that impose container receipt inspections on onsite transfers as a condition of the permit. Container receipt inspections should be allowed anywhere within the Hanford Facility boundaries as long as proper controls are instituted to ensure no tampering has been done to the shipment.

Additionally, there is no basis for requiring container receipt inspection and movement to permanent or temporary storage within 24 hours of waste arrival at WRAP for any waste received. Although efforts are made to perform these functions within 24 hours of arrival, the Permittees believe that it is unreasonable to mandate the time limit as a permit condition subject to enforcement. WAC 173-303-395(4) imposes restrictions on treatment, storage, and/or disposal loading and unloading areas that are protective of human health and the environment. WAC 173-303-395(4) imposes requirements to contain/clean spills and prevent release, but does not include 24-hour limits on such areas. Depending on the situation, additional time might be necessary to correct discrepancies or arrange for relocation of waste.

22. Condition III.7.B.c.25.

Key Comment: Inconsistent with Regulations

Draft Permit condition as proposed by the Department of Ecology:

The Department recognizes that the generator may hire the WRAP operating organization to treat waste, including sorting and repackaging, and thereby correct discrepancies and problems identified during the waste acceptance process. If correction of these discrepancies and problems are not accomplished within two (2) months of receipt of the waste shipment, the Permittees shall contact the Department (specifically the Ecology Project Manager) to establish a compliance schedule for treatment of the waste shipment.

Condition Impact Statement: This condition would exceed and expand on the regulatory requirements of WAC 173-303-370, which apply only to waste received from offsite.

Requested Action: Delete this condition.

CONDITION/COMMENT/JUSTIFICATION

Comment Justification: WAC 173-303-370 does not contain any requirements that restrict owners/operators from receiving waste that they determine can be taken from offsite at their facilities. The Permittees are committed to resolving significant discrepancies as required by WAC 173-303-370(4). However, there is no regulatory basis for imposing this time limit on all discrepancies identified during waste acceptance. The Permittees do not believe that the "2 months of receipt" time limit is appropriate for resolving discrepancies, provided that the waste is managed properly. Refer to related comment on Draft Permit Condition III.7.B.c.24.

23. **Condition III.7.B.c.26.**

Key Comment: Inconsistent with Regulations, Potential for Compliance Issues, Hinders Cost-Effectiveness

Draft Permit condition as proposed by the Department of Ecology:

Delete the text on page 2-6, lines 1 through 3 (Section 2.2.2), and replace it with the following: "verification activity. Physical screening by visual inspection or NDE could be performed by the WRAP operating organization before the waste is shipped to WRAP. In this case, the visual inspection is performed by observation of the generator filling empty containers with waste or examining the container contents at the location. NDE is performed using mobile equipment which meets the performance requirements identified in the Permit. When visual inspection or NDE is performed at a location other than WRAP, at least one tamper-resistant seal is applied to each container examined and verified as acceptable, so that the container may not be reopened unless the seal is broken. These seals are the same as custody seals and are subject to the same evidentiary requirements as custody seals. The seals must be placed by the observer/verifier before the container leaves his/her sight on the day the observation occurs. The seal must be uniquely identified and controlled, e.g., signed and dated or uniquely numbered and tracked in a logbook. In addition, the seal must be easily differentiated from tamper-resistant seals used for other purposes. The verification must be documented in the paperwork that accompanies the waste shipment to WRAP and that paperwork must be placed in the TSD unit operating record. Also, the transfer documentation must identify whether the container required verification and the result of that verification. As long as the tamper-resistant seal remains intact, those containers of waste may be moved within the Hanford Solid Waste Complex without further physical screening, although container receipt inspections are required for all waste shipments, including transfers. The waste may still be subject to chemical screening."

Condition Impact Statement: This condition as drafted would impose an excessive level of control by stipulating requirements in extensive detail without regulatory basis.

Requested Action: Delete this condition.

Comment Justification: WAC 173-303-300(5) requires owners/operators to "develop and follow a written waste analysis plan which describes the procedures he will use to comply with the waste analysis requirements..." The text originally submitted in the WRAP permit application is consistent with the requirements of WAC 173-303-300 and provides adequate description of physical screening. This condition would delete that text and replace it with excessive detail regarding the physical screening process.

24. **Condition III.7.B.c.29.**

Key Comment: Inconsistent with Regulations

Draft Permit condition as proposed by the Department of Ecology:

Insert the phrase "The minimum" at the beginning of the sentence in line 17 on page 2-6 and replace the phrase "generating units" in lines 17 and 18 with the word "generators" so that the sentence reads as follows: "The minimum physical screening frequency is 5 percent for onsite generators, ..."

Condition Impact Statement: This condition would imply a definition for the term generator that is inconsistent with the regulatory definition of WAC 173-303-040.

Requested Action: Delete the condition and leave the text as "generating units." Alternatively, modify the condition to still avoid using the term "generator", but use the phrase "waste generated onsite" to denote the onsite verification frequency.

CONDITION/COMMENT/JUSTIFICATION

Comment Justification: WAC 173-303-040 defines generator as "any person, by site, whose act or process produces dangerous waste or whose act first causes a dangerous waste to become subject to regulation."

WAC 173-303-040 defines person as "any person, firm, association, county, public or municipal or private corporation, agency, or other entity whatsoever." Based on these definitions and the applicability of WAC 173-303 to the Hanford Facility, the U.S. Department of Energy is the only generator on the Hanford Facility. Therefore, it is inappropriate to incorporate a term into the permit that implies that onsite personnel are separate generators. All contractors that engage in generation activities within the contiguous boundaries on the Hanford Facility under U.S. Environmental Protection Agency/Washington State Identification Number 7890008967 constitute a single generator (i.e., there is only one Form 2 for the Hanford Facility).

25. Condition III.7.B.c.36.

Key Comment: Inconsistent with Regulations, Hinders Cost-Effectiveness

Draft Permit condition as proposed by the Department of Ecology:

Delete the text in lines 19 through 21 on page 2-7, that begins with "The following tests are selected . . ." "This text is replaced with the following: "All of the listed screening tests are required to be conducted on all samples collected for chemical screening, unless a technical justification is documented describing the reason for not performing the chemical screening test. The justification may be provided by a procedure, noted in the special instructions to the waste profile at the time of approval, or documented in the verification record, i.e., a logbook notation why a test is not appropriate to the sample or matrix."

Condition Impact Statement: This condition as drafted would impose an excessive level of control by dictating screening tests and rationales for screening tests in far greater detail than intended by WAC 173-303-300.

Requested Action: Delete this condition. Alternatively, rewrite the condition to replace page 2-7, lines 23 through 42, so the condition reads as follows:

"The following tests are conducted on all samples collected for chemical screening:

- PH
- Peroxide
- Oxidizer
- Water reactivity.

Additionally, the following screening tests could be performed as needed:

- HOC (chlor-n-oil/water/soil)
- Headspace
- Sulfide
- Cyanide
- Paint filter.

Comment Justification: WAC 173-303-300(5)(a) states "The owner or operator must develop and follow a written waste analysis plan which describes the procedures...and the plan must contain at least: (a) The parameters for which each dangerous waste... will be analyzed, and the rationale for selecting these parameters (i.e., how analysis for these parameters will provide sufficient information on the waste's properties to comply with subsections (1) through (4) of this section)". WAC 173-303-300 contains adequate requirements for waste analysis. This condition would impose requirements that exceed WAC 173-303-300 for chemical screening activities. There is no need to require technical justifications as to why a given chemical screening parameter was not performed on a given sample. In addition, the time and effort to document a technical justification is not cost effective and does not allow management efficiency in chemical screening. The Permittees believe that the language contained in lines 19 through 21 on page 2-7 is appropriate and should remain in the waste analysis plan.

CONDITION/COMMENT/JUSTIFICATION

The selection of these three parameters (peroxide, oxidizer, and water reactivity) is based on defensible safety principles for all waste.

26. Condition III.7.B.c.45.

Key Comment: Hinders Cost-Effectiveness,
Redundant/Nonenforceable

Draft Permit condition as proposed by the Department of Ecology:

Add the following paragraph describing quality assurance to Section 2.2.5: "All confirmation activities shall be governed by TSD unit-specific governing documentation and performed in a consistent manner. Confirmation records are kept in a traceable, defensible manner. All data are recorded either in uniquely identified, bound logbooks with sequentially numbered pages or on electronic media. Records must be maintained in a protective manner, e.g., protected from fire, water, access and/or tampering by unauthorized personnel. In addition, electronic records must be protected from electromagnetic damage."

Condition Impact Statement: This condition as drafted would incorporate redundant recordkeeping requirements in excessive detail as part of the waste analysis plan.

Requested Action: Delete this condition. Alternatively, strike all language following the first sentence so the condition reads as follows:

Add the following text to Section 2.2.5.

"All confirmation activities will be performed in accordance with treatment, storage, and/or disposal unit-specific governing documentation and performed in a consistent manner. Confirmation records will be kept in accordance with Condition II.I.1.b. of the HF RCRA Permit".

Comment Justification: WAC 173-303-380 states "the owner or operator of a facility must keep a written operating record at their facility". WAC 173-303-380 does not require specific formats for recordkeeping. This condition as drafted incorporates redundant recordkeeping requirements in excessive detail. Hanford Facility Resource Conservation and Recovery Act Permit, Dangerous Waste Portion, Condition II.I.1.b. requires retention of all records required by WAC 173-303-300, which includes records associated with confirmation activities, but does not specify detailed procedures for recordkeeping.

27. Condition III.7.B.c.46.

Key Comment: Potential for Compliance Issues

Draft Permit condition as proposed by the Department of Ecology:

If a false negative occurs as described in line 14, page 2-9, the corrective action described in lines 15 and 16 must include the re-evaluation of all affected video tapes/records since the previous acceptable QC check. If any results are questionable, those affected drums must be reevaluated and handled appropriately.

Condition Impact Statement: This condition should be rewritten to properly address quality control for all physical screening parameters used.

Requested Action: Rewrite this condition to replace Section 2.2.5.1 of the waste analysis plan with the following text:

"2.2.5.1 Physical Screening Quality Control. This section describes the QC used by the WRAP operating organization to ensure that quality data are obtained when performing physical screening methods identified in Section 2.2.2, except visual inspection. Visual inspection does not consist of the use of instrumentation or chemical tests. Therefore, QC for visual inspection depends on appropriate training for the individual(s) performing the test. For the remaining physical screening tools (NDE, NDA, and Dose Rate Profile), QC for these methods will be incorporated in accordance with manufacturer's instructions or site-specific protocols. If any results are questionable, those affected containers must be re-evaluated and handled appropriately."

CONDITION/COMMENT/JUSTIFICATION

Comment Justification: This condition as drafted would address an excessive level of detail for quality control and would only apply to one physical screening tool. The Permittees are committed to applying quality control in physical screening activities and intend to resolve issues associated with false negatives; therefore, the Permittees request that the text provided be incorporated into the permit. Adequate enforceable requirements for quality control already exist in the Hanford Facility Resource Conservation and Recovery Act Permit at Condition II.E.1., which states, "All WAPs and SAPs required by this Permit shall include a quality assurance/quality control (QA/QC) plan, or equivalent, to document all monitoring procedures so as to ensure that all information, data, and resulting decisions are technically sound, statistically valid, and properly documented". The text in the requested action is consistent with Condition II.E.1. without imposing excessive detail.

28. **Condition III.7.B.c.47.**

Key Comment: Potential for Compliance Issues

Draft Permit condition as proposed by the Department of Ecology:

In Section 2.2.5.1. on page 2-9, quality control has not been presented for non-destructive analysis or for dose rate profile. Until such time that text describing those physical screening options is provided to the Department for review and approval, the required revisions are made, the public comment conducted, and the text becomes an enforceable condition of this WAP, all physical screening must be by visual observation and NDE only, subject to other enforceable conditions of this Permit.

Condition Impact Statement: This condition as drafted would deny the use of legitimate physical screening tools until the Department of Ecology reviews and approves quality control efforts.

Requested Action: Delete this condition. The text provided in the requested action for Draft Permit Condition III.7.B.c.46 provides a comprehensive approach to physical screening quality control.

Comment Justification: WAC 173-303-300(5)(b) requires waste analysis plans to include "the methods of obtaining or testing for these parameters". WAC 173-303-110(1) states "Quality control procedures specified by the testing method or an approved equivalent method must be followed for the analytical result to be considered valid for designation". The requirements of WAC 173-303-300 are not intended to require such prescriptive conditions in permits. WAC 173-303-110 imposes quality control procedures on designation activities when testing is used in accordance with WAC 173-303-070(3)(c)(i), but does not require quality control procedures to be incorporated into permits or waste analysis plans. This condition would limit the ability to use legitimate physical screening options without the Department of Ecology-approved quality control procedures. Refer to related response to Draft Permit Condition III.7.B.c.46.

29. **Condition III.7.B.c.49.**

Key Comment: Inconsistent with Regulations, Potential for Compliance Issues, Hinders Cost-Effectiveness

Draft Permit condition as proposed by the Department of Ecology:

Delete lines 21 through 40 on page 2-9. The required chemical screening quality control include, but are not limited to, the following:

- Containers and equipment of the appropriate size and that are chemically compatible with the waste and all testing reagents will be used.
- A documented source of reagent water will be used.
- All chemicals and test kits shall be identified in the logbook/records by manufacturer; lot number(s) or, if no lot number is present, by date of manufacture; date of receipt; and expiration date (if none provided or not applicable, so indicate). All chemicals and test kits must be labeled so that they are traceable to the logbook/records.
- All chemical preparations, i.e., chemical mixtures or solutions, shall be documented in logbook/records by the method of preparation, e.g., weight or volume of chemical(s), identity of solute, volume or weight of solute, final concentration, as well as the name of the preparer; preparation date, expiration date. They must be labeled completely and traceable to the preparation records.

CONDITION/COMMENT/JUSTIFICATION

- One in 20 samples at a minimum will be sampled in duplicate and analyzed.
- One in 20 analyses at a minimum will be performed in duplicate. The duplicate sample shall not be the sampling duplicate.
- The results of quality control checks for each test kit lot or periodic testing and for daily quality control checks including equipment calibration will be recorded in a defensible manner.

Condition Impact Statement: The condition as drafted would impose an excessive level of control by incorporating extensive detail into the permit regarding chemical screening activities.

Requested Action: Rewrite the condition to read as follows:

"Delete lines 18 through 46 on page 2-9. Add the following text to line 18: **2.2.5.2 Chemical Screening Quality Control.** This section describes the QC used by the WRAP operating organization to ensure that appropriate data are obtained when performing chemical screening methods identified in Section 2.2.3.

The following applies for all chemical screening parameters:

- Each lot will be evaluated to determine that the lot is usable. Unstable reagents will be accounted for when determining the usability of the lot.
- For each lot, the source, concentration, date of receipt, lot number, and manufacturer/preparer (as applicable) will be maintained in a logbook.
- For individual chemical screening parameters, QC checks will be performed in accordance with manufacturer's instructions or site-specific protocols.

Comment Justification: WAC 173-303-300(5)(b) requires waste analysis plans to include "the methods of obtaining or testing for these parameters". WAC 173-303-110(1) states "Quality control procedures specified by the testing method or an approved equivalent method must be followed for the analytical result to be considered valid for designation". The requirements of WAC 173-303-300 are not intended to require such prescriptive conditions in permits. WAC 173-303-110 imposes quality control procedures on designation activities when testing is used in accordance with WAC 173-303-070(3)(c)(i), but does not require quality control procedures to be incorporated into permits or waste analysis plans. WAC 173-303-300 requires written waste analysis plans to include the methods of testing used, but does not require development of extensive permit conditions regarding quality control. The Permittees perform chemical screening analyses according to manufacturer's instructions or appropriate site-specific protocols.

The Permittees discovered that the text originally provided in the WRAP permit application requires revision to accurately reflect the use of chemical screening parameters in the verification program. Subsequent efforts to provide appropriate information regarding chemical screening have resulted in the development of a condition that would require the Permittees to make changes to the existing chemical screening quality control system. Therefore, the Permittees recommend incorporation of the suggested text to replace the information originally provided in Section 2.2.5.2, lines 18 through 46. The suggested text provides for a condition that more accurately reflects chemical screening quality control. Refer to comment on Draft Permit Condition III.7.B.c.47.

30. **Condition III.7.B.c.50.**

Key Comment: Redundant/Nonenforceable

Draft Permit condition as proposed by the Department of Ecology:

Insert the phrase "and Quality Control" in the text in line 42 on page 2-9 and the additional text provided to read as follows:

- Equipment and Quality Control Checks

Condition Impact Statement: This condition as drafted would simply change a section title.

Requested Action: Delete this condition.

CONDITION/COMMENT/JUSTIFICATION

Comment Justification: As a result of the comprehensive approach taken to chemical screening quality control in the requested action in response to Draft Permit Condition III. 7.B.c.49, there is no need to specifically call out equipment and quality control checks. As a result, the Permittees propose to delete equipment and quality control aspects in the chemical screening section.

CONDITION/COMMENT/JUSTIFICATION

31. Condition III.7.B.c.51.

Key Comment: Inconsistent with Regulations, Potential for Compliance Issues, Hinders Cost-Effectiveness

Draft Permit condition as proposed by the Department of Ecology:

The following text is inserted under the bulleted heading "Equipment and Quality Control Checks in line 42 on page 2-9: "The WRAP operating organization will perform the following quality control checks on each new test kit or reagent lot to be followed by rechecks on at least a six-month interval, unless a more frequent period is specified in the test kit instructions or the quality control check method.

- (a) Ignitability/Headspace Screening for Volatile Organic Compounds: Headspace screening equipment shall be calibrated using known standard in accordance with the manufacturer's instructions. In addition, the equipment will be quality control checked on each day of use by sampling the headspace of a reagent containing hexane. If it does not perform as expected, the equipment will be recalibrated.
- (b) Peroxide Screening: The quality control check for the peroxide test paper is as follows: (1) Moisten the test paper with water. Add two drops of 3% hydrogen peroxide solution to the test paper. The test paper should turn blue. If it does not, replace the test paper or reject the lot. (2) Add a drop of potassium dichromate solution to approximately 1/2-inch of water in a test tube. Place the peroxide test paper in the solution. The test paper should not turn blue. If it changes color, replace the test paper or reject the lot. (3) Add one drop of nitric acid to the test paper. The paper should turn yellow. If it does not, replace the test paper or reject the lot.
- (c) Paint Filter Liquids Test: The quality control check consists of visually inspecting each filter, prior to performing each test, to ensure that it is in good condition and is not torn or ripped. If it is damaged, the filter shall be replaced.
- (d) pH Screen: The quality control check for the pH test paper is as follows: (1) Place a drop of concentrated hydrochloric acid onto the test paper; the pH should be 0 ± 1 . (2) Place a drop of acetic acid onto the test paper; the pH should be 2 to 3 ± 1 . (3) Place a drop of reagent water onto the test paper; the pH should be 7 ± 1 . (4) Place a drop of ammonium hydroxide onto the test paper; the pH should be 11 to 12 ± 1 . (5) Place a drop of sodium hydroxide onto the test paper; the pH should be 14 ± 1 . If the pH on most of these tests is not as specified, replace or reject the pH paper. If only one or two test produce results that are different than stated, check or replace the reagents. The most important check is the reagent water, although it frequently will have a slightly acidic pH. All of the stated pH checks also may be performed using pH buffer solutions.
- (e) Oxidizer Screen: The quality control check for the oxidizer test paper is as follows: Moisten the test paper with 3M hydrochloric acid. Add two drops of potassium dichromate solution to the paper. The paper should turn black. If the test is negative, replace the paper or reject the lot.
- (f) Water Reactivity Screen: The quality control check consists of testing the pH of the reagent water. If the pH is not 7 ± 1 , the reagent water shall be replaced. Note that this check may be performed as part of the pH quality control check.
- (g) Cyanide Screen: The ferrous ammonium citrate reagent is the most unstable reagent used in this test. The ferrous ion will oxidize to ferric upon standing for even a short period of time. If the reagent has a thick opaque color or if there are particulates floating in the solution, the reagent should be replaced. To check the ferrous ammonium citrate, perform both of the following tests: (1) Add a pinch of ferrous ammonium sulfate to 1/4-inch of the ferrous ammonium citrate reagent in a test tube. Add a drop of 1,10-phenanthroline to the test tube. The solution should turn blood red. (2) Add a pinch of ferrous ammonium sulfate to 1/4-inch of the ferrous ammonium citrate reagent in a test tube (this is solution 1). Add a small amount of potassium ferrocyanide to a test tube of water (this is solution 2). Add a small amount of solution 1 to solution 2 to form solution 3. Add a 1/4-inch of 3 Normal (i.e., 3N or 3M) hydrochloric acid to solution 3. The solution should turn dark blue. If either test is negative, replace the reagent or reject the lot.
- (h) Sulfide Screen: The quality control check for the sulfide test paper is as follows: (1) Add 1 to 2 drops of reagent water to the sulfide test paper. (2) Add two drops of 3 Normal (3N or 3M) hydrochloric acid to

CONDITION/COMMENT/JUSTIFICATION

two sodium sulfide flakes in a disposable watch glass or weighing boat. (3) Touch the sulfide test paper to the flakes. The test paper should turn brown, black, or silvery. If the test is negative, then replace the test paper or reject the lot.

- (i) HOC Screen: The quality control check is to perform the test according to the test kit instruction on a reagent containing approximately 50 ppm of a chlorinated organic compound. If the test does not indicate a positive result, replace or reject the lot. If two or more test kit lots do not indicate a positive result, replace and/or test the reagent and retest the test kit lots.

Condition Impact Statement: This condition as drafted would impose an excessive level of control by incorporating detailed requirements regarding chemical screening control.

Requested Action: Delete this condition.

Comment Justification: The WRAP permit application contains an adequate level of detail regarding waste analysis and is consistent with the intent of WAC 173-303-300. The requested action in response to Draft Permit Condition III.7.B.c.49 provides a comprehensive approach to chemical screening quality control. This condition as drafted would pose ambiguity regarding enforceable conditions of chemical screening activities.

32. Condition III.7.B.c.53.

Key Comment: Redundant/Nonenforceable

Draft Permit condition as proposed by the Department of Ecology:

The result of failure (i.e., "a container fails . . .") as described in Section 3.1, Physical Screening Parameters, under the heading "Failure criteria" may be a return to the generator, a re-profiling of the waste stream, or treatment (processing or reprocessing) at the WRAP TSD unit. The result of failure for chemical screening (e.g., failing the test, constitutes failure), as described in Section 3.2, Chemical Screening Parameters, under the heading "Tolerance" may the same outcomes as for physical screening. In addition, a failure of the chemical screening may be the expected outcome of the test, dependent upon the waste profile.

Condition Impact Statement: This condition as drafted does not appear to impose any restrictions or requirements on the Permittees.

Requested Action: Delete this condition.

Comment Justification: This condition as drafted does not appear to impose any requirements or restrictions upon the Permittees. Furthermore, the text in this condition is redundant to the text of Section 1.1.1.3.3. of the waste analysis plan, which comprehensively addresses resolution of conformance issues. The condition as drafted is confusing and does not provide a clear, enforceable condition. This condition becomes more confusing when compared to the final sentence of Draft Permit Condition III.7.B.c.66., which seems to indicate that failure of a waste means that it will be returned to the generator.

33. Condition III.7.B.c.54.

Key Comment: Lack of Regulatory Authority, Inconsistent with Regulations

Draft Permit condition as proposed by the Department of Ecology:

Delete the text in lines 4 and 5 of page 3-1 and replace it with the following: "Physical and chemical screening parameters for verification must be chosen from those in Sections 3.1 and 3.2. Parameters for waste designation and to meet LDR requirements are addressed in Section 3.3."

Condition Impact Statement: The condition as drafted includes reference to generator activities, which is inconsistent with regulations that exempt generator activities from permitting requirements per WAC 173-303-600(3)(d).

Requested Action: Delete the second sentence of this condition. Alternatively, reword the last sentence of the condition to read: "Other sampling and analysis parameters are addressed in Section 3.3."

CONDITION/COMMENT/JUSTIFICATION

Comment Justification: WAC 173-303-600(3)(d) provides that "final facility standards do not apply to: ...a generator accumulating waste on-site in accordance with WAC 173-303-200." There is no basis for imposing sampling and analysis permit conditions on generator activities (refer to comment response to Draft Permit Condition III.7.B.c.21.).

34. **Condition III.7.B.c.58.**

Key Comment: Inconsistent with Regulations, Potential for Compliance Issues, Hinders Cost-Effectiveness

Draft Permit condition as proposed by the Department of Ecology:

Delete the text in lines 38 through 40 on page 3-1 and replace it with the following text: "The container is scanned top-to-bottom and side-to-side with a non-destructive examination (NDE) system according to documented and approved procedures. At a minimum, the lifts, conveyors rotators, and manipulators for the real-time imaging systems shall be capable of handling drums up to 85-gallons in size and up to 1000 pounds in weight and boxes up to 7000 pounds in weight. The minimum image quality, X-ray system performance, and system operator requirements shall be in accordance with the documented specifications for operating the NDE system. The X-ray components shall include the following: (1) a nine-inch (diagonal) entrance field image intensifier, or equivalent, (2) a twelve-inch, high resolution video display monitor, (3) a video printer, and (4) a high-performance, broadcast quality, S-VHS/VHS recorder/player. Quality assurance measures that indicate X-ray imaging quality shall be utilized and documented during equipment startup. For verification activities by NDE, data are observed on a video monitor and captured on videotape to provide a record. Personnel experienced in the interpretation of NDE imagery will record their observations. These observations are then compared to the inventory of container contents on the shipping documentation and also must be in agreement with the waste profile."

Condition Impact Statement: This condition as drafted would impose an excessive level of control by incorporating extensive detail regarding nondestructive examination activities in excess of WAC 173-303-300 requirements.

Requested Action: Delete this condition.

Comment Justification: WAC 173-303-300(2) states that "the owner or operator must obtain a detailed chemical, physical, and/or biological analysis of a dangerous waste...before he stores, treats or disposes of it." WAC 173-303-300 contains adequate requirements for testing of waste without specifying the need for the level of detail that this condition would require. Nondestructive examination is performed to applicable manufacturer's instructions or site-specific protocols. WAC 173-303-300 does not require incorporation of such detail as a permit condition. The Permittees believe that the description provided in the deleted text is adequate and contains the appropriate level of detail for a waste analysis plan.

35. **Condition III.7.B.c.60.**

Key Comment: Inconsistent with Regulations, Hinders Cost-Effectiveness

Draft Permit condition as proposed by the Department of Ecology:

Delete the text in lines 39 through 42 on page 3-3 and replace it with the following: "Method: Full range pH paper with a stated precision of 1.0 pH unit and a corresponding color chart is used for testing. For aqueous samples, a representative test portion of the sample is introduced onto the strip of pH paper. For solids, sludges, and non-aqueous liquids, a representative test portion is mixed with an approximately equal amount of water. The aqueous portion (extractant) of this mixture is then introduced onto the strip of pH paper. The paper is compared visually to the color chart to determine the best color match. The pH is recorded to the nearest whole pH unit."

Condition Impact Statement: This condition as drafted would impose an excessive level of control regarding procedures to meet WAC 173-303-300 requirements.

Requested Action: Delete this condition.

Comment Justification: This condition would impose a level of detail for pH paper that is overly prescriptive. The Permittees believe that the description originally submitted in the WRAP permit application is adequate and contains the appropriate level of detail for a waste analysis plan.

CONDITION/COMMENT/JUSTIFICATION

36. Condition III.7.B.c.61.

Key Comment: Inconsistent with Regulations, Hinders Cost-Effectiveness

Draft Permit condition as proposed by the Department of Ecology:

Delete the text in lines 7 and 8 on page 3-4 and replace it with the following: "Method: Potassium iodide (KI) starch test paper is used for testing. KI oxidizes to iodine (I₂) in the presence of starch to yield a dark blue-black coloration on the test paper. A representative test portion of the sample is placed on a disposable watch dish or weighing boat. The KI test paper strip is acidified with 3M hydrochloric acid (HCl) and placed in contact with the test portion. A darkening of the test paper is a positive indication of the oxidizing properties of the sample."

Condition Impact Statement: This condition as drafted would impose an excessive level of control regarding procedures to meet WAC 173-303-300 requirements.

Requested Action: Delete this condition.

Comment Justification: WAC 173-303-300(2) states that "the owner or operator must obtain a detailed chemical, physical, and/or biological analysis of a dangerous waste...before he stores, treats or disposes of it." WAC 173-303-300(5) states "the owner or operator must develop and follow a written waste analysis plan which describes the procedures he will use to comply with the waste analysis requirements of subsections (1), (2), (3), and (4) of this section". WAC 173-303-300(5) requires *descriptions of procedures* for waste analysis, but does not require that actual procedures be incorporated into the permit. This condition would impose a level of detail for the oxidizer screen that is overly prescriptive. The Permittees believe that the description originally submitted in the WRAP permit application is adequate and contains the appropriate level of detail for a waste analysis plan.

37. Condition III.7.B.c.62.

Key Comment: Inconsistent with Regulations, Hinders Cost-Effectiveness

Draft Permit condition as proposed by the Department of Ecology:

Delete the text in lines 19 through 21 on page 3-4 and replace it with the following: "Method: Water reactivity of waste is determined by adding a representative test portion to an approximately equal volume of water in a disposable watch glass or weighing boat. The mixture is observed for positive indications of water reactivity such as temperature change (increase or decrease), gas evolution, gelling or polymerization."

Condition Impact Statement: This condition as drafted would impose an excessive level of control regarding procedures to meet WAC 173-303-300 requirements.

Requested Action: Delete this condition.

Comment Justification: WAC 173-303-300(2) states that "the owner or operator must obtain a detailed chemical, physical, and/or biological analysis of a dangerous waste...before he stores, treats or disposes of it." WAC 173-303-300(5) states "the owner or operator must develop and follow a written waste analysis plan which describes the procedures he will use to comply with the waste analysis requirements of subsections (1), (2), (3), and (4) of this section". WAC 173-303-300(5) requires *descriptions of procedures* for waste analysis, but does not require that actual procedures be incorporated into the permit. This condition would impose a level of detail for the water reactivity screen that is overly prescriptive. The Permittees believe that the description originally submitted in the WRAP permit application is adequate and contains the appropriate level of detail for a waste analysis plan.

38. Condition III.7.B.c.63.

Key Comment: Inconsistent with Regulations, Hinders Cost-Effectiveness

Draft Permit condition as proposed by the Department of Ecology:

Delete the text in lines 32 through 34 on page 3-4 and replace it with the following: "Method: A ferrous ammonium citrate solution is used as a colorimetric indicator of free cyanides and some complex cyanides. The reagent turns a dark Prussian blue color due to the formation of blue iron ferrocyanide in the presence of cyanide under acidic conditions. A representative test portion is placed on a disposable watch glass or weighing boat. An

CONDITION/COMMENT/JUSTIFICATION

approximately equal amount of water is added to solid matrices. The ferrous ammonium citrate solution is added and mixed into the test portion. The mixture is then acidified with 3M hydrochloric acid (HCl). A dark blue color, if present, indicates the presence of cyanides."

Condition Impact Statement: This condition as drafted would impose an excessive level of control regarding procedures to meet WAC 173-303-300 requirements.

Requested Action: Delete this condition.

Comment Justification: WAC 173-303-300(2) states that "the owner or operator must obtain a detailed chemical, physical, and/or biological analysis of a dangerous waste...before he stores, treats or disposes of it." WAC 173-303-300(5) states "the owner or operator must develop and follow a written waste analysis plan which describes the procedures he will use to comply with the waste analysis requirements of subsections (1), (2), (3), and (4) of this section". WAC 173-303-300(5) requires *descriptions of procedures* for waste analysis, but does not require that actual procedures be incorporated into the permit. This condition would impose a level of detail for the cyanide screen that is overly prescriptive for incorporation into the permit. The Permittees believe that the description originally submitted in the WRAP permit application is adequate and contains the appropriate level of detail for a waste analysis plan.

39. **Condition III.7.B.c.64.**

Key Comment: Inconsistent with Regulations, Hinders Cost-Effectiveness

Draft Permit condition as proposed by the Department of Ecology:

Delete the text in lines 45 through 48 on page 3-4 and replace it with the following: "Method: Lead acetate test paper strips are used for testing. Under acidic conditions, sulfide compounds release hydrogen sulfide (H_2S) and, in the presence of this H_2S , the lead acetate paper changes to a silvery brown or black color due to the formation of lead sulfide (PbS). A representative test portion is placed on a disposable watch glass or weighing boat. The test portion is acidified with 3M hydrochloric acid (HCl). A lead acetate test paper strip is dampened with water and placed near the acidified test portion. A darkening of the test paper is a positive indication of the presence of sulfides in the test portion."

Condition Impact Statement: This condition as drafted would impose an excessive level of control regarding procedures to meet WAC 173-303-300 requirements.

Requested Action: Delete this condition.

Comment Justification: WAC 173-303-300(2) states that "the owner or operator must obtain a detailed chemical, physical, and/or biological analysis of a dangerous waste...before he stores, treats or disposes of it." WAC 173-303-300(5) states "the owner or operator must develop and follow a written waste analysis plan which describes the procedures he will use to comply with the waste analysis requirements of subsections (1), (2), (3), and (4) of this section". WAC 173-303-300(5) requires *descriptions of procedures* for waste analysis, but does not require that actual procedures be incorporated into the permit. This condition as drafted would impose a level of detail for the sulfide screen that is overly prescriptive for incorporation into the permit. The Permittees believe that the description originally submitted in the WRAP permit application is adequate and contains the appropriate level of detail for a waste analysis plan.

40. **Condition III.7.B.c.65.**

Key Comment: Inconsistent with Regulations, Hinders Cost-Effectiveness

Draft Permit condition as proposed by the Department of Ecology:

Delete the text in lines 11 through 13 on page 3-5 and replace it with the following: "Method: A precise amount of oil (i.e., the test portion) is placed into the first of two disposable test tubes provided with the test kit. An ampule containing a colorless catalyst is broken and the contents are mixed thoroughly with the test portion. A second ampule containing metallic sodium is broken and the sodium, activated by the catalyst, strips chlorine from any chlorinated organic compounds present to form sodium chloride. An aqueous buffer solution is added to the test portion. This neutralizes the excess sodium and extracts the sodium chloride into the water. The water layer

CONDITION/COMMENT/JUSTIFICATION

is then separated from the oil and decanted into the second test tube. An ampule containing a precise amount of reagent is broken and the contents mixed with the water. An ampule containing an indicator is then broken and the contents mixed with the water. The color of the mixture is dependant on the amount of chlorinated organic compounds in the original test portion of oil."

Condition Impact Statement: This condition as drafted would impose an excessive level of control regarding procedures to meet WAC 173-303-300 requirements.

Requested Action: Delete this condition.

Comment Justification: WAC 173-303-300(2) states that "the owner or operator must obtain a detailed chemical, physical, and/or biological analysis of a dangerous waste...before he stores, treats or disposes of it." WAC 173-303-300(5) states "the owner or operator must develop and follow a written waste analysis plan which describes the procedures he will use to comply with the waste analysis requirements of subsections (1), (2), (3), and (4) of this section". WAC 173-303-300(5) requires *descriptions of procedures* for waste analysis, but does not require that actual procedures be incorporated into the permit. This condition as drafted would impose a level of detail for the halogenated organic carbon screen that is overly prescriptive for incorporation into the permit. The Permittees believe that the description originally submitted in the WRAP permit application is adequate and contains the appropriate level of detail for a waste analysis plan.

41. **Condition III.7.B.c.66.**

Key Comment: Inconsistent with Regulations, Hinders Cost-Effectiveness

Draft Permit condition as proposed by the Department of Ecology:

Delete the text in lines 15 and 16 on page 3-5 and replace it with the following: "Tolerance: The presence of halogenated organic compounds (HOCs) in the waste requires that either (1) the generator must supply laboratory data obtained by the SW-846 Method 8082 for the waste in the specific container, or (2) the specific container of the waste stream must sampled by the TSD unit and the waste analyzed by SW-846 Method 8082 to determine if the waste contains polychlorinated biphenyls (PCBs). If the waste does contain PCBs, the waste profile must be re-evaluated to determine if the waste is TSCA-regulated and, if the waste is not TSCA-regulated, then the quantitative analytical data must be useable to verify that the concentration of PCBs in the waste is less than 50 ppm. The waste fails if the waste stream is TSCA-regulated or the concentration of PCBs is equal to or greater than 50 ppm. The TSD unit may fail the waste (i.e., return it to the generator) without obtaining the quantitative analytical data."

Condition Impact Statement: This condition as drafted would impose an excessive level of control regarding procedures to meet WAC 173-303-300 requirements and would impose requirements on Toxic Substances Control Act waste for which the Department of Ecology has no legal authority to regulate.

Requested Action: Delete this condition.

Comment Justification: WAC 173-303-300(2) states that "the owner or operator must obtain a detailed chemical, physical, and/or biological analysis of a dangerous waste...before he stores, treats or disposes of it." WAC 173-303-300(5) states "the owner or operator must develop and follow a written waste analysis plan which describes the procedures he will use to comply with the waste analysis requirements of subsections (1), (2), (3), and (4) of this section". WAC 173-303-300(5) requires *descriptions of procedures* for waste analysis, but does not require that actual procedures be incorporated into the permit. This condition would impose a level of detail for the halogenated organic carbon screen that is overly prescriptive for incorporation into the permit. The Permittees believe that the description originally provided in the WRAP permit application is adequate and contains the appropriate level of detail for a waste analysis plan.

WAC 173-303-071(3)(k) specifically excludes Toxic Substances Control Act-managed polychlorinated biphenyls from the Dangerous Waste Regulations.

WAC 173-303-100(6) allows generators to designate halogenated organic carbons based on existing knowledge and also allows for the identity and concentration to be determined by either applying knowledge or by testing. This condition would impose specific laboratory testing on the generator for any waste that contains halogenated

CONDITION/COMMENT/JUSTIFICATION

organic carbons or testing by WRAP in search of polychlorinated biphenyls, both without regulatory authority. In addition, WAC 173-303-600(3)(d) specifically excludes generators who are accumulating waste from final facility standards. Refer to comments on Draft Permit Conditions III.7.B.c.15 and III.7.B.c.21.

42. **Condition III.7.B.c.68.** **Key Comment:** Lack of Regulatory Authority, Inconsistent with Regulations, Hinders Cost-Effectiveness

Draft Permit condition as proposed by the Department of Ecology:

Delete the text in lines 21 and 22 on page 3-5 and replace it with the following: "Parameters needed to meet designation, characterization, and LDR requirements for waste stored and/or treated at WRAP are identified in Appendix A of this WAP."

Condition Impact Statement: This condition as drafted would contradict the WAC 173-303-600(3)(d) exemption for generators by incorporating requirements into the permit that apply to generators.

Requested Action: Rewrite this condition to read:

"Delete the text in lines 21 and 22 on page 3-5 and replace it with the following: "Parameters needed to meet other waste characterization needs for waste stored and/or treated at WRAP are identified in Appendix A."

Comment Justification: WAC 173-303-600(3)(d) specifically excludes generator accumulation from the final facility standards. It is inappropriate for the Department of Ecology to attempt to regulate generator activities through a Resource Conservation and Recovery Act permit (refer to comment response to Draft Permit Condition III.7.B.c.21.).

43. **Condition III.7.B.c.70.** **Key Comment:** Inconsistent with Regulations

Draft Permit condition as proposed by the Department of Ecology:

Delete the text in lines 10 through 11 on page 4-2 beginning with "or other approved . . ." and replace it with the following: "except as amended by the Permit."

Condition Impact Statement: This condition as drafted contains provisions that are inconsistent with SW-846.

Requested Action: Rewrite the condition to read as follows:

Delete the text in lines 9 and 10 on page 4-2 and replace it with the following: "Sample preservation and holding times follow SW-846 protocol."

Comment Justification: Preservation and holding times will be applied appropriately to ensure accuracy and precision of testing data in accordance with SW-846. For data to be legally defensible, preservation must be consistent with authoritative sources.

44. **Condition III.7.B.c.71.** **Key Comment:** Inconsistent with Regulations

Draft Permit condition as proposed by the Department of Ecology:

The following condition applies for the preservation and holding times for samples and for laboratory extracts of the samples. Waste samples are treated and preserved as necessary to protect the sample. Tables 2-36 and 4-1 in SW-846 contains recommended treatment/preservative and holding times. Not all samples require preservation and placing a holding time on a sample may not always be appropriate. Samples with a high concentration of the analyte or non-LDR samples may not require preservation, whereas aqueous samples and samples with low concentrations of the analyte or LDR samples require preservation. If the required preservation interferes with some of the analytes requested, then multiple aliquots of sample may need to be obtained for analysis. Samples taken for analysis of a persistent constituent or non-biologically degradable constituent may not require a holding time. For example, a sample for PCB analysis does not require a holding time (although the laboratory extractant is subject to a holding time). The recommended holding time and preservation for hexavalent chromium (Cr+6) listed in the Tables are required for all sample matrices unless the hexavalent chromium concentration is assumed to be represented by the total chromium in the sample. The recommended preservation and holding time for mercury (Hg) is required in all sample matrices. For the laboratory-prepared organic extracts (e.g., semi-volatile

CONDITION/COMMENT/JUSTIFICATION

organic analysis and PCBs) the holding times listed in the Tables are required to be met for each extract.

Condition Impact Statement: This condition as drafted contains provisions that are inconsistent with SW-846.

Requested Action: Delete this condition.

Comment Justification: WAC 173-303-110 (1) states "All methods and publications listed in this section are incorporated by reference," (i.e., WAC 173-303-110(3)(a) "Test Methods for Evaluating Solid Waste, Physical/Chemical Methods, EPA Publication, SW-846 (Third Edition (November 1986) as amended by Updates...and III (December 1996))". The Permittees believe that WAC 173-303-110, through incorporation of SW-846, Update III, by reference, is adequate for establishing appropriate preservation and holding times for samples and laboratory extracts. This condition as drafted would be inconsistent with SW-846.

The Requested Action, coupled with the response to Draft Permit Condition III.7.B.c.70, contains an appropriate level of detail for a permit condition and a waste analysis plan.

45. **Condition III.7.B.c.73.**

Key Comment: Inconsistent with Regulations, Potential for Compliance Issues, Hinders Cost-Effectiveness

Draft Permit condition as proposed by the Department of Ecology:

The log of sampling activities described in lines 18 through 23 on page 4-2 is required to be kept in an inventoried, uniquely numbered, bound logbook with sequentially numbered pages. Any affixed information, e.g., pictures, copies of chain-of-custody documentation, shall be permanently attached to a logbook page and initialed and dated across the edge of the attached material onto the logbook page so that removal or tampering with the attachment(s) can be identified. No affixed material may be placed over any other affixed items or written entries. The requirements for defensible data recording apply, including correction of entries by single line cross-out, initial and date, and give reason for the change. A signature is required rather than initials if the correction is made by someone other than the original recorder. No entries shall be obliterated, e.g., "white out" must not be used. The identity of the person who is initialing the record must be easily determined.

Condition Impact Statement: This condition as drafted would impose excessive detail on the WRAP operating organization regarding how sampling logs are maintained.

Requested Action: Delete this condition. Alternatively, replace this condition with one that reads as follows:

"The log of sampling activities described in lines 18 through 23 on page 4-2 shall be kept in accordance with standard industrial data recording practices."

Comment Justification: WAC 173-303-380(1) states "the owner or operator of a facility must keep a written operating record at their facility". WAC 173-303-380 does not specify procedures for recordkeeping as this condition would. WAC 173-303-380 and Hanford Facility Resource Conservation and Recovery Act Permit, Dangerous Waste Portion, Condition II.I.1. require various records to be retained and maintained, but not to the level of specificity that would be incorporated through this condition. This condition as drafted would require recordkeeping of sampling activities to a level of detail that is inconsistent with regulatory requirements of WAC 173-303-380, and other permits issued by the Department of Ecology.

46. **Condition III.7.B.c.77.**

Key Comment: Inconsistent with Regulations, Potential for Compliance Issues, Hinders Cost-Effectiveness

Draft Permit condition as proposed by the Department of Ecology:

Delete the text in lines 26 through 28 on page 4-2 and replace it with the following: "Chain of custody and chain-of-custody documentation are maintained for samples at all times. Two chain-of-custody documentation systems are employed by WRAP: electronic for chain of custody internal to the WRAP processing area and hard copy for all other chain of custody. Electronic chain of custody is provided by the Data Management System (DMS), a computer database, for samples collected from waste undergoing processing in the WRAP gloveboxes. After a sample is collected and placed in a sample transfer container, the sample collector enters his/her unique password into the chain-of-custody screen on the DMS. When custody of the sample is transferred from one individual to

CONDITION/COMMENT/JUSTIFICATION

another within the WRAP TSD unit, both individuals enter their passwords into the DMS at the time of custody transfer. The DMS includes, but may not be limited to, the following information: the container from which the sample originated, the unique sample number assigned, date and time of collection, sample type, sample location, method(s) of transfer to the laboratory, identity of the sample collector, identity of all subsequent internal WRAP custodians. The information on the DMS is transferred to an independent computer system on a daily basis. The independent system transfers the data to an electronic storage medium which is kept in an appropriately protected storage vault. After preparation of the sample for transfer to a laboratory, a chain of custody form (hard copy) is generated by TSD unit personnel. The final custodian listed on the electronic chain of custody is the initial custodian on this chain of custody form. In addition, for all samples collected outside of the gloveboxes, a chain of custody form (hard copy) is filled out by the sample collector. This form includes any transfers of custody within the TSD unit. The hard copy chain-of-custody form travels with each sample to the laboratory."

Condition Impact Statement: This condition as drafted would specify an excessive level of detail regarding chain-of-custody activities that are used to ensure sample integrity.

Requested Action: Delete this condition.

Comment Justification: WAC 173-303-300(1) "requires the facility owner or operator to confirm his knowledge about a dangerous waste before he stores, treats, or disposes of it". Chain-of-custody protocols are used by owners and operators to ensure that information obtained for compliance with WAC 173-303-300 is not compromised by inadvertent or intentional tampering. However, there are no provisions in WAC 173-303-300 and WAC 173-303-110 that allow for incorporation of specific chain-of-custody procedures into permits. This condition as drafted would specify excessive controls regarding chain-of-custody procedures. The Permittees believe that the level of detail that describes chain-of-custody procedures on page 4-2, lines 26-28 is appropriate and meets the intent of WAC 173-303-300 and -110. This condition would not enhance protection of human health or the environment, but would hinder management efficiency and cost effectiveness at WRAP.

47. **Condition III.7.B.c.78.** **Key Comment:** Inconsistent with Regulations

Draft Permit condition as proposed by the Department of Ecology:

Section 5.0 is deleted in entirety and replaced by the text of Attachment 41, B.

Condition Impact Statement: This condition as drafted would impose a level of control regarding selection of laboratory and analytical methods that exceeds the regulatory requirements of WAC 173-303-300.

Requested Action: Rewrite the condition to read as follows:

"Section 5.0 is deleted in entirety and replaced by the following text.

5.0 Selecting a Laboratory, Laboratory Testing, and Analytical Methods.

QC shall be applied in implementing both sampling and analytical techniques. Specific performance standards for QA and QC procedures for individual sampling and analysis activities are dynamic and shall be revised as warranted to reflect technological advances in available, appropriate techniques. These performance standards shall be described in policies maintained and used at WRAP and shall be available for review by the Department of Ecology upon request.

5.1 Sampling Program

Sampling procedures for WRAP operations are described in Section 2.2.4. The selection of sample collection devices shall depend on the type of sample, the sample container, the sampling location, and the nature and distribution of regulated constituents in the waste. In general, the methodologies used correspond to those referenced by 40 CFR Part 261, Appendix I. The selection and use of the sample collection device shall be supervised or performed by a person who is thoroughly familiar with sampling protocols.

Sampling equipment shall be constructed of materials that are nonreactive with the waste being sampled. Materials such as glass, PVC plastic, aluminum, or stainless steel could be used. Care shall be taken in the selection and use of the sample collection device to prevent contamination of the sample and to ensure compatibility with waste being sampled. Individual container samples that are related and compatible may be

CONDITION/COMMENT/JUSTIFICATION

composited before analysis.

5.2 Analytical Program

A program of analytical QC practices and procedures has been developed on the Hanford Site to ensure that precision and accuracy are maintained throughout the laboratories. Good laboratory practices that encompass sampling, sample handling, housekeeping, and safety are maintained at onsite laboratories.

5.3 Conclusion

The aforementioned sampling and analytical quality practices help ensure that the data obtained are precise and accurate for the waste stream being sampled. The analytical results are used by operations management to decide whether or not to accept a particular waste and, on acceptance, to determine the appropriate method of treatment, storage, and/or disposal. Results also are important to ensure that the waste is managed properly and that incompatible waste is not combined inadvertently."

If the Department of Ecology retains Attachment 41B, the following specific requests for change are offered:

- 1) Page 2 line 1 add "received copies of" after the word "or".
- 2) Page 2 line 9 delete "incidents (spills)" and replace with "spills"
- 3) Page 2, lines 13 and 14 delete lines and replace with "Identify whether waste is compatible with waste currently stored".
- 4) Page 2 line 28 delete "and reject"
- 5) Page 2 line 31, delete "and reject"
- 6) Page 3 line 2, delete the phrase "either 'prove the negative' or".
- 7) Page 3 line 3 delete the phrase " for which the negative can not be proven".
- 8) Page 3 line 15 delete the words "or designee"
- 9) Page 3 line 31 delete the words "surveying and".
- 10) Page 3 line 39 delete the phrase "national quality standards, which are as follows" and replace with "the laboratory's QA plan for precision, completeness, and comparability. Representativeness assessment is a function of sample acquisition".
- 11) Page 4 line 19 delete the phrase "consistent methodology" and replace with " standard methods".
- 12) Page 5 line 5 add the phrase "identified in WAC 173-303-045" to the end of the sentence.
- 13) Page 5 line 8 add the phrase "most current version(s)" to the end of the sentence.
- 14) Page 5 line 9 add the phrase "most current version(s)" to the end of the sentence.
- 15) Page 5 line 11 add the phrase "most current version(s)" to the end of the sentence.
- 16) Page 5 lines 16 and 17 delete the first sentence of the paragraph.
- 17) Page 5 lines 18-19 delete the words "in real time".
- 18) Page 6 line 15 delete the phrase "with the Washington State Department of Ecology (Ecology)" and replace it with "before starting work with the client".
- 19) Page 6 line 28 delete the phrase "with Ecology" and replace it with "before starting work with the client".

CONDITION/COMMENT/JUSTIFICATION

Comment Justification: WAC 173-303-300 provides adequate requirements for waste analysis. The text suggested by the Permittees in the requested action contains a level of detail appropriate for inclusion as a permit condition and accurately reflects the Permittees' approach to selecting a laboratory, performance of laboratory testing, and use of analytical methods. This condition as drafted would impose overly prescriptive requirements by incorporating a detailed document (Attachment 41B) into the permit. The Permittees insist that the suggested text is more appropriate. Nevertheless, comments have been provided regarding Attachment 41B. These comments should not be construed to imply that the Permittees believe that incorporation of Attachment 41B into the permit is acceptable.

The Permittees recommend incorporation of the suggested text to replace the information originally provided in Section 5.0 of the waste analysis plan. The suggested text ensures an appropriate level of precision and accuracy for data obtained from waste in accordance with the waste analysis program, and for selection of laboratory testing and use of analytical methods.

The text offered by the Permittees in lieu of the condition as drafted contains a level of detail consistent with that contained in the U.S. Environmental Protection Agency Region 10 Arlington, Oregon Resource Conservation and Recovery Act Permit.

48. **Condition III.7.B.c.79.**

Key Comment: Redundant/Nonenforceable

Draft Permit condition as proposed by the Department of Ecology:

The preparative method for the toxicity characteristic is EPA, SW-846 Method 1311, Toxicity Characteristic Leaching Procedure (TCLP). To ensure that the test portion is representative of the waste, a test portion of 50 grams or more is preferred. If a test portion of 50 grams or more is used for the determination, then only a single extraction is required to be performed. However, if the test portion is less than 50 grams, each material to be tested must be extracted in duplicate or multiple replicates so that the precision of the extraction can be determined and evaluated. A relative standard deviation of 25% or lower between extractions for the analytes must be obtained for the analytical data to be useable for waste designation. All routine and quality control data associated with the TCLP and subsequent determinative methods are required to be maintained in the TSD unit operating record.

Condition Impact Statement: This condition as drafted is redundant to provisions available to the regulated community through WAC 173-303-110 and SW-846.

Requested Action: Delete this condition.

Comment Justification: WAC 173-303-110(3)(a) and -045(1)(a) incorporate the Third Update of SW-846 into WAC 173-303 by reference. SW-846, Method 1311, Section 7.2, states that "a minimum sample size of 100 grams (solid and liquid phases) is recommended. SW-846, Section 2.1, states that "if an alternative analytical procedure is employed, then EPA expects the laboratory to demonstrate and document that the procedure of providing appropriate performance for its intended application." In addition, 62 Federal Register 62084 states, "for mixed waste testing, sample sizes of less than 100 grams can be used, if the analyst can demonstrate that the test is still sufficiently sensitive to measure the constituents of interest at the regulatory levels specified in the TCLP and representative of the waste stream being tested... Use of a sample size of less than 100 grams is highly recommended for mixed wastes with concentrations of radionuclides that may present serious radiation exposure hazards." These references place the burden on the regulated community to ensure adequacy of test methods. Therefore, based on the sources cited herein, this condition is unnecessary and redundant.

Lastly, the controls imposed by this condition are not achievable in all circumstances. When the analytical results are reported at or near the detection limits of the determinative methods, the relative standard deviation of 25 percent cannot be met.

CONDITION/COMMENT/JUSTIFICATION

49. Condition III.7.B.c.80.

Key Comment: Inconsistent with Regulations, Hinders Cost-Effectiveness

Draft Permit condition as proposed by the Department of Ecology:

Instead of performing the TCLP as described above, a material may be analyzed for the total concentration of the Toxic Characteristic (TC) constituents. For this approach, solids and sludges must undergo a digestion procedure for metals or an extraction procedure for organics. Then, based on the assumption that the analytes are 100% (totally) leachable from the waste, the resulting data are evaluated against the TC criteria allowing for the 20-fold dilution that is inherent in the TCLP extraction for solids and sludges. (Note that the dilution factor does not apply for liquids.) That is, for each toxic characteristic metal and organic compound, if the analyte concentration is less than 20 times the TC limits, then the waste is not considered to possess the characteristic of toxicity for that constituent. If the totals are more than 20 times the TC limits, then a TCLP must be performed (or, if undergoing stabilization, the waste may be retreated before performing another screening).

Condition Impact Statement: This condition would establish a condition allowing totals analysis but would prohibit its use for assuming a waste exceeds the toxicity characteristic leaching procedure or land disposal restriction threshold, even though regulatory intent allows such use.

Requested Action: Delete this condition.

Comment Justification: WAC 173-303-110(3)(a) and -045(1)(a) incorporate the Third Update of SW-846 into WAC 173-303 by reference. SW-846, Method 1311, Section 1.2 states, "if a total analysis of the waste demonstrates that individual analytes are not present in the waste, or that they are present but at such low concentrations that the appropriate regulatory levels could not possibly be exceeded, the TCLP *need not be run*." 62 Federal Register 62084 states, "the grinding or milling step in the TCLP has raised ALARA concerns for individuals who test mixed waste. The use of total constituent analysis, instead of the TCLP, may also minimize the generation of secondary mixed or radioactive waste through the use of smaller sample sizes and reduction, or elimination, of high dilution volume leaching procedures." The cited references allow for appropriate use of totals analysis without unnecessary additional requirements.

The condition discusses a provision already available to the regulated community in SW-846. The provision does not need to be repeated as a permit condition. The Department of Ecology has drafted a condition that would impose unnecessary restrictions and expenditures upon the Permittees with respect to totals analyses and with the potential to cause as low as reasonably achievable concerns. The Permittees can comply with existing regulations that allow the approach requested.

50. Condition III.7.B.c.87.

Key Comment: Potential for Compliance Issues, Hinders Cost-Effectiveness, Redundant/Nonenforceable

Draft Permit condition as proposed by the Department of Ecology:

Delete "or any other method allowed by regulations" in line 34 on page 7-3.

Condition Impact Statement: This condition as drafted does not appear to impose any requirements or restrictions on the Permittees, but might be intended to deny the Permittees the ability to use methods allowed by regulations.

Requested Action: Delete this condition

Comment Justification: WAC 173-303-110 allows for use of SW-846 and other methods to meet the requirements of WAC 173-303. WAC 173-303-110(5) provide the process by which "any person may request the department to approve an equivalent testing method..." This condition would unnecessarily limit options available to the Permittees for compliance with testing requirements of WAC 173-303-110.

CONDITION/COMMENT/JUSTIFICATION

51. Condition III.7.B.c.88.

Key Comment: Inconsistent with Regulations, Hinders Cost-Effectiveness

Draft Permit condition as proposed by the Department of Ecology:

Delete "SW-846 or any other method allowed by regulations" in line 38 on page 7-3 and replace it with "this Permit."

Condition Impact Statement: This condition arbitrarily would restrict the Permittees' ability to use reliable test methods that may be approved via an equivalent testing method petition as allowed by WAC 173-303-110.

Requested Action: Delete this condition

Comment Justification: WAC 173-303-110 allows for use of SW-846 and other methods to meet the requirements of WAC 173-303. WAC 173-303-110(5) provide the process by which "any person may request the department to approve an equivalent testing method..." This condition would unnecessarily limit options available to the Permittees for compliance with testing requirements of WAC 173-303-110.

52. Condition III.7.B.d.1.

Key Comment: Inconsistent with Regulations, Potential for Compliance Issues, Hinders Cost-Effectiveness

Draft Permit condition as proposed by the Department of Ecology:

On Page 4-1, Line 33, delete "TSD" and replace with "LDR and disposal."

Condition Impact Statement: This condition would require sorbents for waste in storage to meet requirements for disposal.

Requested Action: Delete this condition.

Comment Justification: WAC 173-303-140(4)(b) imposes restrictions on sorbents used for disposal of waste in landfills. This condition would specify the types of sorbents to be used in waste stored at WRAP based on requirements for disposal. WRAP will not be permitted as a disposal facility and therefore, requirements related to waste disposal are inappropriate for inclusion in the permit.

The text originally written in the WRAP permit application is accurate and should not be removed. The WRAP operating organization must be allowed to select sorbents for a variety of management circumstances. It is the Permittees' intent that sorbents placed in waste containers destined for disposal must meet the requirements of WAC 173-303-140(4)(b) before disposal. There is no regulatory basis for imposing the use of land disposal restriction/disposal sorbents on storage and treatment activities.

53. Condition III.7.B.d.3.

Key Comment: Inconsistent with Regulations, Potential for Compliance Issues, Hinders Cost-Effectiveness

Draft Permit condition as proposed by the Department of Ecology:

On Page 4-2, Line 33, insert the following text: "Information for all containers received at and shipped from WRAP will be maintained on an Inventory recordkeeping/control system. The records to be maintained for these containers will include documentation of all testing, analyses, contents, and package identification number (PIN) resulting from WRAP operations. The PIN is used to track waste movement from cradle to grave on SWITS. If SWITS is substantially changed, the Permittee must notify the Department of how cradle to grave documentation will be maintained for all waste managed at WRAP."

Condition Impact Statement: This condition would incorporate excessive detail regarding waste tracking.

Requested Action: Rewrite this condition and relocate to Chapter 3.0 to read as follows.

"On Page 3-1, Line 35, insert the following text: "Information for all containers received at and shipped from WRAP will be maintained in an inventory recordkeeping/waste tracking system consistent with WAC 173-303-380(1)(a) and (b)."

CONDITION/COMMENT/JUSTIFICATION

Comment Justification: WAC 173-303-380(1) requires owners/operators to know "the location of each dangerous waste within the facility and the quantity at each location." Any permit condition that addresses waste tracking should be written in accordance with WAC 173-303-380.

Details regarding methods and tools used for waste tracking should not be incorporated directly into the permit as a condition. This condition would incorporate a level of detail that would hinder the Permittees' ability to operate WRAP in an efficient and cost-effective manner.

54. **Condition III.7.B.d.7.**

Key Comment: Lack of Regulatory Authority, Hinders Cost-Effectiveness

Draft Permit condition as proposed by the Department of Ecology:

The Permittee shall conduct annual inspections of all exterior roof and wall surfaces for building 2336-W during the hottest period each summer, documenting the status of building panel delamination. Inspections shall begin in 1999 and continue until the Department is satisfied that the rate of new panel delaminations has decreased and will continue to decrease such that further evaluations will not be required. All panel delaminations shall be repaired within sixty (60) days of the inspection.

The Permittee shall submit to the Department an annual report documenting the annual inspection and repair of panel delaminations at building 2336-W. The report will include the following:

- Scaled drawings (sized to one scale) indicating current panel delaminations, excluding previously repaired delaminations.
- A record of repairs made subsequent to this year's inspection.
- A listing of current panel delaminations, including location on building (i.e., specific portion of roof or wall), size, history of repair, moisture content, and location on panel (i.e., relative to edges).
- Any delaminations identified on a panel during each inspection shall be listed sequentially relative to previous panel delaminations for that panel.

This information shall be submitted to the Department within ninety (90) days of inspection. All scaled drawings will be of the same scale as documented in 1999 in order to compare changes in panel delamination rates.

Condition Impact Statement: This condition as drafted would establish arbitrary inspections and reports for WRAP.

Requested Action: Delete this condition.

Comment Justification: WAC 173-303-320 requires an owner/operator to "inspect his facility to prevent malfunctions and deterioration, operator errors, and discharges which may cause or lead to the release of dangerous waste constituents to the environment, or a threat to human health." WAC 173-303-630(6) requires an owner/operator to "inspect areas where containers are stored..." The condition as drafted would impose inspection requirements on the Permittees that are inconsistent with WAC 173-303-320 and WAC 173-303-630(6). The Permittees contend that WRAP is structurally sound and that panel delamination does not pose a threat to human health and the environment. As noted in the following, engineering data supporting this contention have been prepared and documented.

The Permittees believe that, while visually detracting, the panel delamination will have no effect on the structural integrity of the 2336-W Building. This has been communicated previously to the Department of Ecology [letter, J. E. Rasmussen, U.S. Department of Energy, to M. A. Wilson, Washington State Department of Ecology, "Response to State of Washington Department of Ecology (Ecology) April 2, 1998, Letter on Professional Engineer's (P.E.) Stamp on Central Waste Complex (CWC) and Waste Receiving and Processing Facility (WRAP) Permit Application Material," dated July 29, 1998. Existing warranty repair activities are sufficient for addressing recurrence of panel delamination to date. Further, the 2336-W Building walls and roof are not part of the containment system required by WAC 173-303-630 for container storage areas. Conducting and documenting the inspections called for would be a costly effort that would add no value to protectiveness of human health and

CONDITION/COMMENT/JUSTIFICATION

the environment.

55. Condition III.7.B.d.9.

Key Comment: Inconsistent with Regulations

Draft Permit condition as proposed by the Department of Ecology:

On Page 4-4, Line 19, add the following text: "The estimated amount of water discharged by the fire suppression system during a 20 minute discharge is 13,578 gallons for the Shipping/Receiving Area, 8,626 gallons for the NDE/NDA Area, and 8,412 gallons for the Process Area. The Permittee shall provide equipment sized to be capable of pumping the secondary containment volume within 24 hours. For small volumes of water, 55-gallon drums will be utilized as transfer containers. If the situation threatens human health or the environment, the Permittees shall remove liquid from the secondary containment immediately, within 24 hours. If the situation does not threaten human health or the environment, then the permittee shall remove liquid from the secondary containment within 72 hours. If the identified schedules cannot be met, the Permittee shall notify the Department for approval of an alternative schedule.

Condition Impact Statement: This condition as drafted would contain excessive detail regarding procedures for removal of liquids from secondary containment to meet WAC 173-303-630(7).

Requested Action: Delete this condition. Alternatively, replace this condition with the following: On Page 4-4, Line 19, add the following text after "...the water main": "The WRAP operating organization will maintain the ability to remove spilled or leaked waste from the containment system in as timely a manner as is necessary to prevent overflow."

Comment Justification: WAC 173-303-630(7)(a)(ii) states that "spilled or leaked waste and accumulated precipitation must be removed from the containment system in as timely a manner as is necessary to prevent overflow." This condition would arbitrarily specify a time limit for removal from secondary containment without regulatory authority.

Some key problems with this condition are as follows.

- The specification to obtain/maintain equipment that could empty the secondary containment system within 24 hours is inappropriate for a permit condition and is without regulatory basis. For example, if a fire emergency were to occur in the secondary containment area, debris/recovery activities could prevent pumping of the containment within 24 hours. The permit should not restrict emergency response actions or hinder post-event analyses. Flexibility is required in this area and the condition is unnecessarily restrictive.
- The requirement to use 55-gallon drums is inappropriate for a permit condition and is without regulatory basis.
- Human health and the environment are protected by WAC 173-303-630(7)(a)(ii). Requirements in excess of the regulation add no further benefit or value and impose costs that will detract from resources supporting cleanup.

56. Condition III.7.B.d.11.

Key Comment: Inconsistent with Regulations

Draft Permit condition as proposed by the Department of Ecology:

On Page 4-i, Line 16, delete "Liquids" and replace with "Waste."

Condition Impact Statement: This condition as drafted would change text that was provided in the WRAP permit application in accordance with the Department of Ecology's Publication #95-402, Section D-1d(2) for removal of liquids from secondary containment to comply with WAC 173-303-630(7).

Requested Action: Delete this condition.

Comment Justification: WAC 173-303-630(7) requirements specifically address the removal of *liquids* from secondary containment systems. Publication #95-402 also guides applicants to address "Liquids" in checklist item [D-1d(2)]. Thus, the Permittees believe that it is appropriate to leave the permit application language unchanged.

CONDITION/COMMENT/JUSTIFICATION

57. **Condition III.7.B.d.12.** **Key Comment:** Inconsistent with Regulations
- Draft Permit condition as proposed by the Department of Ecology:**
- On Page 4-4, Line 34, delete "Liquids" and replace with "Waste."
- Condition Impact Statement:** This condition as drafted would change text that was provided in the WRAP permit application in accordance with Publication #95-402, Section D-1d(2) for removal of liquids from secondary containment to comply with WAC 173-303-630(7).
- Requested Action:** Delete this condition.
- Comment Justification:** WAC 173-303-630(7) requirements specifically address the removal of *liquids* from secondary containment systems. Publication #95-402 also guides applicants to address "Liquids" in checklist item [D-1d(2)]. Thus, the Permittees believe that it is appropriate to leave the permit application language unchanged.
58. **Condition III.7.B.d.13.** **Key Comment:** Inconsistent with Regulations
- Draft Permit condition as proposed by the Department of Ecology:**
- On Page 4-4, Line 36, delete "liquids."
- Condition Impact Statement:** This condition as drafted would change text that was provided in the WRAP permit application in accordance with Publication #95-402, Section D-1d(2) for removal of liquids from secondary containment to comply with WAC 173-303-630(7).
- Requested Action:** Delete this condition.
- Comment Justification:** WAC 173-303-630(7)(c) states that "storage areas that store containers holding only wastes that do not contain free liquids, do not exhibit the characteristic of ignitability or reactivity as described...need not have a containment system as described in this subsection." WAC 173-303-630(7) provides for removal of liquids from secondary containment. WAC 173-303 provides for exclusion from secondary containment requirements for non-liquid wastes. This condition would create confusion regarding requirements by modifying text provided in the WRAP permit application. Refer to related comments on Draft Permit Conditions III.7.B.d.11, and III.7.B.d.12. The language originally provided in the WRAP permit application is accurate and reflects the intent of WAC 173-303-630(7). The original text should remain unchanged.
59. **Condition III.7.B.d.16.** **Key Comment:** Lack of Regulatory Authority
- Draft Permit condition as proposed by the Department of Ecology:**
- On Page 4-5, Line 26, insert the following text: "Records (electronic and/or paper) of all spills and releases of hazardous substances, including radiation survey results, shall be maintained as part of the WRAP operating record throughout the operating life of WRAP. These records will eventually be utilized during closure activities at WRAP as noted in Chapter 11 of this permit."
- Condition Impact Statement:** This condition would impose retention of radiation survey results without regulatory authority.
- Requested Action:** Delete the phrase "including radiation survey results" from this condition.
- Comment Justification:** The Permittees agree that radiation survey results could be used for determining spill boundaries. However, it is inappropriate to require such survey information as part of the operating record, because WAC 173-303 has no stated purpose nor standards directly applicable to radionuclides (refer to response to Draft Permit Condition III.7.B.c.11.).
60. **Condition III.7.B.d.18.** **Key Comment:** none
- Draft Permit condition as proposed by the Department of Ecology:**
- On Page 4-8, Line 1, after "...of mixed waste" insert the following text: "in accordance with all applicable regulations under the Atomic Energy Act and the Nuclear Waste Policy Act."

CONDITION/COMMENT/JUSTIFICATION

Condition Impact Statement: The condition as drafted would closely reflect the text of 40 CFR 264.1080(b)(6).

Requested Action: Insert the phrase *authority of* into the text so the condition reads:

"...in accordance with all applicable regulations under the *authority of* the Atomic Energy Act and the Nuclear Waste Policy Act."

Comment Justification: The Department of Ecology has not adopted 40 Code of Federal Regulations 264, Subpart CC regulations and therefore does not have authority for regulating organic air emissions. This condition actually does not impose any restrictions or requirements, but simply provides information already applicable by regulation. The Permittees agree that applicable Atomic Energy Act requirements must be followed, irrespective of the text in this condition.

61. Condition III.7.B.d.19.

Key Comment: Potential for Compliance Issues, Hinders Cost-Effectiveness

Draft Permit condition as proposed by the Department of Ecology:

On Page 4-8, Line 33, delete ", and other areas within WRAP if needed."

Condition Impact Statement: The condition as drafted would eliminate flexibility to treat mixed waste in appropriate locations within WRAP as allowed by WAC 173-303-630.

Requested Action: Rewrite this condition to delete the text as drafted, but replace the text with the phrase "and the low-level and TRU gloveboxes."

Comment Justification: The Permittees believe this condition is the result of a misunderstanding regarding the intent of the text being deleted. The "other areas within WRAP" referred to are the low-level and transuranic gloveboxes, which should be allowed for use in performing the specified activities. The requested change will allow the flexibility to pretreat liquids if WRAP needs to transfer these from their original large containers into smaller containers for better management of the waste. An example of this would be neutralizing corrosive liquids. The neutralizing reagent would be added to the smaller container before the container is placed in the sorting glovebox. Incorporation of the text in the requested action would be consistent with WAC 173-303-630 provisions and would eliminate one step for management in the restricted waste management gloveboxes and make the process more efficient.

62. Condition III.7.B.d.22.

Key Comment: Inconsistent with Regulations

Draft Permit condition as proposed by the Department of Ecology:

Permittee shall identify critical systems for safe management of dangerous waste and mixed waste at WRAP as required in Facility Condition II.L.2.b of this permit. The Permittee shall describe the location and function of each critical system identified. This information shall be submitted to the Department within thirty (30) days of issuance of this permit and, upon approval by the Department, incorporated as a Class 1 modification. If necessary, The Department will amend the requirements through a Class 2 or 3 modification to the Permit.

Condition Impact Statement: This condition would require identification/descriptions of critical systems in accordance with Condition II.L.2.b.

Requested Action: Modify this permit condition to read:

"The WRAP operating organization will identify critical system(s) within 180 days after the effective date of the Final Permit."

Comment Justification: Agreement has not yet been reached with the Department of Ecology on how to identify critical systems. Thus, 180 days is needed to develop criteria, apply these to WRAP, and finalize the documentation.

The permit conditions in this modification *will not become effective until 30 days after issuance*. Hence, requiring submittals based on the issuance date would impose permit conditions before the effective date of the permit.

CONDITION/COMMENT/JUSTIFICATION

63. Condition III.7.B.e.2.

Key Comment: Redundant/Nonenforceable

Draft Permit condition as proposed by the Department of Ecology:

On Page 6-1, Line 9, after " . . . personnel" add "to radioactive, dangerous, and mixed waste."

Condition Impact Statement: This condition as drafted would change text submitted in the WRAP permit application without basis.

Requested Action: Delete this condition. Alternatively, delete the word "radioactive" from this condition.

Comment Justification: This condition as drafted would amend a statement that was provided in the application for informational purposes. The Permittees intended the statement as background information regarding the intent of the WRAP design. The text is inappropriate as a permit condition. Even after deletion of the word "radioactive", this condition would be redundant to Condition II.L.1 that requires design and operation to minimize exposure to human health and the environment. It is the Permittees' intent that all activities are performed in a manner that is protective of human health and the environment. WAC 173-303 does not contain standards for radionuclides. Therefore, this permit cannot impose requirements associated with radionuclides (refer to response to Draft Permit Condition III.7.B.c.11.).

64. Condition III.7.B.e.4.

Key Comment: Potential for Compliance Issues,
Redundant/Nonenforceable

Draft Permit condition as proposed by the Department of Ecology:

On Page 6-2, Line 3, add "WRAP operations are designed to detect abnormal conditions and to ensure regular inspections. Computerized data collection of all alarms and events, remotely controlled closed-circuit television cameras, and air monitoring data ensure that a complete record of WRAP operations is maintained. WRAP is also inspected daily for the presence of leaks or other abnormal conditions. In addition, WRAP operations, structures, and equipment are used to prevent contamination of water supplies."

Condition Impact Statement: The condition as drafted is ambiguous regarding what specific requirements and/or restrictions are intended.

Requested Action: Delete this condition. Alternatively, rewrite the condition to read:

"The Permittees shall ensure that WRAP is maintained in accordance with WAC 173-303-630(7). The Permittees shall ensure that WRAP inspections, at a minimum, meet the requirements of WAC 173-303-320(2) and WAC 173-303-630(6)."

Comment Justification: WRAP has been *designed* to meet the standards of WAC 173-303-630(7). WRAP is *operated* to ensure regular inspections in accordance with WAC 173-303-630(6) and 173-303-320(2).

WAC 173-303-630(6) requires inspections of containers "at least weekly." WAC 173-303-630(6) applies to containers and WAC 173-303-320(2) applies to equipment. The Permittees request that the Department of Ecology clarify that containers do not require daily inspection unless damaged to the extent that the containers present a leak or release threat. WAC 173-303-320(2) is not intended to contradict the requirement of WAC 173-303-630(6).

65. Condition III.7.B.e.5.

Key Comment: Lack of Regulatory Authority, Inconsistent with
Regulations

Draft Permit condition as proposed by the Department of Ecology:

Section 6.2.3, in addition to the items listed in the application, shall include, at a minimum, the following categories of items:

- All process line equipment
- NDE/NDA equipment
- Remote waste handling equipment

CONDITION/COMMENT/JUSTIFICATION

- Waste storage equipment
- Emergency equipment
- Ventilation equipment detailing all portions that serve the process area, gloveboxes, and building 2336-W. Include a description of the HEPA filtration equipment.
- Emergency equipment, including spill cleanup supplies.
- Aisle space requirements
- Safe storage of incompatible and ignitable wastes

For all items listed in section 6.2.3, including the above listed items, the Permittee shall identify the types of problems to look for during inspections, as well as the frequency of inspections for each item. The frequency of inspection for specific items on the schedule should be based on the rate of possible deterioration of equipment and/or the probability of an environmental or human health incident if the deterioration, malfunction, or operator error goes undetected between inspections. In many cases, state or federal rules specify the frequency. Be specific: "at least every thirty (30) days" or "at least every seven (7) days" rather than "weekly" or "monthly." This information shall be submitted to the Department within thirty (30) days of issuance of this permit, and upon approval by the Department, incorporated as a Class 1 modification. If necessary, The Department will amend the requirements through a Class 2 or 3 modification to the Permit.

Condition Impact Statement: This condition as drafted would impose requirements without regulatory authority for inspection of equipment that exists solely for the purpose of controlling radionuclide emissions.

Requested Action: Delete the text concerning high-efficiency particulate air filtration system.

Comment Justification: WAC 173-303-010 specifies the purposes of the Dangerous Waste Regulations. The scope of WAC 173-303 is limited and does not include standards for radioactive components of mixed waste. This condition would impose requirements for inspection of high-efficiency particulate air systems specifically installed to control radioactive emissions. The U.S. Environmental Protection Agency has promulgated air emission standards applicable to container management. These standards are found in 40 Code of Federal Regulation 264, Subpart CC. The Subpart CC standards exclude from regulation containers used exclusively for the management of mixed waste. Inspection of high-efficiency particulate air systems is outside the scope of these requirements.

The permit conditions in this modification *will not become effective until 30 days after issuance*. Hence, requiring submittals based on the issuance date would impose permit conditions before the effective date of the permit.

66. Condition III.7.B.e.6.

Key Comment: Inconsistent with Regulations, Hinders Cost-Effectiveness

Draft Permit condition as proposed by the Department of Ecology:

Page 6-2, Line 22, insert "Hard copies of the Log Sheets are stored at WRAP. The inspections are performed by process operations personnel (Advanced General Worker as identified in Chapter 8)." The logs will include, at a minimum, the following: date and time of inspection, printed name and the handwritten signature of the inspector, a notation of the observations made, an account of spills or discharges in accordance with WAC 173-303-145, and the date and nature of any repairs or remedial actions taken.

Condition Impact Statement: This condition as drafted would deny flexibility as to who can perform inspections.

Requested Action: Delete "process operations personnel (Advanced General Worker as identified in Chapter 8.0)" insert "trained personnel (as identified in Chapter 8.0)."

CONDITION/COMMENT/JUSTIFICATION

Comment Justification: WAC 173-303-330 requires that personnel be taught dangerous waste management procedures relevant to the positions in which they are employed. This condition would place unnecessary restrictions on who could perform inspections. The Permittees might want to perform inspections using personnel other than process operations personnel, provided they are trained in accordance with applicable training requirements of Chapter 8.0.

67. **Condition III.7.B.e.8.**

Key Comment: Potential for Compliance Issues, Hinders Cost-Effectiveness

Draft Permit condition as proposed by the Department of Ecology:

On Page 6-3, Line 3, add "The schedule for remedial action for problems revealed during inspection will depend on the potential risk to human health or the environment. Problems revealed during inspections will be responded to according to the following schedule:

Problems Threatening Human Health of the Environment:

Problems that pose an imminent threat to human health or the environment will be corrected immediately, but no later than 24 hours from the time of discovery.

Problems Not Threatening Human Health of the Environment:

Problems that do not pose an imminent threat to human health or the environment are corrected within 72 hours of discovery.

Problems Requiring More Than 72 Hours to Resolve:

If a longer time period is required to correct the problem, the Permittee will propose a time schedule for correcting the problem. The correction schedule is subject to approval by the Department.

Condition Impact Statement: This condition would incorporate a schedule for correcting a broad range of "problems not threatening human health or the environment" that would be arbitrary and difficult to accommodate for minor problems that might be encountered at WRAP.

Requested Action: For the requirement under Problems Not Threatening Human Health or the Environment, modify the phrase "are corrected within 72 hours of discovery" to read "are corrected *or scheduled for correction* within 72 hours of discovery."

Modify the condition to indicate that Permittees will "make best efforts" to correct problems within the required time limits.

Modify the condition to correct typographical errors (e.g., "human health *of* the environment" should be "human health *or* the environment").

Comment Justification: WAC 173-303-320 is intended to require owners/operators to correct problems revealed by inspections *on a schedule that prevents hazards to the public health and environment*. Many problems identified during inspections actually do not present a hazard and can be corrected in a timely manner through routine maintenance. There is no basis for imposing arbitrary time limits to situations that do not pose a threat to human health or the environment. Many inspection deficiencies cannot be corrected within 72 hours, even if personnel work overtime. The Permittees request that the Department of Ecology not impose a 72-hour limit on correcting minor problems that do not threaten human health or the environment. For example, scratched floors will take longer than 72 hours to repair. The condition as written requires correction of problems within specified timeframes, but also acknowledges that a longer period might be necessary to correct certain problems. It is inappropriate to impose a correction schedule for routine maintenance work. It is especially inappropriate to impose arbitrary time limits on situations that do not present a threat or a potential threat to human health or the environment.

The Permittees request that the condition be written to reflect this fact by requiring best efforts to correct problems. If the text is not amended, the Permittees could be unnecessarily found in violation of the Permit, even though "best efforts" have been undertaken to correct problems within the specified timeframes. This approach is

CONDITION/COMMENT/JUSTIFICATION

in accordance with General Permit Condition II.X.

68. Condition III.7.B.e.13.

Key Comment: Inconsistent with Regulations

Draft Permit condition as proposed by the Department of Ecology:

On Page 6-9, Lines 1-2, delete "a professional inspector familiar with the Uniform Fire Code" and replace with "the Hanford Fire Marshall."

Condition Impact Statement: This condition would impose inspection requirements on a specific non-Permittee entity, rather than upon the owner/operator as required by WAC 173-303-395(1)(d).

Requested Action: Modify this condition to replace "the Hanford Fire Marshall" with "facility personnel in the presence of a professional person who is familiar with the Uniform Fire Code, or in the presence of the Hanford Fire Marshal."

Comment Justification: WAC 173-303-395(1)(d) is very specific on the following:

- *Owners/operators* are responsible for performing the annual inspection
- The annual inspection can be performed in the presence of *either* a professional person familiar with the Uniform Fire Code, *or* a local, state, or federal fire marshal.

The suggested text more accurately reflects the requirement of WAC 173-303-395(1)(d) and allows flexibility for implementation on the Hanford Facility as intended by WAC 173-303-395(1)(d).

69. Condition III.7.B.e.16.

Key Comment: Lack of Regulatory Authority

Draft Permit condition as proposed by the Department of Ecology:

After "...to have" on Page 6-9, Line 31, insert "filtered."

Condition Impact Statement: This condition as drafted would impose a regulatory control on the radioactive component of transuranic mixed waste by modifying text provided in the WRAP permit application without regulatory authority.

Requested Action: Delete this condition.

Comment Justification: WAC 173-303-010 specifically delineates all purposes of WAC 173-303. There is no stated purpose to regulate radioactive waste through WAC 173-303, nor are there regulatory standards in WAC 173-303 that apply to radioactive emissions. WAC 173-303-690 and 173-303-691 contain air emission standards for specific equipment. 40 Code of Federal Regulation 264, Subpart CC contains standards for organic emissions from waste management activities, but there is a specific exclusion for units used solely for management of mixed waste [40 Code of Federal Regulation 264.1080.b.6]. Filters are used exclusively for control of radioactive emissions. This condition would impose requirements related to the radioactive component of mixed waste without regulatory authority. There are no specific provisions in the Department of Ecology's hazardous waste management program for the regulation of radioactive hazards from source, special nuclear, or byproduct materials. The U.S. Department of Energy must retain authority over source, special nuclear, and byproduct materials as defined by the Atomic Energy Act.

In addition, the Washington State Department of Health has jurisdiction regarding radionuclide emissions from point sources. The permit condition would increase cost and create confusion regarding regulatory authorities. The Department of Ecology has not properly evaluated all appropriate parameters associated with radionuclide emissions. Therefore, it is inappropriate to impose this standard as a condition of the permit (refer to related comment response to Draft Permit Condition III.7.B.c.11.).

70. Condition III.7.B.f.2.

Key Comment: Potential for Compliance Issues,
Redundant/Nonenforceable

Draft Permit condition as proposed by the Department of Ecology:

Table 7-1. Delete second footnote.

CONDITION/COMMENT/JUSTIFICATION

Condition Impact Statement: This condition simply deletes text that accurately describes applicability of WAC 173-303-350(3)(b).

Requested Action: Delete this condition

Comment Justification: This condition as drafted does not seem to impose any requirements or restrictions on the Permittees. The footnote that would be deleted per this condition is taken directly from WAC 173-303. Deletion of the text does not change the Permittees' position with regard to its intent or the intent of the text for which the footnote was written.

If the intent of the Department of Ecology is to deny the accuracy of the statement being deleted, the Permittees believe such action would exceed regulatory authority of the Department of Ecology.

WAC 173-303-350(3) imposes a requirement to implement the contingency plan when the *owner/operator* determines that *containers are damaged to such an extent, or the dangerous waste is in such condition as to present a hazard to the public health or the environment in the process of transportation.*

The requirement of WAC 173-303-350(3)(b) applies to:

- *manifested waste shipments received from off the facility, and*
- *that is unacceptable to the owner/operator, but cannot be transported, and*
- *that is determined by the emergency coordinator to threaten public health or the environment.*

Application of WAC 173-303-350(3)(b) is only appropriate when all three of these are true. Application of this requirement to activities performed by the owner/operator in managing its own waste is arbitrary and clearly exceeds regulatory authority.

71. Condition III.7.B.g.2.

Key Comment: Lack of Regulatory Authority, Hinders Cost-Effectiveness

Draft Permit condition as proposed by the Department of Ecology:

On Page 5, seventh Paragraph, insert the word "non-hazardous" between "other" and "materials."

Condition Impact Statement: This condition as drafted would impose restrictions that exceed regulatory authority provided by Revised Code of Washington 70.105.

Requested Action: Delete this condition.

Comment Justification: WAC 173-303-010 clearly delineates the purposes of the Dangerous Waste Regulations. All purposes of WAC 173-303 specifically apply to dangerous and extremely hazardous waste. This condition would impose restrictions on types of non-waste materials that could be used at WRAP. There is no basis for establishing a permit condition based on text that was provided in the application for informational purposes. There is no basis for limiting use of non-waste materials that should be available for legitimate use at WRAP.

In addition, the Draft Permit Condition has been written to impose requirements on a section of the Building Emergency Plan that already has been determined by the Department of Ecology to be nonenforceable.

72. Condition III.7.B.g.7.

Key Comment: Inconsistent with Regulations, Hinders Cost-Effectiveness

Draft Permit condition as proposed by the Department of Ecology:

In Section 7.2.1, add a section (7.2.1.1) that details procedures to safely shut down utilities at WRAP (i.e., HVAC, fire suppression, electrical circuits, and sanitary water and/or sewer). This information shall be submitted to the Department within 30 days of issuance of this permit and, upon approval by the Department, incorporated as a Class 1 modification. If necessary, The Department will amend the requirements through a Class 2 or 3 modification to the Permit.

Condition Impact Statement: This condition would impose requirements based on a presumption that detailed procedures are required for shutdown of all the specified utilities to avoid presenting a threat to human health and

CONDITION/COMMENT/JUSTIFICATION

the environment if an emergency arises.

Requested Action: Rewrite this condition to read:

In Section 7.2.1, add a section (7.2.1.1) that provides a description of actions to safely shut down WRAP in the event of loss of utilities. This information shall be submitted to the Department of Ecology within 30 days after the effective date of this permit, and upon approval by the Department of Ecology, incorporated as a Class 1 modification. If necessary, the Department of Ecology will amend the permit through a Class 2 or 3 modification. If the Department of Ecology insists on retaining the condition as drafted, change this condition to require submittal by the Permittees of a list of equipment that requires shutdown during emergencies and descriptions of procedures for such shutdown. The Permittees request the Department of Ecology change "within 30 of issuance..." to "within 30 days after the effective date..." In such case, the condition should read (changes are italicized):

In Section 7.2.1, add a section (7.2.1.1) that *identifies utilities that require shutdown during emergencies at WRAP. This section shall include descriptions of procedures for such shutdown.* This information shall be submitted to the Department of Ecology within 30 days *after the effective date* of this permit and, upon approval by the Department of Ecology, incorporated as a Class 1 modification. If necessary, the Department of Ecology will amend the *permit* through a Class 2 or 3 modification.

Comment Justification: WAC 173-303-350(3)(a) states that "the contingency plan must contain the following: a description of the actions which facility personnel must take to comply with this section and WAC 173-303-360". The condition as drafted would presume that procedures for utility shutdown would be required to ensure safe shutdown of WRAP. Furthermore, the Permittees believe that the Department of Ecology originally intended to propose a condition similar to the text offered in the requested action to describe actions taken to safely shut down WRAP in the event of a loss of utilities.

The permit conditions in this modification *will not become effective until 30 days after issuance.* Hence, requiring submittals based on the issuance date would impose permit conditions before the effective date of the permit.

73. Condition III.7.B.g.8.

Key Comment: Inconsistent with Regulations, Hinders Cost-Effectiveness

Draft Permit condition as proposed by the Department of Ecology:

In Section 7.2.5, delete entire fourth Bullet and add new fourth Bullet with the following, "Classify the spill as one that can be cleaned up by personnel in the immediate vicinity at the time of the incident, or as a spill that requires the notification of the BED and assistance from additional, trained personnel (i.e., HFD HazMat Team). The classification will be made using the following resources:

- SWITS information, as well as the Spill Report Checklist and other resources (ERPGs, Emergency Response Guidebook, MSDSs, etc.) will be used to determine spill constituents, including toxicity and other hazards.
- If there is not a good understanding of spill hazards, or the risks are not understood clearly, the spill shall be handled by the HazMat Team.
- Classification is not necessarily base on the quantity of the spill, but by the toxicity of the chemical present.
- The HFD can be requested to evaluate the spill to determine if immediate response by the HFD HazMat Team is warranted."

Condition Impact Statement: Accept.

Requested Action: Not applicable.

Comment Justification: Not applicable.

CONDITION/COMMENT/JUSTIFICATION

74. Condition III.7.B.g.11.

Key Comment: Inconsistent with Regulations

Draft Permit condition as proposed by the Department of Ecology:

The Permittee will submit to the Department a revised Section 9.2 that indicates the specific location and capability of all portable fire extinguishers. This information shall be submitted to the Department within thirty (30) days of issuance of this permit and, upon approval by the Department, incorporated as a Class 1 modification. If necessary, The Department will amend the requirements through a Class 2 or 3 modification to the Permit.

Condition Impact Statement: This condition would require submittal of clarifying information regarding emergency response fire extinguishers in accordance with WAC 173-303-350(3)(e).

Requested Action: Change the requirement to identify "the specific location" to a requirement to identify "the general location" of portable fire extinguishers. Change "within 30 days of issuance..." to "within 30 days after the effective date..."

Comment Justification: WAC 173-303-350(3)(e) requires locations of equipment to be identified. However, because the fire extinguishers being addressed are portable, the Permittees request that flexibility be allowed in identifying their locations. It would be appropriate to specify the expected area of use for each portable fire extinguisher.

The permit conditions in this modification *will not become effective until 30 days after issuance*. Hence, requiring submittals based on the issuance date would impose permit conditions before the effective date of the permit.

75. Condition III.7.B.g.12.

Key Comment: Inconsistent with Regulations

Draft Permit condition as proposed by the Department of Ecology:

The Permittee will submit to the Department a revised Section 9.4 that enumerates the specific Personal Protective Equipment, its location, and capabilities. This information shall be submitted to the Department within thirty (30) days of issuance of this permit and, upon approval by the Department, incorporated as a Class 1 modification. If necessary, The Department will amend the requirements through a Class 2 or 3 modification to the Permit.

Condition Impact Statement: This condition would require submittal of clarifying information regarding emergency response clothing in accordance with WAC 173-303-350(3)(e).

Requested Action: Accept the first sentence in this condition. Change "within 30 days of issuance..." to "within 30 days after the effective date..."

Comment Justification: The permit conditions in this modification *will not become effective until 30 days after issuance*. Hence, requiring submittals based on the issuance date would impose permit conditions before the effective date of the permit.

76. Condition III.B.g.13.

Key Comment: Inconsistent with Regulations

Draft Permit condition as proposed by the Department of Ecology:

The Permittee will submit to the Department a revised Section 9.5 indicating that a portable spill response cart is located in the shipping/receiving area and that one is located in the process area. Show that the spill response locker is located only in the 2336-W material preparation area room (room 152) and not in the process area. Elaborate on the capability of all equipment. This information shall be submitted to the Department within thirty (30) days of issuance of this permit and, upon approval by the Department, incorporated as a Class 1 modification. If necessary, The Department will amend the requirements through a Class 2 or 3 modification to the Permit.

Condition Impact Statement: This condition would require descriptions of equipment capability in excessive detail such that each time new spill equipment is procured, the permit would require modification.

Requested Action: Accept the first two sentences of this condition. Delete "Elaborate on the capability of all equipment." Change "within 30 days of issuance..." to "within 30 days after the effective date..."

CONDITION/COMMENT/JUSTIFICATION

Comment Justification: The condition to "Elaborate on the capability of all equipment," would hinder the Permittees' ability to efficiently employ new spill equipment. The list of the equipment in Section 9.5 is intended to provide examples of the types of equipment that are located in spill response carts and lockers.

The permit conditions in this modification *will not become effective until 30 days after issuance*. Hence, requiring submittals based on the issuance date would impose permit conditions before the effective date of the permit.

77. **Condition III.7.B.g.14.**

Key Comment: Potential for Compliance Issues

Draft Permit condition as proposed by the Department of Ecology:

On Page 31, Section 14.0, delete "1996" and replace with "(The most current version)."

Condition Impact Statement: This condition as drafted does not appear to impose any requirements or restrictions upon the Permittees and would furthermore incorporate erroneous information into the permit.

Requested Action: Delete this condition.

Comment Justification: The 1996 version of the National Institute of Occupational Safety and Health pocket guide is the correct reference because it was used as stated in the WRAP permit application. When the pocket guide is updated, changes will be made in the application to reflect its use as necessary.

78. **Condition III.7.B.i.6.**

Key Comment: Inconsistent with Regulations

Draft Permit condition as proposed by the Department of Ecology:

On Page 4, Section 5.3.4, the categories of General Manager positions do not completely match the categories of General Manager positions listed in Attachment 2. Revise either Section 5.3.4 or Attachment 2 or both to match the General Manager descriptions and required training courses. The revised text shall be submitted to the Department within 30 days of issuance of this permit and, upon approval by the Department, incorporated as a Class 1 modification. If necessary, The Department will amend the requirements through a Class 2 or 3 modification to the Permit.

Condition Impact Statement: This condition as drafted would require the Permittees to revise the WRAP training plan to achieve consistency in documentation.

Requested Action: Accept first two sentences.

Change "within 30 days of issuance..." to "within 30 days after the effective date..."

Comment Justification: The permit conditions in this modification *will not become effective until 30 days after issuance*. Hence, requiring submittals based on the issuance date would impose permit conditions before the effective date of the permit.

79. **Condition III.7.B.i.7.**

Key Comment: none

Draft Permit condition as proposed by the Department of Ecology:

On Page 7, Section 5.5, delete the word "some" and replace with "non-facility."

Condition Impact Statement: This condition as drafted would provide clarification regarding training requirements for non-WRAP individuals that enter WRAP.

Requested Action: Accept.

Comment Justification: The Permittees agree that the text drafted by the Department of Ecology provides clarification.

CONDITION/COMMENT/JUSTIFICATION

80. Condition III.7.B.j.1.

Key Comment: Inconsistent with Regulations

Draft Permit condition as proposed by the Department of Ecology:

Within sixty (60) days of the issuance of the permit, the Permittee shall provide to the Department a revised closure plan. The plan shall include the following items:

- Closure methods for structures and soil.
- Criteria for the selection for the closure methods.
- Schedule of closure activities.
- Rationale for determining contaminants of concern (COC).

The permittee shall submit this information to the Department within sixty (60) days of issuance of this permit. The final closure plan for WRAP shall be included in the permit as a Class 3 modification in "Mod E" upon approval by the Department.

Condition Impact Statement: This condition would require submittal of a revised closure plan. The revised plan will be submitted long before closure of WRAP, which should render Draft Permit Conditions III.7.B.j.2 through III.7.B.j.9 unnecessary.

Requested Action: Accept, with the exception of the required submittal date.

Change "within 60 days of issuance..." to "within 60 days after the effective date..."

Comment Justification: The permit conditions in this modification *will not become effective until 30 days after issuance*. Hence, requiring submittals based on the issuance date would impose permit conditions before the effective date of the permit.

81. Condition III.7.B.j.2:

Key Comment: Redundant/Nonenforceable

Draft Permit condition as proposed by the Department of Ecology:

On Page 11-1, Line 7, add "The WRAP closure will address all portions of WAC 173-303-610 not specifically stated in this permit."

Condition Impact Statement: This condition is unnecessary and is redundant to applicable WAC 173-303 regulations, the Hanford Federal Facility Agreement and Consent Order, and this permit.

Requested Action: Delete this condition.

Alternatively, replace Draft Permit Conditions III.7.B.j.2 through III.7.B.j.9, so that instead of having eight conditions that require specific modifications to an obsolete closure plan, there would be one condition that reads as follows:

"The Permittees shall not initiate closure actions at WRAP before approval of the revised closure plan required by Condition III.7.B.j.1, except for specific actions that the Permittees obtain prior approval for from the Department of Ecology."

Comment Justification: WAC 173-303 and the Hanford Federal Facility Agreement and Consent Order both require Hanford Site treatment, storage, and/or disposal units to be closed in accordance with WAC 173-303-610. This condition would not impose any new requirements. This condition, in conjunction with other unnecessary and redundant conditions, would contribute to increased costs in permit implementation and maintenance.

It is the Permittees' intent that all treatment, storage, and/or disposal units on the Hanford Facility will be closed in accordance with WAC 173-303-610 and the Hanford Federal Facility Agreement and Consent Order. The Permittees request that the Department of Ecology acknowledge the role of the Hanford Federal Facility Agreement and Consent Order in providing an approach to Hanford Facility cleanup that is cost-effective and minimizes redundancy through coordination of closures with other cleanup efforts.

CONDITION/COMMENT/JUSTIFICATION

Additionally, because the Department of Ecology will require submittal of a revised closure plan for WRAP through Condition III.7.B.j.1, there is no need for Draft Permit Conditions III.7.B.j.2 through III.7.B.j.9. These conditions would not have any effect, except to increase unnecessary expenditure of time, money, and resources. The Permittees intent to submit a revised closure plan that will address WAC 173-303-610 requirements. The Department of Ecology will have approval authority for the revised closure plan and can provide feedback to the Permittees if the closure plan is thought to be deficient.

82. Condition III.7.B.j.3. Key Comment: Hinders Cost-Effectiveness,
Redundant/Nonenforceable

Draft Permit condition as proposed by the Department of Ecology:

On Page 11-1, Line 25, delete the word "particle" and replace with "particulate."

Condition Impact Statement: This condition would require modifications to an obsolete closure plan, despite the fact that closure will not commence before submittal to and approval by the Department of Ecology of a revised closure plan.

Requested Action: Delete this condition.

Comment Justification: The Permittees agree that the text drafted by the Department of Ecology provides clarification. However, the Permittees also believe that this condition is unnecessary because a revised closure plan will be submitted for Department of Ecology approval long before closure of WRAP (refer to second paragraph in Comment Justification Section on response to Draft Permit Condition III.7.B.j.2.).

83. Condition III.7.B.j.4. Key Comment: Hinders Cost-Effectiveness,
Redundant/Nonenforceable

Draft Permit condition as proposed by the Department of Ecology:

After " . . . (Appendix 2A details the TSD Unit Boundary) . . ." on Page 11-1, Line 34, insert "as well as the removal of any soil contaminated by releases from WRAP beyond the TSD unit boundary."

Condition Impact Statement: This condition as drafted fails to acknowledge, and therefore is inconsistent with, provisions of the Hanford Federal Facility Agreement and Consent Order. Additionally, this condition would require modifications to an obsolete closure plan, despite the fact that closure will not commence before submittal to and approval by the Department of Ecology of a revised closure plan.

Requested Action: Delete this condition.

Alternatively, modify the condition to provide reference to the approach addressed in the Hanford Federal Facility Agreement and Consent Order Action Plan, Section 7.0, and acknowledge this approach agreed to for cleanup of Hanford Facility soils.

Comment Justification: The condition is unnecessary because a revised closure plan will be submitted for Departmental of Ecology approval long before closure of WRAP. Nevertheless, the Permittees are commenting on this condition because it would be inappropriate for inclusion in the permit, should the Department of Ecology insist on revisions to the obsolete closure plan (refer to second paragraph in Comment Justification Section on response to Draft Permit Condition III.7.B.j.2.).

The Hanford Federal Facility Agreement and Consent Order provides the proper approach to closure of treatment, storage, and/or disposal units on the Hanford Facility. The Hanford Federal Facility Agreement and Consent Order clearly addresses the most cost. It is the Permittees' intent that all treatment, storage, and/or disposal units on the Hanford Facility will be closed in accordance with WAC 173-303-610 and the Hanford Federal Facility Agreement and Consent Order. The Permittees request that the Department of Ecology acknowledge the role of the Hanford Federal Facility Agreement and Consent Order in providing an approach to cleanup that is cost-effective and minimizes redundancy through coordination of closures with other cleanup efforts. This condition would dictate cleanup of soils without regard for the approach agreed to by the Department of Ecology .

CONDITION/COMMENT/JUSTIFICATION

84. Condition III.7.B.j.5.

Key Comment: Hinders Cost-Effectiveness,
Redundant/Nonenforceable

Draft Permit condition as proposed by the Department of Ecology:

On Page 11-1, Lines 41-42, delete "and disposed of accordingly." After "...will be designated," add "and disposed of."

Condition Impact Statement: This condition would require modifications to an obsolete closure plan, despite the fact that closure will not commence before submittal to and approval by the Department of Ecology of a revised closure plan.

Requested Action: Delete this condition.

Comment Justification: The condition is unnecessary because a revised closure plan will be submitted for Department of Ecology approval long before closure of WRAP. Nevertheless, the Permittees intend to dispose of these and all waste materials properly and in accordance with regulatory requirements (refer to second paragraph in Comment Justification Section on response to Draft Permit Condition III.7.B.j.2.).

85. Condition III.7.B.j.6.

Key Comment: Hinders Cost-Effectiveness,
Redundant/Nonenforceable

Draft Permit condition as proposed by the Department of Ecology:

After "...sampling program" on Page 11-2, Line 1, add "...subject to approval by the Department of Ecology,".

Condition Impact Statement: This condition would require modifications to an obsolete closure plan, despite the fact that closure will not commence before submittal to and approval by the Department of Ecology of a revised closure plan.

Requested Action: Delete this condition.

Comment Justification: The condition is unnecessary because a revised closure plan will be submitted for Department of Ecology approval long before closure of WRAP. The Permittees request the Department of Ecology to address any concerns with sampling during review of the revised plan (refer to second paragraph in Comment Justification in response to Draft Permit Condition III.7.B.j.2.).

86. Condition III.7.B.j.7.

Key Comment: Hinders Cost-Effectiveness,
Redundant/Nonenforceable

Draft Permit condition as proposed by the Department of Ecology:

On Page 11-6, Lines 43-44, delete the sentence beginning with "In addition, ..."

Condition Impact Statement: This condition would require modifications to an obsolete closure plan, despite the fact that closure will not commence before submittal to and approval by the Department of Ecology of a revised closure plan.

Requested Action: Delete this condition.

Comment Justification: The condition is unnecessary because a revised closure plan will be submitted for Department of Ecology approval long before closure of WRAP (refer to second paragraph in Comment Justification on response to Draft Permit Condition III.7.B.j.2.).

87. Condition III.7.B.j.8.

Key Comment: Hinders Cost-Effectiveness,
Redundant/Nonenforceable

Draft Permit condition as proposed by the Department of Ecology:

On Page 11-7, Line 15, revise the text to read, "Within sixty (60) days of completion of closure activities, a copy of the PE ..."

CONDITION/COMMENT/JUSTIFICATION

Condition Impact Statement: This condition would require modifications to an obsolete closure plan, despite the fact that closure will not commence before submittal to and approval by the Department of Ecology of a revised closure plan.

Requested Action: Delete this condition.

Comment Justification: The condition is unnecessary because a revised closure plan will be submitted for Department of Ecology approval long before closure of WRAP (refer to second paragraph in Comment Justification on response to Draft Permit Condition III.7.B.j.2.).

88. **Condition III.7.B.j.9.**

Key Comment: Hinders Cost-Effectiveness,
Redundant/Nonenforceable

Draft Permit condition as proposed by the Department of Ecology:

On Page 11-7, Lines 18-20, delete the text beginning with "The PE is not . . ."

Condition Impact Statement: This condition would require modifications to an obsolete closure plan, despite the fact that closure will not commence before submittal to and approval by the Department of Ecology of a revised closure plan.

Requested Action: Delete this condition.

Comment Justification: The condition is unnecessary because a revised closure plan will be submitted for Department of Ecology approval long before closure of WRAP (refer to second paragraph in Comment Justification Section on response to Draft Permit Condition III.7.B.j.2.).

89. **Condition III.7.B.k.2.**

Key Comment: Inconsistent with Regulations, Potential for
Compliance Issues

Draft Permit condition as proposed by the Department of Ecology:

On Page 12-1, delete Lines 5 through 36, beginning with "Not all of . . ."

Condition Impact Statement: This condition would delete text from the WRAP permit application that was intended as a general description of reporting and recordkeeping requirements expected to be applicable to WRAP based on WAC 173-303.

Requested Action: Delete this condition.

Comment Justification: There is no basis for eliminating permit application text that correctly identifies applicable regulatory requirements from *Hanford Facility Dangerous Waste Permit Application, General Information Portion*, DOE/RL-91-28, Table 12-1. WRAP unit-specific reporting/recordkeeping requirements are limited to those that are *applicable by regulation* (refer to *Hanford Facility Dangerous Waste Permit Application, General Information Portion*, DOE/RL-91-28, Chapter 12.0, page 12-1, lines 32-36).

This condition as drafted would erase appropriate permit application text without proper cause. Clearly, not all of the requirements in Table 12-1 are applicable at WRAP. For example, groundwater monitoring is applicable to land-based units and therefore not applicable to WRAP, which is not land-based (refer to Chapter 5.0 of the WRAP application, which explains which of these requirements should not be applicable and why).

This condition, in conjunction with Draft Permit Conditions III.7.B.k.5. and III.7.B.k.6., would require the Permittees to waste time and effort trying to convince the Department of Ecology that its own rules allow that some reporting activities would not be applicable to WRAP activities. There is no basis for the Department of Ecology to take the position that reporting requirements be taken out of context and inappropriately applied to WRAP. There is no rationale for expecting the Permittees to justify the lack of applicability when the regulations should adequately enable one to determine scope. The Department of Ecology did not require that this approach be taken for the treatment, storage, and/or disposal units incorporated into Part III of the Permit through the previous modification (Revision 4A).

CONDITION/COMMENT/JUSTIFICATION

90. Condition III.7.B.k.3.

Key Comment: Inconsistent with Regulations, Hinders Cost-Effectiveness

Draft Permit condition as proposed by the Department of Ecology:

The Permittee shall notify the Department of the specific location on the Hanford Facility (e.g., building numbers and/or names) where the WRAP operating record will be maintained. This information shall be submitted to the Department within thirty (30) days of issuance of this permit and, upon approval by the Department, incorporated as a Class 1 modification.

Condition Impact Statement: This condition as drafted would negate flexibility to physically relocate the storage location for WRAP records without a permit modification, even though:

- The records could still be provided to the Department of Ecology upon request without requiring identification of a specific physical storage location,
- The records could be managed in accordance with WAC 173-303-380, Condition I.H and Condition II.I.1 without requiring identification of a specific physical storage location.

Requested Action: Delete this condition. Alternatively, rewrite the condition to allow the Permittees to identify the multiple locations where WRAP records are currently maintained and change "within 30 days of issuance..." to "within 30 days after the effective date..."

Comment Justification: The Hanford Facility Resource Conservation and Recovery Act Permit, Condition II.I.1 states that "A TSD unit-specific operating record for each TSD unit shall be maintained at a location identified in Parts III, V, and VI of this Permit" If this condition as drafted is intended to require consolidation of WRAP records into a single physical location, then it would impose excessive costs to accomplish re-location of records. The Permittees request that the Department of Ecology agree that the "location" required by Condition II.I.1 be interpreted to allow for records to remain in their current locations. The permit conditions in this modification *will not become effective until 30 days after issuance*. Hence, requiring submittals based on the issuance date would impose permit conditions before the effective date of the Permit.

91. Condition III.7.B.k.4.

Key Comment: Hinders Cost-Effectiveness,
Redundant/Nonenforceable

Draft Permit condition as proposed by the Department of Ecology:

On Page 12-1, Line 37, add "The Permittee will produce and place as-built drawings in the WRAP operating record within six (6) months of issuance of this permit. In addition, the referenced as-built drawings will be revised at least every twelve (12) months to incorporate all outstanding engineering change notices (ECNs) and Non Conformance Reports (NCRs)."

Condition Impact Statement: This condition would impose redundant requirements upon the Permittees and would require modifications to drawings in accordance with an arbitrary schedule.

Requested Action: Delete this condition.

Comment Justification: The first sentence of this condition is unnecessary because as-built drawings were provided with the WRAP permit application, a copy of which will be maintained in the WRAP operating record as specified in Chapter 12.0 of the WRAP permit application and Chapter 12.0 of *Hanford Facility Dangerous Waste Permit Application*, DOE/RL-91-28. The second sentence of the Draft Permit Condition is unnecessary because the Permittees already are obligated to provide engineering change notices to the Department of Ecology quarterly in accordance with Hanford Facility Resource Conservation and Recovery Act Permit, Dangerous Waste Portion, Condition I.C.3. These engineering change notices constitute revisions to the as-built drawings. Drawings are updated periodically, not based on an arbitrary schedule, but based on the number and type of engineering change notices that amend a particular drawing. There is no basis in WAC 173-303-810 or 830, or elsewhere for requiring revision of drawings as would be imposed by this condition.

The engineering change notices and revised drawings are placed in the WRAP operating record in accordance with

CONDITION/COMMENT/JUSTIFICATION

Chapter 12.0 of the WRAP permit application. Hanford Facility Resource Conservation and Recovery Act Permit, Dangerous Waste Portion, General Condition II.L.2.d. requires placement of as-built drawings that incorporate modifications for completed projects in the operating record within 12 months of completion. This condition as drafted would require that as-builts must be amended every 12 months to incorporate engineering change notices and nonconformance report. Proper documentation is maintained and the Department of Ecology receives timely notification in accordance with Condition II.L.2.d.. Therefore, this condition should be unnecessary.

92. Condition III.7.B.k.5.

Key Comment: Inconsistent with Regulations, Potential for Compliance Issues, Hinders Cost-Effectiveness, Redundant/Nonenforceable

Draft Permit condition as proposed by the Department of Ecology:

On Page 12-1, add "All unit specific reporting requirements identified in Table 12-1 of the General Information Portion "DOE/RL-91-28" are applicable to the WRAP unit."

Condition Impact Statement: This condition would arbitrarily impose reporting requirements that have no relevance to WRAP activities.

Requested Action: Delete this permit condition.

Comment Justification: There are no provisions in WAC 173-303 that allow for regulations that are not relevant to a facility's activities to be enforced through a permit. This condition (in conjunction with the condition following this one) would require unnecessary expenditure to interpret regulations for the Department of Ecology without any benefit to public health or the environment.

There is no regulatory basis for the random assignment of requirements from Table 12-1 to WRAP. Table 12-1 is a comprehensive list of requirements that are generally applicable on the Hanford Site and it was not submitted with the expectation that it would be applied in its entirety as a permit condition for one unit. Some requirements listed in Table 12-1 are obviously not applicable to WRAP. For example, groundwater monitoring would not apply to WRAP simply because it does not meet the WAC 173-303-040 definition for "regulated unit." This condition would be inconsistent with regulatory requirements (refer to response to Draft Permit Condition III.7.B.k.2.).

93. Condition III.7.B.k.6.

Key Comment: Inconsistent with Regulations, Potential for Compliance Issues, Hinders Cost-Effectiveness, Redundant/Nonenforceable

Draft Permit condition as proposed by the Department of Ecology:

The Permittee shall identify requirements from Table 12-1 of the General Information Portion "DOE/RL-91-28" that are not applicable to WRAP and provide justification as to why they are not applicable. This information shall be submitted to the Department within thirty (30) days of issuance of this permit and, upon approval by the Department, incorporated as a Class 1 modification. If necessary, The Department will amend the requirements through a Class 2 or 3 modification to the Permit.

Condition Impact Statement: This condition would require the Permittees to perform a regulatory interpretation for the Department of Ecology to justify that certain self-explanatory regulations are not relevant to WRAP operations.

Requested Action: Delete this condition.

Comment Justification: (Refer to response to Draft Permit Condition III.7.B.k.2.).

CONDITION/COMMENT/JUSTIFICATION

1. Condition III.8.A.

Key Comment: Inconsistent with Regulations

Draft Permit condition as proposed by the Department of Ecology:

COMPLIANCE WITH APPROVED PERMIT APPLICATION

The Permittees shall comply with all requirements set forth in the Central Waste Complex (CWC) Permit Application, Rev. 1, as found in Attachment 42, including the modifications specified in Condition III.8.B., if any exist. Enforceable portions are listed below (All subsections, figures, and tables included in these portions are also enforceable unless stated otherwise):

Part A Application, Revision 5, May 22, 1998

Section 2.1	Central Waste Complex Mixed Waste Storage Facility Description
Section 2.2	Topographic Maps
Section 2.4	Release from Solid Waste Management Units (SWMU)
Chapter 3.0	Waste Analysis
Chapter 4.0	Process Information
Chapter 6.0	Procedure to Prevent Hazards
Chapter 7.0	Contingency Plan
Chapter 8.0	Personnel Training
Chapter 11.0	Closure and Post Closure Requirements
Chapter 12.0	Reporting and Recordkeeping
Appendix 2A	Topographic Maps
Appendix 3A	Waste Analysis Plan
Appendix 4A	Design Drawings
Appendix 4B	Secondary Containment Calculations
Appendix 4C	Sealant Properties
Appendix 7A	Building Emergency Plan (As applicable in Chapter 7)
Appendix 8A	Training Plan
Attachment 41A	Waste Acceptance Criteria
Attachment 41B	Selecting a Laboratory and Quality Assurance/Quality Control

Condition Impact Statement: This condition as drafted would incorporate sections of the CWC permit application into the permit that were previously determined by the Department of Ecology to be nonenforceable.

Requested Action: Delete Sections 2.1, 2.4, and Attachment 41B from the enforceable section list.

Comment Justification: This condition has been drafted against portions of the application (Sections 2.1 and 2.4) that the Department of Ecology previously had identified as nonenforceable information in Publication #95-402, dated 6/96. Section 2.2 contains information determined by the Department of Ecology as enforceable. The Permittees request the Department of Ecology use the same approach as was taken for Chapters 4 through 6 of the Hanford Facility Resource Conservation and Recovery Act Permit, Dangerous Waste Portion.

CONDITION/COMMENT/JUSTIFICATION

The Permittees submitted a comment on September 24, 1998, requesting removal of Sections 2.1 from the list of enforceable portions found in Condition III.8.A. The Permittees again request removal of Section 2.1 and 2.4 from the Permit. Regarding the request for deletion of Attachment 41B, refer to comment on Draft Permit Condition III.8.B.c.74.

2. **Condition III.8.B.a.1:** **Key Comment:** Inconsistent with Regulations, Potential for Compliance Issues, Redundant/Nonenforceable

Draft Permit condition as proposed by the Department of Ecology:

Section 2.4, Revise to include the following specific regulatory requirements for releases from solid waste management units; WAC 173-303-806 (4)(a)(xxiii), (xxiv), -645, -646, and 40 CFR 270.14d.

Condition Impact Statement: This condition as drafted would impose requirements that are redundant to and/or inconsistent with provisions already in the Hanford Facility Resource Conservation and Recovery Act Permit, Dangerous Waste Portion.

Requested Action: Delete this condition. Alternatively, modify the condition to read as follows:

"Any releases from Solid Waste Management Units within the boundaries of the CWC TSD unit shall be documented for evaluation in accordance with WAC 173-303-646(2) and the Hanford Federal Facility Agreement and Consent Order."

Comment Justification: WAC 173-303-806(4)(a) states "Part B of the permit application consists of the general information requirements of this subsection, and the specific information requirements in (b) through (h) of this subsection as applicable to the facility...These information requirements are necessary in order for the department to determine compliance with WAC 173-303-600 through 173-303-670." The Department of Ecology developed the initial Hanford Facility Resource Conservation and Recovery Act Permit, Dangerous Waste Portion, with the specific intent of eliminating redundancy regarding modifications to incorporate new treatment, storage, and/or disposal units into the permit. In accordance with that intent, many aspects of the permit application process already have been addressed thoroughly and already are covered adequately in the permit. Corrective action process adequately is covered in the permit such that any release from CWC already would be addressed properly in accordance with the permit and Hanford Federal Facility Agreement and Consent Order. The Department of Ecology should verify that WAC 173-303-806(4)(a)(xxiii) and (xxiv) already has been addressed and incorporated into the Hanford Facility Resource Conservation and Recovery Act Permit, Hazardous and Solid Waste Amendments Portion. Any efforts to amend the existing corrective action program should be addressed in accordance with the Hanford Facility Resource Conservation and Recovery Act Permit, Dangerous Waste Portion, Part IV - Corrective Actions for Past Practices and must be consistent with the Hanford Federal Facility Agreement and Consent Order. The CWC is a container management unit for which no releases to the environment currently exist. Consequently, there are currently no solid waste management units identified for corrective action within the boundaries of the CWC. The criteria for permitting CWC as a container management unit have been met by submittal of information required by WAC 173-303-806(4)(b). The criteria for general and corrective action conditions have been met by the past submittal of information required by WAC 173-303-806(4)(a).

WAC 173-303-645(1)(a)(ii) states that "all solid waste management units must comply with the requirements of WAC 173-303-646(2)." The Hanford Facility Resource Conservation and Recovery Act Permit, Hazardous and Solid Waste Amendments Portion contains requirements for releases from solid waste management units. Additionally, the Hanford Federal Facility Agreement and Consent Order Action Plan, Section 7.4, addresses implementation of corrective action on the Hanford Facility. Schedules to implement corrective action for solid waste management units also are maintained in the Hanford Federal Facility Agreement and Consent Order. The information required by the Hanford Facility Resource Conservation and Recovery Act Permit, Dangerous Waste Portion, Condition II.I.1., is maintained in *Hanford Facility Dangerous Waste Permit Application, General Information Portion*, DOE/RL-91-28, Appendix 2D. Also, information is maintained in waste information data system that satisfies the Hanford Facility Resource Conservation and Recovery Act Permit, Hazardous and Solid

CONDITION/COMMENT/JUSTIFICATION

Waste Amendments Portion, Condition III.f., regarding identification of new solid waste management units. A document is issued every January (*Hanford Site Waste Management Units Report*, DOE/RL-88-30) that identifies new solid waste management units. As stated in the Foreword of the CWC Part B permit application, duplication of information is not necessary; therefore, this condition is not necessary. Reference to 40 Code of Federal Regulations, Part 270.14(d) is inappropriate because the Department of Ecology has received corrective action authority. Therefore, it is superseded by WAC 173-303-806(4)(a)(xxiii), which applies in lieu of 40 Code of Federal Regulations, Part 270.14(d). In addition, this condition has been drafted against a portion of the permit application previously identified as nonenforceable. Refer to related comment on Draft Permit Condition III.8.A.

3. **Condition III.8.B.b.4.**

Key Comment: Lack of Regulatory Authority, Potential for Compliance Issues, Hinders Cost-Effectiveness

Draft Permit condition as proposed by the Department of Ecology:

Delete lines 19 through 21 on page 3-1.

Condition Impact Statement: This condition would impose limitations that exceed the regulatory authority delegated to the Department of Ecology by Revised Code of Washington 70.105.

Requested Action: Delete this condition.

Comment Justification: Comment Justification: WAC 173-303-071(3)(k) specifically excludes "PCB wastes whose disposal is regulated by EPA under 40 CFR 761.60...". Depending on the specific polychlorinated biphenyls waste, Toxic Substances Control Act regulations for polychlorinated biphenyl treatment may be self-implementing. There is no regulatory basis for attempting to regulate such waste (or the excluded polychlorinated biphenyl component of dangerous and/or mixed waste) through the *Dangerous Waste Regulations*, except as provided for certain polychlorinated biphenyl waste that is not managed pursuant to the Toxic Substances Control Act as specified in WAC 173-303-071(3)(k).

On August 22, 1988, the Attorney General of Washington provided explicit clarification regarding the inappropriateness of attempting to regulate excluded PCBs through the *Dangerous Waste Regulations* (refer to the Department of Ecology's Institutional Memory Compendium, memo 3145.880822). In that memo, Assistant Attorney General Jeffrey S. Myers provided Jon Neel, Enforcement Officer with information indicating that the WAC 173-303-071(3)(k) exclusion "covers all requirements of ch. 173-303 WAC...". Regarding regulation of excluded polychlorinated biphenyls, Mr. Myers indicated that "the law does not adequately support Ecology's position" and further stated "[I]n attempting to regulate such wastes..., Ecology is limited in its authority by RCW 70.105.105."

4. **Condition III.8.B.b.5.**

Key Comment: Inconsistent with Regulations, Redundant/Nonenforceable

Draft Permit condition as proposed by the Department of Ecology:

The Permittees shall prepare an attachment to the WAP which describes the waste tracking procedures as specified in lines 28 and 29 on page 3-1. This text shall be submitted to the Department for review and approval within 30 days of issuance of this Permit. Upon approval by the Department, the description will be added to the text of Section 1.1.1. of the Waste Analysis Plan (WAP), also identified as Appendix 3A, as a Class 1 modification. If necessary, the Department will amend the requirements through a Class 2 or 3 modification.

Condition Impact Statement: This condition as drafted would incorporate waste tracking descriptions into the waste analysis plan instead of into Chapter 3.0 of the CWC permit application.

Requested Action: Rewrite this condition and relocate to Chapter 3.0 to read as follows:

On page 3-2, line 8, insert the following text: "Information for all containers received at and shipped from CWC will be maintained consistent with WAC 173-303-380(1)(a) and (b) in an inventory recordkeeping/waste tracking system."

CONDITION/COMMENT/JUSTIFICATION

Comment Justification: Waste tracking requirements of WAC 173-303-380(1) and (2) can be met by incorporating suggested text from the requested action for this condition. The Permittees submitted information in the CWC permit application stating that the waste analysis plan contains waste tracking and recordkeeping procedures. On reconsideration, the Permittees believe that this information is outside the scope of, and therefore inappropriate for inclusion in, the waste analysis plan. The Permittees recommend that any condition pertaining to waste tracking be incorporated into Chapter 3.0 instead of Appendix 3A. In addition, the original permit condition referenced the wrong page and line number.

The permit conditions in this modification *will not become effective until 30 days after issuance*. Hence, requiring submittals based on the issuance date would impose permit conditions before the effective date of the Permit.

5. **Condition III.8.B.c.2.** **Key Comment:** Potential for Compliance Issues

Draft Permit condition as proposed by the Department of Ecology:

Delete lines 14 through 18 on page 1-3, and replace with text to read as follows: Verification. Verification activities include container receipt inspection, physical screening, and chemical screening. All waste shipments and containers are subject to receipt inspection during the waste shipment acceptance process. In addition, a percentage of waste containers and shipments are selected for physical screening. Containers are opened and inspected visually or verified by NDE, NDA, or dose rate profile. Of those containers subjected to physical screening, a percentage are required to be sampled for field or laboratory analysis. All information and data are evaluated to confirm that the waste matches the waste profile and container data/information supplied by the generator. Any . . ."

Condition Impact Statement: This condition as drafted could be misinterpreted to require that all containers must be subjected to physical and chemical screening.

Requested Action: Modify this condition to clarify that not all waste shipments and containers are subject to physical and chemical screening. Suggest changing the first sentence of the condition to read as follows:

"Verification activities include container receipt inspection and *also could include* physical and chemical screening."

Comment Justification: The Permittees believe that not all shipments and containers should be subjected to physical and chemical screening and request that the Department of Ecology clarify its intent.

6. **Condition III.8.B.c.4.** **Key Comment:** Inconsistent with Regulations, Hinders Cost-Effectiveness

Draft Permit condition as proposed by the Department of Ecology:

Delete lines 42 through 47 on page 1-3 and lines 1 through 7 on page 1-4 and replace with the following text: "conformance reports are used to complete an evaluation of the generator and to adjust the physical screening rate as indicated. At a minimum, an evaluation according to the following criteria shall be performed and the indicated scores shall be assigned based upon severity and justification:

6. Designation conformance issues

- Regulatory violation, 7 – 10
- Mismanagement of waste (e.g., conditions which would or did lead to placement of waste in the wrong storage location, the wrong treatment path, etc.), 4 – 6
- No mismanagement of waste, 1 – 3

7. Characterization conformance issues

- Safety issue, 7 – 10
- Mismanagement of waste (see above), 4 – 6

CONDITION/COMMENT/JUSTIFICATION

- No mismanagement of waste, 1 – 3
- 8. Paperwork inconsistencies
 - LDR form, 1 – 3
 - Shipping papers or waste tracking forms, 1 – 3
 - Waste profile discrepancies, 1 – 3
 - Incomplete shipment and/or transfer information, 1 – 3
- 9. Screening conformance issues
 - Regulatory violation and/or safety issue, 7 – 10
 - Mismanagement of waste (see above), 4 – 6
 - No mismanagement of waste, 1 – 3
- 10. Receipt conformance issues
 - Regulatory violation and/or safety issue, 7 – 10
 - Mismanagement of waste, 4 – 6
 - No mismanagement of waste, 1 – 3

A generator receiving a score of ten (10) or greater has demonstrated less than satisfactory performance and must be evaluated for corrective action by the CWC operating organization. The physical screening rate is increased for that generator based upon the following criteria:

- A score of 10 to 15 – the physical screening frequency is increased to a minimum of 15%.
- A score of 16 to 20 – the physical screening frequency is increased to a minimum of 50%.
- A score greater than 20 – the physical screening frequency is increased to 100%.

Condition Impact Statement: This condition would specify a level of detail for adjusting physical screening rates that is unnecessary and in excess of established regulatory requirements of WAC 173-303-300.

Requested Action: Rewrite the condition to read as follows:

Delete lines 45 through 47 on page 1-3; and lines 1 through 7 on page 1-4 beginning with "These conformance issues..." and replace with the following text: "The CWC operating organization will: (1) perform monthly evaluations based on deficiencies and conformance issues identified, (2) evaluate unsatisfactory performance for corrective actions, and (3) adjust physical screening rates accordingly."

Comment Justification: WAC 173-303-300(6) requires owners/operators to "specify the procedures which will be used to inspect and, if necessary, analyze each movement of hazardous waste received at the facility to ensure that it matches the identity of the waste designated on the accompanying manifest or shipping paper." The condition as drafted would incorporate actual procedures used into the permit instead of specifying such procedures as required by regulation.

The Permittees recommend incorporation of the suggested text to replace the information originally provided in Section 1.1.1.3.2, page 1-3, lines 42 through 48; and page 1-4, lines 1 through 7. The suggested text provides for a condition that reflects an appropriate level of control regarding conformance reports.

7. **Condition III.8.B.c.5.** **Key Comment:** Lack of Regulatory Authority, Potential for Compliance Issues, Hinders Cost-Effectiveness

Draft Permit condition as proposed by the Department of Ecology:

Paperwork inconsistencies or improperly completed and/or incorrect information must be corrected and resolved

CONDITION/COMMENT/JUSTIFICATION

prior to acceptance of waste for management at this TSD unit.

Condition Impact Statement: This condition would require resolution of discrepancies to be handled in a manner that exceeds regulatory authority provided by WAC 173-303-370(4) and (5).

Requested Action: Delete this condition.

Comment Justification: WAC 173-303-370 does not deny owners/operators the opportunity to resolve paperwork inconsistencies associated with waste transfers in a reasonable manner. WAC 173-303-370(4)(b) states that "upon discovering a significant discrepancy, the owner or operator must attempt to reconcile the discrepancy with the waste generator or transporter". WAC 173-303-370(4) only applies to manifested waste.. WAC 173-303-370(5) provides reasons why owners/operators "may decide that a dangerous shipment should not be accepted by his facility." This condition as drafted would impose requirements intended for off-site shipments to onsite transfers without regulatory authority. This condition as drafted also would be inconsistent with WAC 173-303-370(4) and (5) for receipt of waste from offsite by denying the owner/operator the ability to decide whether or not a shipment should be accepted. The Permittees require flexibility intended by regulation to resolve paperwork discrepancies. In some situations, to deny acceptance of waste might present a hazard to human health and the environment.

8. **Condition III.8.B.c.6.** **Key Comment:** Potential for Compliance Issues

Draft Permit condition as proposed by the Department of Ecology:

Approved waste profiles and all supporting documentation from the initial submission through all re-evaluations must be retained in the TSD unit operating record as required by Condition II.I.1. for waste managed, i.e., stored and/or treated, at this TSD unit.

Condition Impact Statement: This condition as drafted is ambiguous regarding what "supporting documentation" needs to be retained in the operating record for compliance with this condition.

Requested Action: Rewrite the condition as follows: "Approved waste profiles will be retained in the Operating Record in accordance with Condition II.I.1 and will be made available to the Department of Ecology upon request."

Comment Justification: WAC 173-303-380(1)(c) requires retention of "records and results of waste analyses...required by WAC 173-303-300...and by 40 CFR...268.4(a), and 268.7." Hanford Facility Resource Conservation and Recovery Act Permit, Dangerous Waste Portion, Condition II.I.1.b. requires retention of "records and results of waste analyses required by WAC 173-303-300." There are no requirements in WAC 173-303 or the Hanford Facility Resource Conservation and Recovery Act Permit, Dangerous Waste Portion to retain "supporting documentation". The requested alternative text more accurately reflects the requirements of WAC 173-303 and the Hanford Facility Resource Conservation and Recovery Act Permit, Dangerous Waste Portion.

9. **Condition III.8.B.c.7.** **Key Comment:** Lack of Regulatory Authority, Hinders Cost-Effectiveness

Draft Permit condition as proposed by the Department of Ecology:

Within 30 days of the issuance of this Permit, the Permittees are required to submit, to the Department for review and approval, text describing all constraints which apply to the acceptance of waste at this TSD unit for any purpose, including physical examination and temporary storage in any portion of the building or within the boundaries of the TSD unit. Upon approval by the Department, the description will be added to the text of Section.1.1.3 of the WAP as a Class 1 modification. If necessary, the Department will amend the requirements through a Class 2 or 3 modification.

Condition Impact Statement: This condition would place restrictions on waste acceptance at CWC that exceed WAC 173-303-300 requirements by incorporating all internally-imposed restrictions (including restrictions associated with the radioactive component of mixed waste) into the waste analysis plan as enforceable

CONDITION/COMMENT/JUSTIFICATION

requirements.

Requested Action: Delete this condition. Alternatively, replace this condition with the following text:

"Dangerous and/or mixed waste with waste numbers not identified on the CWC Part A, Form 3, will not be managed at CWC. Additionally, waste for which CWC is unable to obtain the information required by WAC 173-303-300 will not be managed in CWC."

Comment Justification: The requirements for waste analysis are provided in WAC 173-303-300. The written waste analysis plan must describe procedures used to comply with -300(1) through (3) that pertain to confirmation about waste through analysis. This condition as drafted would incorporate waste acceptance criteria related to the radioactive component of mixed waste into the permit without regulatory authority. The U.S. Department of Energy must retain jurisdiction over the source, special nuclear, and byproduct material components of mixed waste in accordance with the Atomic Energy Act. This condition as drafted also would incorporate other internal waste acceptance criteria into the permit without regulatory authority. In summary:

- This condition seeks to expand the scope of the waste analysis plan by including text regarding waste acceptance parameters, *including all constraints on waste receipt for any purpose*
- Many constraints on waste acceptance are unrelated to results of waste analysis and therefore are beyond the scope of a waste analysis plan (e.g., constraints associated with CWC acceptance of mixed waste based on the radioactive component)
- There is no regulatory basis for attempting to incorporate such internal constraints into a plan that is, by regulation, intended for identification of parameters, methods, and frequency of analysis for the purpose of ensuring proper management of dangerous and/or mixed waste
- The Permittees need to retain flexibility that allows for safe and cost-effective modification of waste acceptance criteria as allowed by regulation, without unnecessary time and cost impacts associated with excessive permit conditions.

The inappropriateness of any state effort to unilaterally assert authority over radioactive materials is dictated by the exclusion of source, special nuclear, and byproduct materials from the definition of solid waste set forth at Resource Conservation and Recovery Act 1004; the overriding and preemptive Atomic Energy Act; Resource Conservation and Recovery Act 1006(a) (the inconsistency provision); U.S. Department of Energy's Byproduct Rule (10 Code of Federal Regulation 962); the U.S. Environmental Protection Agency Notice Regarding State Authorization (51 Federal Register 24504, July 3, 1986); the U.S. Environmental Protection Agency Notice on Clarification of Interim Status Qualification Requirements for the Hazardous Components of Radioactive Mixed Waste (53 Federal Register 37045, September 23, 1988); the Washington State's recognition of possible preemption in its Hazardous Waste Management Act, Revised Code of Washington 70.105.109; the limitations of the waiver of sovereign immunity in Section 6001 of Resource Conservation and Recovery Act to materials within the Resource Conservation and Recovery Act definition of solid waste (thereby excluding source, special nuclear, and byproduct materials); and the Hanford Federal Facility Agreement and Consent Order.

The permit conditions in this modification *will not become effective until 30 days after issuance*. Hence, requiring submittals based on the issuance date would impose permit conditions before the effective date of the Permit.

CONDITION/COMMENT/JUSTIFICATION

10. **Condition III.8.B.c.8.**

Key Comment: Potential for Compliance Issues

Draft Permit condition as proposed by the Department of Ecology:

Insert the following text at line 39 on page 1-4: "1.1.1.3.4 Process for Reducing the

Physical Screening Frequency. After the initial screening frequency has been established for a generator or that frequency has been adjusted due to poor performance, the physical screening frequency can be reduced in accordance with the following:

- The physical screening frequency will be stepped down in three steps based upon the ability of the generator to implement the corrective action plan and/or demonstrate an ability to appropriately manage waste. At no time shall the physical screening frequency be reduced below 5% for onsite generators or below 10% for offsite generators.
 - Step 1) Reduce frequency by 66% the first month.
 - Step 2) Reduce frequency established in Step 1 by 50% or to the minimum allowable, whichever results in a greater frequency.
 - Step 3) Reduce frequency to the minimum allowable.
- The reduction will be determined during the monthly evaluation process; however, the following minimum criteria must be met prior to reduction of the frequency:
 - (1) Five (5) containers from the waste stream in question (defined by a single waste profile) must pass verification, and
 - (2) The TSD unit must document an acceptable evaluation of the corrective action plan or that the generator's new waste management program has been implemented and is effective.

If the screening frequency was increased based upon conformance issues at the time of waste receipt, the corrective action plan must be fully implemented before the generator may return to the minimum physical screening frequency. However, waste streams from the same generator, which did not have conformance issues upon receipt at this TSD unit, may return to the minimum verification frequency if the TSD unit operating organization determines that the specific conformance issue is unlikely to affect the generator's other waste streams."

Condition Impact Statement: This condition as drafted is difficult to understand and is ambiguous regarding key aspects of the methodology for reduction in screening frequency.

Requested Action: Rewrite the condition to read as follows:

Insert the following text at line 32 on page 1-5: "1.1.1.3.4 Process for Reducing the Physical Screening Frequency. Screening rate frequencies and changes to those frequencies could be applied to a specific waste stream, to a specific contractor, or to a specific offsite generator based on the circumstances surrounding the conformance issue. After the initial screening frequency for a given waste stream has been established or increased, the physical screening frequency can be reduced in accordance with the following.

The physical screening frequency will be reduced in three steps: Reduction for all steps is based on the ability to demonstrate that five containers from the waste stream in question pass verification. In addition, reduction to the minimum frequency requires that the CWC operating organization document an acceptable evaluation of the corrective action plan, and the corrective action plan is fully implemented. At no time will the physical screening frequency be reduced below 5 percent for waste generated onsite or below 10 percent for offsite generators.

- Step 1. Reduce frequency by 66 percent after five containers from the waste stream in question pass verification.

CONDITION/COMMENT/JUSTIFICATION

- Step 2. Reduce frequency established in Step 1 by 50 percent or to the minimum allowable, whichever results in a greater frequency after five containers from the waste stream in question pass verification.
- Step 3. Reduce frequency to the minimum allowable after five containers from the waste stream in question pass verification. The CWC operating organization documents an acceptable evaluation of the corrective action plan, and the corrective action plan is fully implemented.

The screening rate reduction will be established during periodic performance evaluation system team meetings."

In addition, delete the text in the CWC permit application contained in Appendix 3A, page 1-4, lines 35-38.

Comment Justification: The Permittees discovered that the text regarding the methodology for reduction in verification rates inadvertently was omitted from the CWC permit application. Subsequent efforts to provide appropriate information regarding reduction in verification rates have resulted in the development of a condition that is ambiguous regarding key aspects of the reduction methodology. The suggested text provides for a condition that accurately reflects the existing verification program. Therefore, the Permittees recommend incorporation of the suggested text to replace the information originally provided as Section 1.1.1.3.4. The Permittees also recommend deletion of related text contained in Appendix 3A, on page 1-4, lines 35-38.

11. **Condition III.8.B.c.9.**

Key Comment: Lack of Regulatory Authority, Hinders Cost-Effectiveness

Draft Permit condition as proposed by the Department of Ecology:

The following waste types are added in lines 19 through 23 on page 1-5 to the list of wastes prohibited from management at this TSD unit: (1) Bulk solids in trucks or roll-off boxes.

Condition Impact Statement: This condition arbitrarily would limit methods of transporting or transferring waste to WRAP that could be safely transported in accordance with WAC 173-303-190 and -240 and properly managed in accordance with WAC 173-303-630.

Requested Action: Delete this condition. Alternatively, reword the condition as follows: "The following waste type is added to the list of waste prohibited from management at CWC: • Bulk solids in trucks"

Comment Justification: WAC 173-303-190(1) states that "the generator must package all dangerous waste for transport in accordance with United States DOT regulations on packaging, 49 CFR Parts 173, 178, and 179". WAC 173-303-240 (2) states that "any person who transports a dangerous waste must comply with the requirements of WAC 173-303-240 through 173-303-270, when such dangerous waste is required to be manifested by WAC 173-303-180". WAC 173-303-240(4) states that "these requirements do not apply to on-site (as defined in WAC 173-303-040) transportation of dangerous waste by generators, or by owners/operators of permitted TSD facilities". These requirements allow for transport of offsite shipments if the containers meet U.S. Department of Transportation regulations. These requirements exempt onsite transport activities from regulatory control. WAC 173-303-630 does not impose any requirements regarding transport of waste to treatment, storage, and/or disposal units.

This condition as drafted would prohibit acceptance of roll-off boxes at CWC without regulatory basis. Flexibility must be retained to allow CWC to manage waste in a safe and cost-effective manner without unnecessary restrictions.

12. **Condition III.8.B.c.11.**

Key Comment: Lack of Regulatory Authority, Potential for Compliance Issues, Hinders Cost-Effectiveness

Draft Permit condition as proposed by the Department of Ecology:

Toxic Substances Control Act- (TSCA-) regulated waste may not be treated at this TSD unit until such time that a TSCA Permit is obtained for treatment.

CONDITION/COMMENT/JUSTIFICATION

Condition Impact Statement: This condition would impose limitations that exceed the regulatory authority delegated to the Department of Ecology by Revised Code of Washington 70.105.

Requested Action: Delete this condition.

Comment Justification: WAC 173-303-071(3)(k) specifically excludes "PCB wastes whose disposal is regulated by EPA under 40 CFR 761.60..." Depending on the specific polychlorinated biphenyls waste, Toxic Substances Control Act regulations for polychlorinated biphenyl treatment may be self-implementing. There is no regulatory basis for attempting to regulate such waste (or the excluded polychlorinated biphenyl component of dangerous and/or mixed waste) through the *Dangerous Waste Regulations*, except as provided for certain polychlorinated biphenyl waste that is not managed pursuant to the Toxic Substances Control Act as specified in WAC 173-303-071(3)(k).

On August 22, 1988, the Attorney General of Washington provided explicit clarification regarding the inappropriateness of attempting to regulate excluded PCBs through the *Dangerous Waste Regulations* (refer to the Department of Ecology's Institutional Memory Compendium, memo 3145.880822). In that memo, Assistant Attorney General Jeffrey S. Myers provided Jon Neel, Enforcement Officer with information indicating that the WAC 173-303-071(3)(k) exclusion "covers all requirements of ch. 173-303 WAC...". Regarding regulation of excluded polychlorinated biphenyls, Mr. Myers indicated that "the law does not adequately support Ecology's position" and further stated "[I]n attempting to regulate such wastes..., Ecology is limited in its authority by RCW 70.105.105."

13. **Condition III.8.B.c.12.**

Key Comment: Inconsistent with Regulations

Draft Permit condition as proposed by the Department of Ecology:

Delete the text on page 1-6, line 1 through 35, and replace it with the following: "For waste that cannot be stored and treated in accordance with the requirements of this WAP (waste analysis plan), an alternative waste management plan (AWMP) may be submitted to the Department for review. Because the activities necessary to support such waste management may not be predictable, some flexibility in the timeframe for submitting, reviewing, and completing the AWMP may be necessary. The following schedule will be observed unless the Department and USDOE agree to an alternate schedule.

- Submit the AWMP to the Ecology Project Manager who is responsible for the TSD unit with a copy to the Hanford Facility RCRA Permit Coordinator at least 120 days before the project is expected to begin. The cover letter would summarize the nature of the request and state that "no reply within 35 working days constitutes approval."
- The Ecology Project Manager specified above reviews and provides comments within 35 working days after receiving the AWMP. At this time, the Department may request a longer comment period or receipt of additional information.
- Upon receipt of the comments by the Permittees, resolution of comments and issues would occur during project manager meetings or other meetings agreed to by the Permittees and the Department.
- For any additional information requested by the Department and for any resubmittal of a revised AWMP following resolution of the Department's comments, the same review timeframes are applicable.
- A final AWMP will be submitted to the Department for approval.
- If no comments are received from the Department within 35 working days after the original or final AWMP submittal, then the plan shall be approved.
- All submittals, including the Department's comments with resolution, shall be placed in the TSD unit operating record. If approval has been made by default, the Permittees shall provide a memo to the operating record so stating.
- The Department has final authority to approve or deny the AWMP."

CONDITION/COMMENT/JUSTIFICATION

Condition Impact Statement: This condition would establish an inappropriate approach for determining proper storage and disposal options for situations not covered by the permit.

Requested Action: Delete this condition and Section 1.2.1 of the waste analysis plan.

Comment Justification: WAC 173-303-300(2) states that "the owner or operator must obtain a detailed chemical, physical, and/or biological analysis of a dangerous waste...before he stores, treats or disposes of it." There is nothing in WAC 173-303-300(2) that prohibits the receipt of waste at a unit by incorporating internal constraints into a permit. WAC 173-303-300 is not intended for addressing treatment and storage options. This condition as drafted would establish protocols for *treating and storing* waste through the waste analysis plan. This condition would be inconsistent with WAC 173-303-300 and the Hanford Federal Facility Agreement and Consent Order.

Section 1.2.1 of the waste analysis plan discusses alternative storage and treatment options for newly encountered situations. The activities discussed are outside the scope of the WAC 173-303-300. Section 1.2.1 was intended to provide information concerning how CWC would manage waste when unpredictable situations are encountered. Upon reconsideration, the Permittees believe that such situations would have to be addressed through other regulations (e.g., WAC 173-303-804, -646, or -830, depending on the specific scenario) and would have to be consistent with the Hanford Federal Facility Agreement and Consent Order. The Permittees request that the Department of Ecology allow for such scenarios to be managed pursuant to the appropriate provisions of WAC 173-303 and the Hanford Federal Facility Agreement and Consent Order and therefore not incorporate Section 1.2.1 within the waste analysis plan as a permit condition.

14. **Condition III.8.B.c.16.**

Key Comment: Redundant/Nonenforceable

Draft Permit condition as proposed by the Department of Ecology:

The text on page 2-3, lines 12 through 36, shall be deleted and replaced with text that is adequate to describe how containers are chosen for physical and chemical screening. Within 30 days of issuance of this Permit, a description of this procedure must be submitted to the Department for review and approval; subsequent to any revisions required by the Department, the description will be added to the text of Section 2.1.2 of this WAP as a Class 1 modification. If necessary, the Department will amend the requirements through a Class 2 or 3 modification.

Condition Impact Statement: This condition would require submittal of information that already has been provided to the Department of Ecology.

Requested Action: Delete this condition.

Comment Justification: There is no need for this condition. Draft Permit Condition III.8.A incorporates Attachment 41A of the Hanford Facility Resource Conservation and Recovery Act Permit, Dangerous Waste Portion as enforceable. Attachment 41A is a logic flow diagram of the "Waste Acceptance Process". The Permittees believe that Attachment 41A provides the appropriate level of detail regarding the verification program and the selection of containers. Additional text regarding how containers are chosen for physical and chemical screening is unnecessary because the requested description already is provided through Attachment 41A. The text originally submitted in the CWC permit application is consistent with Attachment 41A and is sufficient for screening selection.

The permit conditions in this modification *will not become effective until 30 days after issuance*. Hence, requiring submittals based on the issuance date would impose permit conditions before the effective date of the Permit.

15. **Condition III.8.B.c.17.**

Key Comment: Lack of Regulatory Authority, Potential for Compliance Issues, Hinders Cost-Effectiveness

Draft Permit condition as proposed by the Department of Ecology:

Delete lines 7 through 10 on page 2-4, and replace with: "When the available information does not qualify as acceptable knowledge or is not sufficient to characterize a waste for management, the sampling and testing

CONDITION/COMMENT/JUSTIFICATION

methods outlined in WAC 173-303-110 must be used by the generator to determine whether a waste designates as ignitable, corrosive, reactive, and/or toxic and whether the waste contains free liquids. If the analysis is performed to complete characterization after acceptance of the waste by the TSD unit, then this Permit governs the sampling and testing requirements."

Condition Impact Statement: This condition would contradict the exemption from permitting at WAC 173-303-600(3)(d), which allows generator activities to occur under self-implementing provisions.

Requested Action: Delete this condition.

Comment Justification: WAC 173-303-600(3)(d) provides that "final facility standards do not apply to: ...a generator accumulating waste on-site in accordance with WAC 173-303-200." There is no basis for imposing sampling and analysis permit conditions on generator activities.

The text in the waste analysis plan on page 2-4, lines 7-10 is a proper description regarding the use of acceptable knowledge for characterization and is consistent with Section 1.5 of the U.S. Environmental Protection Agency's Office of Solid Waste Emergency Response 9938.4-03, dated April 1994, entitled, "*Waste Analysis at Facilities that Generate, Treat, Store, and Dispose of Hazardous Wastes*." WAC 173-303-110(1) "sets forth the testing methods to be used to comply with the requirements of this chapter". WAC 173-303-070(3)(c) states "for the purpose of determining if a solid waste is a dangerous waste...a person must either: (i) Test the waste according to the methods, or an approved equivalent method, set forth in WAC 173-303-110; or (ii) Apply knowledge of the waste in light of the materials or the process used, when: (A) Such knowledge can be demonstrated to be sufficient for determining whether or not it designated and/or designated properly; and (B) All data and records supporting this determination in accordance with WAC 173-303-210(3) are retained on-site". WAC 173-303-110 applies in situations where WAC 173-303 specifically calls for testing. WAC 173-303-070(3)(c) allows generators to use knowledge to designate. The Permittees intend to use methods of WAC 173-303-110 for treatment, storage, and/or disposal confirmation of knowledge when available information does not constitute acceptable knowledge. WAC 173-303-070(3)(c) clearly provides regulatory flexibility for generators in designating waste. It is inappropriate to preclude such flexibility by attempting to regulate generator activities through permit conditions.

16. **Condition III.8.B.c.19.** **Key Comment:** Potential for Compliance Issues

Draft Permit condition as proposed by the Department of Ecology:

Delete lines 34 through 38 on page 2-4, beginning with the following text: "During waste retrieval . . ." Replace it with: "The following waste knowledge exceptions apply to waste accepted for management at the CWC TSD unit:

- Hazardous debris as defined in WAC 173-303-040 that is managed in accordance with 40 CFR 268.45 (the "Debris Rule") is not required to be sampled. Management of debris in this manner is not dependent on the quantification of constituents to be federal and State-only LDR regulations.
- Wastes generated on-site may be shipped to the CWC TSD unit provided the waste has been characterized for storage and a representative sample has been taken to characterize the waste for treatment and/or disposal.
- Waste that was previously disposed and then retrieved may be transferred to the CWC TSD unit with only the necessary information to properly manage the waste at the storage unit.
- Waste received prior to the implementation of this guidance and has been characterized for storage only may be transferred between CWC and permitted storage units without re-characterization; however, the pre-shipment review and verification requirements must be met.
- On-site generators may ship waste (that cannot be sampled by the generator) to the CWC TSD unit for completion of characterization provided that the waste is characterized for storage."

CONDITION/COMMENT/JUSTIFICATION

Condition Impact Statement: This condition, as written, is ambiguous and fails to convey its intent.

Requested Action: Rewrite the condition to read as follows:

Delete lines 34 through 38 on page 2-4, beginning with the following text: "During waste retrieval, " Replace with: "In some situations, full characterization of waste for cradle-to-grave management is not possible or feasible before receipt at CWC for storage. For storage purposes, waste analysis requirements could be met through application of acceptable knowledge when such knowledge provides sufficient information to ensure that waste will be stored properly. Acceptable knowledge could be used to accommodate storage at CWC for the following.

- Waste previously disposed before the effective date of the regulation that has been or will be retrieved for storage at CWC, and for which adequate information has been obtained to ensure proper storage at CWC.
- Waste placed in storage before the effective date of this permit for which adequate information has been obtained to ensure proper storage at CWC.
- Newly-generated waste for which adequate information has been obtained to ensure proper storage at CWC.

For situations in which acceptable knowledge has been used to accommodate storage, such information will be supplemented as necessary before treatment and/or disposal of the waste."

Comment Justification: WAC 173-303-300 contains adequate requirements for waste analysis. Specifically, WAC 173-303-300(2) states:

"The owner or operator must obtain a detailed chemical, physical, and/or biological analysis of a dangerous waste...before he stores, treats, or disposes of it. This analysis must contain the information necessary to manage the waste in accordance with the requirements of this chapter 173-303 WAC. The analysis may include or consist of existing published or documented data on the dangerous waste, or on waste generated from similar processes, or data obtained by testing, *if necessary*."

The Permittees believe WAC 173-303-300(2) is intended to require the following.

- Detailed analyses are required before treating, storing, or disposing of waste.
- These analyses must be sufficient to manage the waste in accordance with WAC 173-303.
- Analyses required for treatment or disposal typically are more extensive than analyses for storage.
- Although ideal, analyses do not *necessarily* have to be obtained through direct testing of the waste being analyzed.

Direct testing before storage in CWC might not be appropriate for some waste. The U.S. Environmental Protection Agency provides guidance regarding the use of acceptable knowledge for waste managed at treatment, storage, and/or disposal facilities in Section 1.5 of Office of Solid Waste Emergency Response 9938.4-03, dated April 1994, entitled, "*Waste Analysis at Facilities that Generate, Treat, Store, and Dispose of Hazardous Wastes*." Specifically, one situation identified by the U.S. Environmental Protection Agency in which it might be appropriate to apply acceptable knowledge is when "health and safety risks to personnel would not justify sampling and analysis (e.g., mixed waste)." Waste that sufficient information exists to ensure safe storage should not be subject to testing before such storage. Testing for such waste subsequently will be performed to ensure proper treatment and/or disposal as appropriate in accordance with the land disposal restrictions of WAC 173-303-140 and treatment unit waste acceptance criteria. The Permittees must retain the flexibility to obtain treatment and disposal information on a schedule that allows for safe and efficient management of mixed waste.

CONDITION/COMMENT/JUSTIFICATION

17. Condition III.8.B.c.20.

Key Comment: Lack of Regulatory Authority, Inconsistent with Regulations, Potential for Compliance Issues, Hinders Cost-Effectiveness

Draft Permit condition as proposed by the Department of Ecology:

Delete the text on page 2-5, lines 33 through 37 (Section 2.2.1) and replace it with the following: "... 100 percent of each shipment (including onsite transfers) are inspected at the TSD unit for possible damage or leaks, complete labeling, intact tamper seals (if waste has been subjected to physical or chemical screening at another location), and piece count. This is to ensure that the shipment: (1) is received in good condition, (2) is the waste indicated on the manifest or shipping papers, (3) has not been opened after physical and/or chemical screening was performed, and (4) is complete. Any issue resolution, including correction of document discrepancies, re-labeling, overpacking of leaking or deteriorated drums, must occur before verification activities may continue. Documentation of issue resolutions must be maintained in the TSD unit operating record. The container receipt inspection is performed by the WRAP operating organization at WRAP. It must be completed within 24 hours of receipt of the shipment and the shipment must be moved to storage or, if discrepancies exist, into a temporary holding area within the next 24 hours. Action must be taken to overpack any leaking or damaged containers immediately upon discovery. Any paperwork discrepancies for shipments from both offsite and onsite generators must be resolved as required by WAC 173-303-370(4)."

Condition Impact Statement: This condition would exceed regulatory requirements of WAC 173-303-370 for receipt of waste and would increase the scope of WAC 173-303-395(4) for loading and unloading areas.

Requested Action: Replace the condition by retaining the original text in the CWC permit application and amending the text by adding the following text at the end of the paragraph at line 42:

"The CWC operating organization will ensure that the shipment: (1) is received in good condition, (2) is the waste indicated on the manifest or shipping papers, (3) has not been opened improperly after physical and/or chemical screening was performed, and (4) is complete."

Comment Justification: WAC 173-303-370(4) requires that if "the [significant] discrepancy is not resolved within fifteen days after receiving the waste, the owner or operator must immediately submit to the Department a letter describing the discrepancy and attempts to reconcile it, and a copy of the manifest or shipping paper at issue."

WAC 173-303-370(5) states that "the owner or operator may decide that a dangerous shipment should not be accepted by his facility". WAC 173-303-370(5) does not specify when a shipment cannot be accepted, but does give permission to the owner or operator to deny a shipment based on his own discretion regarding discrepancies. By regulation, WAC 173-303-370(5)(a)(ii) allows the owner/operator to determine whether or not significant discrepancies between waste and documentation result in the need for rejecting the shipment.

This condition as drafted would deny the opportunity to resolve paperwork inconsistencies regarding waste transfers in a reasonable manner. WAC 173-303-370 does not require halting verification activities at CWC because of minor paperwork problems. Additionally, there is no basis for extending any requirements of WAC 173-303-370 to receipt of waste from onsite.

This condition as drafted would impose requirements for onsite transfers that are inconsistent with WAC 173-303-370. There are no requirements in WAC 173-303-370 that impose container receipt inspections on onsite transfers as a condition of the permit. Container receipt inspections should be allowed anywhere within the Hanford Facility boundaries as long as proper controls are instituted to ensure no tampering has been done to the shipment.

Additionally, there is no basis for requiring container receipt inspection and movement to permanent or temporary storage within 24 hours of waste arrival at CWC for any waste received. Although efforts are made to perform these functions within 24 hours of arrival, the Permittees believe that it is unreasonable to mandate the time limit as a permit condition subject to enforcement. WAC 173-303-395(4) imposes restrictions on treatment, storage, and/or disposal loading and unloading areas that are protective of human health and the environment.

CONDITION/COMMENT/JUSTIFICATION

WAC 173-303-395(4) imposes requirements to contain/clean spills and prevent release, but does not include 24-hour limits on such areas. Depending on the situation, additional time might be necessary to correct discrepancies or arrange for relocation of waste.

18. **Condition III.8.B.c.21.** **Key Comment:** Inconsistent with Regulations

Draft Permit condition as proposed by the Department of Ecology:

For waste in storage at CWC, the Department recognizes that the generator may hire the WRAP operating organization to treat waste, including sorting and repackaging, and thereby correct discrepancies and problems identified during the CWC waste acceptance process. If correction of these discrepancies and problems are not accomplished within two (2) months of receipt of the waste shipment to CWC, the Permittees shall contact the Department (specifically the Ecology Project Manager) to establish a compliance schedule for treatment of the waste shipment.

Condition Impact Statement: This condition would exceed and expand on the regulatory requirements of WAC 173-303-370, which apply only to waste received from offsite.

Requested Action: Delete this condition.

Comment Justification: WAC 173-303-370 does not contain any requirements that restrict owners/operators from receiving waste that they determine can be taken from offsite at their facilities. The Permittees are committed to resolving significant discrepancies as required by WAC 173-303-370(4). However, there is no regulatory basis for imposing this time limit on all discrepancies identified during waste acceptance. The Permittees do not believe that the "2 months of receipt" time limit is appropriate for resolving discrepancies, provided that the waste is managed properly.

19. **Condition III.8.B.c.22.** **Key Comment:** Inconsistent with Regulations, Potential for Compliance Issues, Hinders Cost-Effectiveness

Draft Permit condition as proposed by the Department of Ecology:

Delete the text on page 2-5, lines 44 through 46 (Section 2.2.2), and replace it with the following: "verification activity. Physical screening by visual inspection or NDE could be performed by the CWC operating organization before the waste is shipped to CWC. In this case, the visual inspection is performed by observation of the generator filling empty containers with waste or examining the contained contents at the location. NDE is performed using mobile equipment which meets the performance requirements identified in this permit. When visual inspection or NDE is performed at a location other than CWC, at least one tamper-resistant seal is applied to each container examined and verified as acceptable, so that the container may not be reopened unless the seal is broken. These seals are the same as custody seals and are subject to the same evidentiary requirements as custody seals. The seals must be placed by the observer/verifier before the container leaves his/her sight on the day the observation occurs. The seal must be uniquely identified and controlled, e.g., signed and dated or uniquely numbered and tracked in a logbook. In addition, the seal must be easily differentiated from tamper-resistant seals used for other purposes. The verification must be documented in the paperwork that accompanies the waste shipment to CWC and that paperwork must be placed in the TSD unit operating record. Also, the transfer documentation must identify whether the container required verification and the result of that verification. As long as the tamper-resistant seal remains intact, those containers of waste may be moved within the Hanford Solid Waste Complex without further physical screening, although container receipt inspections are required for all waste shipments, including transfers. The waste may still be subject to chemical screening."

Condition Impact Statement: This condition as drafted would impose an excessive level of control by stipulating requirements in extensive detail without regulatory basis.

Requested Action: Delete this condition.

CONDITION/COMMENT/JUSTIFICATION

Comment Justification: WAC 173-303-300(5) requires owners/operators to “develop and follow a written waste analysis plan which describes the procedures he will use to comply with the waste analysis requirements...” The text originally submitted in the CWC permit application is consistent with the requirements of WAC 173-303-300 and provides adequate description of physical screening. This condition would delete that text and replace it with excessive detail regarding the physical screening process.

20. **Condition III.8.B.c.25.**

Key Comment: Inconsistent with Regulations

Draft Permit condition as proposed by the Department of Ecology:

Insert “The minimum” at the beginning of the sentence in line 14 on page 2-6 and replace “generating units” in lines 14 and 15 with “generators,” so that the sentence reads as follows: “The minimum physical screening frequency is 5 percent for onsite generators, . . .”

Condition Impact Statement: This condition would imply a definition for the term generator that is inconsistent with the regulatory definition of WAC 173-303-040.

Requested Action: Delete the condition and leave the text as “generating units.” Alternatively, modify the condition to still avoid using the term “generator”, but use the phrase “waste generated onsite” to denote the onsite verification frequency.

Comment Justification: WAC 173-303-040 defines generator as “any person, by site, whose act or process produces dangerous waste or whose act first causes a dangerous waste to become subject to regulation.” WAC 173-303-040 defines person as “any person, firm, association, county, public or municipal or private corporation, agency, or other entity whatsoever.” Based on these definitions and the applicability of WAC 173-303 to the Hanford Facility, the U.S. Department of Energy is the only generator on the Hanford Facility. Therefore, it is inappropriate to incorporate a term into the permit that implies that onsite personnel are separate generators. All contractors that engage in generation activities within the contiguous boundaries on the Hanford Facility under U.S. Environmental Protection Agency/Washington State Identification Number 7890008967 constitute a single generator (i.e., there is only one Form 2 for the Hanford Facility).

21. **Condition III.8.B.c.32.**

Key Comment: Inconsistent with Regulations, Hinders Cost-Effectiveness

Draft Permit condition as proposed by the Department of Ecology:

Delete the text in lines 15 through 17 on page 2-7, that begins with: “The following tests are selected . . .” This text is replaced with the following: “All of the listed screening tests are required to be conducted on all samples collected for chemical screening, unless a technical justification is documented describing the reason for not performing the chemical screening test. The justification may be provided by a procedure, noted in the special instructions to the waste profile at the time of approval, or documented in the verification record, i.e., a logbook notation why a test is not appropriate to the sample or matrix.”

Condition Impact Statement: This condition as drafted would impose an excessive level of control by dictating screening tests and rationales for screening tests in far greater detail than intended by WAC 173-303-300.

Requested Action: Delete this condition. Alternatively, rewrite the condition to replace page 2-7, lines 19 through 38, so the condition reads as follows:

“The following tests are conducted on all samples collected for chemical screening:

- pH
- Peroxide
- Oxidizer
- Water reactivity.

CONDITION/COMMENT/JUSTIFICATION

Additionally, the following screening tests could be performed as needed:

- HOC (chlor-n-oil/water/soil)
- Headspace
- Sulfide
- Cyanide
- Paint filter.

Comment Justification: WAC 173-303-300(5)(a) states "The owner or operator must develop and follow a written waste analysis plan which describes the procedures... and the plan must contain at least: (a) The parameters for which each dangerous waste... will be analyzed, and the rationale for selecting these parameters (i.e., how analysis for these parameters will provide sufficient information on the waste's properties to comply with subsections (1) through (4) of this section)". WAC 173-303-300 contains adequate requirements for waste analysis. This condition would impose requirements that exceed WAC 173-303-300 for chemical screening activities. There is no need to require technical justifications as to why a given chemical screening parameter was not performed on a given sample. In addition, the time and effort to document a technical justification is not cost effective and does not allow management efficiency in chemical screening. The Permittees believe that the language contained in lines 15 through 17 on page 2-7 is appropriate and should remain in the waste analysis plan. The selection of these three parameters (peroxide, oxidizer, and water reactivity) is based on defensible safety principles for all waste.

22. **Condition III.8.B.c.41.**

Key Comment: Hinders Cost-Effectiveness,
Redundant/Nonenforceable

Draft Permit condition as proposed by the Department of Ecology:

Add the following paragraph describing quality assurance to Section 2.2.5: "All confirmation activities shall be governed by TSD unit-specific governing documentation and performed in a consistent manner. Confirmation records are kept in a traceable, defensible manner. All data are recorded either in uniquely identified, bound logbooks with sequentially numbered pages or on electronic media. Records must be maintained in a protective manner, e.g., protected from fire, water, access and/or tampering by unauthorized personnel. In addition, electronic records must be protected from electromagnetic damage."

Condition Impact Statement: This condition as drafted would incorporate redundant recordkeeping requirements in excessive detail as part of the waste analysis plan.

Requested Action: Delete this condition. Alternatively, strike all language following the first sentence so the condition reads as follows:

Add the following text to Section 2.2.5.

"All confirmation activities will be performed in accordance with TSD unit-specific governing documentation and performed in a consistent manner. Confirmation records will be kept in accordance with Condition II.I.1.b. of the Hanford Facility Resource Conservation and Recovery Act Permit, Dangerous Waste Portion."

Comment Justification: WAC 173-303-380 states "the owner or operator of a facility must keep a written operating record at their facility". WAC 173-303-380 does not require specific formats for recordkeeping. This condition as drafted incorporates redundant recordkeeping requirements in excessive detail. Hanford Facility Resource Conservation and Recovery Act Permit, Dangerous Waste Portion, Condition II.I.1.b. requires retention of all records required by WAC 173-303-300, which includes records associated with confirmation activities, but does not specify detailed procedures for recordkeeping.

CONDITION/COMMENT/JUSTIFICATION

23. Condition III.8.B.c.42.

Key Comment: Potential for Compliance Issues

Draft Permit condition as proposed by the Department of Ecology:

If a false negative occurs as described in line 8, page 2-9, the corrective action described in lines 9 and 10 must include the re-evaluation of all affected video tapes/records since the previous acceptable QC check. If any results are questionable, those affected drums must be reevaluated and handled appropriately."

Condition Impact Statement: This condition should be rewritten to properly address quality control for all physical screening parameters used.

Requested Action: Rewrite this condition to replace Section 2.2.5.1 of the waste analysis plan with the following text:

"2.2.5.1 Physical Screening Quality Control. This section describes the QC used by the CWC operating organization to ensure that quality data are obtained when performing physical screening methods identified in Section 2.2.2, except visual inspection. Visual inspection does not consist of the use of instrumentation or chemical tests. Therefore, QC for visual inspection depends on appropriate training for the individual(s) performing the test. For the remaining physical screening tools (NDE, NDA, and Dose Rate Profile), QC for these methods will be incorporated in accordance with manufacturer's instructions or site-specific protocols. If any results are questionable, those affected containers must be re-evaluated and handled appropriately."

Comment Justification: This condition as drafted would address an excessive level of detail for quality control and would only apply to one physical screening tool. The Permittees are committed to applying quality control in physical screening activities and intend to resolve issues associated with false negatives; therefore, the Permittees request that the text provided be incorporated into the permit. Adequate enforceable requirements for quality control already exist in the Hanford Facility Resource Conservation and Recovery Act Permit at Condition II.E.1., which states, "All WAPs and SAPs required by this Permit shall include a quality assurance/quality control (QA/QC) plan, or equivalent, to document all monitoring procedures so as to ensure that all information, data, and resulting decisions are technically sound, statistically valid, and properly documented". The text in the requested action is consistent with Condition II.E.1. without imposing excessive detail.

24. Condition III.8.B.c.43.

Key Comment: Potential for Compliance Issues

Draft Permit condition as proposed by the Department of Ecology:

In Section 2.2.5.1 on page 2-9, quality control has not been presented for non-destructive analysis or for dose rate profile. Until text describing those physical screening options is provided to the Department for review and approval, the required revisions are made, the public comment conducted, and the text becomes an enforceable condition of this WAP, all physical screening must be by visual observation and NDE only, subject to other enforceable conditions of this Permit.

Condition Impact Statement: This condition as drafted would deny the use of legitimate physical screening tools until the Department of Ecology reviews and approves quality control efforts.

Requested Action: Delete this condition. The text provided in the requested action for Draft Permit Condition III.8.B.c.42 provides a comprehensive approach to physical screening quality control.

Comment Justification: WAC 173-303-300(5)(b) requires waste analysis plans to include "the methods of obtaining or testing for these parameters". WAC 173-303-110(1) states "Quality control procedures specified by the testing method or an approved equivalent method must be followed for the analytical result to be considered valid for designation". The requirements of WAC 173-303-300 are not intended to require such prescriptive conditions in permits. WAC 173-303-110 imposes quality control procedures on designation activities when testing is used in accordance with WAC 173-303-070(3)(c)(i), but does not require quality control procedures to be incorporated into permits or waste analysis plans. This condition would limit the ability to use legitimate physical screening options without the Department of Ecology-approved quality control procedures. Refer to related response to Draft Permit Condition III.7.B.c.46.

CONDITION/COMMENT/JUSTIFICATION

25. **Condition III.8.B.c.45.**

Key Comment: Inconsistent with Regulations, Potential for Compliance Issues, Hinders Cost-Effectiveness

Draft Permit condition as proposed by the Department of Ecology:

Delete lines 15 through 34 on page 2-9. The required chemical screening quality control include, but are not limited to, the following:

- Containers and equipment of the appropriate size and that are chemically compatible with the waste and all testing reagents will be used.
- A documented source of reagent water will be used.
- All chemicals and test kits shall be identified in the logbook/records by manufacturer; lot number(s) or, if no lot number is present, by date of manufacture; date of receipt, and expiration date (if none provided or not applicable, so indicate). All chemicals and test kits must be labeled so that they are traceable to the logbook/records.
- All chemical preparations, i.e., chemical mixtures or solutions, shall be documented in logbook/records by the method of preparation, e.g., weight or volume of chemical(s), identity of solute, volume or weight of solute, final concentration, as well as the name of the preparer, preparation date, expiration date. They must be labelled completely and traceable to the preparation records.
- One in 20 samples at a minimum will be sampled in duplicate and analyzed.
- One in 20 analyses at a minimum will be performed in duplicate. The duplicate sample shall not be the sampling duplicate.

The results of quality control checks for each test kit lot or periodic testing and for daily quality control checks including equipment calibration will be recorded in a defensible manner.

Condition Impact Statement: The condition as drafted would impose an excessive level of control by incorporating extensive detail into the permit regarding chemical screening activities.

Requested Action: Rewrite the condition to read as follows:

"Delete lines 12 through 40 on page 2-9. Add the following text to line 12: " **2.2.5.2 Chemical Screening Quality Control.** This section describes the QC used by the CWC operating organization to ensure that appropriate data are obtained when performing chemical screening methods identified in Section 2.2.3.

The following applies for all chemical screening parameters.

- Each lot will be evaluated to determine that the lot is usable. Unstable reagents will be accounted for when determining the usability of the lot.
- For each lot, the source, concentration, date of receipt, lot number, and manufacturer/preparer (as applicable) will be maintained in a logbook.
- For individual chemical screening parameters, QC checks will be performed in accordance with manufacturer's instructions or site-specific protocols.

Comment Justification: WAC 173-303-300(5)(b) requires waste analysis plans to include "the methods of obtaining or testing for these parameters". WAC 173-303-110(1) states "Quality control procedures specified by the testing method or an approved equivalent method must be followed for the analytical result to be considered valid for designation". The requirements of WAC 173-303-300 are not intended to require such prescriptive conditions in permits. WAC 173-303-110 imposes quality control procedures on designation activities when testing is used in accordance with WAC 173-303-070(3)(c)(i), but does not require quality control procedures to be incorporated into permits or waste analysis plans. WAC 173-303-300 requires written waste analysis plans to include the methods of testing used, but does not require development of extensive permit conditions regarding quality control. The Permittees perform chemical screening analyses according to manufacturer's instructions or

CONDITION/COMMENT/JUSTIFICATION

appropriate site-specific protocols.

The Permittees discovered that the text originally provided in the CWC permit application requires revision to accurately reflect the use of chemical screening parameters in the verification program. Subsequent efforts to provide appropriate information regarding chemical screening have resulted in the development of a condition that would require the Permittees to make changes to the existing chemical screening quality control system. Therefore, the Permittees recommend incorporation of the suggested text to replace the information originally provided in Section 2.2.5.2, lines 12 through 40. The suggested text provides for a condition that more accurately reflects chemical screening quality control.

26. **Condition III.8.B.c.46.** **Key Comment:** Redundant/Nonenforceable

Draft Permit condition as proposed by the Department of Ecology:

Insert "and Quality Control" in the text in line 36 on page 2-9 and the additional text Provided to read as follows:

- Equipment and Quality Control Checks

Condition Impact Statement: This condition as drafted would simply change a section title.

Requested Action: Delete this condition.

Comment Justification: As a result of the comprehensive approach taken to chemical screening quality control in the requested action in response to Draft Permit Condition III.8.B.c.45, there is no need to specifically call out equipment and quality control checks. As a result, the Permittees propose to delete equipment and quality control aspects in the chemical screening section.

27. **Condition III.8.B.c.47.** **Key Comment:** Inconsistent with Regulations, Potential for Compliance Issues, Hinders Cost-Effectiveness

Draft Permit condition as proposed by the Department of Ecology:

The following text is inserted under the bulleted heading: "Equipment and Quality Control Checks in line 36 on page 2-9: "The CWC operating organization will perform the following quality control checks on each new test kit or reagent lot to be followed by rechecks on at least a six-month interval, unless a more frequent period is specified in the test kit instructions or the quality control check method.

- (j) Ignitability/Headspace Screening for Volatile Organic Compounds: Headspace screening equipment shall be calibrated using known standard in accordance with the manufacturer's instructions. In addition, the equipment will be quality control checked on each day of use by sampling the headspace of a reagent containing hexane. If it does not perform as expected, the equipment will be recalibrated.
- (k) Peroxide Screening: The quality control check for the peroxide test paper is as follows: (1) Moisten the test paper with water. Add two drops of 3% hydrogen peroxide solution to the test paper. The test paper should turn blue. If it does not, replace the test paper or reject the lot. (2) Add a drop of potassium dichromate solution to approximately ½-inch of water in a test tube. Place the peroxide test paper in the solution. The test paper should not turn blue. If it changes color, replace the test paper or reject the lot. (3) Add one drop of nitric acid to the test paper. The paper should turn yellow. If it does not, replace the test paper or reject the lot.
- (l) Paint Filter Liquids Test: The quality control check consists of visually inspecting each filter, prior to performing each test, to ensure that it is in good condition and is not torn or ripped. If it is damaged, the filter shall be replaced.
- (m) pH Screen: The quality control check for the pH test paper is as follows: (1) Place a drop of concentrated hydrochloric acid onto the test paper; the pH should be 0±1. (2) Place a drop of acetic acid onto the test paper; the pH should be 2 to 3±1. (3) Place a drop of reagent water onto the test paper; the pH should be 7±1. (4) Place a drop of ammonium hydroxide onto the test paper; the pH should be 11 to 12±1. (5) Place a drop of sodium hydroxide onto the test paper; the pH should be 14±1. If the pH on most of these tests is

CONDITION/COMMENT/JUSTIFICATION

not as specified, replace or reject the pH paper. If only one or two test produce results that are different than stated, check or replace the reagents. The most important check is the reagent water, although it frequently will have a slightly acidic pH. All of the stated pH checks also may be performed using pH buffer solutions.

- (n) Oxidizer Screen: The quality control check for the oxidizer test paper is as follows: Moisten the test paper with 3M hydrochloric acid. Add two drops of potassium dichromate solution to the paper. The paper should turn black. If the test is negative, replace the paper or reject the lot.
- (o) Water Reactivity Screen: The quality control check consists of testing the pH of the reagent water. If the pH is not 7 ± 1 , the reagent water shall be replaced. Note that this check may be performed as part of the pH quality control check.
- (p) Cyanide Screen: The ferrous ammonium citrate reagent is the most unstable reagent used in this test. The ferrous ion will oxidize to ferric upon standing for even a short period of time. If the reagent has a thick opaque color or if there are particulates floating in the solution, the reagent should be replaced. To check the ferrous ammonium citrate, perform both of the following tests: (1) Add a pinch of ferrous ammonium sulfate to $\frac{1}{4}$ -inch of the ferrous ammonium citrate reagent in a test tube. Add a drop of 1,10-phenanthroline to the test tube. The solution should turn blood red. (2) Add a pinch of ferrous ammonium sulfate to $\frac{1}{4}$ -inch of the ferrous ammonium citrate reagent in a test tube (this is solution 1). Add a small amount of potassium ferrocyanide to a test tube of water (this is solution 2). Add a small amount of solution 1 to solution 2 to form solution 3. Add a $\frac{1}{4}$ -inch of 3 Normal (i.e., 3N or 3M) hydrochloric acid to solution 3. The solution should turn dark blue. If either test is negative, replace the reagent or reject the lot.
- (q) Sulfide Screen: The quality control check for the sulfide test paper is as follows: (1) Add 1 to 2 drops of reagent water to the sulfide test paper. (2) Add two drops of 3 Normal (3N or 3M) hydrochloric acid to two sodium sulfide flakes in a disposable watch glass or weighing boat. (3) Touch the sulfide test paper to the flakes. The test paper should turn brown, black, or silvery. If the test is negative, then replace the test paper or reject the lot.
- (r) HOC Screen: The quality control check is to perform the test according to the test kit Instruction on a reagent containing approximately 50 ppm of a chlorinated organic compound. If the test does not indicate a positive result, replace or reject the lot. If two or more test kit lots do not indicate a positive result, replace and/or test the reagent and retest the test kit lots."

Condition Impact Statement: This condition as drafted would impose an excessive level of control by incorporating detailed requirements regarding chemical screening control.

Requested Action: Delete this condition.

Comment Justification: The CWC permit application contains an adequate level of detail regarding waste analysis and is consistent with the intent of WAC 173-303-300. The requested action in response to Draft Permit Condition III.8.B.c.42 provides a comprehensive approach to chemical screening quality control. This condition as drafted would pose ambiguity regarding enforceable conditions of chemical screening activities.

28. **Condition III.8.B.c.49.**

Key Comment: Redundant/Nonenforceable

Draft Permit condition as proposed by the Department of Ecology:

The result of failure (i.e., "a container fails . . .") as described in Section 3.1, Physical Screening Parameters, under the heading "Failure Criteria" may be a return to the generator, a re-profiling of the waste stream, or treatment (processing or reprocessing) at a permitted TSD unit. The result of failure for chemical screening (e.g., failing the test, constitutes failure), as described in Section 3.2, Chemical Screening Parameters, under the heading "Tolerance" may the same outcomes as for physical screening. In addition, a failure of the chemical screening

CONDITION/COMMENT/JUSTIFICATION

may be the expected outcome of the test, dependent upon the waste profile.

Condition Impact Statement: This condition as drafted does not appear to impose any restrictions or requirements upon the Permittees.

Requested Action: Delete this condition.

Comment Justification: This condition as drafted does not appear to impose any requirements or restrictions upon the Permittees. Furthermore, the text in this condition is redundant to the text of Section 1.1.1.3.3 of the waste analysis plan, which comprehensively addresses resolution of conformance issues. The condition as drafted is confusing and does not provide a clear, enforceable condition. This condition becomes more confusing when compared to the final sentence of Draft Permit Condition III.8.B.c.62, which seems to indicate that failure of a waste means that it will be returned to the generator.

29. **Condition III.8.B.c.50.**

Key Comment: Lack of Regulatory Authority, Inconsistent with Regulations

Draft Permit condition as proposed by the Department of Ecology:

Delete the text in lines 4 and 5 of page 3-1 and replace it with the following: "Physical and chemical screening parameters for verification must be chosen from those in Sections 3.1 and 3.2. Parameters for waste designation and to meet LDR requirements are addressed in Section 3.3."

Condition Impact Statement: The condition as drafted includes reference to generator activities, which is inconsistent with regulations that exempt generator activities from permitting requirements per WAC 173-303-600(3)(d).

Requested Action: Delete the second sentence of this condition. Alternatively, reword the last sentence of the condition to read: "Other sampling and analysis parameters are addressed in Section 3.3."

Comment Justification: WAC 173-303-600(3)(d) provides that "final facility standards do not apply to: ...a generator accumulating waste on-site in accordance with WAC 173-303-200." There is no basis for imposing sampling and analysis permit conditions on generator activities (refer to comment response to Draft Permit Condition III.8.B.c.17.).

30. **Condition III.8.B.c.54.**

Key Comment: Inconsistent with Regulations, Potential for Compliance Issues, Hinders Cost-Effectiveness

Draft Permit condition as proposed by the Department of Ecology:

Delete the text in lines 38 through 40 on page 3-1 and replace it with the following text: "The container is scanned top-to-bottom and side-to-side with a non-destructive examination (NDE) system according to documented and approved procedures. At a minimum, the lifts, conveyors rotators, and manipulators for the real-time imaging systems shall be capable of handling drums up to 85-gallons in size and up to 1000 pounds in weight and boxes up to 7000 pounds in weight. The minimum image quality, X-ray system performance, and system operator requirements shall be in accordance with the documented specifications for operating the NDE system. The X-ray components shall include the following: (1) a nine-inch (diagonal) entrance field image intensifier, or equivalent, (2) a twelve-inch, high resolution video display monitor, (3) a video printer, and (4) a high-performance, broadcast quality, S-VHS/VHS recorder/player. Quality assurance measures that indicate X-ray imaging quality shall be utilized and documented during equipment startup. For verification activities by NDE, data are observed on a video monitor and captured on video tape to provide a record. Personnel experienced in the interpretation of NDE imagery will record their observations. These observations are then compared to the inventory of container contents on the shipping documentation and also must be in agreement with the waste profile.

Condition Impact Statement: This condition as drafted would impose an excessive level of control by incorporating extensive detail regarding nondestructive examination activities in excess of WAC 173-303-300 requirements.

CONDITION/COMMENT/JUSTIFICATION

Requested Action: Delete this condition.

Comment Justification: WAC 173-303-300(2) states that "the owner or operator must obtain a detailed chemical, physical, and/or biological analysis of a dangerous waste...before he stores, treats or disposes of it."

WAC 173-303-300 contains adequate requirements for testing of waste without specifying the need for the level of detail that this condition would require. Nondestructive examination is performed to applicable manufacturer's instructions or site-specific protocols. WAC 173-303-300 does not require incorporation of such detail as a permit condition. The Permittees believe that the description provided in the deleted text is adequate and contains the appropriate level of detail for a waste analysis plan.

31. **Condition III.8.B.c.56.**

Key Comment: Inconsistent with Regulations, Hinders Cost-Effectiveness

Draft Permit condition as proposed by the Department of Ecology:

Delete the text in lines 39 through 42 on page 3-3 and replace it with the following: "Method: Full range pH paper with a stated precision of 1.0 pH unit and a corresponding color chart is used for testing. For aqueous samples, a representative test portion of the sample is introduced onto the strip of pH paper. For solids, sludges, and non-aqueous liquids, a representative test portion is mixed with an approximately equal amount of water. The aqueous portion (extractant) of this mixture is then introduced onto the strip of pH paper. The paper is compared visually to the color chart to determine the best color match. The pH is recorded to the nearest whole pH unit."

Condition Impact Statement: This condition as drafted would impose an excessive level of control regarding procedures to meet WAC 173-303-300 requirements.

Requested Action: Delete this condition.

Comment Justification: This condition would impose a level of detail for pH paper that is overly prescriptive. The Permittees believe that the description originally submitted in the CWC permit application is adequate and contains the appropriate level of detail for a waste analysis plan.

32. **Condition III.8.B.c.57.**

Key Comment: Inconsistent with Regulations, Hinders Cost-Effectiveness

Draft Permit condition as proposed by the Department of Ecology:

Delete the text in lines 7 and 8 on page 3-4 and replace it with the following: "Method: Potassium iodide (KI) starch test paper is used for testing. KI oxidizes to iodine (I₂) in the presence of starch to yield a dark blue-black coloration on the test paper. A representative test portion of the sample is placed on a disposable watch dish or weighing boat. The KI test paper strip is acidified with 3M hydrochloric acid (HCl) and placed in contact with the test portion. A darkening of the test paper is a positive indication of the oxidizing properties of the sample."

Condition Impact Statement: This condition as drafted would impose an excessive level of control regarding procedures to meet WAC 173-303-300 requirements.

Requested Action: Delete this condition.

Comment Justification: WAC 173-303-300(2) states that "the owner or operator must obtain a detailed chemical, physical, and/or biological analysis of a dangerous waste...before he stores, treats or disposes of it." WAC 173-303-300(5) states "the owner or operator must develop and follow a written waste analysis plan which describes the procedures he will use to comply with the waste analysis requirements of subsections (1), (2), (3), and (4) of this section". WAC 173-303-300(5) requires *descriptions of procedures* for waste analysis, but does not require that actual procedures be incorporated into the permit. This condition would impose a level of detail for the oxidizer screen that is overly prescriptive. The Permittees believe that the description originally submitted in the CWC permit application is adequate and contains the appropriate level of detail for a waste analysis plan.

CONDITION/COMMENT/JUSTIFICATION

33. Condition III.8.B.c.58.

Key Comment: Inconsistent with Regulations, Hinders Cost-Effectiveness

Draft Permit condition as proposed by the Department of Ecology:

Delete the text in lines 19 through 21 on page 3-4 and replace it with the following: "Method: Water reactivity of waste is determined by adding a representative test portion to an approximately equal volume of water in a disposable watch glass or weighing boat. The mixture is observed for positive indications of water reactivity such as temperature change (increase or decrease), gas evolution, gelling or polymerization."

Condition Impact Statement: This condition as drafted would impose an excessive level of control regarding procedures to meet WAC 173-303-300 requirements.

Requested Action: Delete this condition.

Comment Justification: WAC 173-303-300(2) states that "the owner or operator must obtain a detailed chemical, physical, and/or biological analysis of a dangerous waste...before he stores, treats or disposes of it." WAC 173-303-300(5) states "the owner or operator must develop and follow a written waste analysis plan which describes the procedures he will use to comply with the waste analysis requirements of subsections (1), (2), (3), and (4) of this section". WAC 173-303-300(5) requires *descriptions of procedures* for waste analysis, but does not require that actual procedures be incorporated into the permit. This condition would impose a level of detail for the water reactivity screen that is overly prescriptive. The Permittees believe that the description originally submitted in the CWC permit application is adequate and contains the appropriate level of detail for a waste analysis plan.

34. Condition III.8.B.c.59.

Key Comment: Inconsistent with Regulations, Hinders Cost-Effectiveness

Draft Permit condition as proposed by the Department of Ecology:

Delete the text in lines 32 through 34 on page 3-4 and replace it with the following: "Method: A ferrous ammonium citrate solution is used as a colorimetric indicator of free cyanides and some complex cyanides. The reagent turns a dark Prussian blue color due to the formation of blue iron ferrocyanide in the presence of cyanide under acidic conditions. A representative test portion is placed on a disposable watch glass or weighing boat. An approximately equal amount of water is added to solid matrices. The ferrous ammonium citrate solution is added and mixed into the test portion. The mixture is then acidified with 3M hydrochloric acid (HCl). A dark blue color, if present, indicates the presence of cyanides."

Condition Impact Statement: This condition as drafted would impose an excessive level of control regarding procedures to meet WAC 173-303-300 requirements.

Requested Action: Delete this condition.

Comment Justification: WAC 173-303-300(2) states that "the owner or operator must obtain a detailed chemical, physical, and/or biological analysis of a dangerous waste...before he stores, treats or disposes of it." WAC 173-303-300(5) states "the owner or operator must develop and follow a written waste analysis plan which describes the procedures he will use to comply with the waste analysis requirements of subsections (1), (2), (3), and (4) of this section". WAC 173-303-300(5) requires *descriptions of procedures* for waste analysis, but does not require that actual procedures be incorporated into the permit. This condition would impose a level of detail for the cyanide screen that is overly prescriptive for incorporation into the permit. The Permittees believe that the description originally submitted in the CWC permit application is adequate and contains the appropriate level of detail for a waste analysis plan.

CONDITION/COMMENT/JUSTIFICATION

35. Condition III.8.B.c.60.

Key Comment: Inconsistent with Regulations, Hinders Cost-Effectiveness

Draft Permit condition as proposed by the Department of Ecology:

Delete the text in lines 45 through 48 on page 3-4 and replace it with the following: "Method: Lead acetate test paper strips are used for testing. Under acidic conditions, sulfide compounds release hydrogen sulfide (H_2S) and, in the presence of this H_2S , the lead acetate paper changes to a silvery brown or black color due to the formation of lead sulfide (PbS). A representative test portion is placed on a disposable watch glass or weighing boat. The test portion is acidified with 3M hydrochloric acid (HCl). A lead acetate test paper strip is dampened with water and placed near the acidified test portion. A darkening of the test paper is a positive indication of the presence of sulfides in the test portion."

Condition Impact Statement: This condition as drafted would impose an excessive level of control regarding procedures to meet WAC 173-303-300 requirements.

Requested Action: Delete this condition.

Comment Justification: WAC 173-303-300(2) states that "the owner or operator must obtain a detailed chemical, physical, and/or biological analysis of a dangerous waste...before he stores, treats or disposes of it." WAC 173-303-300(5) states "the owner or operator must develop and follow a written waste analysis plan which describes the procedures he will use to comply with the waste analysis requirements of subsections (1), (2), (3), and (4) of this section". WAC 173-303-300(5) requires *descriptions of procedures* for waste analysis, but does not require that actual procedures be incorporated into the permit. This condition as drafted would impose a level of detail for the sulfide screen that is overly prescriptive for incorporation into the permit. The Permittees believe that the description originally submitted in the CWC permit application is adequate and contains the appropriate level of detail for a waste analysis plan.

36. Condition III.8.B.c.61.

Key Comment: Inconsistent with Regulations, Hinders Cost-Effectiveness

Draft Permit condition as proposed by the Department of Ecology:

Delete the text in lines 11 through 13 on page 3-5 and replace it with the following: "Method: A precise amount of oil (i.e., the test portion) is placed into the first of two disposable test tubes provided with the test kit. An ampule containing a colorless catalyst is broken and the contents are mixed thoroughly with the test portion. A second ampule containing metallic sodium is broken and the sodium, activated by the catalyst, strips chlorine from any chlorinated organic compounds present to form sodium chloride. An aqueous buffer solution is added to the test portion. This neutralizes the excess sodium and extracts the sodium chloride into the water. The water layer is then separated from the oil and decanted into the second test tube. An ampule containing a precise amount of reagent is broken and the contents mixed with the water. An ampule containing an indicator is then broken and the contents mixed with the water. The color of the mixture is dependant on the amount of chlorinated organic compounds in the original test portion of oil.

Condition Impact Statement: This condition as drafted would impose an excessive level of control regarding procedures to meet WAC 173-303-300 requirements.

Requested Action: Delete this condition.

Comment Justification: WAC 173-303-300(2) states that "the owner or operator must obtain a detailed chemical, physical, and/or biological analysis of a dangerous waste...before he stores, treats or disposes of it." WAC 173 303 300(5) states "the owner or operator must develop and follow a written waste analysis plan which describes the procedures he will use to comply with the waste analysis requirements of subsections (1), (2), (3), and (4) of this section". WAC 173-303-300(5) requires *descriptions of procedures* for waste analysis, but does not require that actual procedures be incorporated into the permit. This condition as drafted would impose a level of detail for the halogenated organic carbon screen that is overly prescriptive for incorporation into the permit. The Permittees believe that the description originally submitted in the CWC permit application is adequate and

CONDITION/COMMENT/JUSTIFICATION

contains the appropriate level of detail for a waste analysis plan.

37. **Condition III.8.B.c.62.**

Key Comment: Inconsistent with Regulations, Hinders Cost-Effectiveness

Draft Permit condition as proposed by the Department of Ecology:

Delete the text in lines 15 and 16 on page 3-5 and replace it with the following: "Tolerance: The presence of halogenated organic compounds (HOCs) in the waste requires that either (1) the generator must supply laboratory data obtained by the SW-846 Method 8082 for the waste in the specific container, or (2) the specific container of the waste stream must be sampled by the TSD unit and the waste analyzed by SW-846 Method 8082 to determine if the waste contains polychlorinated biphenyls (PCBs). If the waste does contain PCBs, the waste profile must be re-evaluated to determine if the waste is TSCA-regulated and, if the waste is not TSCA-regulated, then the quantitative analytical data must be useable to verify that the concentration of PCBs in the waste is less than 50 ppm. The waste fails if the waste stream is TSCA-regulated or the concentration of PCBs is equal to or greater than 50 ppm. The TSD unit may fail the waste (i.e., return it to the generator) without obtaining the quantitative analytical data.

Condition Impact Statement: This condition as drafted would impose an excessive level of control regarding procedures to meet WAC 173-303-300 requirements and would impose requirements on Toxic Substances Control Act waste for which the Department of Ecology has no legal authority to regulate.

Requested Action: Delete this condition.

Comment Justification: WAC 173-303-300(2) states that "the owner or operator must obtain a detailed chemical, physical, and/or biological analysis of a dangerous waste...before he stores, treats or disposes of it." WAC 173-303-300(5) states "the owner or operator must develop and follow a written waste analysis plan which describes the procedures he will use to comply with the waste analysis requirements of subsections (1), (2), (3), and (4) of this section". WAC 173-303-300(5) requires *descriptions of procedures* for waste analysis, but does not require that actual procedures be incorporated into the permit. This condition would impose a level of detail for the halogenated organic carbon screen that is overly prescriptive for incorporation into the permit. The Permittees believe that the description originally provided in the CWC permit application is adequate and contains the appropriate level of detail for a waste analysis plan.

WAC 173-303-071(3)(k) specifically excludes Toxic Substances Control Act-managed polychlorinated biphenyls from the Dangerous Waste Regulations.

WAC 173-303-100(6) allows generators to designate halogenated organic carbons based on existing knowledge and also allows for the identity and concentration to be determined by either applying knowledge or by testing. This condition would impose specific laboratory testing on the generator for any waste that contains halogenated organic carbons or testing by CWC in search of polychlorinated biphenyls, both without regulatory authority. In addition, WAC 173-303-600(3)(d) specifically excludes generators who are accumulating waste from final facility standards. Refer to comments on Draft Permit Conditions III.8.B.c.11 and III.8.B.c.17.

38. **Condition III.8.B.c.64.**

Key Comment: Lack of Regulatory Authority, Inconsistent with Regulations, Hinders Cost-Effectiveness

Draft Permit condition as proposed by the Department of Ecology:

Delete the text in lines 21 and 22 on page 3-5 and replace it with the following: "Parameters needed to meet designation, characterization, and LDR requirements for waste stored at and/or treated for CWC are identified in Appendix A of this WAP."

CONDITION/COMMENT/JUSTIFICATION

Condition Impact Statement: This condition as drafted would contradict the WAC 173-303-600(3)(d) exemption for generators by incorporating requirements into the permit that apply to generators.

Requested Action: Rewrite this condition to read:

"Delete the text in lines 21 and 22 on page 3-5 and replace it with the following: "Parameters needed to meet other waste characterization needs for waste stored and/or treated at WRAP are identified in Appendix A."

Comment Justification: WAC 173-303-600(3)(d) specifically excludes generator accumulation from the final facility standards. It is inappropriate for the Department of Ecology to attempt to regulate generator activities through a Resource Conservation and Recovery Act permit (refer to comment response to Draft Permit Condition III.8.B.c.17.).

39. **Condition III.8.B.c.66.**

Key Comment: Inconsistent with Regulations

Draft Permit condition as proposed by the Department of Ecology:

Delete the text in lines 13 through 14 on page 4-2 beginning with "or other approved . . ." and replace it with: "except as amended by the Permit."

Condition Impact Statement: This condition as drafted contains provisions that are inconsistent with SW-846.

Requested Action: Rewrite the condition to read as follows:

Delete the text in lines 13 and 14 on page 4-2 and replace it with the following: "Sample preservation and holding times follow SW-846 protocol."

Comment Justification: Preservation and holding times will be applied appropriately to ensure accuracy and precision of testing data in accordance with SW-846. For data to be legally defensible, preservation must be consistent with authoritative sources.

40. **Condition III.8.B.c.67.**

Key Comment: Inconsistent with Regulations

Draft Permit condition as proposed by the Department of Ecology:

The following condition applies for the preservation and holding times for samples and for laboratory extracts of the samples. Waste samples are treated and preserved as necessary to protect the sample. Tables 2-36 and 4-1 in SW-846 contains recommended treatment/preservative and holding times. Not all samples require preservation and placing a holding time on a sample may not always be appropriate. Samples with a high concentration of the analyte or non-LDR samples may not require preservation, whereas aqueous samples and samples with low concentrations of the analyte or LDR samples require preservation. If the required preservation interferes with some of the analytes requested, then multiple aliquots of sample may need to be obtained for analysis. Samples taken for analysis of a persistent constituent or non-biologically degradable constituent may not require a holding time. For example, a sample for PCB analysis does not require a holding time (although the laboratory extractant is subject to a holding time). The recommended holding time and preservation for hexavalent chromium (Cr+6) listed in the Tables are required for all sample matrices unless the hexavalent chromium concentration is assumed to be represented by the total chromium in the sample. The recommended preservation and holding time for mercury (Hg) is required in all sample matrices. For the laboratory-prepared organic extracts (e.g., semi-volatile organic analysis and PCBs) the holding times listed in the Tables are required to be met for each extract.

Condition Impact Statement: This condition as drafted contains provisions that are inconsistent with SW-846.

Requested Action: Delete this condition.

Comment Justification: WAC 173-303-110 (1) states "All methods and publications listed in this section are incorporated by reference," (i.e., WAC 173-303-110(3)(a) "Test Methods for Evaluating Solid Waste, Physical/Chemical Methods, EPA Publication, SW-846 (Third Edition (November 1986) as amended by Updates...and III (December 1996))". The Permittees believe that WAC 173-303-110, through incorporation of SW-846, Update III, by reference, is adequate for establishing appropriate preservation and holding times for

CONDITION/COMMENT/JUSTIFICATION

samples and laboratory extracts. This condition as drafted would be inconsistent with SW-846.

The Requested Action, coupled with the response to Draft Permit Condition III.8.B.c.64, contains an appropriate level of detail for a permit condition and a waste analysis plan.

41. **Condition III.8.B.c.69.**

Key Comment: Inconsistent with Regulations, Potential for Compliance Issues, Hinders Cost-Effectiveness

Draft Permit condition as proposed by the Department of Ecology:

The log of sampling activities described in lines 21 through 26 on page 4-2 is required to be kept in an inventoried, uniquely numbered, bound logbook with sequentially numbered pages. Any affixed information, e.g., pictures, copies of chain-of-custody documentation, shall be permanently attached to a logbook page and initialed and dated across the edge of the attached material onto the logbook page so that removal or tampering with the attachment(s) can be identified. No affixed material may be placed over any other affixed items or written entries. The requirements for defensible data recording apply, including correction of entries by single line cross-out, initial and date, and give reason for the change. A signature is required rather than initials if the correction is made by someone other than the original recorder. No entries shall be obliterated, e.g., "white out" must not be used. The identity of the person who is initialing the record must be easily determined.

Condition Impact Statement: This condition as drafted would impose excessive detail on the CWC operating organization regarding how sampling logs are maintained.

Requested Action: Delete this condition. Alternatively, replace this condition with one that reads as follows:

"The log of sampling activities described in lines 21 through 26 on page 4-2 shall be kept in accordance with standard industrial data recording practices."

Comment Justification: WAC 173-303-380(1) states "the owner or operator of a facility must keep a written operating record at their facility". WAC 173-303-380 does not specify procedures for recordkeeping as this condition would. WAC 173-303-380 and Hanford Facility Resource Conservation and Recovery Act Permit, Dangerous Waste Portion, Condition II.I.1. require various records to be retained and maintained, but not to the level of specificity that would be incorporated through this condition. This condition as drafted would require recordkeeping of sampling activities to a level of detail that is inconsistent with regulatory requirements of WAC 173-303-380, and other permits issued by the Department of Ecology.

42. **Condition III.8.B.c.73.**

Key Comment: Inconsistent with Regulations, Potential for Compliance Issues, Hinders Cost-Effectiveness

Draft Permit condition as proposed by the Department of Ecology:

Delete the text in lines 29 through 31 on page 4-2 and replace it with the following: "Chain of custody and chain-of-custody documentation are maintained at all times for samples collected by or for CWC. The chain-of-custody documentation includes, but may not be limited to, the following information: the container from which the sample originated, the unique sample number assigned, date and time of collection, sample type, sample location, method(s) of transfer to the laboratory, identity of the sample collector, identity of all subsequent custodians. The chain of custody form is originated by the sample collector and includes all transfers of custody. The chain-of-custody form travels with each sample to the laboratory."

Condition Impact Statement: This condition as drafted would specify an excessive level of detail regarding chain-of-custody activities that are used to ensure sample integrity.

Requested Action: Delete this condition.

Comment Justification: WAC 173-303-300(1) "requires the facility owner or operator to confirm his knowledge about a dangerous waste before he stores, treats, or disposes of it". Chain-of-custody protocols are used by owners and operators to ensure that information obtained for compliance with WAC 173-303-300 is not compromised by inadvertent or intentional tampering. However, there are no provisions in WAC 173-303-300 and

CONDITION/COMMENT/JUSTIFICATION

WAC 173-303-110 that allow for incorporation of specific chain-of-custody procedures into permits. This condition as drafted would specify excessive controls regarding chain-of-custody procedures. The Permittees believe that the level of detail that describes chain-of-custody procedures on page 4-2, lines 29-31 is appropriate and meets the intent of WAC 173-303-300 and 173-303-110. This condition would not enhance protection of human health or the environment, but would hinder management efficiency and cost effectiveness at CWC.

43. **Condition III.8.B.c.74.** **Key Comment:** Inconsistent with Regulations

Draft Permit condition as proposed by the Department of Ecology:

Section 5.0 is deleted in entirety and replaced by the text of Attachment 41B.

Condition Impact Statement: This condition as drafted would impose a level of control regarding selection of laboratory and analytical methods that exceeds the regulatory requirements of WAC 173-303-300.

Requested Action: Rewrite the condition to read as follows:

"Section 5.0 is deleted in entirety and replaced by the following text.

5.0 Selecting a Laboratory, Laboratory Testing, and Analytical Methods.

QC shall be applied in implementing both sampling and analytical techniques. Specific performance standards for QA and QC procedures for individual sampling and analysis activities are dynamic and shall be revised as warranted to reflect technological advances in available, appropriate techniques. These performance standards shall be described in policies maintained and used at CWC and shall be available for review by the Department of Ecology upon request.

5.1 Sampling Program

Sampling procedures for CWC operations are described in Section 2.2.4. The selection of sample collection devices shall depend on the type of sample, the sample container, the sampling location, and the nature and distribution of regulated constituents in the waste. In general, the methodologies used correspond to those referenced by 40 CFR Part 261, Appendix I. The selection and use of the sample collection device shall be supervised or performed by a person who is thoroughly familiar with sampling protocols.

Sampling equipment shall be constructed of materials that are nonreactive with the waste being sampled. Materials such as glass, PVC plastic, aluminum, or stainless steel could be used. Care shall be taken in the selection and use of the sample collection device to prevent contamination of the sample and to ensure compatibility with waste being sampled. Individual container samples that are related and compatible may be composited before analysis.

5.2 Analytical Program

A program of analytical QC practices and procedures has been developed on the Hanford Site to ensure that precision and accuracy are maintained throughout the laboratories. Good laboratory practices that encompass sampling, sample handling, housekeeping, and safety are maintained at onsite laboratories.

5.3 Conclusion

The aforementioned sampling and analytical quality practices help ensure that the data obtained are precise and accurate for the waste stream being sampled. The analytical results are used by operations management to decide whether or not to accept a particular waste and, on acceptance, to determine the appropriate method of treatment, storage, and/or disposal. Results also are important to ensure that the waste is managed properly and that incompatible waste is not combined inadvertently."

If the Department of Ecology retains Attachment 41B, the following specific requests for change are offered:

1. Page 2 line 1 add "received copies of" after the word "or"

CONDITION/COMMENT/JUSTIFICATION

2. Page 2 line 9 delete "incidents (spills)" and replace with "spills"
3. Page 2, lines 13 and 14 delete lines and replace with "Identify whether waste is compatible with waste currently stored".
4. Page 2 line 28 delete "and reject"
5. Page 2 line 31, delete "and reject"
6. Page 3 line 2, delete the phrase "either 'prove the negative' or".
7. Page 3 line 3 delete the phrase " for which the negative can not be proven".
8. Page 3 line 15 delete the words "or designee"
9. Page 3 line 31 delete the words "surveying and".
10. Page 3 line 39 delete the phrase "national quality standards, which are as follows" and replace with "the laboratory's QA plan for precision, completeness, and comparability. Representativeness assessment is a function of sample acquisition".
11. Page 4 line 19 delete the phrase "consistent methodology", and replace with " standard methods".
12. Page 5 line 5 add the phrase "identified in WAC 173-303-045" to the end of the sentence.
13. Page 5 line 8 add the phrase "most current version(s)" to the end of the sentence.
14. Page 5 line 9 add the phrase "most current version(s)" to the end of the sentence.
15. Page 5 line 11 add the phrase "most current version(s)" to the end of the sentence.
16. Page 5 lines 16 and 17 delete the first sentence of the paragraph.
17. Page 5 lines 18-19 delete the words "in real time".
18. Page 6 line 15 delete the phrase "with the Washington State Department of Ecology (Ecology)" and replace it with "before starting work with the client".
19. Page 6 line 28 delete the phrase "with Ecology" and replace it with "before starting work with the client".

Comment Justification: WAC 173-303-300 provides adequate requirements for waste analysis. The text suggested by the Permittees in the requested action contains a level of detail appropriate for inclusion as a permit condition and accurately reflects the Permittees' approach to selecting a laboratory, performance of laboratory testing, and use of analytical methods. This condition as drafted would impose overly prescriptive requirements by incorporating a detailed document (Attachment 41B) into the permit. The Permittees insist that the suggested text is more appropriate. Nevertheless, comments have been provided regarding Attachment 41B. These comments should not be construed to imply that the Permittees believe that incorporation of Attachment 41B into the permit is acceptable.

The Permittees recommend incorporation of the suggested text to replace the information originally provided in Section 5.0 of the waste analysis plan. The suggested text ensures an appropriate level of precision and accuracy for data obtained from waste in accordance with the waste analysis program, and for selection of laboratory testing and use of analytical methods.

The text offered by the Permittees in lieu of the condition as drafted contains a level of detail consistent with that contained in the U.S. Environmental Protection Agency Region 10 Arlington, Oregon Resource Conservation and Recovery Act Permit.

CONDITION/COMMENT/JUSTIFICATION

44. Condition III.8.B.c.75.

Key Comment: Redundant/Nonenforceable

Draft Permit condition as proposed by the Department of Ecology:

The preparative method for the toxicity characteristic is EPA, SW-846 Method 1311, Toxicity Characteristic Leaching Procedure (TCLP). To ensure that the test portion is representative of the waste, a test portion of 50 grams or more is preferred. If a test portion of 50 grams or more is used for the determination, then only a single extraction is required. However, if the test portion is less than 50 grams, each material to be tested must be extracted in duplicate or multiple replicates so that the precision of the extraction can be determined and evaluated. A relative standard deviation of 25% or lower between extractions for the analytes must be obtained for the analytical data to be useable for waste designation. All routine and quality control data associated with the TCLP and subsequent determinative methods is required to be maintained in the TSD unit operating record.

Condition Impact Statement: This condition as drafted is redundant to provisions available to the regulated community through WAC 173-303-110 and SW-846.

Requested Action: Delete this condition.

Comment Justification: WAC 173-303-110(3)(a) and -045(1)(a) incorporate the Third Update of SW-846 into WAC 173-303 by reference. SW-846, Method 1311, Section 7.2, states that "a minimum sample size of 100 grams (solid and liquid phases) is recommended. SW-846, Section 2.1, states that "if an alternative analytical procedure is employed, then EPA expects the laboratory to demonstrate and document that the procedure of providing appropriate performance for its intended application." In addition, 62 Federal Register 62084 states, "for mixed waste testing, sample sizes of less than 100 grams can be used, if the analyst can demonstrate that the test is still sufficiently sensitive to measure the constituents of interest at the regulatory levels specified in the TCLP and representative of the waste stream being tested... Use of a sample size of less than 100 grams is highly recommended for mixed wastes with concentrations of radionuclides that may present serious radiation exposure hazards." These references place the burden on the regulated community to ensure adequacy of test methods. Therefore, based on the sources cited herein, this condition is unnecessary and redundant.

Lastly, the controls imposed by this condition are not achievable in all circumstances. When the analytical results are reported at or near the detection limits of the determinative methods, the relative standard deviation of 25 percent cannot be met.

45. Condition III.8.B.c.76.

Key Comment: Inconsistent with Regulations, Hinders Cost-Effectiveness

Draft Permit condition as proposed by the Department of Ecology:

Instead of performing the TCLP as described above, a material may be analyzed for the total concentration of the Toxic Characteristic (TC) constituents. For this approach, solids and sludges must undergo a digestion procedure for metals or an extraction procedure for organics. Then, based on the assumption that the analytes are 100% (totally) leachable from the waste, the resulting data are evaluated against the TC criteria allowing for the 20-fold dilution that is inherent in the TCLP extraction for solids and sludges (Note that the dilution factor does not apply for liquids). That is, for each toxic characteristic metal and organic compound, if the analyte concentration is less than 20 times the TC limits, then the waste is not considered to possess the characteristic of toxicity for that constituent. If the totals are more than 20 times the TC limits, then a TCLP must be performed (or, if undergoing stabilization, the waste may be retreated before performing another screening).

Condition Impact Statement: This condition would establish a condition allowing totals analysis but would prohibit its use for assuming a waste exceeds the toxicity characteristic leaching procedure or land disposal restriction threshold, even though regulatory intent allows such use.

Requested Action: Delete this condition.

Comment Justification: WAC 173-303-110(3)(a) and -045(1)(a) incorporate the Third Update of SW-846 into WAC 173-303 by reference. SW-846, Method 1311, Section 1.2 states, "if a total analysis of the waste

CONDITION/COMMENT/JUSTIFICATION

demonstrates that individual analytes are not present in the waste, or that they are present but at such low concentrations that the appropriate regulatory levels could not possibly be exceeded, the TCLP *need not be run*." 62 Federal Register 62084 states, "the grinding or milling step in the TCLP has raised ALARA concerns for individuals who test mixed waste. The use of total constituent analysis, instead of the TCLP, may also minimize the generation of secondary mixed or radioactive waste through the use of smaller sample sizes and reduction, or elimination, of high dilution volume leaching procedures." The cited references allow for appropriate use of totals analysis without unnecessary additional requirements.

The condition discusses a provision already available to the regulated community in SW-846. The provision does not need to be repeated as a permit condition. The Department of Ecology has drafted a condition that would impose unnecessary restrictions and expenditures upon the Permittees with respect to totals analyses and with the potential to cause as low as reasonably achievable concerns. The Permittees can comply with existing regulations that allow the approach requested.

46. **Condition III.8.B.c.83.**

Key Comment: Potential for Compliance Issues, Hinders Cost-Effectiveness, Redundant/Nonenforceable

Draft Permit condition as proposed by the Department of Ecology:

Delete "or any other method allowed by regulations" in line 24, page 7-3.

Condition Impact Statement: This condition as drafted does not appear to impose any requirements or restrictions on the Permittees, but might be intended to deny the Permittees the ability to use methods allowed by regulations.

Requested Action: Delete this condition

Comment Justification: WAC 173-303-110 allows for use of SW-846 and other methods to meet the requirements of WAC 173-303. WAC 173-303-110(5) provide the process by which "any person may request the department to approve an equivalent testing method..." This condition would unnecessarily limit options available to the Permittees for compliance with testing requirements of WAC 173-303-110.

47. **Condition III.8.B.c.84.**

Key Comment: Inconsistent with Regulations, Hinders Cost-Effectiveness

Draft Permit condition as proposed by the Department of Ecology:

Delete "SW-846 or any other method allowed by regulations" in line 28, page 7-3, and replace with "this Permit."

Condition Impact Statement: This condition arbitrarily would restrict the Permittees' ability to use reliable test methods that may be approved via an equivalent testing method petition as allowed by WAC 173-303-110.

Requested Action: Delete this condition

Comment Justification: WAC 173-303-110 allows for use of SW-846 and other methods to meet the requirements of WAC 173-303. WAC 173-303-110(5) provide the process by which "any person may request the department to approve an equivalent testing method..." This condition would unnecessarily limit options available to the Permittees for compliance with testing requirements of WAC 173-303-110.

48. **Condition III.8.B.d.1.**

Key Comment: Lack of Regulatory Authority, Inconsistent with Regulations, Hinders Cost-Effectiveness

Draft Permit condition as proposed by the Department of Ecology:

With the exception of spill materials (that spill material which is specifically generated within the CWC facility boundary) waste treatment by CWC must be approved by the Department prior to execution. In the event that waste treatment at CWC is a consideration, the following actions must take place: (1) The permittee must revise pertinent Part B Permit chapters (e.g., the WAP, BEP) and submit them to the Department for review and approval sixty (60) days prior to when treatment is scheduled to begin, and (2) Upon approval, the revised information will

CONDITION/COMMENT/JUSTIFICATION

be incorporated into the Permit through a Class 3 modification.

Condition Impact Statement: This condition as drafted would restrict the Permittees from treating waste as allowed by WAC 173-303-630 and the CWC Part A, Form 3.

Requested Action: Delete this condition.

Comment Justification: WAC 173-303-630 contains adequate standards for storage and/or treatment of waste in containers. WAC 173-303 does not contain any restrictions requiring permitted facilities to request permission on a case-by-case basis before treatment. This condition exceeds the regulatory requirements of WAC 173-303 and the provisions of interim status as applied at CWC. All final status permits for container management are issued in accordance with the same standards, irrespective of whether the containers are used for storage or treatment. Generators are allowed by regulation to treat waste without securing a case-by-case approval from the Department of Ecology. WAC 173-303-600(3)(m) states, "the final facility standards do not apply to ... Generators treating dangerous waste on-site in tanks, containers, or containment buildings that are used for the accumulation of such wastes provided the generator complies with WAC 173-303-170(3)." CWC currently is allowed to treat waste in accordance with WAC 173-303-805 and its Part A, Form 3. There is no justification for arbitrarily removing this flexibility.

This condition as drafted would impose unnecessary cost and would limit the ability of the Permittees to treat waste as allowed by WAC 173-303. The U.S. Department of Energy must retain flexibility that allows for safe and cost-effective management of waste without unnecessary time and expenditure in seeking permit revisions.

49. **Condition III.8.B.d.2.** **Key Comment:** Inconsistent with Regulations

Draft Permit condition as proposed by the Department of Ecology:

Permittee shall identify critical systems for safe management of dangerous waste and mixed waste at CWC as required in Facility Condition II.L.2.b of this permit. The Permittee shall describe the location and function of each critical system identified. This information shall be submitted to the Department within thirty (30) days of issuance of this permit and, upon approval by the Department, incorporated as a Class 1 modification. If necessary, The Department will amend the requirements through a Class 2 or 3 modification to the Permit.

Condition Impact Statement: This condition would require identification/descriptions of critical systems in accordance with Condition II.L.2.b.

Requested Action: Modify this permit condition to read:

"The CWC operating organization will identify critical system(s) within 180 days after the effective date of the Final Permit."

Comment Justification: Agreement has not yet been reached with the Department of Ecology on how to identify critical systems. Thus, 180 days is needed to develop criteria, apply these to CWC, and finalize the documentation.

The permit conditions in this modification *will not become effective until 30 days after issuance*. Hence, requiring submittals based on the issuance date would impose permit conditions before the effective date of the permit.

50. **Condition III.8.B.e.1.** **Key Comment:** Potential for Compliance Issues,
Redundant/Nonenforceable

Draft Permit condition as proposed by the Department of Ecology:

Table 7-1. Delete second footnote.

Condition Impact Statement: This condition simply deletes text that accurately describes applicability of WAC 173-303-350(3)(b).

Requested Action: Delete this condition

CONDITION/COMMENT/JUSTIFICATION

Comment Justification: This condition as drafted does not seem to impose any requirements or restrictions on the Permittees. The footnote that would be deleted per this condition is taken directly from WAC 173-303. Deletion of the text does not change the Permittees' position with regard to its intent or the intent of the text for which the footnote was written.

If the intent of the Department of Ecology is to deny the accuracy of the statement being deleted, the Permittees believe such action would exceed regulatory authority of the Department of Ecology.

WAC 173-303-350(3) imposes a requirement to implement the contingency plan when the owner/operator determines that *containers are damaged to such an extent, or the dangerous waste is in such condition as to present a hazard to the public health or the environment in the process of transportation.*

The requirement of WAC 173-303-350(3)(b) applies to:

- *manifested* waste shipments received from *off the facility* and
- that is unacceptable to the owner/operator, but cannot be transported, and
- that is determined by the *emergency coordinator* to threaten *public health* or the environment.

Application of WAC 173-303-350(3)(b) is only appropriate when all three of these are true. Application of this requirement to activities performed by the owner/operator in managing its own waste is arbitrary and clearly exceeds regulatory authority.

51. **Condition III.8.B.f.1.** **Key Comment:** Lack of Regulatory Authority

Draft Permit condition as proposed by the Department of Ecology:

Section 9.5 shall be revised to include catalytic recombiners.

Condition Impact Statement: This condition as drafted would impose requirements associated with the radioactive component of mixed waste without regulatory authority.

Requested Action: Delete this condition.

Comment Justification: WAC 173-303-010 lists the purposes of WAC 173-303. All purposes relate to dangerous and extremely hazardous waste. WAC 173-303 does not contain standards for radioactive waste or the radioactive component of mixed waste. This condition would require use of catalytic recombiners for emergency response spill control without regulatory authority. Catalytic recombiners are inappropriate for use during emergencies and serve no purpose for spill control and containment. Spills involving mixed waste are safely cleaned up and contained without the use of catalytic recombiners. Catalytic recombiners routinely are used to control emissions from the radioactive component of mixed waste during repackaging activities and are limited in application to the radioactive component of waste, which the U.S. Department of Energy must retain authority to regulate.

The U.S. Department of Energy must retain jurisdiction over the source, special nuclear, and byproduct material components of mixed waste in accordance with the Atomic Energy Act. Refer to comment on Draft Permit Condition III.8.B.c.7.

52. **Condition III.8.B.j.1.** **Key Comment:** Hinders Cost-Effectiveness,
Redundant/Nonenforceable

Draft Permit condition as proposed by the Department of Ecology:

On Page 12-1, Line 37, add "The Permittee will produce and place as-built drawings in the CWC operating record within six (6) months of issuance of this permit. In addition, the referenced as-built drawings will be revised at least every twelve (12) months to incorporate all outstanding engineering change notices (ECNs) and Non Conformance Reports (NCRs)."

CONDITION/COMMENT/JUSTIFICATION

Condition Impact Statement: This condition would impose redundant requirements upon the Permittees and would require modifications to drawings in accordance with an arbitrary schedule.

Requested Action: Delete this condition.

Comment Justification: The first sentence of this condition is unnecessary because as-built drawings were provided with the CWC permit application, a copy of which will be maintained in the CWC operating record as specified in Chapter 12.0 of the CWC permit application and Chapter 12.0 of *Hanford Facility Dangerous Waste Permit Application*, DOE/RL-91-28. The second sentence of the Draft Permit Condition is unnecessary because the Permittees already are obligated to provide engineering change notices to the Department of Ecology quarterly in accordance with Hanford Facility Resource Conservation and Recovery Act Permit, Dangerous Waste Portion, Condition I.C.3. These engineering change notices constitute revisions to the as-built drawings. Drawings are updated periodically, not based on an arbitrary schedule, but based on the number and type of engineering change notices that amend a particular drawing. There is no basis in WAC 173-303-810 or 830, or elsewhere for requiring revision of drawings as would be imposed by this condition.

The engineering change notices and revised drawings are placed in the CWC operating record in accordance with Chapter 12.0 of the CWC permit application. Hanford Facility Resource Conservation and Recovery Act Permit, Dangerous Waste Portion, General Condition II.L.2.d. requires placement of as-built drawings that incorporate modifications for completed projects in the operating record within 12 months of completion. This condition as drafted would require that as-builts must be amended every 12 months to incorporate engineering change notices and noncomformance report. Proper documentation is maintained and the Department of Ecology receives timely notification in accordance with Condition II.L.2.d.. Therefore, this condition should be unnecessary.

53. **Condition III.8.B.j.2.**

Key Comment: Inconsistent with Regulations, Potential for Compliance Issues, Hinders Cost-Effectiveness, Redundant/Nonenforceable

Draft Permit condition as proposed by the Department of Ecology:

On Page 12-1, add "All unit specific reporting requirements identified in Table 12-1 of the General Information Portion "DOE/RL-91-28" are applicable to the CWC unit."

Condition Impact Statement: This condition would arbitrarily impose reporting requirements that have no relevance to CWC activities.

Requested Action: Delete this permit condition.

Comment Justification: There are no provisions in WAC 173-303 that allow for regulations that are not relevant to a facility's activities to be enforced through a permit. This condition (in conjunction with the condition following this one) would require unnecessary expenditure to interpret regulations for the Department of Ecology without any benefit to public health or the environment.

There is no regulatory basis for the random assignment of requirements from Table 12-1 to CWC. Table 12-1 is a comprehensive list of requirements that are generally applicable on the Hanford Facility and it was not submitted with the expectation that it would be applied in its entirety as a permit condition for one unit. Some requirements listed in Table 12-1 are obviously not applicable to CWC. For example, groundwater monitoring would not apply to CWC simply because it does not meet the WAC 173-303-040 definition for "regulated unit." This condition would be inconsistent with regulatory requirements.

54. **Condition III.8.B.j.3.**

Key Comment: Inconsistent with Regulations, Potential for Compliance Issues, Hinders Cost-Effectiveness, Redundant/Nonenforceable

Draft Permit condition as proposed by the Department of Ecology:

The Permittee shall identify requirements from Table 12-1 of the General Information Portion "DOE/RL-91-28"

CONDITION/COMMENT/JUSTIFICATION

that are not applicable to CWC and provide justification as to why they are not applicable. This information shall be submitted to the Department within thirty (30) days of issuance of this permit and, upon approval by the Department, incorporated as a Class 1 modification. If necessary, The Department will amend the requirements through a Class 2 or 3 modification to the Permit.

Condition Impact Statement: This condition would require the Permittees to perform a regulatory interpretation for the Department of Ecology to justify that certain self-explanatory regulations are not relevant to CWC operations.

Requested Action: Delete this condition.

Comment Justification: This condition, in conjunction with Draft Permit Condition III.8.B.j.2. would require the Permittees to waste time and effort trying to convince the Department of Ecology that its own rules allow that some reporting activities would not be applicable to CWC activities. There is no basis for the Department of Ecology to take the position that reporting requirements be taken out of context and inappropriately applied to CWC. There is no rationale for expecting the Permittees to justify the lack of applicability when the regulations should adequately enable one to determine scope. The Department of Ecology did not require that this approach be taken for the treatment, storage, and/or disposal units incorporated into Part III of the Permit through the previous modification (Revision 4A).

CONDITION/COMMENT/JUSTIFICATION

1. **Condition III.1.B.d.**

Key Comment: Potential for Compliance Issues,
Redundant/Nonenforceable

Draft Permit condition as proposed by the Department of Ecology:

Table 7.1, delete second footnote.

Condition Impact Statement: This condition simply deletes text that accurately describes applicability of WAC 173-303-350(3)(b).

Requested Action: Delete this condition

Comment Justification: This condition as drafted does not seem to impose any requirements or restrictions on the Permittees. The footnote that would be deleted per this condition is taken directly from WAC 173-303. Deletion of the text does not change the Permittees' position with regard to its intent or the intent of the text for which the footnote was written.

If the intent of the Department of Ecology is to deny the accuracy of the statement being deleted, the Permittees believe such action would exceed regulatory authority of the Department of Ecology.

WAC 173-303-350(3) imposes a requirement to implement the contingency plan when the *owner/operator* determines that *containers are damaged to such an extent, or the dangerous waste is in such condition as to present a hazard to the public health or the environment in the process of transportation*.

The requirement of WAC 173-303-350(3)(b) applies to:

- *manifested* waste shipments received from *off the facility*, and
- that is unacceptable to the *owner/operator*, but cannot be transported, and
- that is determined by the *emergency coordinator* to threaten *public health* or the environment.

Application of WAC 173-303-350(3)(b) is only appropriate when all three of these are true. Application of this requirement to activities performed by the owner/operator in managing its own waste is arbitrary and clearly exceeds regulatory authority.

2. **Condition III.1.B.g.**

Key Comment: Inconsistent with Regulations

Draft Permit condition as proposed by the Department of Ecology:

Within thirty (30) days of issuance of this permit, the Permittees will revise and submit to the Department Section 9.5 of Appendix 7A, to more accurately identify the quantity and capacity of spill control equipment available at the unit.

Condition Impact Statement: This condition as drafted would impose requirements before the effective date of the Permit.

Requested Action: Reword the condition to state: "Within thirty (30) days after the effective date of this permit, the Permittees will revise and submit to the Department of Ecology Section 9.5 of Appendix 7A, to more accurately identify the quantity and capacity of spill control equipment available at the unit."

Comment Justification: The permit condition in this modification *will not become effective until 30 days after issuance*. Hence, requiring submittals based on the issuance date would impose permit conditions before the effective date of the Permit.