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Office of Air Quality  
Planning and Standards  
Research Triangle Park, NC 27711

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September 2000



**CONSOLIDATED FEDERAL AIR RULE FOR THE  
SYNTHETIC ORGANIC CHEMICAL  
MANUFACTURING INDUSTRY - BACKGROUND  
INFORMATION FOR PROMULGATED  
STANDARDS**



**Consolidated Federal Air Rule  
for Synthetic Organic Chemical  
Manufacturing Industry**

**Background Information for  
Promulgated Standards**

Emission Standards Division

U.S. ENVIRONMENTAL PROTECTION AGENCY  
Office of Air and Radiation  
Office of Air Quality Planning and Standards  
Research Triangle Park, North Carolina 27711

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CONSOLIDATED FEDERAL AIR RULE FOR  
SYNTHETIC ORGANIC CHEMICAL  
MANUFACTURING INDUSTRY

BACKGROUND INFORMATION FOR  
PROMULGATED STANDARDS

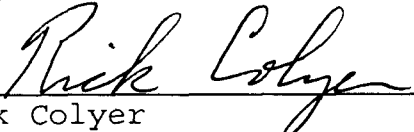
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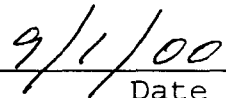
Environmental Protection Agency

CONSOLIDATED FEDERAL AIR RULE  
FOR SYNTHETIC ORGANIC CHEMICAL  
MANUFACTURING INDUSTRY

BACKGROUND INFORMATION FOR  
PROMULGATED STANDARDS

Prepared by:

  
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Date

1. The promulgated consolidated Federal air rule provides a compliance option to several standards previously promulgated under Sections 111 and 112 of the Clean Air Act. It acts to consolidate similar rules that apply to the same types of emission points at an industrial site, thereby eliminating differences among these rules and reducing burden. One of President Clinton's and Vice President Gore's reinventing environmental regulation initiatives directs EPA to consolidate Federal air rules, so that Federal air rules for a single industry would be incorporated into a single rule. This rule would consist of "...one set of emission limitations, monitoring, and recordkeeping and reporting requirements."

2. Copies of this document have been sent to the following Federal Departments: Labor, Health and Human Services, Defense, Transportation, Agriculture, Commerce, Interior, and Energy; the National Science Foundation; the Council on Environmental Quality; State and Territorial Air Pollution Program Administrators; EPA regional Administrators; Local Air Pollution Control Officials; Office of Management and Budget; and other interested parties.

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## LIST OF ACRONYMS

Act	Clean Air Act
CAR	Consolidated Federal Air Rule
CEMS	Continuous emissions monitoring systems
CFR	Code of Federal Regulations
CMPU	Chemical manufacturing process unit
CPMS	Continuous parameter monitoring system
EFR	External floating roof
EPA	Environmental Protection Agency
FR	Federal Register
HAP	Hazardous air pollutant
HON	Hazardous Organic NESHAP
IFR	Internal floating roof
L/G	Liquid-to-gas
MACT	Maximum achievable control technology
NESHAP	National emission standard(s) for hazardous air pollutants
NSPS	New source performance standards
PPM	Parts per million
PPMV	Parts per million by volume
PSIG	Pound per square inch gauge
QIP	Quality improvement plan
RACT	Reasonably available control technology
RCRA	Resource Conservation and Recovery Act
SCU	SOCMI CAR unit
SIP	State implementation plan
SOCMI	Synthetic organic chemical manufacturing industry
SSM	Startup, shutdown, and malfunction
TRE	Total resource effectiveness

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## 1.0 INTRODUCTION

On October 28, 1998, the U.S. Environmental Protection Agency (EPA) proposed the "Consolidated Federal Air Rule (CAR): Synthetic Organic Chemical Manufacturing Industry" (63 FR 57748). The Consolidated Federal Air Rule (CAR) is a consolidation of Federal air rules affecting the synthetic chemical organic manufacturing industry (SOCMI). We selected the Federal air rules applying to the SOCMI for a pilot project to study the feasibility and practical implications of consolidating and streamlining existing rules, and to establish a workable process for consolidation that can be applied to other consolidation efforts in the future. The CAR is one of the initiatives announced by President Clinton and Vice President Al Gore on March 16, 1995 to reinvent environmental regulation.

We solicited public comments on the success of this pilot project as measured against the 10 principles for reinventing environmental regulation, which are listed in the proposal preamble (63 FR 57792). We received comments on these issues as well as other issues raised by the commenters. We also solicited public comments on whether the CAR meets specific goals, which are discussed in sections VI and XII of the proposal preamble (63 FR 57759 and 57792). A public hearing was offered, but none was requested. At the request of several parties, we reopened the comment period for 30 days so that all parties could have additional time to prepare comments on the proposed rule. The EPA received written public comments from the commenters listed in table 1.

This document summarizes the comments received and presents EPA's responses. The comments have been grouped into sections by

subject. Section 2.0 contains comments of a general nature, such as those addressing the scope, applicability, structure, and format of the rule. Section 3.0 presents comments specific to each of the subparts of the proposed rule (general provisions, storage vessels, process vents, transfer racks, equipment leaks, and closed vent systems and control devices). Section 4.0 lists comments on implementation issues and title V interaction. Section 5.0 hosts the comments EPA received on the proposed changes to the equipment leaks referencing subparts. Finally, section 6.0 concludes by listing miscellaneous comments.

TABLE 1. LIST OF COMMENTERS

Document Number	Commenter
IV-D-01	B.M. Higgins, Chair, STAPPA Air Toxics Committee, and R.H. Colby, Chair, ALAPCO Air Toxics Committee, State and Territorial Air Pollution Program Administrators/Association of Local Air Pollution Control Officials (Request to extend comment period.)
IV-D-02	N.L. Morrow, Safety and Environmental Affairs Division, Exxon Chemical Americas (ECA), Houston, TX (Request to extend comment period.)
IV-D-03	Comments of Millennium Specialty Chemicals, Inc. (MSC) and Bush Boake Allen, Inc. (BBA) (collectively, the Terpene Processors), submitted by H.T. Vinyard, Jr., Counsel, Smith, Hulsey & Busey, Jacksonville, FL
IV-G-01	L. Platt, EH&S Regulatory Management Expertise Center, Dow Chemical Company, Freeport, TX
IV-G-02	Supplemental comments by L. Platt, EH&S Regulatory Management Expertise Center, Dow Chemical Company, Freeport, TX (duplicate)
VI-D-01	B. Mathur, Chief, Bureau of Air, Illinois Environmental Protection Agency, Springfield, IL
VI-D-02	N.L. Morrow, Exxon Chemical Americas (ECA), Houston, TX
VI-D-03	R.I. Zvaners, Senior Manager, Environmental Policy, Chemical Manufacturers Association (CMA), Arlington, VA
VI-D-04	J.L. Woolbert, Technical Associate, Eastman Chemical Company, Longview, TX
VI-D-05	N. Dee, Director, Environmental Affairs, National Petrochemical & Refiners Association (NPRA), Washington, DC

Document Number	Commenter
VI-D-06	B.M. Higgins, Chair, STAPPA Air Toxics Committee, and R.H. Colby, Chair, ALAPCO Air Toxics Committee, State and Territorial Air Pollution Program Administrators/Association of Local Air Pollution Control Officials
VI-G-01	Comments of Stepan Company, submitted by P.F. Sharkey, Attorney, Mayer, Brown, & Platt, Chicago, IL
VI-G-02	J.S. Pew, Attorney, Earthjustice Legal Defense Fund, Washington, DC
VI-G-03	J. Marsh, Regulatory Affairs Director, Chemical Industry Council of Illinois (CICI), Rosemont, IL
VI-G-04	Supplemental comments of Stepan Company, submitted by P.F. Sharkey, Attorney, Mayer, Brown, & Platt, Chicago, IL (duplicate)
VI-G-05	N. Carlson Manager, Environmental Programs, Elf Atochem North America, Inc., Philadelphia, PA

## 2.0 GENERAL

Comment: Several commenters (VI-D-02, VI-D-03, VI-D-04, VI-D-06) commended our efforts in developing the CAR. One commenter (VI-D-03) praised the process we used to achieve this proposed rule and encouraged using the CAR development process as a model in other rulemaking activities.

Response: We appreciate this supporting comment and agree that lessons learned from the CAR development process will be applied in any future consolidation efforts.

Comment: Several commenters (IV-G-01, VI-G-03, VI-D-03, VI-D-06, VI-D-01) support our proposal of making the CAR an optional compliance method. One commenter (IV-G-01) cited several examples, some from the preamble of the proposed rule, of why the CAR should be optional. Another commenter (VI-D-03) indicated that the CAR will neither benefit all facilities nor benefit all facilities equally, therefore facilities will need to determine the benefit of the CAR on a case-by-case basis. One commenter (VI-D-06) pointed out that by making the CAR optional, the CAR affords industry a reasonable amount of flexibility while maintaining current stringency levels and avoiding an excessively complex rule.

Response: We appreciate this supporting comment and note that the final rule retains the CAR as an optional compliance method. We also agree that the CAR would not necessarily benefit every source and that your decisions will be made on a case-by-case basis.

Comment: One commenter (VI-D-06) encouraged us to develop consolidated air rules for other industry sectors in the future. The commenter (VI-D-06) suggested that rules applying to surface

coating operations would be amendable to this more efficient compliance mechanism.

Response: We will monitor how this pilot consolidated rule for the SOCM I is received. Depending on its popularity and effectiveness, we may expand the current rule or develop other consolidated rules; given available resources.

## 2.1 CAR OBJECTIVES AND BURDEN REDUCTION

Comment: Two commenters (VI-D-02, VI-D-03) agree that the CAR contains explicit solutions for many troublesome overlap issues among existing regulations. Specifically, the commenter (VI-D-03) believes the CAR: (1) facilitates implementation and compliance by clarifying requirements, (2) explicitly describes how to determine applicability and rule overlap using a detailed level of analysis rather than a generic level, and (3) addresses many overlap issues that had not been resolved before this proposal using a logical, consistent, and rational approach.

Response: We thank the commenters for their support of the approach taken by the CAR to reduce confusion regarding overlap of existing regulations.

Comment: One commenter (VI-D-03) agrees that the CAR meets the President's objectives for rule consolidation. Specifically, the commenter stated that the CAR incorporates the burden reduction options allowed in earlier rules and extends the benefits to other compliance areas. The commenter stated that the CAR also accomplishes the reinvention objective by providing a more user-friendly structure and format and through clarification and simplification. Another commenter (IV-G-01) stated that the CAR goes a long way in reducing conflicting and overlapping requirements, but does not eliminate them which is one of the President's objectives: to "eliminate conflicting and overlapping Federal air compliance requirements."

Response: We appreciate feedback from the commenter regarding meeting the President's objectives for rule consolidation. We maintain, however, that all overlap issues

have been eliminated for the rules that are consolidated in the CAR. Not all rules have been included and further discussion on the decisions made regarding the rules to include in the CAR is in section 2.2, Scope.

Comment: One commenter (VI-G-03) agreed that the CAR provides a single set of recordkeeping, reporting, and monitoring requirements by consolidating the requirements of several rules into one rule. This consolidation provides a significant reduction in burden; for example, the consolidated provisions require periodic reporting only twice annually. Two commenters (VI-D-02 and VI-D-06) asserted that the consolidation of monitoring, reporting and recordkeeping requirements will result in simplifying regulatory requirements, encouraging source compliance with the regulations, and providing a clearer oversight role for the implementing agencies.

Response: We thank the commenters for this feedback regarding the CAR's consolidated recordkeeping, reporting, and monitoring requirements.

Comment: One commenter (VI-G-03) indicated that, as currently proposed, the CAR does not eliminate all instances of overlapping requirements. The commenter (VI-G-03) gave an example when a product accumulator vessel (either distillate or bottoms) is also used to store material, it is subject to both subparts V and FF of 40 CFR part 61. Subpart V requires product accumulator vessels to be equipped with closed vents and control devices, but subpart FF does not limit controls to closed vents and control devices. The commenter further stated that subpart V required leaks in the closed vent system to be repaired within 5 days, whereas subpart FF allows these units to leak for up to 45 days before repairs are required. The commenter (VI-G-03) recommended that the CAR should directly address issues such as the multiple uses of a product accumulator vessel and should eliminate persistent conflicts under existing regulations.



Response: The provisions of 40 CFR part 61, subpart FF apply to waste management units. The provisions of 40 CFR part 61, subpart V apply to surge control vessels and bottoms receivers. The decision as to which rule applies would have already been made prior to using the CAR. The commenter did not elaborate on the situation where one vessel could be subject to both rules and we can not identify a situation where this might happen. Also, subpart FF is not within the scope of the CAR; all overlapping provisions have been eliminated among the rules consolidated in the CAR.

Comment: One commenter (IV-G-01) expressed that the degree of burden reduction from using the CAR has not been substantiated. The commenter (IV-G-01) further asserted that burden reductions from the CAR will vary from facility to facility and that, even if the overall average burden reduction is significant, the reduction to any one facility may be so small that it would not offset the additional time, effort, and expense necessary to train personnel to use the CAR. Such facilities may choose not to use the CAR.

Response: We agree with the comment that burden reductions from using the CAR will vary among facilities and the burden reduction to any one facility may not offset the time, effort, and expense of training personnel to use the CAR. Such facilities may choose not to use the CAR. However, we point out that not all facilities will fall into this category. Many facilities will incur a benefit from using the CAR, especially those subject to several of the referencing subparts. While the true burden reduction of any proposed rule cannot be known prior to the rule's promulgation and implementation, we have made every effort to reasonably estimate the burden reduction attributable to the CAR. We maintain that several benefits can be obtained by sources complying with the CAR as described in the proposal preamble at 63 FR 57790. Each source can assess its benefits and decide whether to use the CAR as a compliance option. These benefits were not questioned by the commenter.

Comment: One commenter (IV-G-01) indicated that switching from compliance with one rule to compliance with another rule requires a steep learning curve on the part of company and facility personnel. The commenter (IV-G-01) suggested that any time such a switch occurs there is increased potential for noncompliance until the facility becomes sufficiently experienced with the new rule. The commenter (IV-G-01) suggested that this would be a particular concern with the CAR, because it is more detailed in some respects than the rules it would replace.

Response: We concur with the commenter's assertion that the CAR will require a learning curve on the part of company and facility personnel. However, the provisions in the CAR are based on provisions in the referencing subparts with which sources must already comply. Therefore, company and facility personnel should find that they are familiar with most of the provisions in the CAR. Where these provisions differ is usually a reduction in burden or an increase in flexibility, or a limited increase in burden, such as with the requirements for halogen scrubbers. Any source believing that the learning curve is too steep can continue to comply with the existing subparts with which they are familiar. Additionally, a source considering using the CAR can take any amount of time necessary before making the decision to do so. Therefore, we do not concur that there will be an increase in misunderstanding of compliance obligations. It is important to remember that, at all times, facilities must be in compliance either with the referencing subparts or the CAR. When choosing to comply with the CAR, facilities are obligated to comply with the applicable referencing subparts until the CAR is implemented.

Comment: One commenter (VI-G-03) alleged that the CAR's imposition of more stringent control requirements is a substantial disincentive to using the CAR. The commenter (VI-G-03) contended that we should reconsider whether the consolidation of procedural requirements such as monitoring and

reporting necessarily requires application of the most stringent level of control at any given SOCFI CAR unit(SCU).

One commenter (VI-D-03) accepts the imposition of a halogen scrubber requirement for some new source performance standard (NSPS) process vents, because it is acceptable to have occasional increased stringency as a trade-off for the rule simplicity provided by the CAR, particularly since the CAR is an optional rule.

Response: The commenter (VI-G-03) did not specify the increases in stringency that are substantial disincentives to using the CAR. However, we assume the commenter is referring to the proposed increase in control stringency due to controlled fittings being applied to 40 CFR part 60, subparts Ka and Kb tanks; halogen vent stream control applied to 40 CFR part 60, subparts III, NNN, and RRR process vents and 40 CFR part 61, subpart BB transfer racks; and instrument monitoring for connectors applied to connectors subject to 40 CFR part 60, subpart VV and 40 CFR part 61, subpart V. In these cases, we proposed an increase in control stringency because maintaining the differences in stringency would have made for a very complicated rule that was not actually a consolidation. Also, the stringency could not be decreased for the most stringent rule because this would cause less emissions to be controlled than required by the most stringent rule.

We agree with the commenter (VI-D-03) that the optional nature of the CAR alleviates concern with the rare increases in stringency. We also maintain that the level of burden associated with the control of additional fittings and control of halogenated vent streams is small when considering that the number of SOCFI tanks and halogenated vent streams that would not be subject to the hazardous organic NESHAP (HON) is small. There are few SOCFI sources that would experience this increase in stringency. Also, if an individual source would not experience a net benefit from using the CAR, there is no requirement forcing the source into the CAR. With the change in the final rule

eliminating the SCU concept (see section 2.3.1) and allowing any source or affected facility subject to a referencing subpart to opt into the CAR, there is even more flexibility for a facility to use the CAR only where it benefits the facility.

For connectors, however, we have been persuaded that the increase in burden of instrument connector monitoring for sources not subject to the HON but subject to 40 CFR part 60, subpart VV or 40 CFR part 61, subpart V could be a substantial disincentive to using the CAR for these sources. We have provided alternative provisions to the proposed instrument connector monitoring that follow the inspection requirements for connectors in subparts V and VV. These alternative provisions are an option for connectors subject to subparts V or VV but not the HON. See section 3.5.10 for further discussion on the change to the connector provisions.

## 2.2 SCOPE

### 2.2.1 Incorporating or Allowing Other Rules in the CAR

Comment: Several commenters (IV-G-01, VI-D-02, VI-D-03, VI-D-04, VI-D-05) support increasing the scope of the CAR so that it completely incorporates other rules applicable to SOCM I sources. All of these commenters (IV-G-01, VI-D-02, VI-D-03, VI-D-04, VI-D-05) specifically mentioned the HON wastewater provisions (40 CFR part 63, subpart G); four of the commenters (VI-D-02, VI-D-03, VI-D-04, VI-D-05) specifically mentioned the Benzene Waste NESHAP provisions (40 CFR part 61, subpart FF); and three commenters (IV-G-01, VI-D-02, VI-D-04) specifically mentioned the SOCM I wastewater NSPS (40 CFR part 60, subpart YYY). One commenter (IV-G-01) requested consolidation of several other rules affecting SOCM I including HON Group 2 transfer racks and storage vessels, emission points not requiring control under the non-HON referencing subparts, marine loading under 40 CFR part 61, subpart BB, and equipment leak provisions under resource conservation and recovery act (RCRA) rules subpart BB. One commenter (IV-G-01) argued that, without

including additional regulations in the consolidation, the CAR cannot achieve its goals of (1) having a single set of consolidated requirements for the SOCFI, and (2) reducing the complexities of overlapping regulations among different Federal air programs. The commenter (IV-G-01) alleges that sources, in most cases, have no incentive to use the CAR and concludes that the CAR must consolidate several additional rules in order to provide this incentive.

Four commenters (VI-D-01, VI-D-02, VI-D-03, VI-D-05) were specifically interested in consolidating all rules that may apply to a facility that has a SOCFI process unit on site. All four commenters requested that sources subject to the Petroleum Refinery NESHA, 40 CFR part 63, subpart CC be allowed to use the CAR to comply with subpart CC. Two commenters (VI-D-02, VI-D-03) also referred to the following 40 CFR part 63 subparts as rules that should use the CAR as a compliance option: I, U, W, DD, TT, OO, UU, WW, and JJJ. The commenter (VI-D-03) encouraged us to define CAR requirements as acceptable for requirements in non-consolidated rules that are likely to overlap with the CAR at SOCFI sites. The commenter (VI-D-03) noted that one goal of the CAR is to allow similar and shared systems at SOCFI facilities to use one set of compliance requirements. Therefore, the commenter (VI-D-03) concluded it is important to assure that all rules that could impact those facilities are considered in the consolidation. Until these relevant rules are added to the CAR, the commenter (VI-D-03) argued, the critical overlaps must be addressed because this is, perhaps, the single largest impediment to facilities adopting the CAR. The commenter (VI-D-03) asserted that maximizing the use of the CAR will provide the most burden reduction and compliance assurance for States and facilities. The commenter (VI-D-03) provided examples of language from other rules that address overlap as well as recommended changes to the language of the CAR at §65.1(c) and addition of new language at §65.1(n).

Response: We agree that the CAR does not consolidate all rules applicable to the SOCMCI or to sources with SOCMCI processes on site. However, as stated in the preamble (63 FR 57750), the scope of the CAR, as a pilot project, was limited to Federal Clean Air Act (Act) rules that apply to SOCMCI, because these rules would provide benefit to affected sources, yet the scope was defined well enough to ensure a reasonable chance of success. Other rules were considered in this consolidation, but their incorporation would have made the process unmanageable in a reasonable amount of time. Some rules considered for consolidation were subject to substantial changes in litigation when the CAR process started and others are currently in litigation. To include additional rules in the consolidation effort at this point would require a supplemental proposal. We consider our efforts better spent finishing this proposal. We maintain that there can be significant burden reduction with the rules that are currently consolidated and that reduction will persuade sources to use the CAR. We do not agree that sources have no incentive to use the CAR.

Comment: Four commenters (VI-D-01, VI-D-02, VI-D-06, VI-G-03) requested that we consider using the CAR as a compliance option for new regulations. Two commenters (VI-D-01, VI-D-02) specifically mentioned the Miscellaneous Organic NESHAP; one commenter (VI-D-06) mentioned the Generic Maximum Achievable Control Technology (MACT); and one commenter (VI-D-02) mentioned the Ethylene MACT. One commenter (VI-D-01) recommended that any new regulations applicable to the SOCMCI that may be promulgated should be incorporated into the CAR for use by affected sources that have opted to use the CAR. The commenter (VI-D-01) stated that in this case, additional incorporated rules would follow part 70 on opting new rules into a title V permit as they are promulgated.

Response: We may consider using the CAR in future rulemakings. Because of the timing of the generic MACT's promulgation, it was not possible to consolidate that rule into

the CAR. However, the generic MACT employs similar structure, concept, and provisions as the CAR.

Comment: One commenter (VI-D-03) noted that the proposed language in §60.560(j) and (k) would not allow polystyrene process vents subject to 40 CFR part 60, subpart DDD, to use the CAR. The commenter pointed out that similar polyethylene process vents subject to subpart DDD are allowed to use the CAR. The commenter suggested that this exclusion resulted from a drafting problem and provided revised language to allow polyethylene and polystyrene process vents the option of complying with the CAR.

Response: We agree that the polystyrene process vents subject to subpart DDD that choose the control device or flare compliance option should be allowed to opt into the CAR. We have edited the final rule to allow this option.

Comment: Some commenters (IV-G-01, VI-D-02, VI-D-03, VI-D-04, VI-D-06) requested that rules that refer to referencing subparts should be allowed to use the CAR as a compliance option. Three commenters (IV-G-01, VI-D-02, VI-D-03) specifically mentioned 40 CFR part 63, subpart I and the polymers and resins MACT standards. Two commenters (VI-D-04, VI-D-06) requested any MACT standard that points to the HON be allowed the option to comply with the CAR. Two commenters (IV-D-02, VI-D-03) stated that subpart DDD requires compliance with subpart VV for equipment leaks. The commenters (VI-D-02, VI-D-03) indicated that a change is needed in §60.560 of subpart DDD to make clear that compliance with the CAR subpart F for equipment leaks is allowed as an alternate to complying with 40 CFR part 60, subpart VV. The commenter (VI-D-02) stated that the CAR, in general, is unclear on the situation in which a process unit is subject to a referencing subpart (in this case subpart VV) by reference from another rule (subpart DDD). The commenter suggested that we amend the applicability of the CAR to clearly state the options for these types of units.

The commenter (VI-D-03) stated that additionally, because 40 CFR part 60, subpart DDD is applicable only on a process

section by process section basis, a preamble discussion is needed relative to §60.560(j) and (k) to clarify that process sections not triggering the applicability of 40 CFR part 60, subpart DDD will not become subject to the CAR if the CAR is adopted. The commenter (VI-D-03) provided suggested language for these recommended revisions.

Response: We have not expanded the scope of the final rule to include other regulations that refer to referencing subparts. The details, approach, and ramifications of allowing the CAR for these other rules have not been investigated. Many of the rules that point to the CAR's referencing subparts for requirements generally have complex references, with conditions and exceptions to the referencing subparts. To allow these rules to comply with the CAR would require us to study the conditions and exceptions and possibly develop detailed references for compliance with the CAR. We consider our efforts better spent finishing this rule so that the burden reductions associated with it can be used as soon as possible. Furthermore, expanding the scope of the CAR to other rules at this point would entail additional proposals.

The proposal preamble contained discussion that no equipment would become subject to a rule just because the CAR was used for compliance [63 FR 57751].

Comment: One commenter (VI-D-05) requested allowing equipment at petroleum refineries subject to a referencing subpart to opt into the CAR on the basis of ease of compliance determination by all parties, a reduction in paperwork and administrative cost, and flexibility.

Response: Under the proposed CAR, equipment at refinery processes subject to referencing subparts that were on the same plant site as a SCU complying with the CAR could opt into the CAR. However, with the increase in flexibility in the applicability of the final CAR any equipment subject to a referencing subpart can use the CAR as a compliance option. See section 2.3 for further discussion on the change in applicability.



### 2.2.2 Miscellaneous Scope Comments

Comment: One commenter (VI-G-03) asked that the CAR allow owners or operators to obtain emission reduction credits for any additional controls required under the CAR that are more stringent than the controls required by the referencing subparts. The commenter stated that these credits would be in addition to the credits the unit has already earned according to a voluntary program. The commenter asserted that this would encourage the use of the CAR.

The commenter (VI-G-03) noted that SOCMI sources in many States voluntarily apply controls in excess of existing regulations to obtain usable and marketable emission reduction credits. The commenter (VI-G-03) wanted to know if participants in the State programs or the Federal Early Reduction Program will still get credit for these programs if they opt to use the CAR. The commenter was concerned that the CAR would require an owner or operator to give up existing credits or the ability to obtain future credits when opting into the CAR.

One commenter (VI-G-03) noted that the monitoring and recordkeeping requirements for units subject to the Early Reduction Program in part 63, subpart D are specified in the title V permit rather than in the rules themselves. The commenter stated that this makes it unclear whether facilities with Early Reduction Units can opt into the CAR. The commenter (VI-G-03) supports allowing owners and operators with Early Reduction Units to opt into the CAR for the benefit of consistent regulation of storage vessels and other units. In such cases, the commenter stated that the owner or operator would retain the benefit of early reduction.

Response: The CAR does not have an emissions averaging or trading program specifically associated with it. Therefore, there is no basis to establish credits or debits for compliance with the CAR. If a State would like to incorporate the CAR into their voluntary emissions credit program and the program does not violate the state implementation plan (SIP) this is within the

States purview to establish. Whether a State gives credits for compliance with the CAR depends on the State's plan and the specific site. Whether a State allows sources to retain existing credits or generate additional credits for compliance with the CAR may affect the sources' decisions to use the CAR. It should be noted, however, that the added flexibility of opting into the CAR on an equipment basis rather than an SCU (see section 2.3, Applicability, for more discussion on this) has given the facility the option to choose the equipment complying with the CAR that will give the most benefit.

There is nothing in the CAR that prohibits all or part of an Early Reduction Source to opt into the CAR. However, the early reduction limits for the source would still have to be met unless the source chooses to give up its compliance extension.

Comment: One commenter (VI-D-04) asserted that one of the substantial transition costs to implement the CAR at existing facilities is the cost related to incorporating the CAR as an alternative compliance approach in Part 70 Operating Permits. The commenter pointed out that if the rule is promulgated very soon, there could be an opportunity in the State of Texas for some SOCMCI sources to minimize this transition cost by being able to implement the CAR into their initial part 70 permit applications. The commenter recommended that the rule be finalized quickly.

Response: We agree with the commenter that getting the CAR out in a reasonably timely manner is preferred, not only so that the implementation is coordinated with the Texas Title V permit program, but also to allow the burden reduction opportunities provided to the Industry to be used. We have processed the comments received, responded to the comments and made the appropriate changes to the regulation in a reasonably timely manner given the complexity of the rule.

Comment: One commenter (VI-D-03) praised the adoption of the CAR styles, structures, and language models into the generic MACT and other recent rulemaking actions and encouraged us to

continue this approach because it provides significant opportunity for burden reductions in regulatory development.

Response: We thank the commenter for their support.

## 2.3 APPLICABILITY

### 2.3.1 SOCMI CAR Unit

Comment: Several commenters (VI-D-01, VI-D-03, VI-D-06, VI-G-03) commented on the complexity and the confusion of either the SCU definition or the assignment procedures or both. Three commenters (VI-D-01, VI-D-06, VI-G-03) stated that SCU and what constitutes an SCU are not clearly defined in the rule. Two of the commenters (VI-D-01, VI-D-06) suggested that the CAR include some "real world" examples, as we did in the Early Reduction rules.

One commenter (VI-G-03) supports the proposal to allow the option of using the CAR on the basis of individual SCU's but said further clarification was needed. The commenter (VI-D-03) suggested describing an SCU determination in the following way:

- (1) as per the SCU definition, identify all equipment associated with the process that is impacted or could be impacted by the HON, subpart III, NNN, RRR, and/or VV rule requirements,
- (2) subject the identified equipment to a review of the applicable underlying rules to determine the "affected" equipment, and
- (3) apply the CAR only to the "affected" equipment.

Another commenter (VI-D-01) noted that the flexibility of the CAR is manifested in the ability of an affected source to define the affected chemical manufacturing process unit (CMPU) and to be able to subgroup the CMPU, which will clearly define the SCU's affected by the CAR. The commenter (VI-D-01) recommended that the CAR should encourage this subcategorization.

Another commenter (VI-D-06) believes that the applicability procedures may prohibit implementation at the State and local levels. The commenter (VI-D-06) specifically cited the assignment procedures in §65.1(j) and (k) of the CAR (emission

points commonly shared between process units) as excessively complicated. The commenter (VI-D-06) suggested that we consider a provision that would allow groups of like equipment subject to one of the referencing subparts (such as transfer racks or storage tanks) to implement the CAR, while other portions of the SCU may continue to comply with applicable referencing subparts.

Another commenter (VI-D-01) expressed concern that the CAR may be applicable to only a fraction of the tanks at a facility. The commenter (VI-D-01) recommended that if more than 50 percent of the storage vessels at a source are subject to the CAR, then the CAR should cover all storage vessels at that source. The commenter (VI-D-01) contends that this approach will simplify applicability, recordkeeping, and reporting.

Response: The proposed CAR required facilities to opt into the CAR on a SCU basis because we thought this would reduce potential complexity of implementing the CAR for regulatory authorities. During development of the proposed CAR, State representatives expressed a desire to allow larger portions of sources to opt in as opposed to a more piecemeal approach, indicating that it would be easier for them to enforce the rule. They felt that opting in on an SCU basis would provide a small enough collection of emission points and equipment to provide operational flexibility to the facility, but a large enough collection to avoid possible confusion and additional burden for regulatory authorities.

However, after reviewing the comments regarding the SCU and assignment procedures, we have concluded that the perceived confusion and complexity added by the SCU assignment procedures outweigh the reduction in burden and complexity to State inspectors by requiring facilities to opt in on a SCU (large collection of equipment) basis. Keeping track of which equipment is in or out of a SCU and which SCU is complying with the CAR appears to be more burdensome than keeping track of which emission point is complying with what rule which must be done anyway. We have simplified the applicability provisions of the

CAR by allowing in the final CAR any affected source subject to a referencing subpart to use the CAR as a compliance option with two exceptions described below. This means that a facility may choose to opt in, for example, one subpart Kb tank or all equipment at the facility that is subject to a referencing subpart. For both regulator and industry personnel, this eliminates the assignment procedures that determine what equipment constitutes a SCU. With this change, it is not necessary to keep track of new regulated sources and whether they are part of a SCU or not.

There are two situations where the regulated source in the CAR does not match the affected source of the referencing subpart. In one situation, the affected source for 40 CFR part 61, subpart V is an individual piece of equipment like a pump or a valve. We determined that allowing owners or operators to opt in to the CAR on an individual piece of equipment would not be workable. Therefore, owners or operators must opt in the group of affected equipment at a process unit. This does not alter the applicability of subpart V to a facility; it only affects the set of equipment that can comply with the CAR.

The second situation where the regulated source in the CAR does not match the affected source of the referencing subpart is in the HON. Under the HON, the affected source is the total of all applicable emission points at the plant site that are subject to the HON. Thus, a HON facility that contains more than one CMPU, would consist of only one affected source, which would be the collection of all subject CMPU's. However, under the CAR the regulated source is collection of emission points within each CMPU (as proposed under the original concept in the CAR of the SCU). Thus, a HON facility can choose to opt into the CAR on a CMPU basis, and not the entire collection of CMPU's that comprise the HON affected source.

Although we believe that in most cases facilities will opt in larger groups of equipment (e.g., most or all subpart Kb tanks), the States and owners or operators have the opportunity

to work together to determine the basis on which facilities can opt in their equipment that will provide the "best fit" for both regulators and industry.

Comment: One commenter (IV-G-01) suggested that the proposal preamble discussion at 63 FR 57757 and 57758 regarding the SCU's and the definition of regulated source carries a misleading implication. The commenter (IV-G-01) stated that the discussion implies that if one SCU within a plant site elects to comply with the CAR, then all new and existing sources, regardless of their relation to the SCU, must comply with the CAR if they are part of the same plant site and subject to one of the referencing subparts. The commenter (IV-G-01) suggested an edit to clarify this issue.

Response: Because of the change in the applicability provisions, the clarification suggested by the commenter is no longer necessary.

Comment: The commenter (VI-D-03) asserted that polyethylene, polypropylene, and polystyrene units should be defined as SCU's, by adding 40 CFR part 60, subpart DDD to the list of rules in the SCU definition. The commenter argued that this would clarify the pointers in subpart DDD and the requirements that apply to these units. The commenter stated that it would also allow stand-alone polyethylene, polypropylene, and polystyrene units to take advantage of the CAR's burden reductions. The commenter pointed out that additionally, some facilities operate a number of stand-alone polyethylene, polypropylene, and polystyrene sites at sites where SCU's are present. The commenter asserted that if subpart DDD units were included in the SCU definition, facilities with these units could use the CAR for the entire site. The commenter stated that the facility would not have to maintain compliance systems for both rules, thereby removing an impediment to using the CAR. While this would expand the scope of the CAR, the commenter reasoned it would allow more of the SOCOMI industry to take advantage of the CAR.

Response: Because of the change in the applicability provisions there is no longer a need to define the SCU. A facility can choose to opt any affected source or facility subject to a referencing subpart into the CAR regardless of its affiliation to a SCU. The SCU definition has been deleted in the final CAR.

Comment: One commenter (VI-D-02) questioned why §65.1(i)(2) refers to subparts VV, III, NNN, and RRR. The commenter stated that the purpose of §65.1(i)(2) is to identify process units where equipment assignment procedures are unnecessary, because the referencing rule has already defined the SCU. The commenter stated that the definitions of process units contained in subparts VV, III, NNN, and RRR are not specific enough to identify all of the equipment that is part of the process unit. The commenter (VI-D-02) requested a revision of §65.1(i) to require that the equipment included in an SCU is the equipment defined as part of the process unit in the referencing subparts, as applicable, as well as any other equipment that is part of the SCU as determined by the assignment rules in §65.1(j) through (m).

Another commenter (IV-G-01) stated that the proposal preamble (63 FR 57756) contains a discussion about assignment procedures for assigning transfer operations to process units. The commenter (IV-G-01) advised that this discussion should not refer to thermoplastic product process units (TPPUs) and petroleum refinery process units (PRPUs) because subparts U and JJJ do not regulate transfer operations.

Response: Because of the changes in the applicability provisions, the assignment procedures have been deleted. Therefore, the suggestions made by the commenters no longer need to be addressed.

### 2.3.2 Pointer Paragraphs in Referencing Subparts

Comment: One commenter (IV-G-01) suggested that §§60.110a(e) and 60.110b(g) should not state that §60.16 of subpart A still applies. The commenter pointed out that §60.16

of subpart A is a list of prioritized major source categories and is not necessary for sources complying with the CAR.

Response: We have left the reference to §60.16 of 40 CFR part 60, subpart A, in the list of provisions that still apply to sources complying with the CAR. Although it is just the list of source categories, we consider it important to provide a complete list of applicability provisions that have not been incorporated into the CAR, but that still apply to sources complying with the CAR.

Comment: One commenter (IV-G-01) advised that table 4 in 40 CFR part 63, subpart H is duplicative to table 1A being added to 40 CFR part 63, subpart G. The commenter also noted that table 1A of subpart G is missing a reference to 63.5(f)(1) that is in table 4 of subpart H.

Response: Table 1A and table 4 both list the 40 CFR part 63 general provisions (subpart A) requirements that apply to owners or operators choosing to comply with the CAR. Both tables are necessary, one for subpart G of the HON (which applies to process vents, storage vessels, and transfer operations) and one for subpart H of the HON (which applies to equipment leaks). We have added the missing reference to §63.5(f)(1) to table 1A of subpart G. Also, there are some additional general provisions that apply to sources referenced to the CAR from 40 CFR part 63, subpart G that were inadvertently left off of table 1A of subpart G in the proposed rule. These were identified in table 1 of subpart A of part 65 but were not included in the subpart G table. These provisions have been added in the final CAR.

Comment: One commenter (VI-D-03) indicated that the proposed §§60.110a(c) and 60.110b(e) pointer paragraph wording suggests that all subject storage vessels in all SCU's at a site must opt into the CAR together, rather than all subject storage vessels within an individual SCU opting in together. The commenter (VI-D-03) suggested the following language as a change: "...for storage vessels that...and that is part of an individual SCU."



The commenter noted that §§60.110a(f) and 60.110b(h) make clear that all subject storage vessels within an SCU must opt into the CAR together, so leaving the word "all" out of these paragraphs does not change the requirement, but does clarify that all subpart Ka and Kb storage vessels in all SCU's at a site need not opt into the CAR at once.

Response: Because of the changes in applicability, the pointer paragraphs in subparts Ka and Kb have been revised to not include the reference to SCU. We believe that this simplification has taken care of the clarification suggested by the commenter.

Comment: One commenter (VI-D-03) noted that for subpart DDD process vents opting into the CAR, the proposed language at §60.560(m) requires the vents to comply with the CAR subpart D. The commenter pointed out that the total resource effectiveness (TRE) approach in the CAR subpart D, however, is not the approach used under subpart DDD to define covered vents. Therefore, the commenter concluded only subpart G of the CAR is appropriate for subpart DDD process vent provisions. The commenter (VI-D-03) proposed changes to the language of §60.560(m) to address this problem. The commenter (VI-D-03) also suggested that clarification may be needed in all referencing subparts that subpart DDD vents are not subject to the CAR subpart D.

Response: For owners and operators choosing to comply with the CAR, §60.560(j) requires subpart DDD process vents to comply with subpart G of the CAR (not subpart D of the CAR). The proposed §60.560(m) requires other process vents subject to other referencing subparts (40 CFR part 60, subparts III, NNN, RRR, and the HON) to also comply with the CAR if the process vents are located in the same SCU. However, because of the changes to applicability in the final CAR, §60.560(m) has been deleted.

Comment: One commenter (VI-D-02) requested that the ongoing recordkeeping requirements of §60.116 be duplicated in the CAR subpart C, so the owner/operator of a storage vessel complying with the CAR need not refer back to part 60, subpart Kb.

Response: We have not included the recordkeeping requirements of §60.116b in the final CAR. This record is required in both subpart Ka and Kb of part 60. It is an applicability record of the material stored and its vapor pressure. Because this record is required in only two of the rules consolidated, and it is an applicability record, we decided not to include it in the CAR. In general, all applicability requirements remain in the referencing subparts.

Comment: One commenter (IV-G-01) recommends changes to the proposed text of 40 CFR part 60, subparts III, NNN, and RRR to clarify specifically which affected facilities may elect to comply with the CAR. The commenter (IV-G-01) asserts that the proposed text does not clearly indicate which affected facilities may choose to comply with the CAR, but rather implies by sequence of the wording that only specific exempt facilities may choose to comply with the CAR. Using subpart III at §60.610(d) as an example, the commenter (IV-G-01) stated that, as it was written, only sources subject to paragraph (c) could use the CAR: "Owners or operators of process vents that are subject to this subpart may choose to comply with the provisions of 40 CFR part 65, subpart D to satisfy the requirements of paragraph (c) of this section and §§60.612 through 60.615 of this subpart, except §60.615(a), as provided in paragraphs (d)(1), (d)(2) and (e) of this section." The commenter (IV-G-01) proposed language for clarification, with an example from subpart III as follows: "...Owners and operators of process vents that are subject to 60.610(a), (b) and (c) may choose to comply with the provisions of 40 CFR Part 65, subpart D to satisfy the requirements of 60.612 through 60.615 of this subpart, except 60.615(a), as provided...".

Response: We have clarified which facilities subject to subparts III, NNN, or RRR may choose to comply with the CAR, but have used different wording than what was suggested. The CAR contains the exemptions from control for process vents with low flow, low concentrations, and TRE values greater than 4.0.

Therefore it is appropriate to state that the CAR satisfies the requirements for process vents exempt from control. The text of subparts III, NNN, and RRR has been modified to clarify this. For example, the following text from subpart III at §60.610(d) was modified: "Owners or operators of process vents that are subject to this subpart may choose to comply with the provisions of 40 CFR part 65, subpart D to satisfy the requirements of §§60.612 through 60.615 of this subpart, except §60.615(a), as provided in paragraphs (d)(1), (d)(2) and (e) of this section. The provisions of 40 CFR part 65 also satisfy the requirements of paragraph (c) of this section. Other provisions..."

## 2.4 STRUCTURE AND FORMAT

Comment: One commenter (IV-G-01) asserts that the CAR does not provide a single set of provisions by which sources may meet all regulatory requirements, because process units will have to comply with the CAR and with certain paragraphs of the referencing subparts. Two commenters (IV-G-01, VI-D-01) claimed that the CAR does not completely simplify the set of regulations being consolidated and thereby may cause more instances of confusion and noncompliance. As an example, the commenter (IV-G-01) pointed out that each of the referencing subparts require the owner or operator to follow the general provisions of subpart A of the CAR and some specific general provision requirements from 40 CFR parts 60, 61, or 63.

Another commenter (VI-D-01) noted that the attempt to provide a modular, stand-alone applicability section for the CAR has resulted in a very complex structure and still requires the implementing agencies and affected sources to rely upon the individual rules that are consolidated in the CAR.

One commenter (IV-G-01) claimed that the CAR will have no benefit to sources that have any group 2 or non-regulated vent streams, or are subject to any State requirements. The commenter (IV-G-01) reasoned that most sources eligible to use the CAR will have streams subject to rules, or portions of rules, that are not

being consolidated. The commenter (IV-G-01) maintained that the CAR will be beneficial only to sources that have only group 1 or regulated process vents, storage tanks, transfer operations, and/or equipment subject to federal leak standards.

Response: We agree with the commenter that there are applicable provisions in the referencing subparts and referencing general provisions that require familiarity and awareness on the part of sources complying with the CAR. However, these provisions pertain to applicability and are used to determine whether the rule applies to the source or equipment and whether control is required. We maintain that once an owner or operator of a facility complying with the CAR determines the applicability of control, then the owner or operator will rarely have to refer to the referencing subparts and referencing general provisions. A change affecting applicability will require referring to the referencing subpart.

We disagree with the commenter's assertion that the CAR will not benefit facilities that have group 1 and group 2 storage vessels and transfer racks. Group 1 storage vessels and transfer racks are emission points which must be controlled. Group 2 includes emission points where control is not required. In general, requirements for group 2 emission points include records and reports that confirm the group status of the emission points. Once the group 2 reports are submitted, there are few additional requirements in the referencing subparts with which a facility must comply, and the CAR requirements are not relevant to group 2 storage vessel and transfer rack emission points. We believe significant benefits can accrue to sources subject to multiple referencing subparts with group 1 points.

Comment: Two commenters (IV-G-01, VI-D-03) recommended that we incorporate tables listing the provisions of the referencing subparts that are still applicable when using the CAR, in order to reduce the amount of regulatory information that stakeholders must review to determine applicable requirements. One commenter (IV-G-01) asserted that such a table would not only clarify the

more subtle requirements of the CAR, but would also highlight the remaining requirements from the referencing subparts that otherwise would be easy to overlook. Another commenter (VI-G-03) suggested adding a "road map" table which gives a section-by-section comparison of the existing requirements in the referencing subparts and the alternative CAR provisions.

Response: As suggested by the commenters, we have incorporated a table that lists the provisions of the referencing subparts that still apply to sources complying with the CAR as an aid to the user. We have also developed tables that give a paragraph-by-paragraph comparison of each referencing subpart and its corresponding CAR paragraph in the proposed rule. These are referred to as "correlation tables" and can be found on the EPA Technology Transfer Internet site ([www.epa.gov/ttn/uatw/car/car\\_rdp.html](http://www.epa.gov/ttn/uatw/car/car_rdp.html)).

Comment: Another commenter suggested that the CAR should be revised as a "stand alone" part so that sources subject to the referencing subparts could simply opt to comply with the CAR, thereby eliminating the need for cross-referencing the referencing subparts.

Response: We have made every effort to make the CAR a stand alone part that sources can be referred to with very little looking back at the original referencing subpart. It has been necessary to maintain the provisions in the referencing subparts pertaining to applicability, however. Significant complexity would have been added to the CAR if incorporation of the referencing subpart applicability had been attempted. Also, there are a few recordkeeping or reporting provisions of some referencing subparts that needed to remain applicable. These are cases where we have determined that the provisions are necessary for implementing and enforcing the referencing subpart.

By adding the tables of referencing subpart provisions that still apply to sources complying with the CAR, we contend that confusion has been eliminated and the final CAR and referencing subparts are clear and easily implemented.

Comment: One commenter (VI-D-03) expressed appreciation for the CAR's new formatting features. The commenter stated that the significant reorganization of regulatory requirements by end-user need, by implementation step, by specific regulatory topic, and by applicability is a key component to making the regulation less confusing. The commenter stated that the frequent use of labels to facilitate quick recognition of the organizational structure provides clarity. The commenter (VI-D-03) indicated that the use of direct language and translation of appropriate regulatory requirements in step-wise procedures will help reduce the learning time and disputes regarding desired regulatory objectives.

Response: We appreciate the commenters support for the formatting features found in the CAR.

### 3.0 SPECIFIC COMMENTS BY SUBPART

#### 3.1 GENERAL PROVISIONS

Comment: One commenter (VI-D-02) noted that §65.1(f) requires an implementation schedule for sources opting to use the CAR. The commenter stated that it is not clear whether this schedule must be approved. The commenter (VI-D-02) argues that the schedule should not be subject to review and approval, because the CAR is voluntary and at least as stringent as the referencing subparts. The commenter (VI-D-02) requests that we clarify, through rewording of the regulatory text and the preamble, that the implementation plan is submitted for planning purposes only and that review and approval by the permitting authority are not required.

Response: The implementation date is to be established in coordination with the Administrator or delegated authority. We consider this step to be important so that the regulator can be aware of the process being used to convert the facility from complying with the referencing subparts to complying with the CAR. It provides an opportunity to the regulator to ensure that there will be no compliance gaps, and the benefits of CAR implementation for the regulator can be balanced with the benefits to the source of using the CAR. The regulator also has workload and resource constraints to consider and may prefer to modify permits at a more opportune time than envisioned by the source. In addition, the regulator must have some comfort level with respect to implementation and enforcement and the emission sources the facility wants to opt in. We have clarified in the final CAR that the implementation date must be established by mutual agreement between the facility and regulator.

### 3.1.1.1 Definitions

Comment: One commenter (IV-G-01) indicated that many definitions in the underlying subparts were not included in the CAR and that this forces the user to rely on the definition sections in the referencing subparts, which is not explicitly allowed in the CAR. The commenter (IV-G-01) recommends that the CAR clearly state that definitions in the referencing subparts should be used for terms that are used in the CAR and that are not defined in the Act or in subpart A of the CAR.

Response: We have clarified in the CAR that the definitions in the referencing subparts should be used for terms used in the CAR and not defined in either the Act or subpart A of the CAR.

Comment: One commenter (IV-G-01) expressed that §65.2 of the CAR needs to define the term "excess emissions." The commenter (IV-G-01) pointed out that "excess emissions" is explained in §65.3(a)(4) of the CAR but is not defined in §65.2. The commenter (IV-G-01) requested that §65.2 should be consistent with §65.3(a)(4), if this section actually contains the definition of excess emissions.

Response: The term "excess emissions" is defined for purposes of the CAR where it is first used, in §65.3(a)(4). The term is used in the following locations in the CAR:

- §65.6(b)(1)(i),
- §65.6(b)(4)(iv),
- §65.6(c),
- §65.162(a)(2)(iv), and
- §65.163(c).

We have edited each of these sections to include a reference to §65.3(a)(4), where the term "excess emissions" is defined. A definition has not been added for "excess emissions" in §65.2 because the term has different connotations throughout the parts 60, 61, and 63 regulations. Since the CAR affects rules in all three parts, we have decided not to put a definition in the definition section to avoid confusion. Instead the term will be clarified when it is used in the CAR by cross references to §65.3(a)(4).



Comment: One commenter (VI-D-06) requested clarification of terms that contain subjective adjectives either in the definitions section or in the sections where the terms occur. Two commenters (VI-D-01, VI-D-06) specifically mentioned the definitions of "excused excursion" and "reasonable intervals." Another commenter (VI-G-03) pointed out that "excused excursion" is not defined.

Response: It is inevitable that some terms will be used in a regulation that are not immediately obvious to everyone. For technical terms and terms where confusion is possible, we provide definitions. For many other terms, we rely on the meaning given the terms in common language. The term "reasonable intervals" is used one time in the CAR at §65.3(d)(3). The language used in this paragraph is consistent with the language of §65.100(k)(9)(iii). We consider this term sufficiently clear. The term excused excursions has been clarified in the sections where it is used.

Comment: One commenter (IV-G-01) suggested that the definition of "repaired" be modified to require monitoring "as appropriate" to verify repair because visual leakers may not require remonitoring.

The commenter(IV-G-01) also concluded that the phrase "definition of repair" found in §65.106(d)(2) should be changed to "definition of repaired or first attempt at repair" in order to parallel the definition of "repaired" in §65.2 of subpart A and because monitoring is also required after the first attempt at repair.

Response: "Visual leakers" requirements in the CAR typically include language to the effect of "repaired in this instance means that the visual indications of a leak have been eliminated." Therefore, the standard definition of "repaired" in §65.2 would not apply, and adding the phrase "as appropriate" to the definition of "repaired" is confusing and is not necessary. We maintain that it is not appropriate to add the suggested language to §65.106(d)(2).

Also, in §65.106(d)(2), the CAR requires follow-up monitoring after a leaking valve has been repaired. The requirement is equally applicable whether "repair" was successful on the first, second, third, or any subsequent attempt at repair. If the required "first attempt at repair" is successful (and proven through monitoring to be "repaired"), then §65.106(d)(2) requires a follow-up monitoring within 3 months.

Comment: One commenter (IV-G-01) expressed the opinion that the term "high throughput transfer rack" should be defined in the CAR subpart A in §65.2. The commenter also noted that §65.145(b)(1)(iii) has a reference to a "non low-throughput transfer rack" and recommended that the term "high throughput transfer rack" be used for consistency.

Response: We agree that using the term "high throughput transfer rack" would be beneficial. We have edited the CAR to incorporate the term where appropriate and have added a definition for high throughput transfer rack.

Comment: One commenter (IV-G-01) reasoned that the definition of "relief device or valve" found in the CAR subpart A, §65.2 should be revised to include relief valves that allow passage of nitrogen to prevent vacuums. The commenter suggested that without such a change, the CAR definition of "relief device or valve" would be inconsistent with the change that is proposed to the HON definition of "pressure relief valves" as discussed at 63 FR 57762.

Response: The definition in the CAR for "pressure relief device or valve" specifically notes that "devices activated... by a vacuum are not pressure relief devices." A "relief device or valve" under the CAR means a "device or valve used only to release an unplanned, nonroutine discharge," not necessarily relieving pressure. Pressure relief devices are a subset of relief devices. There are specific equipment leak requirements for pressure relief devices in subpart F of the CAR, but the CAR does not have requirements for relief devices in general.

The change noted by the commenter (and discussed at 63 FR 57762) is regarding the definition of "open-ended valve or line." This term is defined differently in the referencing subparts, but the intent is the same: relief devices, the broader category of devices needed for safety purposes or equipment protection, are not considered open-ended valves. The CAR language therefore specifically exempts "relief valves" in the definition of "open-ended valve or line" instead of exempting "pressure relief valves," as was done in the HON and 40 CFR part 61, subpart V. (No change has been proposed to the HON definition of "pressure relief device or valve" or "open-ended valve or line.")

Comment: One commenter (IV-G-01) recommended that the terms "alternative test method" and "equivalent test method" found in the CAR subpart A, §65.2 should be combined into one term and used consistently, because they seem to mean the same thing.

Another commenter (VI-D-02) asserted that there is no reason for the CAR to require a Method 301 demonstration for alternate test methods, if the Administrator has approved an alternate as a general matter and thereby determined the alternate to be generally applicable. The commenter (VI-D-02) recommended deleting this condition from the definition of "alternative test methods."

Response: The definitions and requirements for alternative test methods and for equivalent methods are not the same. The two terms are used in different circumstances. Equivalent methods are demonstrated to show "a consistent and quantitatively known relationship" to the required test method for the specific condition under which that test method would be run. An alternative method provides results adequate for the Administrator's determination of compliance.

We have provided more detail on the types of changes that constitute alternatives to test methods by adding definitions and examples for minor, intermediate, and major changes. These definitions have obviated the need for the proposed definition of "alternative test method." As indicated in these definitions,

only major and intermediate changes to test methods must undergo a Method 301 demonstration. Further, in those limited situations where we determine that a Method 301 demonstration is representative of an entire source category, we may approve a major alternative for application to the entire source category, such that only the initial application of the change would undergo a Method 301 demonstration.

There is a need to maintain the requirement to perform Method 301 for changes to test methods that have not been approved by the Administrator. By specifying that Method 301 be used, we ensure that we will receive the necessary data to evaluate an alternative to a test method. Also, companies submitting alternative test methods for approval will know what information is expected.

Comment: Two commenters (VI-G-03, VI-G-04) commented on confusion in the definitions for recapture, recovery, and control devices. One commenter (VI-G-03) supported the comments of VI-G-04 on this issue. One commenter (VI-G-04) contended that the goals of "regulatory reinvention" mandate that we use the CAR as an opportunity to eliminate the artificial distinction between recapture, recovery, and control devices and articulate a simple, straightforward principle applicable to any device that controls emissions. The commenter (VI-G-04) stated that, as proposed, the CAR definitions are overly complex and penalize the use of "recovery devices" to achieve emission control. The commenter (VI-G-04) further stated that this approach not only results in confusion in permitting, compliance, and enforcement of the CAR, but also creates a regulatory disincentive for the recycling of recovered chemical materials. The commenter (VI-G-04) added that these results are contrary to the goals of the White House paper "Reinventing Environmental Regulation" which emphasizes deleting "conflicting", "overlapping", "duplicative", and "confusing" requirements in favor of regulations that are "understandable to those who are affected by them."

The commenter (VI-G-04) referenced the definitions for "control, recovery, and recapture devices" as confusing and specifically called attention to the exclusion of recovery devices as control devices (in the control device definition) and the exception to this exclusion in §65.63(a)(2)(ii). The commenter (VI-G-04) stated that this exception was confusing, difficult to apply, and unjustified from an environmental standpoint. The commenter (VI-G-04) elaborated on why the conditions of the exception are unjustified from an environmental standpoint. The commenter (VI-G-04) also contended that the proposed CAR creates a recycling penalty and encourages the use of recapture devices where a waste is formed. The commenter (VI-G-04) stated that this is a practice that should be discouraged. The commenter (VI-G-04) stated that if we are concerned that a recovery device may actually be a part of the process, that this concern should be addressed by a simple, straightforward statement in the rule (i.e., that a recovery device may not be relied upon as a control device if it is necessary to the operation of the emission source). The commenters (VI-G-03, VI-G-04) suggested that recapture and recovery devices should be considered control devices to the extent that they are relied upon by the owner or operator to reduce emissions. The commenter (VI-G-04) stated that this can be accomplished by shortening the definition of "control device" to just the first two sentences in the proposed definition and the exclusion and exceptions in §65.63(a)(2) should be deleted.

Response: The recapture device concept was added to the HON in recent changes to that rule. This change was discussed in the HON amendment proposal preamble on August 26, 1996 (61 FR 43704); the change was promulgated in January 17, 1997. In the proposal preamble, we explain that this change fills a "regulatory void for non-combustion/non-recovery devices while preserving the approach used in this rule (and earlier rules) to differentiate between process and control in this industry." We point out in this discussion, the NSPS process vent provisions (40 CFR 60,

subparts III, NNN, and RRR) and the HON provisions, prior to this change, treated all carbon absorbers, condensers, adsorbers, and scrubbers as "recovery devices" and never considered these devices to be used in situations where the material was captured and disposed of. Therefore, the recapture provisions were added to the HON to include these devices as a compliance option in situations when they are not used as recovery devices (i.e., when they are used as recapture devices).

In the final CAR, an additional change was made to provide clarity and reduce the complexity of these provisions. The CAR has eliminated the term "recapture device" and now relies on the term "control device" in the situation where this term has been used. Even under the proposed CAR all recapture devices were control devices. We have used this fact in the final rule to simplify the language. Elements of the recapture device definition have been incorporated into the control device definition. This is in order to make it clear that, for process vents, control devices include non-combustion/non-recovery devices (devices that capture material that is not used, reused, or sold), but do not include recovery devices (devices that recover material that is used, reused, or sold).

The CAR does not penalize the use of recovery devices as the commenter suggests. This change has not changed the fact that recovery devices are allowed to be used to comply with the rule by raising the TRE index value. Under the NSPS, HON, and CAR process vent provisions, equipment is considered to be part of the process if the recovered materials are used, reused, or sold for use as the chemical or for fuel. This provision is stated in the rule by specifying that all applicability determinations take place after the final recovery device. If the process vent meets the criteria for TRE, flow, and concentration then control is required. In the process vent rules, three options are given for compliance: (1) a flare can be installed; (2) a control device (not a recovery device) meeting 98 percent emissions reduction or a 20 ppmv outlet concentration can be installed; or (3) a

recovery device can be installed that increases the TRE to greater than 1.0 -- this option, therefore extends the process out to the end of the new recovery device. Although the rule does not consider a recovery device to be a control device for process vents (because recovery devices are part of the process), this third option encourages the use of recovery devices (or process changes) to prevent pollution. By recovering and reusing chemicals, emissions can be reduced such that the TRE is increased to greater than 1.0 and a control device does not need to be applied. The recovery device does not need to meet the 98 percent reduction or 20 ppmv criteria, it only needs to increase the TRE to greater than 1.0. (In many cases, less than 98 percent reduction can increase the TRE to greater than 1.0.) By making the distinction between recovery devices and non-combustion/non-recovery devices that capture material not used, reused, or sold, we have expanded the list of control devices that can be used to meet option (2) (the 98 percent emissions reduction or 20 ppmv outlet concentration) to include non-combustion/non-recovery devices as well as combustion control devices.

Recovery devices are part of the process and are therefore not control devices. Non-combustion/non-recovery devices that capture material that is not used, reused, or sold are not part of the process and are therefore control devices. The distinction between these devices is necessary to maintain the distinction between process and control equipment. The distinction between process and control equipment was an integral part of the data analysis used to support the process vent rules. We do not consider this an arbitrary distinction.

It would not provide adequate guidance to simply state in the rule that a recovery device can not be relied upon as a control device if it is necessary to the operation of the emission source, as suggested by the commenter. There would be several possible interpretations on whether a recovery device is integral to a process, for instance:

- is a recovery device that provides an increase in production efficiency greater than 10 percent integral to a process? what about a 5 percent increase?;
- is a recovery device that decreases the use of raw materials by 5 percent integral? what about a 2 percent decrease?

The convention that the last recovery device is considered part of a process has been used since 40 CFR 60, subpart III was proposed in October 1983 and in three other rules since. We consider this convention fair, understandable, and easily applied.

The exception to the exclusion of recovery devices used to meet the 98 percent control requirement specified in §65.63(a)(2)(ii) was added to the HON and incorporated into the CAR to provide for a specific situation. Industry brought to our attention the situation where a control device exists after the final recovery device and the control device can not meet the 98 percent control requirement and can not meet the 20 ppmv outlet concentration requirement consistently. In this situation the facility is faced with the decision to stop reusing the material recovered in the recovery device or add an additional device. (By no longer using the material recovered in the recovery device, the recovery device can be considered a control device and be used to help meet the 98 percent control requirement.) Because of the costs, the facility would be more likely to stop reusing the recovery material, thereby creating an additional solid waste stream and not reducing emissions any further. We decided to avoid the creation of additional solid waste streams, especially with no further reduction of emissions, and to allow these recovery devices to be considered control devices. There are several conditions required to be met before this exception can be used. These conditions are necessary to make sure that the exception is only available for these specific situations.

Comment: One commenter (VI-G-03) requested a deletion of the sentence within the definition of "malfunction" that reads,



"Failures that are caused in part by poor maintenance or careless operation are not malfunctions." The commenter noted that the terms "poor maintenance" and "careless operation" are not defined. The commenter believes the standard for identifying a malfunction is already articulated in the definition by the terms "sudden, infrequent and not reasonably preventable," and the commenter therefore maintains that the terms "poor maintenance" and "careless operation" are ambiguous, unenforceable, unnecessary, and likely to lead to litigation.

Response: The language in the CAR definition of "malfunction" regarding "poor maintenance or careless operation" is identical to the language in the definition sections of the 40 CFR part 60 and part 63 general provisions. This language exists in the definition to add clarity to the "sudden, infrequent and not reasonably preventable" language. It specifies that any event that was caused in part by poor maintenance, for instance, is not a malfunction. We contend this clarification is necessary and that its meaning is clear.

Comment: One commenter (VI-G-03) suggested that the definition of "permit program" should include State permitting programs that are not part of the title V program and Federally Enforceable State Operating Permits programs for minor and synthetic minor sources.

Response: In the context of the CAR, "permit program" refers to title V permits established pursuant to part 70 or 71; it does not refer to other types of permit programs. Changing the definition as the commenter has suggested would only add confusion where this term is used.

Comment: A commenter (IV-G-01) pointed out that the definition of regulated source in subpart A of the CAR does not match the definition in the proposal preamble.

Response: There is no definitions section in the proposal preamble, therefore, we assume the commenter is referring to the text in section V.A, Amendments to the Referencing Subparts: General Concepts (63 FR 57758). In this section, "regulated

source" is described. The words used in this description are different than those used to define it. However, the meaning is the same.

Comment: One commenter (IV-G-01) indicated that "maximum true vapor pressure" as used in subpart C, §65.41(b) of the CAR should be defined.

Response: Maximum true vapor pressure is a term necessary for determining the applicability of control for storage vessel rules. Therefore, it is defined with the applicability provisions in the referencing subparts. The definition from the applicable referencing subpart should be used when that term is encountered in the CAR.

Comment: One commenter (IV-G-01) noted that the term "referencing subpart" does not include HON subpart F.

Response: The commenter is correct. 40 CFR part 63, subpart F is not listed as a referencing subpart in the definition of referencing subpart. Subpart F is not a referencing subpart because there is no reference to the CAR from subpart F. The references from the HON to the CAR are in 40 CFR part 63, subpart G for storage vessels, process vents, and transfer racks, and in 40 CFR part 63, subpart H for equipment leaks.

Comment: Two commenters (IV-G-01, VI-D-03) pointed out that, in subpart A of the CAR, the definition of a closed loop system contradicts the definition of a closed vent system. One commenter (IV-G-01) stated that the definition of a closed vent system intentionally excludes piping going back to the process from the scope of a closed vent system. The commenters (IV-G-01 and VI-D-03) recommended that "except through a closed vent system" be removed from the definition of a closed loop system.

Response: We agree with the commenter that there is potential for confusion regarding the definitions of a closed vent system and a closed loop system. Therefore, we have revised the definition of a closed loop system in subpart A of the CAR to

state that a "closed loop system means an enclosed system that returns process fluid to a process."

Comment: One commenter (VI-D-03) asserts that the first sentence of the CAR control device definition implies that a combustion device fueled from a fuel gas system is a control device. The proposed definition is inconsistent with the treatment of fuel gas systems by the CAR. The commenter suggested a revision of the control device definition to clarify that combustion devices that only burn fuel as a primary fuel are excluded from the definition, as follows: "Control device means any combustion device combusting a regulated material as a secondary fuel, recovery device, recapture device, or any combination of these devices used to comply with this part...." (Suggested language is underlined.) The commenter (VI-D-03) asserted that this change would allow simplification of the boiler and process heater language in the CAR subpart G, because the exceptions for primary fuel could be eliminated. For example, the commenter said §65.149(b)(2)(ii) could be deleted and paragraph (c)(1) of the same section could be greatly simplified.

Response: The commenter is correct when pointing out that the first sentence of the CAR control device definition does seem to imply that a fuel gas system could be considered a control device. However, the fourth sentence clearly states "A fuel gas system is not a control device." We consider this clarification to be sufficient to avoid the confusion suggested by the commenter. Also, the change suggested by the commenter would not be appropriate in situations where the regulated stream is the primary fuel, such as in the case of some flares.

### 3.1.2 Startup, Shutdown, and Malfunction

Comment: Three commenters (IV-G-01, VI-D-02, VI-D-03) pointed out that the requirement in §65.6(c)(2) of the CAR is inconsistent with the preamble of the CAR which states that provisions in the part 63 general provisions regarding immediate reporting of periods of startup, shutdown, and malfunction have

not been included in the CAR. One commenter (IV-G-01) advised that the startup, shutdown, and malfunction immediate reporting requirement in §65.6(c)(2) of the CAR should be removed because it is inconsistent with the provisions from subpart G of the HON. The commenter noted that the HON requires sources to report such actions in the periodic report instead of an immediate report.

Response: We intended to be consistent with HON requirements and therefore did not intend to require immediate reporting of periods of startup, shutdown, and malfunction under the CAR. This inadvertent error has been corrected by removing this requirement from §65.6(c). As noted in the proposal preamble, requiring these reports with the periodic reports instead of as immediate reports not only sufficiently ensures compliance but also provides for report consolidation.

Comment: One commenter (IV-G-01) recommended that we remove the criteria under §65.6(c)(1)(ii) of the CAR, which require that the periodic startup, shutdown, and malfunction reports include the number of startup, shutdown, and malfunction events and the total duration of all periods of startup, shutdown, and malfunction for the reporting period. The commenter claimed that this section only requires reporting if the total duration exceeds either of the durations specified in §65.6(c)(1)(ii)(A) or (c)(1)(ii)(B) and the commenter (IV-G-01) objects to the criteria because they add calculation burdens that are not required by the referencing subparts.

The commenter (IV-G-01) suggested that, if we retain the provisions in §65.6(c)(1)(ii)(A) and (c)(1)(ii)(B) of the CAR, we should clarify specifically what startup, shutdown, and malfunction information sources must include in their periodic startup, shutdown, and malfunction reports. The commenter (IV-G-01) indicated that it is often easier to report all startup, shutdown, and malfunction periods that caused excess emissions rather than determining the percentage of time a Continuous Parameter Monitoring System (CPMS) is not operating or

is malfunctioning, or the percentage of time in which startup, shutdown, and malfunction events caused excess emissions.

Regarding §65.6(c)(1)(ii)(A), the commenter (IV-G-01) specifically requested clarification of the assumption that a separate downtime percentage should be calculated for each individual CPMS and that only startup, shutdown, and malfunction event durations need to be reported on CPMS for which the period of inoperation or malfunction is equal to or greater than 5 percent. The commenter (IV-G-01) also requested clarification of whether to include or exclude periods of CPMS inoperation or malfunction when the actions taken by an owner or operator are consistent with the procedures specified in the source's startup, shutdown, and malfunction (SSM) plan. The commenter (IV-G-01) also asked that we clarify which periods of CPMS inoperation or malfunction should be included in the startup, shutdown, and malfunction report and requested that only the periods of CPMS inoperation or malfunction for which actions are inconsistent with the SSM plan be included.

Regarding §65.6(c)(1)(ii)(B) of the CAR, the commenter (IV-G-01) requested that we clarify how to calculate the percentage of startup, shutdown, and malfunction time during which excess emissions occur because of inconsistency in the definition of "regulated source." The commenter (IV-G-01) requests that the percentage should be calculated on an emission point by emission point basis considering the operating time of each emission point. The commenter (IV-G-01) assumes that when one emission point exceeds 1 percent of that regulated source's operating time, the information in §65.6(c)(1)(ii) of the CAR needs to be reported only for that emission point. The commenter (IV-G-01) requested clarification regarding which periods of startup, shutdown, and malfunction should be included in the percentage calculation. The commenter (IV-G-01) requested that only the periods of startup, shutdown, and malfunction for which actions are inconsistent with the SSM plan be included in the

percentage calculation and the periodic startup, shutdown, and malfunction report.

Response: A semi-annual summary report of the occurrences and durations of each startup, shutdown, and malfunction during which excess emissions occur is required by the CAR general provisions. We consider the semi-annual summary report an important addition to the startup, shutdown, and malfunction provisions, because it would highlight when startup, shutdown, and malfunction conditions exist for a significant amount of time, and it would indicate conditions that happen frequently during a semi-annual period. The purpose of reporting only above certain thresholds was to reduce burden, primarily if occurrences are rare or infrequent.

Nevertheless, we agree with the commenter's assertion that it may be easier to report all startup, shutdown, and malfunction periods that caused excess emissions, rather than reporting the percentage of time a CPMS is malfunctioning or not operating, or the percentage of operating time in which regulated source startup, shutdown, and malfunction events occurred that caused excess emissions. We consider the determination of the operating time for the various regulated sources to be burdensome and difficult to keep track of, making the calculation of the percentages difficult. Therefore, we have eliminated the requirement to calculate the percentage of time an SSM event occurs and the reporting exemption associated with it. The facilities that would have benefitted from this exemption, those with infrequent SSM events, will have very little to report and, therefore, will only see a small increase in burden. The final rule requires the owner or operator to report all startup, shutdown, and malfunction periods.

We have clarified the information that must be included in the periodic startup, shutdown, and malfunction report as requested by the commenter. The report must include the number of discrete startup, shutdown, and malfunction events and how

long these events lasted for each regulated source and CPMS regardless of whether the SSM plan was followed or not.

Comment: One commenter (IV-G-01) noted that the last sentence of the reporting discussion in the proposal preamble (63 FR 57767) should use the terms "greater than or equal to" in reference to total duration of excess emissions and CPMS downtime instead of "less than."

Response: The commenter is correct in that the preamble should have read "greater than or equal to" in the sentence referenced by the commenter. However, the paragraphs that this proposed preamble text refers to (§65.6(c)(1)(ii)(A) and (c)(1)(ii)(B)) have been deleted in the final CAR for the reasons mentioned in the previous response.

Comment: One commenter (IV-G-01) expressed that it is not accurate for the CAR preamble to state that "[SSM] plans are considered inadequate under the HON if they fail to provide for the operation of the regulated source during startup, shutdown, and malfunction to minimize emissions to at least the levels required by all relevant standards." The commenter points out that the HON was revised to override the provision in §63.6(e)(1)(i) of 40 CFR part 63, subpart A and addresses the issue in §63.102(a)(4) of 40 CFR part 63, subpart F. The commenter (IV-G-01) states that §63.102(a)(4) provides that "during startups, shutdowns, and malfunctions when the requirements of this subpart [subpart F], subparts G and/or H of this part do not apply..., the owner or operator shall implement, to the extent reasonably available, measures to prevent or minimize excess emissions to the extent practical...." The commenter (IV-G-01) asserted that the preamble to the CAR should imply that HON sources are subject to a different standard. The commenter (IV-G-01) also requested that future rulemaking should reflect the reality that we recognize that it is "impracticable, as well as contradictory...to expect sources to continually meet applicable emissions standards while experiencing a startup, shutdown, or malfunction."

Response: We acknowledge that the CAR preamble had an incorrect reference to the HON. The reference should have been to the general provisions of part 63, as the commenter (IV-G-01) points out by referencing the general provisions §63.6(e)(1)(i) of 40 CFR part 63, subpart A. The CAR has the same wording used by the HON on this issue. The paragraph referenced by the commenter, §63.102(a)(4), is incorporated in the CAR as §65.3(a)(4).

In regard to the commenter's request that the Agency's future rulemaking should reflect the reality that the Agency realizes that it is "impracticable, as well as contradictory...to expect sources to continually meet applicable emissions standards while experiencing a startup, shutdown, or malfunction," we will determine the provisions that are appropriate for future rulemakings when these rules are developed. The commenter is free to make these comments for future rulemakings during the public comment period for those rules.

Comment: One commenter (IV-G-01) suggested that the proposal preamble should be amended to indicate that excursions will not count against the number of excused excursions when an SSM plan applies and is followed.

Response: The commenter is correct that an excursion that occurs during a startup, shutdown, or malfunction event in which the SSM plan is followed does not count against the number of excused excursions. The CAR is clear on this point.

Comment: Two commenters (VI-G-03, VI-D-06) support our decision not to require the incorporation of the SSM plan into a facility's title V permit as a requirement in the CAR. One commenter (VI-G-03) stated that the CAR SSM plan and procedures provide useful flexibility. The other commenter (VI-D-06) agrees with the statements in the preamble that incorporating the plan into the title V permit would be counter-productive due to the fact the SSM plans will need to be modified periodically. One commenter (IV-G-03) elaborated on their support by comparing these provisions in the CAR with those in the HON. The commenter



(VI-G-03) stated that the HON requires, unlike the CAR, that the SSM plan be incorporated by reference into the title V permit. Because of this, the commenter (VI-G-03) inferred that a title V permit modification would be necessary each time the SSM plan is changed. The commenter (VI-G-03) believes the SSM plan should be updated as often as necessary to accommodate current process conditions and scenarios. The commenter (VI-G-03) asserted that a facility should not have to apply for a permit modification to maintain its SSM plan. The commenter (VI-D-06) suggested that the CAR's approach for SSM plans should be used for other rules, such as MACT standards, where a source is required to develop SSM plans.

Conversely, another commenter (VI-D-01) recommended that the CAR adopt similar requirements to 40 CFR part 63 general provisions. The commenter (VI-D-01) noted that the 40 CFR part 63 general provisions require a reference to a facility's SSM plan in that facility's title V permit. The SSM plan is then required to be filed on site.

Response: As stated by some of the commenters and in the proposal preamble (63 FR 57766), the CAR does not require the SSM plan itself to be incorporated by reference into a source's title V permit because of the frequency at which SSM plans may be updated. The general provisions of part 63 were used as the basis for the SSM provisions of the CAR, and they appear to require incorporation by reference of the plan itself by stating in §63.6(e)(3)(i):

"The plan shall be incorporated by reference into the sources title V permit."

However, a clarification to this language has been released in a memorandum from John Seitz, Director of OAQPS to Regional Air Directors (January 18, 1996) entitled "Incorporation of Startup, Shutdown, and Malfunction Plans into Source's Title V Permits." This memorandum clarifies the language by stating:

"The language in §63.6(e)(3)(i) is to ensure that the requirement to prepare and implement a SSM plan is explicitly stated within a source's operating permit. Our

intention is not for the contents of the plan to be actually written into the permit."

Therefore, the commenter (IV-G-03) is incorrect in stating that the HON requires the plan to be incorporated by reference into the title V permit. The HON does not specifically state that the plan must be incorporated by reference but relies on the requirements of §63.6(e)(3)(i). As just explained, the provisions of §63.6(e)(3)(i) have been clarified in the memorandum to mean that the requirement to prepare and implement a SSM plan must be in the source's operating permit. The SSM requirements under the HON are the same as those in the CAR but the CAR is clearer in that it incorporates the clarification we released in the before mentioned memorandum.

In response to the other commenter (VI-D-01), the CAR does adopt the requirements of the general provisions of part 63 but it incorporates this clarification.

In reviewing these provisions, we have determined that the requirement to keep the SSM plan onsite needs to be stated explicitly. Although it is obvious that the plan must be kept on-site based on the general record retention requirements in §65.4(c), it is not completely clear that the plan must be retained on-site after 2 years (or 6 months as specified in §65.4(c)(2)). Therefore, we have clarified in the SSM provisions that the SSM plan must be retained on-site. This is necessary because of the frequency in which this document may change and the need to have it available for review. Also, among other reasons, the document may need to be revised if found to be inadequate.

Comment: One commenter (VI-D-02) requested a revision to §65.3(a)(3) to recognize that shutdown of control devices is allowed during periods of planned routine maintenance for control devices used on storage vessels, as specified elsewhere in the CAR.

Response: In the language at §65.3(a)(3), shutdown of control devices is prohibited "during times when emissions are

being routed to such items of equipment if the shutdown would contravene requirements of" the CAR. During planned routine maintenance of a control device on a storage vessel, the requirement to operate the control device does not apply [see §65.42(b)(4) and (b)(5)(iii) of the CAR]. Therefore, a shutdown of the control device would not contravene the requirements of the CAR and would be allowed under §65.3(a)(3), as drafted in the proposed rule. In order to make this exception clear, we have edited the final language of §65.3(a)(3) to reference §65.42(b)(4) and (b)(5)(iii).

### 3.1.3 Reporting

Comment: Three commenters (VI-D-02, IV-G-01, VI-G-03) supported limiting the amount of time for approval or disapproval of a schedule change for reporting. Two commenters (IV-G-01, VI-G-03) advocated that, under §65.5(h)(3) of the CAR, an owner or operator should be able to assume approval of a request for an adjustment to a time period or postmark deadline if written disapproval is not received within 15 days. Another commenter (VI-D-02) suggested modifying §65.5(h) to provide automatic approval of requests in 90 days, unless the Administrator indicates disapproval or a desire to review the request, in which case the change would not be allowed until the review is completed. One commenter (IV-G-01) stated that many requests go unanswered and that the commenter's company has been waiting on some approvals for more than 1 year.

Response: We acknowledge that it is desirable for the Administrator to approve or deny requests within the designated 15-day period. However, it is important that the changes in schedule be made upon mutual agreement between the facilities and the States, because both parties must change their respective schedules for handling the reports. Therefore, it is not appropriate to grant a blanket approval for all requests that go unanswered in that period of time. It is suggested that the facilities consider their experience with typical turn-around

times on requests and factor that experience into their schedules when submitting requests.

Comment: Similarly, one commenter (VI-G-03) advocated that a time frame be provided for the Administrator's action on requests for a determination of equivalence for alternative emission limits. The commenter (VI-G-03) argued that alternative emission limits that provide equivalent protection should not need to be published in the Federal Register. The commenter stated that in the standard for determination of equivalency, the use of the term "performance standards" is confusing and should be deleted.

Response: In regards to requests for alternative means of emission limitation, there are several steps required for the Administrator to approve or deny these requests. For this reason, it is difficult to require a specific time frame for this review. It is suggested that the facilities consider their experience with typical turn-around times on requests and factor that experience into their schedules when submitting requests.

We assume that the commenter is referring to the alternative means of emission limitation provisions of §65.8 when referring to "alternative emission limits." The alternative means of emission limitation provisions allow a source to propose an alternative to any design, equipment, work practice, or operation standard. A source can not propose an alternative to a performance standard which might be in the form of an emission limit or percent emission reduction. In the case of performance standards, it is not necessary to propose alternatives because performance standards allow any means of reduction a source chooses as long as it meets the performance level, the emission limit, or emission reduction. The inclusion of the phrase "(but not performance standards)" is to clarify that alternative means of emission limitation requests are not appropriate for performance tests. We consider this clarification helpful.

We maintain that public review through publication in the Federal Register is appropriate because while the requirements of

the CAR have undergone public review, the requested alternatives have not.

Comment: One commenter (IV-G-01) suggested that, for the purpose of using an alternative means of emission limitation, it may be unreasonable and costly to require an owner or operator to demonstrate the emission reduction achieved by a required work practice for 12 months. The commenter (IV-G-01) reasoned that we should already know the emission reduction achieved by the required work practice, and that the owner or operator should only have to demonstrate the emission reduction achieved by the proposed alternative work practice. The commenter (IV-G-01) also noted that in §65.102(d)(2)(ii), the term "equipment" is used rather than "work practice."

Response: We agree with the commenter and the 12-month requirement, §65.102(d)(2)(ii), was removed from the final regulation. It is the operator's burden to provide sufficient data to support an alternative work practice which could be more or less than 12 months.

The commenter is incorrect in that the term "work practice" should have been used in §65.102(d)(2)(ii) instead of "equipment." This paragraph refers to each equipment type not each work practice.

Comment: One commenter (VI-D-02) recommended revising §65.4(a) to refer to the regulated source or site, rather than to the owner or operator. The commenter contended that record retention requirements should be specified in terms of sites or sources that are or are not subject to title V, because owners or operators may have to comply with title V at one site but not at another.

Response: We have made changes in the final rule in §65.4(a)(1) and (a)(2) to make the clarification suggested by the commenter.

Comment: One commenter (IV-G-01) requested that we clarify which months the first periodic report should cover for sources electing to comply with the CAR upon initial startup. The

commenter suggested that the first periodic report should cover the 6-month period beginning on the date the Initial Compliance Status Report is due, because parameters may not be established for 240 days after the applicable compliance date specified in the referencing subparts, or 60 days after the performance test.

Another commenter (VI-G-03) suggested that the language at §65.5(e)(2) for periodic report due dates is too complicated. The commenter (VI-G-03) suggested alternative language as follows: "The report is due on or before February 28 for the period of July 1 through December 31 and August 31 for the period of January 1 through June 30."

Response: The commenter (IV-G-01) is correct that the proposed CAR is not clear on when the first periodic report is due for sources electing to comply with the CAR upon initial startup. The final rule has been clarified to state that the first periodic report covers the 6-month period after the Initial Compliance Status Report is due. As the commenter noted, the parameter ranges will be included in the Initial Compliance Status Report and before that time there will be no basis for judging performance.

We acknowledge that the language would be simpler if the periodic reporting 6-month periods were required to be January 1 through June 30 and July 1 through December 31. However, the compliance dates do not often occur at the beginning or middle of the calendar year. In order to ensure that all periods are being reported on, the due date must be triggered by the compliance date. Also, the report is due within 2 months after the 6-month period. It is difficult to explicitly state these requirements; some sources may find this paragraph confusing. However, the source has the opportunity, through the title V process and by less formal means, to revise or adjust the semiannual report schedule with the delegated authority. Also, through §65.5(h) the source and the delegated authority can agree on a different schedule. We consider the clarity and flexibility sufficient to make this paragraph workable.

Comment: One commenter (VI-G-03) asserted that to maintain certainty, consistency, and the intent of the CAR, that record retention periods should only be specified in §65.4(a)(1) and (a)(2). The commenter (VI-G-03) objected to the regulated community having to search throughout the CAR for longer retention times than those specified in §65.4(a)(1) and (a)(2). The commenter (VI-G-03) asked that all other requirements or references to retention periods other than those found in §65.4(a)(1) and (a)(2) be removed.

Response: It is necessary to keep some records longer than the retention times listed in §65.4(a)(1) and (a)(2). These are situations where the information does not change often but it is still necessary to have the information available, such as monitoring data for connectors monitored every 8 years. To add clarity and to avoid the regulated community having to search throughout the CAR for longer retention times, we have listed in §65.4(a)(1) and (a)(2) all paragraphs where longer retention times are required.

Comment: One commenter (VI-D-02) noted that the current language in §65.5(d)(2) appears to require submission of the initial compliance status report on the 240th day after the compliance date or on the 60th day after the performance test. The commenter (VI-D-02) requested a change of the wording to §65.5(d)(2) to specify that the report is required within 240 days "or within 60 days after the completion of the performance test."

Response: We agree that the initial compliance status report does not have to be submitted on the 240th day after the compliance date or on the 60th day after the performance date. We have made the suggested edits so that §65.5(d)(2) requires submission within the 240 or 60 day time periods.

Comment: One commenter (VI-D-02) noted that §65.5(i) requires some information to be submitted via title V or otherwise, but does not specify when or for what purpose. The commenter (VI-D-02) asked if this is the content requirement for

the compliance status report and, if so, if the requirement should be moved to paragraph (d).

Response: The items listed in §65.5(i) are information that we assume would be included in the source's title V permit application. However, in the case where the owner or operator may not think to include this information, we are explicitly listing these items as needing to be included in the title V permit. This was also done in the HON at §63.152(e).

#### 3.1.4 Compliance

Comment: One commenter (VI-G-03) asserted that §65.3(b) and (c) fail to provide standards for determination of compliance. The commenter contended that the terms "acceptable operation and maintenance procedures" and "proper operation and maintenance practices" are subjective and do not provide plant personnel with guidance on what is actually required. The commenter asserted that this will lead to unnecessary litigation. The commenter stated that these subjective standards should be replaced by objective standards such as performance tests, emission standards, specified operating parameters and other specifications in the rules, permits, and applicable startup, shutdown, and malfunction plans.

Response: The provisions of these paragraphs [§65.3(b) and (c)] are general provisions giving the Administrator the authority to use a variety of sources of information to make findings of compliance. These paragraphs specify several types of information that can be used to determine if "acceptable operation and maintenance procedures" or "proper operation and maintenance practices" have been followed. These provisions also refer to the more specific provisions for performance tests, monitoring, and SSM plans.

Also, the language of these paragraphs is consistent with the 40 CFR part 63 general provisions and provisions of 40 CFR 63.152 of the HON. We consider this language to be sufficiently clear.



Comment: One commenter (VI-G-03) wanted to know what the consequence of having been "deemed to have failed to have applied the control in a manner that achieves the required operating conditions" as set forth in §65.3(b)(1). The commenter (VI-G-03) noted that §65.3(b)(2) states that excursions are not violations.

Response: If a source has been "deemed to have failed to have applied the control in a manner that achieves the required operating conditions," then the source has violated the operating standard. The commenter is incorrectly reading §65.3(b)(2). This paragraph reads "An excursion is not a violation..., if the conditions of paragraphs (b)(2)(i) or (b)(2)(ii) of this section are met." We have edited this sentence to make it easier to read and less likely to be read incorrectly.

Comment: One commenter (IV-G-01) stated that the information in §65.3(b)(2) was a subset of the information in §65.156(d). The commenter asserted that all of the information should be in one place in subpart G.

Response: The provisions in §65.3(b)(2) are of a general nature regarding excursions of parameter monitoring ranges. These provisions are a part of the general compliance determination procedures when parameter monitoring is used. The provisions in §65.156(d) pertain to more specific requirements on how to determine excursions, excursions that are not violations, and how many excused excursions are allowed. We maintain that the segregation of the general provisions and the more detailed ones is important for understanding.

Comment: One commenter (VI-G-03) requested that the following sentence be removed from §65.3(c): "The Administrator will make findings of compliance with the standards of this part using metric units." The commenter questioned if this would require facilities to replace all English unit monitoring equipment with metric unit equipment. If so, the commenter contended this would be an unreasonably excessive cost. The commenter stated that if facilities are allowed to keep English

unit monitoring equipment, the compliance determination may infer non-compliance due to rounding and conversion factors. The commenter asserted that this would result in disputes that would be burdensome to facilities, EPA, State enforcement, and permitting agencies.

Response: Unlike the HON and many other MACT standards, we have provided both English and metric units for all values in the CAR. The HON and other rules only provide values in metric units because the Administrator does make all findings of compliance based on metric units. In order to help readers of the rule, we have added the English units to the CAR. To clarify that finding of compliance will only be made using metric units, we added the sentence the commenter objects to. If this sentence were deleted then all of the values in English units would also have to be deleted. This would still not change the fact that findings of compliance are based on using metric units. This has not meant in the past nor does it mean now that sources must change their monitoring equipment. It only means that any monitoring data collected in English units will be converted to metric and compared to the metric parameter monitoring ranges or emission limits of the standard. The use of conversion factors are unavoidable. See the US Code, title 15, section 205a for a statement of the government's policy of metric units.

Comment: One commenter (VI-G-03) requested that the phrase "or to protect personnel safety" be added to the following language in §65.3(a)(3) regarding when it is allowable to shut down items of equipment required by the CAR: "Paragraph (a)(3) of this section does not apply if the item of equipment or CPMS is malfunctioning or if the owner or operator must shut down the equipment to avoid damage due to a contemporaneous startup, shutdown, or malfunction from the regulated source or portion thereof."

Response: The proposed paragraph §65.3(a)(3) has been deleted in the final CAR. We decided that the language of this paragraph was becoming complicated in an attempt to enumerate all

the instances where equipment should not be operated during startup, shutdown, or malfunction. Instead we determined that the general duty language throughout the CAR [the new §65.3(a)(3) which was the proposed §§65.3(a)(4) and 65.156(c)(2) and (c)(5)] regarding SSM is sufficient to communicate the requirements during an SSM.

Comment: One commenter (VI-D-02) asserted that it was intended for the CAR to allow one excused excursion of each operating parameter per reporting period. However, the commenter pointed out that the paragraphs covering excused excursions, presumably §65.3(b)(4)(iii), are missing although they are referenced from §65.3(b)(1) and (b)(4). The commenter suggested that the missing paragraphs should be added. Another commenter (VI-G-03) also noted that, there is no §65.3(b)(4)(iii).

Response: The reference to §65.3(b)(4)(iii) in §65.3(b)(1) should have been §65.3(b)(2); and the reference to §65.3(b)(4)(iii) in §65.3(b)(4) should have been §65.3(b)(4)(ii). These cross-references have been changed in the final CAR. The provision that the commenter refers to regarding the CAR allowing one excused excursion is in §65.156(d)(2).

### 3.2 STORAGE VESSELS

Comment: One commenter (IV-G-01) suggested that the CAR include an explanation that surge control vessels and bottoms receivers are treated as storage vessels under the CAR, because the CAR currently does not have a definition of storage vessels in §65.2 of subpart A. Because this definition is absent from §65.2, the commenter (IV-G-01) claims that the user is forced to rely on the storage vessel definition in the HON (40 CFR part 63, subpart F, §63.101), which specifically excludes surge control vessels and bottoms receivers from the definition of storage vessels. The commenter (IV-G-01) stated that, in this case, the user would need to consult the amendments to the HON (40 CFR part 63, subpart H) or 40 CFR part 61, subpart V to

remember that surge control vessels and bottoms receivers should be treated as storage vessels under subpart C of the CAR.

Response: We have clarified subpart C of the CAR to indicate that surge control vessels and bottoms receivers will be treated as storage vessels when referenced to subpart C. We have also added a definition of bottoms receiver to 40 CFR part 61, subpart V for completeness.

Comment: One commenter (IV-G-01) objected to the use of the term "noncontact floating roof" found in §65.43(a)(4)(i) of the CAR, as well as subpart Kb and the HON. The commenter points out that subpart Ka only states "...each opening in the roof...." The commenter maintains that the term "noncontact" is confusing because the roof is required to float on the liquid.

Response: The term "noncontact" is defined in relation to storage vessel floating roofs within the definition of external floating roof (EFR). The definition for internal floating roof (IFR) also alludes to a noncontact floating roof. To clarify what is meant by the term, we have revised the IFR definition to be as explicit as the EFR definition.

Comment: One commenter (VI-D-02) noted that §65.48(c)(1) requires notification at least 30 days prior to refilling an IFR, EFR, or EFR converted to an IFR, while §65.48(c)(2) requires notification 30 days prior to an EFR seal gap inspection. The commenter (VI-D-02) requested combining the notification requirements of §65.48(c)(1) and (c)(2), where applicable, and clarifying the proposed language.

The commenter (VI-D-02) asserted that §65.43(c)(5) and §65.48(c)(2) should also be clarified that the seal gap notification need not be submitted exactly 30 days before the measurement, as the current language seems to suggest, but "at least" 30 days before. The commenter (VI-D-02) also pointed out that both seal inspections and refilling can occur with less than 30 days warning, when a storage vessel outage is unexpected. Thus, the commenter (VI-D-02) pointed out, provision for shorter

notification periods is needed in §65.48(c)(2) to parallel the option provided in §65.48(c)(1)(ii).

Response: There is no prohibition in the CAR from including both notifications [§65.48(c)(1) and (c)(2)] in a single submission. We maintain, however, that these provisions cover different situations and that separate requirements for refilling notifications and for seal gap measurements are appropriate.

We agree with the commenter that the language in §65.48(c)(2) should be modified to clarify that the report is due at least 30 days prior to the seal gap measurement. We have also edited the CAR to provide an option for notification when unplanned seal gap measurement occurs. We have edited the CAR to include provisions in §65.48(c)(2) that parallel the options at §65.48(c)(1).

Comment: One commenter (VI-D-02) requested additional wording as follows for §65.48(d) to clarify intent: "...shall be based on the annual inspections required by §65.43(c)(1)(i) and (c)(2)(ii)(A) and any observations made at other times when the roof is viewed."

Response: We agree with the commenter and have made the suggested edit to help clarify the intent of §65.48(d).

Comment: One commenter (VI-D-02) requested that the requirements for EFR's converted to IFR's be spelled out in the text of §65.45 rather than referring to paragraphs from the EFR and IFR sections of subpart C. The commenter stated that this will reduce confusion and enhance compliance for sources in this situation.

Response: We have not edited the final CAR to include text that spells out the requirements for EFR's converted to IFR's. The proposed and final text clearly spells out the paragraphs that apply.

Comment: One commenter (VI-D-03) requested a clarification to §65.47(e) to indicate that the new record requirement for landing a floating roof on its legs does not apply during periods

of startup, shutdown, and malfunction. The commenter provided suggested language for the clarification.

Response: It is not often that a storage vessel will be the subject of a startup, shutdown, or malfunction but in these cases the SSM plan must specify the actions that should be taken. Depending on the effect of the SSM on the storage vessel, these records may still be significant.

Comment: One commenter (VI-G-03) cautioned that §65.43(a)(4)(iii) of the proposed CAR is confusing when compared to §63.119(b)(5)(iii) because it does not include the phrase, "...for the purpose of sampling."

Response: The phrase "...for the purpose of sampling" was deleted in the CAR because it implied that you could have penetrations for purposes other than sampling. The only allowable penetrations are those specified in one of the paragraphs under §65.43(a)(4).

### 3.3 PROCESS VENTS

Comment: One commenter (IV-G-01) stated that the text of the applicability section for process vents (§65.60) implies that subpart D applies to only process vents that require control. The commenter stated that this is not the case for Group 2A and 2B process vents. The commenter suggested the following changes to the text:

" The provisions of this subpart and of subpart A of this part apply to regulated material emissions from process vents ."

Response: We agree that subpart D of the CAR is also applicable to Group 2A and 2B process vents and that control is not required for these process vents. However, we contend that the language regarding being referenced from a referencing subpart is important to ensure that only sources referred to subpart D can use subpart D. We have modified the language in the final CAR to read as follows:

" The provisions of this subpart and of subpart A of this part apply to regulated material emissions from

process vents where a referencing subpart references the use of this subpart."

Comment: One commenter (IV-G-01) asserted that an owner or operator should be allowed to designate a group 1 vent stream as halogenated without having to perform any testing or calculations. The commenter (IV-G-01) pointed out that this allowance would assume a "worst case" and provide the corresponding level of control. The commenter contended that the allowance also would be similar to designating a process vent as group 1 in accordance with §65.62(b)(1) of the CAR.

Response: We agree that it is reasonable to allow an owner or operator to designate a group 1 vent stream as halogenated without having to perform any testing or calculations. This clarification has been made in the rule.

Comment: Commenter (IV-G-01) stated that the paragraph heading in §65.63(a)(2) should be revised to add "by weight" after 98 percent.

Response: The paragraph headings are meant to be short descriptors to aid in reading the document. We do not consider adding "by weight" an improvement in clarity and consider shorter headings that still convey the point better than longer ones. For this reason, we have revised this heading to remove "by volume" after 20 parts per million. The heading now reads: "98 percent or 20 parts per million standard." The text of the rule specifies the 98 percent be "by weight" and the 20 parts per million be "by volume."

Comment: One commenter (IV-G-01) suggested that §65.63(f)(4) through (f)(6) refer to the corresponding sections in recordkeeping §65.66(d) and reporting §65.67(b).

Response: The proposed and final CAR at §65.63(f) contain a reference to §65.66(d). We have added a reference to §65.67(b) in §65.63(f).

Comment: One commenter (IV-G-01) urged that §§65.64(c) and 55.158(c)(2) of the CAR should be amended to include both Method

18 and Method 26 or 26A in order to properly determine the hydrogen halide concentrations in any applicable vent stream.

Response: The method cited for use in determining the halogen status of a vent stream is correct in both §§65.64(c) and 65.158(c)(2). In these sections of the rule, procedures are given to determine whether a vent stream is considered halogenated and Method 18 is cited. Under the CAR, as under the HON, if "the mass emission rate of halogen atoms contained in organic compounds" is equal to or greater than 0.45 kg/hr the vent stream is considered halogenated. Therefore, to determine if a vent stream is halogenated, the organic and inorganic halogens must be differentiated. Method 18 speciates the halogens so that the "halogen atoms contained in organic compounds" can be determined. Methods 26 and 26A do not differentiate between organic and inorganic halogenated compounds, so they cannot be used to determine whether a vent stream is halogenated.

Methods 26 or 26A are required when determining if a scrubber installed after a combustion device has reduced the halogens by 99 percent during a performance test [see §65.158(c)]. Because many of the organic halogens would be converted to inorganic halogens in the combustor, the distinction between inorganic and organic halogens is not relevant.

Comment: One commenter (IV-G-01) asserted that footnote (a) to table 2 in the CAR preamble (63 FR 57770 "CAR Process Vent Group Determinations") is unclear, confusing, and does not capture the points of the explanation given in the preamble at 63 FR 57770. The commenter (IV-G-01) suggested that the footnote be revised as follows:

"The 50 ppm HAP concentration cutoff only applies to 40 CFR part 63, subpart G sources. Process vents subject to only 40 CFR part 60, subparts RRR or NNN are eligible for the 300 ppm TOC cutoff. There is no concentration cutoff for subpart III sources. The process vent provisions of subpart DDD are not consolidated under subpart D of the CAR."



Response: We agree and have revised the footnote to table 2 (63 FR 57770) to incorporate the recommendation of the commenter in the final CAR.

Comment: One commenter (VI-D-03) counseled that the CAR should be revised and the proposal preamble clarified to ensure that vent streams considered non-halogenated under a referencing subpart will be considered non-halogenated under the CAR. The commenter (VI-D-03) stated that it is possible that a process vent stream that is halogenated under the part 60 referencing subparts (III, NNN, RRR) would be considered non-halogenated under the CAR. The commenter (VI-D-03) asserted that this would result in a change in which the TRE equation must be used to determine whether the stream requires control. Furthermore, the commenter (VI-D-03) added that a benzene loading operation subject to 40 CFR part 61, subpart BB would have to demonstrate that it is not halogenated if it opts to use the CAR, subjecting these sources to unnecessary burden. The commenter (VI-D-03) reasoned that this will result in some group 2 process vents moving to group 1 because of the change in the TRE equation. The commenter (VI-D-03) suggested changes to the language of the CAR at §§65.2, 65.64(g), and 65.85(c) to provide clarification.

Response: As explained in the preamble, at 63 FR 57772, we acknowledge that because the CAR adopts the HON halogenated vent stream determination procedures, the halogenated status of process vents under 40 CFR part 60 subparts III, NNN, and RRR may change under the CAR. We maintain that the number of vents affected will not be significant. To be affected, the process vent would have to include halogenated components, be subject to a process vent NSPS, and not be subject to the HON. We believe that this is a small subset of vents. And for the fraction of this subset that would experience a change in halogenated status under the CAR, we remind the owner or operator that compliance with the CAR is an optional replacement for continuing to comply with the referencing subparts. In the specific case of 40 CFR part 61, subpart BB, we maintain that there are very few (if any)

loading operations that are both subject to subpart BB and also halogenated. The applicability of subpart BB is such that it would be nearly impossible for the liquid to be halogenated.

Comment: One commenter (VI-D-03) supports the uniformity achieved by consolidating the performance test procedures from the SOCFI NSPS rules. These rules require combustion devices that do not use supplemental air to correct effluent concentrations values to a 3 percent oxygen basis. The commenter acknowledges that sources subject to 40 CFR part 60, subpart DDD do not have this requirement. The commenter stated that subpart DDD sources will, therefore, incur increased stringency if opting to use the CAR, but this would probably affect very few of those sources.

Response: We thank the commenter for this support, and agree with the commenter that a consolidated approach to performance testing is simple and desirable even though it may increase the stringency of the rules for some.

Comment: One commenter (VI-D-01) indicated that the CAR's requirement specifying a correction to 3 percent oxygen for all combustion device concentration measurements could result in a 30 percent increase in reported concentration values. The commenter (VI-D-01) stated that this will be problematic since, typically, a 7 percent oxygen correction is required in current regulations or in Federally enforceable permits. The commenter (VI-D-01) noted that the CAR should not be more stringent than the underlying rules.

Response: The commenter is incorrect that current Federal regulations affecting the SOCFI use a 7 percent oxygen correction. All rules consolidated that have an oxygen correction use a 3 percent oxygen correction. The CAR has not changed this requirement from what is in the referencing subparts.

Comment: Two commenters (VI-D-02, VI-D-03) request that the proposed CAR subpart D be revised to provide a return to a process or fuel gas system as a compliance option for group 1

process vents. One commenter (VI-D-03) stated that this will make subpart D of the CAR consistent with other CAR sections and will provide incentive for shared return systems to use the CAR. This commenter (VI-D-03) asserts that such gas streams can be "process vents" (1) when the gas stream was, for whatever reason, identified as a process vent when applicability was determined, (2) if the stream is split, with a portion going to the atmosphere or to a control device, or (3) if the stream is sometimes returned to a process or fuel gas system and at other times sent to a control device.

Response: The CAR, as well as the HON, does not have a provision specifically allowing process vents to be routed to a process or fuel gas system as a compliance option. These rules do not provide this option because it would be confusing or inconsistent with definitions in some rules.

Route to process. Specifically, the NSPS and HON define applicability of requirements for vent streams at the equipment that originates the vent stream and determine the need for control at the exit of the last recovery device in the process. Since routing to a process would most likely require either routing to an existing recovery device in the process line or adding a recovery device to recycle the desired stream components, allowing a compliance option of routing to a process would merely move the point where the need for control is evaluated. This option already exists in all of these rules; it is the option to maintain the TRE index value greater than 1.0. (The typical way to achieve and maintain a TRE greater than 1.0 is to use product recovery to reduce organic compound emissions.) Based on past experience with these rules, we believe that it would be confusing to many readers if in addition to maintaining the TRE index value greater than 1.0 option, we also allowed a compliance option of routing to process. People would not understand the distinction between the two cases and therefore, would be confused as to the requirements of the rule.

Route to fuel gas system. We believe that adding route to fuel gas system as a compliance option would also be a source of confusion. Under the HON, gas streams that are routed to a fuel gas system are not process vents based on the definitions in 40 CFR part 63, subpart G. Therefore, this option would create confusion about the classification of the gas stream. Under the definitions in the three NSPS for SOCMI, the streams would still be regulated vent streams, but the rule already provides compatible compliance options for combustion devices. If we were to add route to fuel gas system as a compliance option for SOCMI NSPS vent streams, there would be questions as to which compliance option was being used in such cases and why the rule retained provisions for use as part of the primary fuel sent to a boiler or process heater. It would be a problem for people implementing the rule, because there would be no clear distinction between the cases.

Comment: One commenter (VI-G-03) pointed out several small burden reductions resulting from the engineering assessment provisions, and noted that the ability to use engineering assessments is not useful for units that have been previously tested. However, the commenter (IV-G-03) recognized that some relief is also afforded from the extensive recalculation and reporting if a process change does not affect the group 2B status of a vent. The commenter (VI-G-03) pointed out that only a statement to that effect is required under the CAR, not a detailed report.

Response: The commenter is correct. If a source has already determined the applicability it would not be necessary to redo the applicability when coming under the CAR. The engineering assessment provisions provide several burden reduction opportunities for units not previously tested and that undergo process changes.

Comment: One commenter (VI-G-03) asserted that the CAR provides some relief from monitoring process vents regulated under subparts NNN and RRR. The commenter (VI-G-03) stated that

no group 2B vents (TRE greater than 4.0 and less than 8.0) are defined by these rules, therefore monitoring is required by these referencing subparts.

Response: We assume that the commenter is referring to the TRE index value criteria for monitoring that was changed from 8.0 in 40 CFR part 60, subparts NNN and RRR to 4.0 in the CAR. Therefore, in the CAR, process vents subject to subpart NNN or RRR that have a TRE between 4.0 and 8.0 do not have to monitor but would have to monitor under subpart NNN or RRR.

Comment: One commenter (IV-G-01) claimed that the last sentence of paragraph (b) (3) of §65.142 should state that no other provisions of the subpart apply to Group 2 process vents, because the paragraph applies to Group 2A and 2B vents, not just Group 2A vents.

Response: The provisions of subpart G of the CAR are not applicable to Group 2B process vents. These vents are not referenced to subpart G from subpart D. Therefore, it is not appropriate to change the reference from Group 2A to Group 2. However, the earlier reference to Group 2 in §65.142(b) (3) should also be Group 2A, this has been corrected in the final CAR.

Comment: One commenter (IV-G-01) suggested that references made to TRE index value greater than 1.0 in the CAR §§65.63(c) and (d), 65.65(b), and 65.66(e) should also say "and less than or equal to 4.0" to clarify that Group 2A process vents have the same specifications as Group 2A vents defined in §65.62(c).

Response: The reason for defining Group 2A and Group 2B process vents in the CAR is because several words can be eliminated each time a Group 2 vent is referred to. These long descriptions that follow the term Group 2 in the HON can sometimes make for long confusing sentences. We consider the reliance on the terms Group 2A and Group 2B to be a clarification and simplification of the HON language.

Also, in the paragraphs referenced by the commenter the language described situations when "maintaining a TRE above 1.0." It would not be appropriate, even without the Group 2A and 2B

terms, to add "and less than or equal to 4.0" because we do not require that the TRE be maintained at all times between 1.0 and 4.0, only that it be maintained above 1.0 at all times.

Comment: One commenter (VI-D-03) suggested that the provisions of §60.665(1)(6) of subpart NNN and §60.705(1)(5) of subpart RRR should be revised so that the units opting to comply with the CAR can follow the provisions of the CAR for determining stream parameters and conducting performance tests. The commenter pointed out that the way these provisions are currently drafted that the source would have to follow the applicable provisions of subpart NNN or RRR for determining stream parameters and conducting the performance test before going to the CAR to comply.

Response: The provisions of §§60.665(1)(6) and 60.705(1)(5) have been edited to allow sources choosing to comply with the CAR to use the provisions of the CAR to determine stream parameters and to conduct the performance tests.

### 3.4 TRANSFER RACKS

Comment: One commenter (IV-G-01) advised that the CAR should be revised to allow most of the exemptions for transfer racks that are routed to vapor balance systems to apply to transfer racks routed to process or fuel gas systems. The commenter (IV-G-01) reasoned that the piping leading to the process or fuel gas system should not be considered a closed vent system and noted that the fuel gas systems are excluded from the definition of control devices. The commenter (IV-G-01) provided suggested language for this change.

Response: We agree that this is a warranted clarification of the intent of these requirements. The CAR has been revised to allow exemptions for transfer racks routed to processes or fuel gas systems.

Comment: One commenter (IV-G-01) noted that the term "transfer rack" is used in §65.80 of the CAR, but it is not defined in subpart A of the CAR. The commenter requested that

the term "transfer rack" be defined in subpart A of the CAR, or else subpart A should reference the transfer rack definition in HON subpart F and the loading rack definition in the benzene transfer operations NESHAP subpart BB.

Response: Because the term is not defined in the CAR, "transfer rack" has the same meaning in the CAR as it does for HON sources and the same meaning as "loading rack" for subpart BB sources. The language proposed to be added to subpart BB in §61.300(f) makes it clear that "loading racks" and "transfer racks" are the same.

Comment: One commenter (VI-G-03) commended the consolidation of the transfer rack rules from the HON into the CAR subpart E and noted that the consolidation should help facilities to demonstrate full compliance. The commenter (VI-G-03) also noted that HON group 1 transfer racks are relieved of an unnecessary recordkeeping burden by using the CAR. The commenter (VI-G-03) stated that once a transfer rack has been designated group 1 (requiring controls), records on throughput, HAP concentration, and partial pressure should not be required.

Response: We thank the commenter for this support.

Comment: One commenter (IV-G-01) requested clarification of several points from the proposal preamble at 63 FR 57779. The commenter (IV-G-01) first requested we specify how the CAR consolidation of the HON storage vessel provisions clarify the HON transfer monitoring provisions. The commenter (IV-G-01) stated secondly that we clarify that continuous monitoring is not required for low-throughput transfer racks as opposed to transfer racks as stated in the preamble.

Response: By consolidating on the HON storage vessel provisions for low-throughput transfer racks, the monitoring provisions for storage vessels are extended to low-throughput transfer racks. Under the CAR, owners or operators of low-throughput transfer racks can now monitor according to a monitoring plan they develop instead of monitoring specified by the rule.

The commenter is correct that the continuous monitoring requirements are not required for low-throughput transfer racks unless continuous monitoring is specifically included in the monitoring plan.

Comment: One commenter (IV-G-01) noted that the option to compress and route regulated material vapors to a process is given in §65.83(a)(3). This option appears to be the same as the "routed to a process" option given in §65.83(a)(4). The commenter (IV-G-03) suggested that the option should be removed from §65.83(a)(3), since it appears redundant.

Response: The provisions of §65.83(a)(3) specify what constitutes vapor balancing. In the HON, vapor balancing included compressing the regulated material and routing it to the process. The CAR has also included this as a form of vapor balancing. There are very few provisions that pertain to vapor balancing. The provisions of §65.83(a)(4) are for routing emissions to a fuel gas system or process. If a source uses this option to comply, some provisions of subpart G of the CAR must also be followed.

Although both of these provisions pertain to routing the emission to a process, the provisions are different depending on whether the vent stream is compressed or not. We maintain that these are two separate activities that require two separate paragraphs.

Comment: One commenter (IV-G-01) noted that §65.84(a) requires the owner or operator of a transfer rack to operate the equipment in the manner specified in paragraphs (a)(1) or (a)(2). However, the commenter noted, paragraph (a)(1) is a closed vent system which routes the regulated material vapors to a control device and paragraph (a)(2) is process piping that routes the regulated material vapors to a process or fuel gas system or to a vapor balance system. The commenter (IV-G-01) suggested a revision to §65.84(a) because the current wording suggests that one can operate a CVS or process piping.



Response: We have added to the text of §65.84(a) in order not to imply that one can operate a CVS or process piping. The final CAR states:

" An owner or operator of a transfer rack shall operate it in such a manner that emissions are routed through the equipment specified in paragraph (a)(1) or (a)(2) of this section."

### 3.5 EQUIPMENT LEAKS

#### 3.5.1 Leak Detection

Comment: One commenter (VI-G-03) expressed support for the streamlined leak detection and repair requirement provided in the CAR. The commenter agreed with our decision to eliminate the quality improvement program (QIP) for leaking valves. The commenter noted that the provisions of subpart F of the CAR that require increased monitoring frequency for consistently leaking valves are a sufficient incentive toward quality improvement. The commenter supported our decision to extend the maximum period for valve monitoring from 1 year to 2 years, and the maximum period for connector monitoring from 4 years to 8 years. The commenter noted that these provisions will eliminate unnecessary monitoring and give participating facilities an even better incentive to install and maintain "leak free" components. However, the commenter also stated that while most facilities will view extended monitoring periods for valves and connectors as a significant incentive to opt into the CAR from the HON, the incentive is not expected to be as compelling for smaller facilities. According to the commenter, extended monitoring periods are expected to save a facility with 1,000 valves and connectors only approximately \$325 per year.

Response: We thank the commenter for this support and agree that in general, the CAR offers more benefit to larger, complex sources.

Comment: One commenter (IV-G-01) noted that §65.104(a)(2) of the CAR provides a list of cases in which sensory monitoring for leaks is required. The commenter stated that §65.117(b)(6)

requires sensory monitoring and suggested that we include that section in the list of cases in which sensory monitoring is required.

Response: The CAR contains the procedures for conducting a pressure test of a batch process in §65.117(b)(6). The procedures call for the use of a test liquid and the visual indications of liquids dripping in this circumstance are occurring under controlled conditions at scheduled times. The list in §65.104(a)(2) contains references to standards where sensory monitoring is required to detect infrequent, unanticipated leaks of regulated material. It is not appropriate to include §65.117(b)(6) in the list provided by §65.104(a)(2).

Comment: One commenter (IV-G-01) noted that §65.104(a)(1) of the CAR provides a list of some of the cases in which instrument monitoring for leaks is required. The commenter suggested that we expand §65.104(a)(1) to be a complete list of cases in which instrument monitoring is required.

Response: We note that the intent of §65.104(a)(1) is to provide a comprehensive list of all routine instrument monitoring requirements. This section does not list the non-routine instrument monitoring requirements, such as cases in which instrument monitoring is required only when certain criteria are triggered or where instrument monitoring is offered as a compliance option.

Comment: One commenter (IV-G-01) requested the removal of §65.104(e)(2)(i) and (e)(2)(ii), claiming that these two paragraphs do not provide a complete list of what needs to be recorded upon finding a leak. The commenter noted that §65.105(f) provides a complete list.

Response: There are two separate recordkeeping requirements. The first is triggered upon detection of a leak. The information that must be recorded is specified in §65.104(e)(2), and consists of the instrument and the equipment operator's name along with the date the leak was detected and the leaking equipment identification. The records specified in

§65.105(f) are the second set of records, and they document the repair of the leak (not the discovery of the leak). For example, §65.105(f)(1) and (f)(2) require that the date of first attempt at repair and the date of successful repair be recorded. We maintain that both sets of records are unique and necessary.

Comment: One commenter (IV-G-01) recommended that we use the term "observed" rather than "monitored" in §65.104(a)(2)(iii). The commenter also suggested that the reference in §65.104(a)(2)(iii) to §65.104(e)(1)(i) should be to (e)(1)(iv).

Response: We agree with the commenter and have replaced the term "monitored" with the term "observed" in §65.104(a)(2)(iii). We have also changed the reference in §65.104(a)(2)(iii) to §65.104(e)(1)(iv).

### 3.5.2 Leak Repair

Comment: One commenter (IV-G-01) suggested that subpart F of the CAR should include language that addresses what is and what is not considered a violation when attempting to repair a leak, similar to language in §63.162(h) of subpart H (HON equipment leaks). The commenter (IV-G-01) pointed out that §63.162(h) of the HON states that if an attempt to repair a leak is made within the specified time, but the attempt is unsuccessful, the owner or operator is not in violation of the HON. The commenter (IV-G-01) expressed concern that successful repair of a leak may require multiple attempts and that applicable State regulations and permit conditions may prevent an owner or operator from designating the leaking piece of equipment for delay of repair. The commenter (IV-G-01) suggested that similar language be included in subpart F of the CAR which would clarify that failing to take action upon discovering a leak is violation, but that good-faith, unsuccessful attempts at repair are not violations.

Response: The CAR contains language that clarifies that leaks, in and of themselves, are not considered violations of the standard. The standards require action upon detecting leaks,

such as repair and recordkeeping requirements. Failing to take the required actions are violations of the standards; detecting a leak is not a violation of the standards. Therefore, it is not necessary to add language from the HON to the CAR to clarify this issue. If it is necessary to delay repair beyond the required repair time, the source can employ the delay of repair provisions. A source that neither repairs a leak nor uses the delay of repair provisions is in violation.

Comment: One commenter (IV-G-01) recommended that we revise the leak detection sections in subpart F of the CAR to allow consistent exceptions for different types of equipment. The commenter noted that in §65.106(b) (the leak detection section for valves), the owner or operator is required to monitor valves unless otherwise specified in §§65.102(b), 65.117, 65.118, or paragraph (e) of this section. The commenter questioned whether other requirements, such as monitoring for pumps or connectors, qualified for the same exceptions. For example, the commenter specifically called out §65.107(b), pump leak detection. This section does not reference §65.117, so the commenter questioned whether §65.117 is an allowable alternative (even though §65.117 references §65.107). The commenter suggested that we make the exceptions to monitoring consistent with the valve exceptions by revising §§65.107 through 65.114.

Response: We acknowledge that the proposed CAR did not explicitly list the exceptions to every requirement, especially where the exception itself specified the sections to which it was available. To clarify the issue while keeping the language simple, we have edited the CAR to remove the individual references to the exceptions while adding language to the exceptions to more clearly state where they are applicable.

We have clarified in the rule the four "paths" through the standards of the subpart.

1. Comply with the standards as they are written. This includes some specific exceptions within a standard (for example, the exception to pump monitoring for pumps equipped with dual mechanical seals).

2. Comply with §65.117 (batch processes) instead of the regular standards of §§65.106 through 65.114 and 65.116.
3. Comply with §65.118 (enclosed-vented process units) instead of the regular standards of §§65.106 through 65.116.
4. Comply with any of the above options as modified by an approved alternative means of emission limitation pursuant to §65.102(b).

We recognize that there is some confusion that results from specifically listing the exceptions granted by §§65.116 and 65.117. The exception is explicitly mentioned in some standards, but not in others. We have edited the CAR to remove all the individual references to §§65.116 and 65.117 from the standards in §§65.106 through 65.114. We also edited §§65.116 and 65.117 to clarify that those two sections are each considered to be alternatives to the entire set of standards set out in §§65.106 through 65.114.

Comment: One commenter (IV-G-01) suggested that the leak identification removal requirement in §65.105(c)(1) of the CAR for valves and connectors be revised to apply only to valves and connectors in gas/vapor or light liquid service. The commenter (IV-G-01) pointed out that, according to §65.110(b) of the CAR, no monitoring is required for valves and connectors in heavy liquid service if a leak detected by auditory, visual, or olfactory inspection is eliminated within 5 days.

Response: We agree with the commenter and have revised §65.105(c)(1) to apply only to valves and connectors in gas/vapor or light liquid service. It was our intent, however, to have all leaking equipment identified. Therefore, we revised §65.110(b)(2) to require that if instrument monitoring identifies a leak, the equipment must be identified.

Comment: One commenter (IV-G-01) noted that §65.107(e)(1)(viii) specifies that "when a leak is detected pursuant to paragraph (e)(1)(vi) of this section, it shall be repaired as specified in 65.105(a)." The commenter suggested

that we change the reference from 65.105(a) to 65.105 to be consistent with other sections of subpart F and to allow for delay of repair.

Response: We agree that the reference to §65.105(a) should be made more general. The reference has been edited to §65.105 to be consistent with the other sections of subpart F of the CAR.

### 3.5.3 Delay of Repair

Comment: One commenter (IV-G-01) noted that the delay of repair requirements for valves, connectors, and agitators in §65.105(d)(3) require purged material to be collected and destroyed or recovered in a control device complying with §65.115. The commenter suggested that we add the option of routing the purged material to a process or fuel gas system.

Response: We agree that adding the option of routing to a process or fuel gas system would increase operational flexibility. We have edited the CAR at §65.105(d)(3)(ii) to incorporate this addition. We note that it will not always be feasible to route to a fuel gas system or to a process, but where it can be done we believe it is a useful option.

Comment: One commenter (VI-D-03) suggested that we revise §65.105(d) to make the delay of repair language in §65.105(d) consistent with §65.105(d)(1). The commenter (VI-D-03) recommended the following language for §65.105(d): "...The owner or operator shall maintain a record of the facts that explain any delay of repairs and, where appropriate, why repair within 15 days was technically infeasible without a process shutdown."

Response: We agree with the commenter and have edited the language in §65.105(d) to be consistent with that at §65.105(d)(1).

### 3.5.4 Valves--Difficult- and Unsafe-to-Monitor

Comment: One commenter (IV-G-01) recommended that unsafe-to-monitor and difficult-to-monitor valves be exempt from the provisions in §65.106(e) of the CAR which require follow-up monitoring 3 months after a leak is repaired. The commenter (IV-G-01) stressed that it would be impractical and costly to

conduct follow-up monitoring within 3 months for unsafe-to-monitor and difficult-to-monitor valves. The commenter (IV-G-01) also pointed out that a similar exemption is provided in §65.108(e) of the CAR which exempts unsafe-to-monitor connectors from the requirement for follow-up monitoring 90 days after repair.

Response: In order to remain consistent with the provisions of §63.168(h) of the HON, §65.106(e)(1) of the CAR has been revised to state that unsafe-to-monitor valves are exempt from the 3 month follow-up monitoring provisions of §65.106(d)(2) of the CAR. To remain consistent with §63.168(i) of the HON, however, §65.106(e)(2) of the CAR has not been revised and difficult-to-monitor valves continue to be subject to the 3 month follow-up monitoring provisions of §65.106(d)(2).

Difficult-to-monitor valves have some obstacle to overcome before they can be monitored, but monitoring does not pose a safety hazard. The written plan required by §65.103(c)(4)(ii) for difficult-to-monitor valves specifies annual monitoring at a minimum. Because personnel are not put at risk and the valves must be monitored at least annually, it is not appropriate to exempt difficult-to-monitor valves from the 3 month follow-up monitoring upon repair of a leak.

Comment: One commenter (IV-G-01) suggested that difficult-to-monitor valves should be limited to 3 percent at new or reconstructed sources, but not limited at existing sources. The commenter (IV-G-01) also suggested that the criteria for designating difficult-to-inspect components on a closed vent system should not include a limitation on the number of components. The commenter (IV-G-01) proposed revised language for the CAR, 40 CFR part 61, subpart V and 40 CFR part 60, subpart VV that would reflect the above suggestion and also create consistency with subpart H of the HON.

Response: We intend to model the difficult-to-monitor allowance in the CAR and in the proposed revisions to subparts V and VV after the provisions in the HON. To correct drafting

errors at proposal, we revised the language in §65.103(c)(2) of the CAR to include a 3 percent limit on the number of valves that can be designated as difficult-to-monitor at new or reconstructed sources, and to impose no limit on the number of difficult-to-monitor valves at existing sources. It is appropriate to limit new sources because designers can consider equipment layout when designing a new source. Also, the proposed amendments to 40 CFR part 61, subpart V were revised at §61.242-11(l)(2) to remove the 3 percent limit on the number of difficult-to-inspect components included in closed-vent-systems.

#### 3.5.5 Valves--Subgrouping and Monitoring Frequency

Comment: One commenter (IV-G-01) expressed concern with the wording in §65.106(c)(1)(i) of the CAR which states that "the owner or operator shall decide no later than the implementation date of this part or upon revision of an operating permit whether to calculate percent leaking valves on a process unit or group of process units basis." The commenter (IV-G-01) said that the phrase, "group of process units basis" in §65.106(c)(1)(i) is confusing if it is intended to refer to a subgroup of valves within a process unit. The commenter (IV-G-01) suggested that the language be revised to read, "...on a process unit or a valve subgroup basis."

Response: The intent of §§65.106(b) and 65.106(c) is to provide the owner or operator with maximum flexibility for managing the monitoring of valves. To be eligible for valve subgrouping provisions, the owner or operator must first demonstrate that less than 2 percent of valves are leaking either within a process unit or within a group of process units. The decision at this first step is setting up the collection of valves (either the valves in a process unit or in a group of process units) that may be eligible for subgrouping. This collection of valves must perform better than a 2 percent leak rate before subgrouping of the collection is allowed.

If the owner or operator decides to calculate the percentage of leaking valves on a process unit basis, and less than



2 percent of the valves are leaking within that process unit, then the valve subgrouping provisions of §65.106(b) apply to valves within the process unit. If the owner or operator decides to calculate the percentage of leaking valves on a group of process units basis (more than one process unit), and less than 2 percent of the valves are leaking within that group of process units, then subgroups of valves may be designated within the group of process units (both within and across individual process units). The owner or operator may decide whether or not to group several process units together for the purpose of calculating the overall percentage of leaking valves. Section 65.106(c)(1)(i) specifies that this decision must be made no later than the implementation date of the CAR or upon revision of an operating permit.

Comment: One commenter (IV-G-01) requested clarification regarding the appropriate time to notify the Administrator of a decision to begin or end subgrouping valves. The commenter noted that §65.106(b)(4)(v) requires the owner or operator to "notify the Administrator no later than 30 days prior to the beginning of the next monitoring period of the decision to begin or end subgrouping valves." The commenter also noted that according to the same section, notification may be included in the next periodic report. The commenter requested clarification on whether notification can be included in the next periodic report regardless of when the next monitoring period begins.

Response: The notification to begin or end subgrouping of valves must be submitted at least 30 days prior to the beginning of the next monitoring period. This notification can be included with a periodic report; it does not have to be a separate notice. If you choose to submit the notice as part of a periodic report, then the periodic report must be submitted at least 30 days prior to the beginning of the next monitoring period.

Also note that only a single notice is required. If you submit the notice as part of your periodic report, then a separate notification is not required.

We have revised §65.106(b)(4)(v) to clarify these two options for notifications.

Comment: One commenter (VI-G-03) noted that §§65.106(b)(3) and 65.108(b)(3) in subpart F of the CAR determine the monitoring frequency for valves and connectors, respectively. The commenter observed that for each doubling of the monitoring period (for example, from 1 to 2 years), the percent of leaking components allowed is cut in half (for example, from 0.5 to 0.25 percent for valves). The commenter suggested that this pattern creates a disincentive to strive for longer monitoring periods, noting that frequent changes in the leak detection and repair program are burdensome. The commenter questioned how we determined the percent leaking valves that are used to determine the required monitoring frequencies.

Response: Regarding the perceived disincentive to establishing longer monitoring periods, we recognize that there may be some burden involved with changing a leak detection and repair program. This burden, however, may be more than offset by the reduction in monitoring events. Going from annual monitoring to monitoring once every 2 years effectively cuts the number of monitoring events in half, with the only increase in burden being procedural changes in the monitoring program.

Regarding the rationale for determining the percent leaking valves used to determine the required monitoring frequencies, we note that we maintained the same emission rate. Doubling the monitoring period while halving the allowable percent leakers maintains the effective overall emission rate.

### 3.5.6 Valves--Other Comments

Comment: One commenter (IV-G-01) recommended that subpart F of the CAR and subpart H of 40 CFR part 63 both allow the owner or operator to designate sealless valves as operating with no detectable emissions, as is allowed in 40 CFR part 60, subpart VV and 40 CFR part 61, subpart V. The commenter (IV-G-01) suggested that allowing this designation would provide an incentive for facilities to install sealless valve technology. The commenter

(IV-G-01) also noted that facilities subject to subpart VV and subpart V would incur an increased monitoring burden under the CAR if they had previously designated some sealless valves as operating with no detectable emissions.

Response: The provisions in 40 CFR part 60, subpart VV and 40 CFR part 61, subpart V for designating valves as operating with no detectable emissions require that the owner or operator monitor these valves annually to verify that these valves continue to operate with no detectable emissions. The extended monitoring periods and valve subgrouping provisions of the CAR allow an owner or operator to monitor valves even less frequently. We expect that an owner or operator would continue to have incentive to install advanced valve technology, because these valves could be designated as part of a subgroup, and could potentially be monitored as infrequently as once every 2 years if the technology proves effective. Therefore, we did not find it necessary to revise subpart H of the HON and subpart F of the CAR as suggested by the commenter.

Comment: One commenter (IV-G-01) recommended that the  $V_L$  term in the percent leaking valves calculation in §65.106(c)(1)(ii) should include valves found leaking pursuant to §65.106(d)(2)(iii)(A) and (d)(2)(iii)(B), as applicable. The commenter expressed concern that without explicitly including these valves in §65.106(c)(1)(ii), an owner or operator may overlook the requirement to include valves found leaking during the 3 month follow-up monitoring required by §65.106(d)(2).

Response: We agree that the  $V_L$  term needs to be clarified, and we have added a reference to §65.106(d)(2)(iii)(A) and (d)(2)(iii)(B) to the  $V_L$  term in the percent leaking valves equation at §65.106(c)(1)(ii).

Comment: Regarding plant sites with less than 250 valves, one commenter (IV-G-01) advised that §65.106(e)(3) should be revised to read as follows: "Instead, the owner or operator shall monitor each valve in regulated material service for leaks once each quarter except as provided in paragraphs (e)(1) and

(e)(2) of this section." The commenter noted that this revision will drop the reference to §§65.106(b)(4)(iii) through (b)(4)(v), which the commenter contends is not needed.

Response: We acknowledge that the provisions for plant sites with fewer than 250 valves [see §65.106(e)(3)] contained an incorrect reference at proposal. We have edited the section to specify that at plant sites with fewer than 250 valves, monitoring will be required quarterly or at a frequency specified through the optional subgrouping procedure.

#### 3.5.7 Pumps--Percent Leaking Pumps Calculation

Comment: One commenter (IV-G-01) suggested that, in §65.107(c)(4) of the CAR, the definition of the  $P_T$  term (the total number of pumps in regulated material service) in the percent leaking calculation for pumps be changed to explicitly include pumps routed to a process or fuel gas system or equipped with a closed vent system routed to a control device. The commenter (IV-G-01) reasoned that if sealless pumps and dual mechanical seal pumps can be included in the  $P_T$  term, then a plant should be given credit for pumps vented to a closed vent system routed to a control device or pumps routed to the process or a fuel gas system.

Response: We agree with the commenter that the  $P_T$  term of the percent leaking equation in §65.107(c)(4) should include pumps routed to a process or fuel gas system or equipped with a closed vent system. The definition of the  $P_T$  term in this section has been clarified to include pumps meeting the criteria in §65.107(e)(3), in addition those meeting the criteria in paragraphs (e)(1) and (e)(2).

Comment: One commenter (IV-G-01) requested clarification on how unsafe-to-monitor pumps should be accounted for in the percent leaking pump calculation in §65.107(c)(4) of the CAR. The commenter (IV-G-01) inquired whether unsafe-to-monitor pumps should be excluded from the  $P_L$  term (the number of pumps found leaking as determined through monthly monitoring) because they are not considered part of the "monthly monitoring" of pumps.

Also, the commenter (IV-G-01) inquired whether unsafe-to-monitor pumps should be included in the  $P_T$  term (the total number of pumps in regulated material service). The commenter (IV-G-01) reasoned that if the  $P_L$  term excludes unsafe-to-monitor pumps then the  $P_T$  term should exclude them as well. Similarly, the commenter (IV-G-01) noted that if the  $P_L$  term includes unsafe-to-monitor pumps, then they should be included in the  $P_T$  term.

Response: The  $P_L$  term in §65.107(c)(4) of the CAR is defined as the number of pumps found leaking as determined through monthly monitoring as required in §65.107(b)(1). We agree with the commenter that the  $P_L$  term does not include unsafe-to-monitor pumps because they are not included in the monthly monitoring required by §65.107(b)(1). Note that §65.107(e)(6) specifically excludes these pumps from monthly monitoring pursuant to §65.107(b). The  $P_T$  term is defined as the total number of pumps in regulated material service, and therefore includes unsafe-to-monitor pumps in regulated material service.

Comment: One commenter (VI-D-03) requested clarification of which pumps are included in the divisor of the calculation that determines the rate of leaking pumps. The commenter (VI-D-03) recommended that the divisor of this calculation should be the SCU for any designated SCU's. The commenter (VI-D-03) recommended that the divisor should be based on process units only for equipment that is not part of a SCU. The commenter (VI-D-03) provided that the term "process unit" in the proposed rule is confusing in the issue of percent leaking pumps calculation. The commenter pointed out that the definition of "process unit" in the proposed CAR refers to the referencing subpart definition, but several referencing subparts are frequently involved in a single SCU. The commenter stated that it is also confusing how to handle the unit grouping decision as equipment comes under the CAR.

The commenter (VI-D-03) recommended that the choice of a SCU, or group of SCU's, as the basis for the calculation should be allowed when the first SCU comes under the CAR, regardless of the choice of divisor under the HON or for units continuing to comply with the HON. The commenter stated that such a choice would be binding for future equipment coming into the CAR. The commenter (VI-D-03) asserted that a "new election" should be allowed for HON units, because the number of pumps in an SCU will be different than the number of pumps in a HON unit (because only HAP-containing pumps are covered by the HON). The commenter (VI-D-03) provided language to make this change in the requirements at §65.107(c).

Response: The final CAR does not include the SCU concept. Therefore, the process unit referred to by the divisor of the equation is clearly referring to the process unit that has opted to comply with the CAR.

With regards to "new election" for HON units, we have clarified that when a facility opts into the CAR, the decision to base the calculation on a process unit or group of process units can be made. Because the facility's permit will be open for modification to opt into the CAR, it is also an opportunity to re-evaluate and modify the selection of process units used as the basis of the calculation for the process units remaining under the HON.

#### 3.5.8 Pumps--Visual Inspections

Comment: One commenter (IV-G-01) suggested that we revise §65.107(e)(1)(viii) to state that a leak detected pursuant to paragraph (e)(1)(v) or (e)(1)(vi) must be repaired as specified in §65.105. The commenter cautioned that if paragraph (e)(1)(v) were not included, then there would be no repair time limit for leaks detected under that paragraph.

Response: Under the CAR at §65.107(e)(1)(v), weekly visual inspections are required for dual mechanical seal pumps. If there are visual indications of liquids dripping, then the owner or operator has a choice to instrument monitor the pump or take

action to eliminate the drip. At this point, a leak has not been detected. A leak is detected only if the owner or operator chooses to instrument monitor and gets a reading in excess of 1,000 ppm. If the owner or operator chooses to take action to eliminate the drip, then no leak is detected.

The distinction is important because, as the commenter pointed out, there is no time limit in the proposed CAR for owners or operators to take action to eliminate the drip. There is also no time limit in the proposed CAR for performing the instrument monitoring if the owner or operator chooses that option. But there is a time limit (15 days) to repair a leak after its presence has been confirmed through instrument monitoring.

To remedy this inconsistency, we edited the language in §65.107(e)(1)(v) to specify that one of the two procedures (perform instrument monitoring or eliminate the drip) must be completed "prior to the next required inspection." Similar language was also added to parallel requirements at §65.109(b)(3) (agitator seals), §65.109(e)(1)(iv) (dual mechanical agitator seals), and §65.110(b)(1) (heavy liquid service equipment; pressure relief devices in liquid service; and instrumentation systems). Note that §65.110 does not specify required visual inspection frequency. In this section, there is a 15 day time limit to perform instrument monitoring or to take action to eliminate the indications of a leak.

Comment: One commenter (VI-D-02) suggested that we revise the proposed language for §§65.107(b)(4) and 65.107(e)(1)(v) of the CAR to eliminate a potential requirement for weekly monitoring of pumps. The commenter pointed out that pumps must be monitored monthly by EPA Method 21, and must also be monitored weekly by visual inspection. If weekly visual inspection identifies "liquids dripping," the owner or operator is required either to monitor the pump by Method 21, or to eliminate the visual indications of liquids dripping. The commenter noted that if the owner or operator chooses to monitor the pump by

Method 21, and no leak is found, then nothing is required. However, the commenter pointed out that visual indication of liquids dripping is likely to still exist each week and therefore require monitoring by Method 21 each week. The commenter pointed out that a small amount of liquid drip from a pump is not unusual, particularly where a heavy barrier fluid is present. The commenter suggested that once an owner or operator has shown that a drip from a pump is not a leak, subsequent weekly monitoring should not be required. The commenter recommended that additional paragraphs be added to §§65.107(b)(4) and 65.107(e)(1)(v) to clarify that additional instrument monitoring of a pump due to visual indication of liquids dripping is only required once between routine monthly monitoring.

Response: We thank the commenter for pointing out this potential problem, and we have edited the language in the pumps standards at §§65.107(b)(4) and 65.107(e)(1)(v). The revised standards specify that if weekly visual inspections indicate "liquids dripping" and if instrument monitoring shows that there is not a leak, then no additional instrument monitoring is required until the next regularly scheduled (monthly) instrument monitoring.

### 3.5.9 Pumps--Other Comments

Comment: One commenter (IV-G-01) suggested that language in §65.107(e)(5) of the CAR be revised to state that if more than 90 percent of the pumps at a process unit are equipped with dual mechanical seals or have no externally actuated shaft (i.e. sealless pumps), then the process unit should be exempt from the percent leaking calculation in §65.107(c) of the CAR rather than being exempt from the leak detection requirements in §65.107(b) of the CAR. The commenter (IV-G-01) stated that this revision would make the CAR consistent with §63.163(i) of the HON.

Response: We agree with the commenter, and we have revised the language in §65.107(e)(5) of the CAR to state that if more than 90 percent of the pumps at a process unit are either equipped with dual mechanical seals or have no externally



actuated shaft then, the process unit is exempt from the percent leaking calculation in §65.107(c) and not exempt from the leak detection requirements in §65.107(b).

Comment: One commenter (IV-G-01) requested clarification on portions of the QIP requirements for pumps in §65.116 of the CAR. It is the understanding of the commenter (IV-G-01) that the data analysis of pumps in the QIP (specified by §65.116(d)(5) of the CAR to be completed within 18 months of beginning the QIP) is not required if the facility meets the criteria to exit the QIP in less than 18 months. The commenter (IV-G-01) requested that this point be clarified. The commenter (IV-G-01) also requested clarification on whether a facility in the QIP for the first time would be required to comply with the requirements of the trial evaluation in §65.116(d)(6) of the CAR if a data analysis has already identified a superior pump design, technology or operating and maintenance practice. The commenter (IV-G-01) also pointed out that the quality assurance program in §65.116(d)(7) and the pump replacement program in §65.116(d)(8) require that a facility implement these programs after having been in the QIP for 3 or 4 years, depending on the number of employees and number of pumps at the facility. The commenter (IV-G-01) requested clarification on how to determine the length of time a facility has been in the QIP program if the facility has exited and reentered the QIP program one or more times.

Response: In response to clarifying what to do for a facility that exits a QIP in less than 18 months, we agree with the commenter that the first data analysis would not be required.

In response to the issue of facilities implementing a QIP for the first time, we agree that a trial evaluation program would not be necessary if a data analysis specific to the individual situation at the facility had previously been conducted. This pre-existing data analysis would have already identified the services, operating or maintenance practices, and pump or pump seal design technologies with better than average emission performance. The requirement under the QIP would then

be to begin implementation of the superior technology through the replacement program.

In response to the question regarding the time period requirements of the QIP, the 3 and 4 year requirements would refer to the time passed since the first triggering of the QIP. The QIP was developed for poorly performing facilities and was not envisioned as an additional burden to facilities operating on the edge of triggering a QIP. We recognize that, in the absence of data identifying a superior technology, a facility entering and exiting a QIP must re-enter the QIP at the performance trial step.

We note that the intent of the CAR is to create an incentive to improve performance such that the QIP is not triggered. We do not anticipate many facilities needing to comply with the QIP, and we expect very few sources to be operating "on the bubble," constantly entering and exiting the QIP.

Comment: Two commenters (IV-G-01 and VI-D-03) recommended changing the leak definition for heavy liquid pumps that are not in polymerizing monomer or food/medical service from 1,000 ppm to 2,000 ppm in §65.110. The commenters (IV-G-01 and VI-D-03) pointed out that, although the leak definition for heavy liquid pumps is 1,000 ppm, they are not required to be repaired unless they are detected to be leaking at or above 2,000 ppm. One commenter (IV-G-01) also stated that a 2,000 ppm leak definition for heavy liquid pumps would be consistent with the requirements of 40 CFR part 63, subpart H (HON equipment leaks).

Response: We agree with the commenter; for all heavy liquid pumps that are not in polymerizing monomer service, we intended §63.169 of the HON and §65.110 of the CAR to state that an instrument reading of 2,000 parts per million indicates a leak. We have revised the portions of §65.110(b)(2) of the CAR and §63.169(b) of the HON relating to pumps in heavy liquid service to read: "If an instrument reading of ... 5,000 parts per million or greater for pumps handling polymerized monomers, 2,000 parts per million or greater for all other pumps (including pumps in

food/medical service) ... is measured, ... a leak is detected...."

### 3.5.10 Connectors--Exemptions to the Connector Standards

Comment: Two commenters (IV-G-01 and VI-D-03) suggested that owners or operators electing to use the CAR should not be required to monitor connectors that are subject only to the provisions of 40 CFR part 61, subpart V or 40 CFR part 60, subpart VV. Both commenters noted that these referencing subparts require only sensory inspection of connectors. The commenters (IV-G-01 and VI-D-03) stated that instrument monitoring of connectors in gas/vapor or light liquid service would represent a substantial burden increase over sensory inspection and may be a disincentive for owners or operators to opt into the CAR. One commenter (IV-G-01) provided an example from the CAR preamble which states that agitators subject only to the requirements of subpart VV would not be subject to the provisions for agitators in the CAR because there are no provisions that apply to agitators in subpart VV.

One commenter (VI-D-03) suggested that an overall environmental benefit would be achieved if facilities currently using sensory inspection for connectors were exempt from monitoring using EPA Method 21. The benefit, according to the commenter (VI-D-03), would be that facilities subject to subpart VV of part 60 and subpart V of part 61 would be more likely to opt into the CAR and would therefore be subject to a more stringent leak detection and repair program for valves. The commenter (VI-D-03) stated that leak definition for valves is 10,000 ppm in subparts V and VV compared to 500 ppm in subpart F of the CAR. The commenter (VI-D-03) pointed out that although sensory inspection of connectors instead of instrument monitoring appears to be a relaxation of the proposed requirements of the CAR, sensory inspection is not a change from existing requirements. The commenter (VI-D-03) also alleged that historical and recent connector emission data indicate that

little benefit would be gained from instrument monitoring versus sensory inspection of connectors.

Response: We have considered the commenters request. We have determined that at a facility currently performing only sensory monitoring for connectors, initiating instrumental monitoring may present a significant disincentive to using the CAR. Because we believe that the more facilities that use the CAR, the more burden that will be reduced for both industry and regulators, we have provided a sensory monitoring option for sources subject only to subparts V and VV to eliminate this disincentive for opting into the CAR. No degradation of environmental protection will result from the CAR requiring sensory monitoring for connectors coming into the CAR from subparts V and VV because that is what those two referencing subparts require. The final CAR has been modified so that it contains two connector monitoring programs. The first will consist of sensory monitoring and will be available as an alternative to connector monitoring for equipment referenced to the CAR from subparts V and VV. The second will consist of the instrument monitoring procedures as proposed; this program will be applicable to equipment coming to the CAR from the HON and will be available to equipment coming to the CAR from subparts V and VV.

Note, however, that when sensory monitoring indicates a potential leak and the owner or operator performs instrument monitoring, a leak definition of 500 ppm is used for consistency with the other connector monitoring provisions in the CAR.

Comment: One commenter (IV-G-01) noted that although §65.104(a)(2)(ii) states that "inaccessible, ceramic, or ceramic-lined connectors...shall be observed pursuant to 65.108(e)(2)," there is no actual requirement to observe connectors in §65.108(e)(2). The commenter also noted that although §65.104(a)(2)(iv) requires several types of equipment to be observed pursuant to §65.110(b)(1), there is no actual requirement to observe this equipment in §65.110(b)(1). The

commenter recommended that we remove §§65.104(a)(2)(ii) and 65.104(a)(2)(iv).

Response: We concur with the commenter and have deleted §§65.104(a)(2)(ii) and (a)(2)(iv). We clarify that §§65.108(e)(2) and 65.110(b)(1) do not require the owner or operator to perform regularly scheduled inspections or observations. They do require that action be taken, however, if evidence of a leak is observed.

Comment: One commenter (IV-G-01) suggested that we revise §65.108(e)(1) to make unsafe-to-monitor connectors exempt from the connectors compliance schedule in §65.108(a) and leak detection requirements in §65.108(b). The commenter pointed out that unsafe-to-monitor connectors should not be included in the initial screening required by §65.108(a) because they may not be safe to monitor at any time during the first 12 months.

Response: We agree with the commenter and have made edits to the CAR at §65.108(e) to specify that unsafe-to-monitor connectors are neither included in the initial screening required by §65.108(a) nor in the leak detection provisions of §65.108(b). This does not relieve you from having to inspect during safe-to-monitor periods.

Comment: One commenter (IV-G-01) recommended that inaccessible connectors mentioned in §65.108(e)(2)(i) should be exempt from the leak repair requirements in paragraph (d) because §65.108(e)(2)(ii) specifies the timing for repair for inaccessible connectors.

Response: We clarify that §65.108(e) does not reference §65.108(d) for leak repair. In §65.108(e)(2)(ii), the requirement is to eliminate the "visual, audible, olfactory, or other indication of a leak...as soon as practical." The standard leak detection procedures in §65.105 do not apply to these types of connectors (inaccessible, ceramic, or ceramic-lined), so no reference is provided to §65.108(d) because §65.108(d) specifies the use of §65.105. Also, note that §65.108(d) explicitly states

that §65.105 is to be used only for leaks "detected pursuant to paragraphs (a) and (b)."

#### 3.5.11 Connectors--Other Comments

Comment: One commenter (IV-G-01) requested that the definition of the %C<sub>L</sub> term in the percent leaking connectors calculation in §65.108(c) of the CAR be revised to clarify that connectors found leaking during the 90 day follow-up monitoring are excluded from the calculation. The commenter (IV-G-01) pointed out that including connectors found leaking during the 90 day follow-up monitoring would lead to double counting of leaking connectors. The commenter (IV-G-01) recommended revising the definition of %C<sub>L</sub> to read, "%C<sub>L</sub> = Percent leaking connectors as determined through monitoring required through periodic monitoring required in paragraphs (a) and (b)(3)(i) through (b)(3)(iii)."

Response: We agree with the commenter that including connectors found leaking during the 90 day follow-up monitoring in the %C<sub>L</sub> term of the percent leaking connector calculation would lead to double counting of leaking connectors. We have revised the language in §65.108(c), as suggested by the commenter, in order to clarify that connectors found leaking during the 90 day follow-up monitoring are not included in the percent leaking connector calculation.

Comment: One commenter (VI-G-05) suggested that we include a subgrouping program for connectors. The commenter (VI-G-05) stated that it is often practical for monitoring personnel to monitor valves and their associated connectors at the same time because the monitoring route followed is typically ordered by location rather than by equipment type. The commenter (VI-G-05) reasoned that it would make sense to allow similar subgrouping programs for both valves and connectors. The commenter (VI-G-05) also suggested that the process stream contained within the equipment plays a role in causing leaks. The commenter (VI-G-05) reasoned that if a certain area or subgroup is experiencing high

leak rate problems for valves, it is likely that the connectors in that area are experiencing similar problems.

Another commenter (VI-D-03) suggested that a subgrouping program for connectors in the CAR was not justified. The commenter (VI-D-03) stated that the increased complexity of a connector subgrouping program for owners, operators, and agency inspectors is not justified for the minimal environmental benefit. The commenter (VI-D-03) provided several reasons for not creating a subgrouping program for connectors. One reason the commenter gave was that the leak frequency for connectors has not been shown to be a function of the process, fluid temperature or operating pressure. A second reason the commenter gave is that 40 CFR part 63, subpart H and the proposed CAR provide for connectors in gas/vapor service to be monitored once per year and allows longer monitoring periods for process units with connector leak rates less than 0.5 percent. A third reason the commenter gave was that historical industry data indicate that, in general, emissions from connectors is already extremely low and a recent study showed insignificant differences in connector leakage emissions at facilities with and without leak detection and repair programs.

Response: We do not believe it is appropriate to add a subgrouping program for connectors, given the added complexity of such a program for minimal environmental benefit or burden reduction.

#### 3.5.12 Monitoring Instrument Procedures

Comment: One commenter (IV-G-01) recommended that water be given as an example of an inert in the phrase "For process streams that contain nitrogen, air, or other inerts that are not organic HAPs or VOC . . ." found in §65.104(b)(2) and §65.143(c)(1)(ii).

Response: We agree with the commenter and have added "water" to the lists of example inert compounds in §§65.104(b)(2) and §65.143(c)(1)(ii).

Comment: One commenter (VI-D-03) recognized that in §§65.104(b)(2) and 65.143(c)(1) of the CAR, we have reduced the burden of determining an instrument response factor compared to the requirements of subpart H of the HON. The commenter (VI-D-03) requested that we clarify what is required and how to demonstrate that the requirements of §§65.143(c)(1) and 65.104(b)(2) have been met. The commenter (VI-D-03) noted that the HON requires that an instrument response factor be based on the mathematical average response factor for a given process fluid. The commenter (VI-D-03) also noted that we recognized the difficulty in calculating individual stream response factors, particularly for complex streams and that we specified in the CAR that response factors could be based on a representative response factor. The commenter (VI-D-03) agreed with the simplification but expressed concern that the proposed language regarding the requirements and demonstrations of compliance were unclear. The commenter (VI-D-03) provided suggested revisions to the language in §§65.143(c)(1)(ii) and 65.104(b)(2)(i) and also provided language for an additional recordkeeping requirement to be added to §§65.119(b) and 65.163(a).

Response: We have adopted some of the changes requested by the commenter in §§65.104(b)(2) and 65.143(c)(1), and we have added the explicit records suggested by the commenter to §§65.119(b) and 65.163(a). Both changes help clarify the rule by spelling out exactly what the procedures are and what records must be kept when modifying the instrument response factor under Method 21 in cases where a representative composition of the process fluid is used.

Comment: Two commenters (VI-D-03 and VI-D-02) suggested that we revise §§65.104(b)(4) and 65.143(c)(1)(v) to allow gases other than methane to be used as a Method 21 calibration gas. Both commenters expressed concern that an owner or operator of a source subject to subpart VV and using hexane as a calibration gas would face the unnecessary burden of switching to methane in order to opt into the CAR. One commenter (VI-D-02) suggested



that there are many materials, in addition to methane and hexane, that have response factors in the proper range to assure good measurements. The commenter (VI-D-02) requested that we allow non-methane calibration gases, particularly hexane, as long as the instrument performance criteria are met.

Response: We clarify that hexane is an allowable substitute for methane as a calibration gas in cases where methane cannot be used because the monitoring instrument does not respond to methane. This allowance is spelled out at §65.104(b)(4)(ii), "A calibration gas other than methane in air may be used if the instrument does not respond to methane..." This approach is consistent with the HON, provides for a single consolidated calibration procedure, and still allows n-hexane to be used in cases where methane is not able to be used.

Comment: One commenter (IV-G-01) suggested that, in subpart F of the CAR, we revise all of the references to monitoring methods. The commenter provided a list of paragraphs from subpart F of the CAR that require the owner or operator to detect leaks by the method specified in §§65.104(b), (c), and (e). The commenter pointed out that §65.104(b) contains the monitoring method information, §65.104(c) contains information about adjusting the instrument readings, and §65.104(e) is about identification and records of leaking equipment. The commenter recommended that we change the references to either just §§65.104(b) and (c), or to just §65.104(b).

Response: We agree that referencing §65.104(e) is not necessary, so long as §65.104(b) and (c) are referenced. We have edited the language in subpart F of the CAR accordingly.

### 3.5.13 Compressors

Comment: One commenter (VI-D-03) expressed concern that the language in §65.112(f) of the CAR differs from the HON in the criteria for designating a compressor as operating with "no detectable emission." The commenter explained that the last sentence of §65.112(f) is not in the HON and implies that if a compressor has ever had an instrument reading above 500 parts per

million (ppm), then it cannot be designated as having no detectable emissions. The commenter (VI-D-03) recommended that the last sentence of §65.112(f) be removed. The commenter cautioned that the current language in this section eliminates any incentive for an owner or operator to upgrade a compressor seal that was expected to have no detectable emissions, but has had a problem. The commenter stated that an upgraded compressor seal would not allow the owner or operator to redesignate the compressor as having no detectable emissions if an instrument reading above 500 ppm has been detected at any time. The commenter pointed out that according to the current language of the HON, an instrument reading above 500 ppm for a compressor seal designated as having no detectable emissions constitutes a violation of the standard. The commenter (VI-D-03) stated that this is adequate incentive for an owner or operator to avoid designating a compressor seal as having no detectable emissions if the seal is likely to have a problem.

Response: To clarify the intent of the provisions, we have revised §65.112(f)(1) by removing the last sentence. This change was suggested by the commenter, and we agree that the language is clearer without this sentence.

The proposed language implied that once a compressor has an instrument reading greater than 500 ppm, it can no longer qualify for the alternative compressor standard. This was not our intent. The intent of the CAR is that if an instrument reading of greater than 500 ppm is observed, the standard has been violated. The newly revised language is consistent with similar language in the HON and in the pressure relief device standards in the CAR.

#### 3.5.14 Sampling Connection Systems

Comment: One commenter (IV-G-01) pointed out that §65.113(c) of the CAR requires compliance with §§65.113(c)(1) through 65.113(c)(5), but that §65.113(c)(2), which requires the owner or operator to collect and recycle purged process fluid to a process, is a subset of §65.113(c)(1), which requires that a

closed purge, closed loop, or closed vent system return the purged process fluid directly to a process line or to a fuel gas system. The commenter (IV-G-01) recommended that §65.113(c)(2) be deleted, and that the paragraphs in §65.113(c) be renumbered accordingly. The commenter (IV-G-01) also suggested that §65.113(c)(1) should specify that if the purged process fluid is returned to a fuel gas system or process, it should meet the requirements of §65.115, which specifies the standards for emissions routed to a fuel gas system or process. The commenter (IV-G-01) pointed out that this would be consistent with other sections in subpart F of the CAR which reference §65.115 when allowing the owner or operator to route emissions to a fuel gas system or back to the process.

The commenter (IV-G-01) then suggested that language in 40 CFR part 63, subpart H, 40 CFR part 61, subpart V and 40 CFR part 60, subpart VV be revised to be consistent with the above comments relating to sampling connection systems.

Response: We maintain that §65.113(c)(2) is not a subset of §65.113(c)(1), and therefore did not remove §65.113(c)(2). Separate provisions are necessary to clarify that a sampling connection system may consist of a direct connection such as a closed purge, closed loop or closed vent system as described in paragraph (c)(1). Alternatively, a sampling connection system may consist of plant personnel using a bucket or drum to manually return a purged sample to the process as allowed by paragraph (c)(2). Also in §65.113(c)(1), we did not add a reference to comply with the closed vent system and control device requirements of §65.115 because we determined that the associated compliance and recordkeeping burden was not necessary for sampling connections.

### 3.5.15 Enclosed-Vented Process Units

Comment: One commenter (IV-G-01) recommended that the enclosed-vented process unit provisions in §65.118 of the CAR be revised to allow for either a process unit or a portion of a process unit to be designated as an enclosed-vented process. The

commenter (IV-G-01) also requested that enclosed-vented process units be given the option to be routed to a fuel gas system or to a process. In addition, the commenter (IV-G-01) suggested that enclosed-vented process units should not be exempt from the closed vent system requirements of §65.115 of the CAR.

Response: We note that the enclosed-vented process unit alternative is intended for process units entirely contained within large buildings, where all emissions will vent through a limited number of exhaust ports. Many of these process units are unmanned. Pharmaceutical process units are typical examples of this type of operating scenario.

We maintain that it is inappropriate to allow the enclosed-vented alternative for portions of process units. Doing so creates confusing compliance situations and stretches the scope of the allowance beyond what was originally intended.

We also note that it is not appropriate to allow these units to vent to a process or fuel gas system. Vents coming off an enclosed-vented process unit are typically very dilute with negligible heating values.

#### 3.5.16 Batch Product--Processes

Comment: One commenter (IV-G-01) requested that we clarify the requirements of §65.117(b) regarding pressure testing and retesting of batch product-processes. The commenter noted that §65.117(b)(4)(i) requires a batch product-process to be retested if a leak has been detected and that §65.117(b)(4)(ii) states that "if a batch product-process fails the retest or the second of two consecutive pressure tests," it must be repaired within 30 days of the second test. The commenter requested clarification on whether or not §65.117 allows for two consecutive pressure tests, whether the retest is considered the second consecutive test, and whether repair is required within 30 days of the retest if the first test failed.

Response: The intent of the requirements in §65.117(b) is as follows. The retest is the second of two consecutive pressure tests. The "or" in the rule has been replaced by parenthesis to

help make the issue clearer. The rule now reads, "...if a batch product-process fails the retest (the second of two consecutive pressure tests)..."

This should help clarify that you have 30 days after failing the retest to repair the leak. This is the same as specifying 30 days after failing the second of two consecutive pressure tests.

Comment: One commenter (IV-G-01) asked if a pressure test for a batch process must continue indefinitely if no pressure loss or gain equal to a rate of 1 pound per square inch gauge (psig) per hour is seen when using a pressure measurement device of  $\pm 10$  percent. The commenter (IV-G-01) noted that, according to §65.117(b)(5)(iv), if a more accurate measurement device is not available, and an owner or operator elects to use a pressure measurement device with a precision of at least 10 percent, then the duration for the test must extend for the time necessary to detect a pressure loss or rise that equals a rate of 1 psig per hour. The commenter questioned if the test is required to continue indefinitely if a pressure loss or rise does not equal 1 psig per hour.

Response: To clarify how long the test must be extended, consider the following example. A process operating at 200 psig is tested, and you elect to use a pressure measurement device with a precision of 20 psig ( $\pm 10$  percent of the test pressure). Such a device would not be able to detect a pressure drop of 1 psig/hour in 1 hour because it could only detect a change of  $\pm 20$  psig. The test must be extended to 20 hours. After 20 hours, if the process is losing pressure at a rate greater than 1 psig/hour, then the instrument will be able to detect the change because the change would be greater than the precision of the device ( $\pm 20$  psig).

#### 3.5.17 Periodic Report Contents

Comment: One commenter (IV-G-01) recommended that the requirement to report nonrepairable components as part of the periodic reporting requirements of §65.120(b)(1) of the CAR be

removed. This paragraph requires the owner or operator to "include the number of leaking components that were not repaired as required by §65.105(a), and for valves and connectors identify the number of components that are determined by §65.106(c)(3) to be nonrepairable." The commenter (IV-G-01) pointed out that this requirement is redundant with the requirement in §65.120(b)(2) to report occurrences of delay of repair. The commenter (IV-G-01) also pointed out that §65.106(c)(3) is referenced in the valve section, but there is no parallel reference for nonrepairable connectors in the connector section. The commenter (IV-G-01) requested clarification on reporting the number of leaking components that were not repaired as required by §65.105(a) of the CAR. The commenter (IV-G-01) asked if the intent was for the owner or operator to report the number of components which missed either the 5 day first attempt and/or the 15 day final repair for reasons other than delay of repair.

Response: With regard to the apparent redundancy in periodic reporting requirements, §65.120(b)(1) requires reporting of the number of leaking components that were not repaired. This number refers to the components not repaired within the 15 day time period. It does not include the number of components that are not repaired pursuant to the requirement to perform a first attempt at repair within 5 days.

In addition, this number may not be the same number as the instances of delay of repair, which is required to be reported under §65.120(b)(2). For example, one component may leak multiple times during a reporting period. This may necessitate more than one instance of delay of repair, but the number of components that leaked is still one.

With regard to reporting the number of nonrepairable connectors, we recognize that the CAR does not provide for designating connectors as nonrepairable. To correct this oversight, we edited §65.120(b)(1) so that the section does not refer to connectors.

### 3.5.18 Alternatives and Exemptions

Comment: One commenter (IV-G-01) suggested edits to §65.103(c)(3) so that it is clear that the planned schedule for monitoring required by the paragraph includes an explanation of why the equipment is unsafe-to-monitor or difficult-to-monitor. The commenter pointed out that the proposed language only addresses explanations of why the equipment is difficult-to-monitor.

Response: We agree with the commenter and have revised §65.103(c)(3) to require explanation not only for difficult-to-monitor equipment but also for unsafe-to-monitor equipment.

Comment: One commenter (IV-G-01) suggested that whenever a reference is made to routing emissions to a process or fuel gas system or routing emissions to a closed vent system and control device meeting the requirements of §65.115, we should also provide an alternative reference to §65.102(b) (request for alternative means of emission limitation). The commenter noted that §§65.111(d) and 65.118(a) both refer to a control device meeting the requirements of either §65.115 or §65.102(b). The commenter suggested that we use §§65.111(d) and 65.118(a) as examples for how other sections should be revised.

Response: The original text was not clear, as it explicitly referenced alternative means of emission limitation in only two places. We have clarified the rule by removing the references to §65.102(b) from §§65.111(d) and 65.118(a). The intent of the CAR is to provide for alternative means of emission limitation for all control devices. Also, just referencing §65.115 for control device requirements is sufficient, because §65.115(b) references §65.102(b) where applicable.

#### 3.5.19 Other Equipment Leak Comments

Comment: One commenter (IV-G-01) suggested that the language in §65.103(b)(5) regarding the requirement to identify "instrumentation systems subject to the provisions of this subpart" would be clearer if it referenced §65.110 (the instrumentation system standards) instead of "this subpart."

Response: While the instrumentation systems standard is contained within §65.110, many other sections of subpart F of the CAR are also potentially applicable. For example, instrument monitoring provisions of §65.104, and alternative means of emission limitation requested under §65.102(b) are all sections within subpart F of the CAR that may apply to instrumentation systems. The intent of §65.103(b)(5) is to identify all instrumentation systems subject to subpart F of the CAR ("this subpart") and not just those complying with §65.110.

Comment: One commenter (VI-G-05) suggested that we include language in the CAR to clarify that a performance test is not required for control devices used only to control emissions from equipment leaks. The commenter (VI-G-05) recommended that, aside from annual visual inspection, the only requirement for such control devices should be "operation of the control device at all times when emissions are vented to them." The commenter (VI-G-05) suggested that startup, shutdown, and malfunction plan requirements would be unnecessarily burdensome for these minor control devices which are infrequently used.

Response: In §65.146 (nonflare control devices used for equipment leaks only), paragraph (b) specifically states that, "A performance test is not required for any control device used only to control emissions from equipment leaks." Regarding SSM plan requirements, we maintain that the SSM plan applies to all "equipment equipped with a closed vent system and control device subject to subpart G" of the CAR (see §65.6). Excepting certain control equipment from the SSM plan would not only create confusion but also potentially result in increased emissions.

Comment: One commenter (IV-G-01) suggested we include visual inspection records for agitators in §65.119(c)(4). The commenter reasoned that if weekly inspection for pumps must be documented, then weekly inspection for agitators should be documented as well.

Response: We agree that it is reasonable and consistent to require documentation of the weekly inspection for agitators.



We added this record to §§65.109 and 65.119.

Comment: One commenter (VI-D-02) suggested that the current requirements for open ended lines are unrealistic and that we should consider a work practice approach for handling emissions from open ended lines and open ended valves. The commenter noted that the current requirement states that open ended lines and valves must either be equipped with a second valve or be plugged or capped when not in use. The commenter pointed out that at a large facility, it is virtually impossible to achieve 100 percent compliance with this requirement because of various operational and maintenance situations. The commenter suggested that we consider a work practice that would confirm the status or correct the status of a cap or plug each time an open valve is monitored under the valve monitoring provisions, without creating a violation. The commenter suggested that the CAR would be a good opportunity to introduce such a program, and said their company would welcome the opportunity to work with EPA to develop a low burden work practice system for open ended lines and valves.

Response: We did not include a work practice approach for handling emissions from open ended valves and lines. Incorporating such a standard would have required additional study and analysis. Performing this analysis was not within the scope of the CAR, so we did not incorporate the work practice approach suggested by the commenter.

### 3.6 CLOSED VENT SYSTEMS AND CONTROL DEVICES

#### 3.6.1 Performance Tests

Comment: One commenter (IV-G-01) asserted that performance tests should not be required if a source has previously conducted one for any referencing subpart, even if the methods or conditions during the test were different than those specified in the CAR. The commenter (IV-G-01) reasoned that the CAR's requirement to conduct a performance test would be an unaffordable burden to any company bringing a significant number of sources and control devices under the CAR and would likely

keep companies from opting to use the CAR. The commenter (IV-G-01) contends that the requirement to conduct a new performance test would not create any new environmental benefit.

Response: The CAR does not impose a new burden by requiring new performance tests when test conditions have changed. This requirement already exists in the referencing subparts. Performance tests are only needed if a source has previously conducted one under a referencing subpart but the conditions were different than those specified in the CAR. Re-testing is required even by the referencing subparts when a process change has occurred. This is appropriate because a process change could change the conditions such that the control device no longer meets the rule requirements. The CAR allows an option for the facility to demonstrate that the performance test demonstrates compliance despite the process change [see §65.157(b)(1) of the CAR].

We stress that, with very few exceptions, the referencing subparts use the same test methods as the CAR for their performance tests. We therefore contend that there will be very few, if any, instances where initial performance tests will need to be repeated, if they have been previously conducted under the requirements of a referencing subpart. The only differences in test methods where new performance tests may be required between the CAR and the referencing subparts are: subpart BB requires Method 25A or 25B while the CAR requires Methods 18 or 25A for concentration of regulated material; subpart DDD requires Method 3 while the CAR requires Method 3B for oxygen concentration.

Comment: One commenter (VI-D-03) requested clarification of the CAR preamble language requiring the preservation of past compliance obligations. Specifically, the commenter (VI-D-03) cited the proposal preamble at 63 FR 57761: "In addition, owners and operators who choose to comply with the CAR are still obligated to fulfill requirements that applied while they were complying with a referencing subpart. For example, if a facility is required by a referencing subpart to complete a performance

test, opting to comply with the CAR does not remove the requirement to conduct a performance test or protect the source from enforcement actions for not completing the test." The commenter stated that the last sentence of that paragraph implies that the CAR performance test requirements are overridden by referencing subpart requirements, even after a source has come under the CAR.

Response: A source is obligated to fulfill the requirements of the original referencing subpart. The CAR does not, for example, require performance tests where performance tests have previously been conducted and no process changes have been made. But if a referencing subpart requires a performance test and the source has not yet completed the test, this obligation remains. The source cannot opt into the CAR and avoid the requirement.

This is similar to the "there shall be no gaps in compliance" language of §65.1(f)(2). Compliance with periodic reporting and all of the other requirements under the referencing subparts must continue while the source is implementing the CAR. Then, on the implementation date [see §65.1(f)(1)] the CAR requirements are followed in place of the specified requirements of the referencing subparts.

### 3.6.2 Control Requirements

Comment: One commenter (IV-G-01) requested that we allow routine maintenance of control and recovery devices without requiring a facility to shut down its process, as long as the facility could demonstrate that the process could not be shut down. The commenter (IV-G-01) cited that this type of option has been available to some facilities subject to MACT standards, listed the HON storage vessel provisions as an example, and suggested that this option could be made available only for a limited number of hours per year. The commenter (IV-G-01) maintained that it is often safer and more environmentally beneficial to perform maintenance on control and recovery devices without shutting down the entire process, because many continuous processes can require days to start up and shut down. The

commenter (IV-G-01) indicated that the current provisions create an atmosphere among owners and operators that they must install "redundant" emission control equipment at "considerable expense" in order to minimize excess emissions. The commenter (IV-G-01) provided three examples of situations in which it was claimed that the emissions from a shutdown and subsequent startup of the process would be greater than if the control devices had been serviced while the processing continued.

Another commenter (VI-D-03) requested that the allowance of 240 hours per year for planned routine maintenance be extended to control devices that control process vents, transfer operations, and equipment leak emissions. The commenter stated that it is a common industry practice to combine vent streams for an emission control device. The commenter asserted that allowing planned routine maintenance for all control devices on emission sources would increase the incentive to use the CAR. The commenter contended that this request is appropriate because the same types of control devices are presently used to control emission from process vents, transfer operations, and equipment leak systems and are being operated and maintained in the same manner. The commenter stated that allowing planned maintenance of these systems will reduce malfunctions and thus provide environmental benefit. The commenter (VI-D-03) provided suggested edits to the CAR for this provision.

Response: We do not find the industry examples compelling and point out that two of the examples should be considered malfunctions in the source's startup, shutdown, and malfunction plan rather than routine maintenance.

The commenter's (IV-G-01) request is addressed through the provisions for startup, shutdown and malfunction in §65.6 of the CAR. In the commenter's (IV-G-01) first example, a compressor that normally collects vent streams, compresses them, and then returns them to the process sustains mechanical problems. This is not an example of routine maintenance, but rather an example

of malfunctioning process equipment and the situation should be addressed through the SSM plan as specified in §65.6 of the CAR.

The commenter's (IV-G-01) second example is not an example of routine maintenance either. The commenter refers to a situation where a carbon bed is due for replacement and that this replacement would normally occur during a planned process unit shutdown. Due to abnormal fouling or plugging the replacement cannot occur during a planned shutdown. Such an event would qualify as malfunction, not as routine maintenance. As with the commenter's first example, this situation should be handled through the startup, shutdown, and malfunction provisions of §65.6 of the CAR.

For the commenter's (IV-G-01) third example, we remind owners and operators that when they determine a control strategy for complying with regulations, they need to consider issues of routine maintenance of control and recovery devices. If an owner or operator chooses to route several processes to a single control or recovery device, this would obviously necessitate shutting down all the processes routed to that device in order to perform maintenance on the device. This is a choice that the owner or operator makes. The owner or operator just as easily could choose to route those processes through more than one control or recovery device. In fact, owners or operators could choose, in the example provided by the commenter (IV-G-01), to route emissions to a backup recovery device or control device, such as a flare, rather than vent uncontrolled emissions from several processes to the atmosphere while maintenance is performed on the primary control or recovery device. The owner or operator has flexibility in the choice of how to design the emissions control system, and that flexibility precludes uncontrolled emissions during situations of routine maintenance.

With regard to the HON storage vessel provisions that contain this provision, we point out that when an owner or operator has a malfunction in a control device for a storage vessel, it is not possible to simply "shut down" the storage

vessel, that is, one cannot always put the stored liquid somewhere else. Also, more emissions would result from emptying and degassing the storage vessel than would occur from allowing the emissions to bypass the control device for up to 240 hours per year. Therefore, there had to be some provision for shutting down control devices for storage vessels to allow for their maintenance and repair. We do not believe that it is appropriate to provide this allowance for process vents.

Comment: One commenter (IV-G-01) requested that we incorporate changes in §65.147 of the CAR that were recently promulgated in amendments to 40 CFR parts 60 and 63 [see §§60.18 and 63.11(b)] regarding the operation of flares that burn hydrogen as fuel or that could be modified to burn hydrogen as fuel.

Response: We concur that the requested changes would be beneficial and have incorporated the changes into §65.147 of the CAR.

Comment: One commenter (IV-G-01) suggested revising the CAR at §65.144(a), which currently states "except as provided in 65.3(b)(1) of subpart A...." The commenter (IV-G-01) suggested that the paragraph should be revised to state "except during periods of startup, shutdown, and malfunction...." This would make the paragraph consistent with the CAR at §65.145(a).

Response: We have revised the final rule at §§65.144(a) and 65.145(a) to state "...except during periods of startup, shutdown, and malfunction as specified in §65.3(a)...." We agree that the two paragraphs should be consistent. However, the reference to the appropriate general provisions paragraph was also needed so that the details of compliance during startup, shutdown, and malfunction were clear.

Comment: One commenter (IV-G-01) claimed that drafting errors in §65.155 (other control devices) should be corrected so as to make §65.155 applicable to §65.145 (storage vessels and low-throughput transfer racks) and to §65.146 (equipment leaks).

Response: We contend that the citations are correct as proposed, noting that §65.155 provides for "other" control devices on process vents and high-throughput transfer racks only.

Comment: One commenter (IV-G-01) requested clarification to the proposal preamble (63 FR 57781) on which referencing subparts lack specific halogen vent stream requirements.

Response: The only referencing subpart with halogen vent stream requirements is the HON. No other referencing subpart had specific halogen vent stream requirements. However, the halogen vent stream requirements of the CAR do not pertain to equipment leaks or storage vessels. Therefore, the CAR halogen vent stream requirements have been extended to sources subject to 40 CFR part 60, subpart III, NNN, RRR and 40 CFR part 61, subpart BB.

Comment: One commenter (IV-G-01) suggested that §65.144(b)(2) should apply to equipment leaks routed to a process, and that leaving "equipment leaks" out of the first sentence was a drafting error.

Response: We clarify that while §65.144 pertains in general to fuel gas systems and processes to which storage vessel, transfer rack, or equipment leak regulated material emissions are routed, not all paragraphs of §65.144 apply to all types of emission points. In particular, §65.144(b)(2) was not intended to apply to equipment leak emissions routed to fuel gas systems or processes. That is why §65.144(b)(2) explicitly states, "For storage vessels and transfer racks...."

### 3.6.3 Monitoring, Recordkeeping, and Reporting

Comment: One commenter (IV-G-01) requested clarification of the monitoring requirements for a halogen scrubber system where the first scrubber is the acid scrubber and the second is the caustic scrubber. The commenter (IV-G-01) points out that personnel who are expert with scrubbers indicate that pH should be measured on the first (acid) scrubber and the liquid-to-gas (L/G) ratio should be measured on the final (caustic) scrubber.

Response: We have not added specific monitoring parameter instructions for monitoring a halogen scrubber system because

these systems can vary in design. Specific parameter monitoring requirements may not fit all cases. However, monitoring procedures for scrubber systems (or any alternative monitoring) can be approved under the CAR provisions in §65.7(b). If an owner or operator feels that pH should be measured on the acid (first) scrubber and the L/G on the final (caustic) scrubber, it is possible to have such a monitoring plan approved under the alternative monitoring provisions.

Comment: One commenter (VI-D-01) expressed that the CAR effectively consolidates the monitoring, recordkeeping, and reporting requirements of the applicable rules. The commenter (VI-D-01) recommends enhancing this concept by establishing one stringent requirement for all applicable reporting frequencies, one date for periodic reporting, and the same retention requirements for all records. Another commenter (VI-G-03) stated that there is benefit to stating specific dates for reports rather than gearing report dates to other unspecified dates.

Response: We note that §65.5(h) provides for establishing a common schedule for all reporting frequencies at a facility. We maintain, however, that it is beneficial and not unduly burdensome to allow owners or operators to adjust the reporting dates.

Comment: One commenter (IV-G-01) suggested removing the reference to continuous emissions monitoring systems (CEMS) from the proposal preamble (63 FR 57760) because it incorrectly states that "...no CEMS...provisions are included in the CAR since they are not applicable,...." The commenter noted that CEMS is one of the monitoring provisions under the HON and the CAR.

Response: We would like to clarify what was meant in the preamble. The commenter is correct that, in certain situations, a continuous organic concentration monitoring device is an alternative to parameter monitoring for recovery devices. However, the general provisions regarding CEMS are not applicable to these devices. Therefore, the proposal preamble specified



that "...no CEMS...provisions are included...since they are not applicable."

Comment: One commenter (VI-G-03) suggested that all CAR monitoring, recordkeeping, and reporting should use uniform standards and procedures that are reflected in the relevant title V permit. The commenter (VI-G-03) gave an example: cost savings can be achieved if the frequency and timing of monitoring, recordkeeping, and reporting for all CAR units is consistent. The commenter (VI-G-03) stated that there is also a benefit to making these requirements consistent with the most recent rulemaking approaches, such as the HON. The commenter (VI-G-03) suggested that future regulatory amendments to part 65 should agree with these more uniform requirements, rather than create new, duplicative requirements. The commenter (VI-G-01) also suggested that the amount of required monitoring, recordkeeping, and reporting should be weighed against the benefit to the environment. The commenter (VI-G-03) gave an example: for some equipment, there may be no net benefit to equipment leak monitoring semi-annually versus monitoring annually.

Response: The commenter did not specify what they believe is inconsistent between the CAR and title V records and reports. We believe the CAR is consistent with title V. With respect to equipment leak monitoring, the CAR retains the "good performance" rewards of the HON by allowing longer periods between monitoring. Indeed, the CAR has taken this a step further by allowing even longer periods than the HON for even better performance.

Comment: One commenter (IV-G-01) pointed out an apparent contradiction in the proposal preamble at 63 FR 57782 in the paragraph beginning with "The CAR adopts the requirements of 40 CFR parts 61 and 63..." The commenter asked how the immediate repair or replacement of CPMS parts requirements are not in the General Provisions of Part 60, but these requirements are spelled out in sections 40 CFR 60.11(d), and 60.13(e) and (f).

Response: In the proposal preamble, we made the point that this provision is not explicitly in the 40 CFR part 60 general provisions, but it is implicit in the part 60 general provisions, at §§60.11(d) and 60.13(e) and (f). These provisions spell out good control practices.

Comment: One commenter (IV-G-01) suggested a restructuring of the proposal preamble discussion at 63 FR 57782 for the paragraph beginning with "The CAR provisions are different from the non-HON referencing subparts..." The commenter stated that the rest of this paragraph about 3-hour averages seems to be a different topic and the first sentence seems to go with the next paragraph about the CAR allowing the use of ranges from the non-HON referencing subparts instead of site-specific ranges. The commenter (IV-G-01) expressed confusion regarding the discussion in these paragraphs.

Response: The discussion in the paragraph cited by the commenter was meant to be compared with the information in the previous paragraph. The previous paragraph describes the provisions of the CAR and the paragraph cited by the commenter describes the provisions of the referencing subparts. By reading both paragraphs, the differences between the two are apparent.

In order to clarify the differences, we will describe them here. The CAR and HON require daily averages and the 40 CFR parts 60 and 61 (non-HON) referencing subparts require 3-hour averages. The non-HON referencing subparts provide the parameter range that will be used; the CAR and HON allow site-specific ranges to be developed. Under the CAR and HON, if the daily average is outside the range, it is a violation of the operating conditions (after the one excused excursion). The Administrator may then require a performance test to determine if there is a violation of the standard, but may also use any credible evidence to determine noncompliance. Under the non-HON referencing subparts, if the 3-hour averages are outside the range, there is no violation of the operating conditions, but the Administrator can require a performance test to determine if a

violation of the standard has occurred (again, the Administrator may also use any credible evidence to determine a violation).

Comment: One commenter (IV-G-01) stated that the proposal preamble (63 FR 57784), is not accurate in saying that 40 CFR parts 60 and 63 general provision for flare requirements require hourly records of pilot flame monitoring results. The commenter gave the following reasons for this contention:

1. There is no mention of hourly recordkeeping for pilot flame monitoring in the flare requirements of §§60.18 or 63.11;
2. The only use of the term "hourly" in the part 60 general provisions is in §60.14(h) through (j) where "maximum hourly emissions" are referred to; and
3. The only use of the term "hourly" in the part 63 general provisions is in §63.8(g)(2) where "valid hourly average" is referred to.

Response: The commenter is correct that the general provisions of parts 60 and 63 do not explicitly state that hourly records of pilot flame monitoring results are required. However, both general provisions require that monitoring be carried out to ensure that the flares are operated and maintained properly. It is implicit in these provisions that records of the monitoring results are required. The CAR and the HON explicitly require hourly records indicating whether there has been outage of all pilot flames any time during the hour. This is a burden reduction for 40 CFR part 60, subpart DDD, RRR, and NNN sources where continuous records are required.

Comment: One commenter (IV-G-01) claimed that upon sensory indications of a leak occurring during closed vent system annual inspections performed pursuant to §65.143(d)(1), the language should require "elimination of the leak" and not "elimination of the indications of a leak."

Response: We clarify that a "leak" is not detected until confirmed through instrument monitoring. If, at the time of the annual visual inspections, there are indications of potential leaks (visible, audible, or olfactory), then the owner or

operator has a choice as to what action to take, but a "leak" has not yet been detected. One option is to eliminate the indications of the leak. The other option is to instrument monitor the closed vent system. If the monitor indicates that there is a leak, then the presence of a leak is confirmed and the leak must be repaired.

Comment One commenter (IV-G-01) questioned why closed vent system leak detection instruments should be calibrated at 10,000 ppm, which seems to be required by §65.143(c)(1)(v). The commenter pointed out that the requirement should be to calibrate at 500 ppm (the leak definition for closed vent systems) or at a concentration that does not exceed the leak definition by more than 2000 ppm. The commenter also questioned the need for §65.143(c)(1)(v)(C).

Response: We clarify that §65.153(c)(1)(v)(B) requires the calibration gas to be less than 10,000 ppm. Sources opting into the CAR from 40 CFR part 61, subpart V, will likely have calibration procedures in place based on 10,000 ppm. By requiring the calibration gas to be less than 10,000 ppm, the CAR does not impose additional burden on these sources, yet it is flexible enough to accommodate the other subparts.

We maintain that §65.143(c)(1)(v)(C) is necessary, as this paragraph provides for devices with multiple calibration scales. Note that §65.143(c)(1)(v)(C) specifies a maximum concentration of 2,500 ppm for the lower scale's calibration gas; this is the leak definition for closed vent systems (500 ppm) plus 2,000 ppm.

## 4.0 IMPLEMENTATION AND TITLE V

### 4.1 IMPLEMENTATION

Comment: Two commenters (VI-D-01 and VI-D-06) support our proposal to recognize the CAR as an alternative compliance approach to the individual subparts being consolidated. One commenter (VI-D-01) pointed out that this will allow States that provide for alternatives in the implementation of the consolidated rules to implement the CAR upon promulgation.

Response: We thank the commenters for supporting the CAR as an alternative compliance approach.

Comment: Four commenters (IV-D-01, VI-D-03, VI-D-06, VI-G-03) support our proposal to waive formal delegation of the CAR where States already have delegated authority to implement the underlying NSPS and NESHAP. One commenter (VI-G-03) noted that States need to continue to include the regulated community as an active participant in the process of "tailoring" the Federal rule to the States' needs; States need to provide the regulated community with due process, appropriate standards, and opportunity for appeals. One commenter (VI-D-03) stated that the implementation approaches outlined in the preamble remove an obstacle to CAR implementation and foster further consolidation with State rules. The commenter (VI-D-03) suggested that we consider using direct final rules to expedite non-controversial changes in State implementation plans.

Response: We thank the commenters for supporting the approaches outlined in the proposal preamble and will consider using direct final rules in the future, when appropriate.

Comment: One commenter (VI-D-6) also supports an approach that would provide for implementation of the CAR in States with

an approved title V program, regardless of whether the State has received formal delegation of the underlying rules.

Response: At proposal, we stated that delegation of the CAR could occur if the State has delegation for all the referencing subparts. However, we agree with the commenter that delegation of the CAR could also occur when States have an approved title V program. We recognize that fewer States have accepted delegation of the part 63 rules than the parts 60 and 61 rules. By incorporating the part 63 rules into the title V permit as applicable requirements, the terms and conditions of the part 63 rules become enforceable by the permitting authority through the permit, as if the part 63 rules themselves were delegated. We agree that the CAR could be delegated to permitting authorities with approved title V programs in place, however there are advantages to obtaining formal delegation of the CAR by the permitting authority. Delegation should be conditioned to ensure the CAR is substantively incorporated unchanged into the permit.

As stated above, there are advantages to accepting formal delegation of the CAR. Permitting authorities that accept formal delegation of the CAR through delegation of the referencing subparts, i.e., the HON (or accept formal delegation of any section 112 requirement), are the clear enforcement authority. In other words, if the permitting authority does not accept formal delegation of the referencing subparts, then the EPA Regional Office remains the enforcement authority and sources must submit duplicate reports to both the EPA Regional Office and the permitting authority. Additionally, if the permitting authority accepts formal delegation of the referencing subparts then the permitting authority can make the discretionary decisions regarding the general provisions authorities. For example, if a source wants to change some facet of its monitoring program, then, in some cases, a permitting authority that has accepted delegation of the CAR can approve this change. See the 40 CFR part 63, subpart E preamble dated January 12, 1999 (64 FR 1879) for more information.

Comment: Four commenters (VI-D-01, VI-D-03, VI-D-06, VI-G-03) agreed that we should pre-approve the CAR for reasonably available control technology (RACT) equivalency for monitoring, recordkeeping, and reporting. Two commenters (VI-D-01, VI-D-06) agreed with our decision to allow States to amend SIP-based and other Federally-based rules so that they point to the CAR as a compliance alternative. One commenter (VI-D-01) noted that this could help prevent some SCUs from being subject to a separate set of state regulations, thereby subverting the CAR's purpose. The commenter (VI-D-01) stated that it is unnecessary to propose a streamlined process for approval of SIP submittals that incorporate the CAR, if the State agency has delegation for implementation of the subject regulations and has been delegated the CAR. The commenter (VI-D-01) indicated that the consolidated rules in the CAR should cover any RACT or air quality standards considerations and that other alternatives can be approved through section 112(1) of the Act. One commenter (VI-D-06) also supports our approach which recognizes that the permitting authority is logically the best entity to determine whether the CAR is an appropriate alternative to the SIP.

Response: We thank the commenters for their support and appreciate the feedback regarding RACT interaction.

Comment: One commenter (IV-G-01) asserts that sources subject to State air regulations will still have to comply with State rules, at least for some amount of time. The commenter (IV-G-01) supports that the proposed CAR includes an accelerated method of incorporating the CAR so that it supersedes the State rules in the hierarchy of rule applicability. The commenter (IV-G-01) cautions that a State may also opt not to incorporate the CAR, particularly in States that have more stringent requirements than the CAR. One commenter (VI-D-01) supported the CAR as a voluntary option for the States.

Response: It is not clear whether the commenter is referring to State regulations, or to Federal regulations that are implemented by the State and therefore have been incorporated

into the State regulations. If the commenter is referring to State regulations, facilities will continue to be subject to State regulations regardless of complying with the CAR. Some States have developed additional regulations that apply to SOCOMI emission points that apply under State law. Some of these regulations are more stringent than the Federal regulations upon which the CAR is based. The CAR does not affect these rules.

If the commenter is referring to Federal regulations implemented by the States, some States can exercise the CAR as an alternative compliance approach to expedite the implementation of the CAR, as described in the proposal preamble at 63 FR 57785. Here, the only delay in implementing the CAR should be the time necessary to agree on the schedule for the source to come into compliance with the CAR. If the State cannot immediately allow use of the CAR as an alternative compliance option because of procedural or legislative hurdles, there may be a delay in the implementation of the CAR at that State while the necessary changes are made and ratified in the State's regulations. The States also have the option to consolidate the CAR requirements with the SIP requirements.

The commenter is correct in noting that a State can decide not to allow the CAR as a compliance alternative. We have made the CAR optional for industry at each State's discretion by requiring that the implementation schedule be established by mutual agreement. Whatever the State decides, the more stringent State rules will still apply. A more stringent State equipment leak program, for example, would not be affected by implementation of the CAR. State rules still apply even when the CAR is implemented, unless the State removes the obligation.

#### 4.2 TITLE V

Comment: Two commenters (VI-D-01, VI-D-06) support our approach with regard to incorporating the CAR into title V permits. One commenter (VI-D-01) stated that a facility's title V permit is the final consolidation document for the



monitoring, recordkeeping, and reporting required by all applicable rules. The commenter (VI-D-01) stated that the title V permit also provides a checklist for determining compliance and pursuing enforcement.

Response: We thank the commenters for this support.

Comment: Two commenters (VI-D-01, VI-D-06) pointed out that some permitting authorities will find that the part 70 permit renewal is the most reasonable time to implement the CAR. One commenter (VI-D-01) asserted that this would allow time for the final issuance of the first phase of title V permits and would provide guidance for consolidation in the second phase of title V permit issuance. The commenter (IV-D-01) also indicated that this would reduce burden to States and sources. The commenter (IV-D-01) stated that title V permits that have already been issued would not have to be re-opened, so attention can continue to be focused on first-round issuance.

Two commenters (VI-D-01, VI-D-06) asked that we give notice that implementing agencies can use the title V renewal period as an appropriate implementation timing for the CAR. The commenter (VI-D-01) notes that because the CAR is not mandatory, it is not necessary to reopen a permit. The commenter (VI-D-01) pointed out that States can apply the CAR under title V at renewal rather than either re-opening a previously issued permit before renewal or delaying approval of an initial permit.

Response: We have no objections with the approaches outlined by the commenter for dealing with title V and CAR interaction at renewal time. We recognize that the States have the authority to decide how and when to allow sources to modify their permits and begin compliance with CAR, and would use the timing as a means to better manage permitting resources.

Comment: One commenter (VI-D-01) indicated that, if the circumstances change and the CAR were to become mandatory, the commenter would support our position outlined in section VIII of the preamble to the proposed rule. Under this position, the commenter contended, incorporation of the CAR into issued title V

permits would be allowed under a "notice-only" provision that would not require EPA and public review. The commenter stated that this would be applicable only if the permit is incorporating previously-adopted requirements and if source-specific requirements are not being established through the permit.

Response: The CAR has been finalized as an optional rule.

Comment: One commenter (VI-D-06) supports our position that incorporation of the CAR should not require EPA and public review under a revised part 70. One commenter (VI-D-06) agrees with our distinction between the types of changes that trigger a significant permit revision and those that will qualify for a minor revision. The commenter concludes, as we proposed, that adopting the CAR into a title V permit is a minor revision. The commenter (VI-D-06) stated that a "notice only" approach may be appropriate if such an approach is provided for in the part 70 rules.

Response: We thank the commenter for the support on this issue. We do note, however, that interaction with the State is a crucial step in CAR implementation. Some States will have different timing requirements for CAR transition and permit modification, so working with your State is very important.

## 5.0 CHANGES TO THE EQUIPMENT LEAKS REFERENCING SUBPARTS

### 5.1 CLARIFICATION OF INTENT

Comment: Two commenters (IV-G-01, VI-D-03) agreed with the definitions in the CAR for a closed vent system and for a control device. The commenters suggested revisions to language in the referencing subparts in order to be consistent with the CAR. The commenters (IV-G-01, VI-D-03) recommended revisions to definitions of closed vent systems and control device in §63.161 of 40 CFR part 63 subpart H, §61.241 of 40 CFR part 61, subpart V, and §60.481 of 40 CFR part 63 subpart VV. The definitions in these referencing subparts, according to the commenter (VI-D-03), contradict the definition of a closed vent system in the CAR. Three commenters (IV-G-01, VI-D-03, VI-D-04) recommended that process piping that routes vapors to a process or fuel gas system should not be considered a closed vent system in any rule. The commenter (VI-D-04) suggested that this change would clarify that hard-piping, ductwork, and connections are "process" components and not part of a closed vent system. One commenter (IV-G-01) also agreed with the definition of a control device and its exclusion of a fuel gas system as a type of control device.

The commenter (VI-D-03) also suggested revisions to other sections of the referencing subparts in order to maintain consistency with the closed vent system definition in the CAR and to clarify that piping routed to the process or to a fuel gas system is not part of a closed vent system. The commenter recommended changes to language in §§63.163(g), 63.164(h), 63.170, and 63.173(f) of the HON which refer to routing vapors to a control device from pumps, compressors, surge control vessels, and agitators, respectively. The commenter recommended changes

to several paragraphs in §60.482 of subpart VV. To be consistent with the suggested definitions of closed vent systems and control devices, the commenter also recommended changes to several paragraphs in §61.242 of subpart V.

One commenter (IV-G-01) notes that under the CAR §65.143(b)(2) and (b)(3), parts of a closed vent system that are unsafe-to-inspect or difficult-to-inspect are exempt from all monitoring and inspections requirements as long as certain conditions are met. The commenter (IV-G-01) claimed that part 60, subpart VV, the HON subpart H, and part 61, subpart V should be changed to be consistent with the CAR on this issue.

One commenter (VI-D-04) suggested that we revise the proposed language in §61.242-4(d)(2) of 40 CFR part 60, subpart V to allow pressure relief devices to be isolated from process service after a pressure release. The commenter recommended revising the language to accommodate a specific rupture disk design arrangement.

One commenter (IV-G-01) requested a revision of the definition of "connector" in 40 CFR part 61, subpart V and part 60, subpart VV to match the definition in 40 CFR part 63, subpart H. The commenter pointed to the reasoning in the CAR preamble at 63 FR 57764 to support this request.

Response: With respect to revising the referencing subparts, the intent of the CAR is to add references that allow an owner or operator to choose to comply with the CAR and to make minor clarifications to the referencing subparts where appropriate for drafting errors, typographical mistakes, and internal inconsistencies. It is not the intent of the CAR to make revisions to the original language or intent of the referencing subparts to match the CAR improvements. However, We have made revisions to the equipment leak referencing subparts where these revisions conform to the safety provisions contained within the HON and the CAR. We have not generally revised referencing subparts to conform to new language in the CAR,

although there are some exceptions in which revisions to the referencing subparts were a practical solution.

In part, the reason for not making significant revisions to the referencing subparts is that such changes could have unintended implications or consequences for owners or operators who choose to continue to comply with a referencing subpart. The CAR could then be disrupting existing interpretation or implementation of the referencing subparts. Therefore, we did not generally make substantive revisions to the referencing subparts as suggested by the commenter, and specifically we did not make the changes suggested by the commenters in this comment.

Comment: One commenter (IV-G-01) pointed out that the delay of repair provisions of 40 CFR part 63, subpart H, 40 CFR part 61, subpart V, and 40 CFR part 60, subpart VV create a disincentive for an owner or operator to attempt a repair between the 15th day after detection and the next process unit shutdown. The commenter (IV-G-01) suggested that similar revisions in language to the delay of repair provisions found in the CAR at §65.105(d) should also be made in §63.171(a) of the HON, §61.242-10(a) of subpart V, and §60.482-9(a) of subpart VV.

Response: In order to clarify the intent of the referencing subparts, we made the suggested revisions to the referencing subparts. Like the CAR, the other equipment leak rules now make it clear that the owner or operator can successfully repair a leaking piece of equipment within the time period without the equipment being disqualified from the original delay of repair classification. It should be noted that these revisions are considered within the scope of the CAR because they represent clarifications and not revisions to the original intent of the referencing subparts.

Comment: One commenter (IV-G-01) requested that an option be provided in subpart V for surge control vessels and bottoms receivers to comply with the EFR or IFR requirements of 40 CFR part 63, subpart G. The commenter (IV-G-01) also requested that the option to route vapors to a fuel gas system or a process

should be provided in both HON subpart H and part 61, subpart V and that the option to route emissions to a process be added to subpart V. Two commenters (IV-G-01 and VI-D-04) noted that there was no reference to the new tables 1 and 2 added to subpart V. The commenter (IV-G-01) also pointed out that the reference to tables 1 and 2 should be added to §61.242-9 of subpart V. Furthermore, the commenter (IV-G-01) noted that table 1 and table 2 are for existing and new sources, respectively. The commenter suggested that "new source" and "existing source" are MACT terminology and are not appropriate terminology for subpart V.

One commenter (VI-D-04) requested that we clarify the purpose of adding a definition for "maximum true vapor pressure" to §61.241 of 40 CFR part 61, subpart V and the purpose of adding table 1 and table 2 to subpart V. The commenter stated that they had not located any occurrences of the term "maximum true vapor pressure" in subpart V except in the newly added tables 1 and 2.

Response: We would like to clarify that some provisions were inadvertently left out of the proposed rule. We have corrected these by doing the following:

- Adding a reference to tables 1 and 2 in §61.242-9 of 40 CFR part 61, subpart V; and
- Adding an allowance to subpart V so that surge control vessels and bottoms receives can comply with the floating roof storage vessel provisions of the HON or by routing to a process or control device.

We did not add the option to route storage vessel emissions to a fuel gas system to the HON or to subpart V because it is not within the scope or intent of the CAR to change the compliance options for sources that choose to continue using the referencing subparts. The changes we made in this case to subpart V were necessary to clarify the control requirements for surge control vessels and bottom receivers. We did not analyze the impacts of expanding the control options under the HON and subpart V.

We used "new" and "existing" in the newly added tables 1 and 2 to subpart V to be consistent with the corresponding tables and concept contained in the HON. The terms "new source" and "existing source" are not new to subpart V. The definitions are provided in the part 61 general provisions. See §61.02.

We would also like to clarify that we added the definition for "maximum true vapor pressure" to subpart V because that term is used in the newly added tables 1 and 2. Without adding this definition the rule would not provide guidance on how to determine the maximum true vapor pressure.

Comment: One commenter (VI-D-04) noted that the proposed language to §§60.482-2(g) of 40 CFR part 60, subpart VV and 61.242-2(g) of 40 CFR part 61, subpart V are significantly different than §63.163(j) of the HON regarding the designation of unsafe-to-monitor pumps. The commenter pointed out that the HON provides more exemptions than subparts VV and V for pumps designated as unsafe-to-monitor. The commenter specifically pointed out that the leak repair requirements and the barrier fluid demonstrations are not required by the HON for unsafe-to-monitor pumps. The commenter suggested that we revise the proposed language for §60.482-2(g) of subpart VV and §61.242-2(g) of subpart V to match the corresponding language in the §63.163(j) of the HON. To achieve consistency with the HON, the commenter recommended that we add "and (d)" to the list of exempt paragraphs in §§60.482-2(g) and 61.242-2(g).

Response: We would like to clarify that we intended to adopt the HON unsafe-to-monitor provisions into subparts VV and V. We inadvertently created some inconsistencies, and we have edited the CAR as suggested by the commenter to fix the problem.

Comment: Two commenters (VI-D-03, VI-D-04) recommended revisions to 40 CFR part 60, subpart VV and 40 CFR part 61, subpart V to limit monitoring frequency of unsafe-to-monitor pumps to monthly during safe-to-monitor times. The commenters explained that the proposed language for §§60.482-2(g)(2) and 61.242-2(g)(2) require monitoring of unsafe-to-monitor pumps as

frequently as practicable during safe-to-monitor times. The commenters stated that during safe-to-monitor times, the frequency of monitoring for unsafe-to-monitor pumps should be limited to the monitoring frequency for other pumps. One commenter suggested adding "but not more frequently than the periodic monitoring schedule otherwise applicable" to the end of §§60.482-2(g)(2) and 61.242-2(g)(2).

Response: We have adopted the commenter's suggested language and have edited the language to be consistent with that in the CAR at §65.103(c)(4)(i). The rule now specifies that monitoring must occur "as frequently as practical during safe-to-monitor times, but not more frequently than the periodic monitoring schedule otherwise applicable."

Comment: One commenter (VI-D-04) suggested that EPA revise the language in §61.242-8(a) to clarify the requirements for repair of pressure relief devices in liquid service and connectors. The commenter suggested that if a potential leak, as indicated by visual, audible, or olfactory evidence, were repaired, then it is not necessary to monitor the pressure relief device or connector. The commenter also suggested that EPA add a paragraph (a)(3) to §61.242-8 to clarify the repair criteria for potential leaks indicated by visual, auditory, or olfactory evidence. The commenter pointed out that these revisions would be consistent with §63.169(a) of the HON.

Response: We agree with the commenter and have made the requirements for pressure relief devices in liquid service and connectors consistent with other, similar provisions in the HON and in the CAR. Our edits give the owner or operator the choice of either eliminating the indications of a leak or performing instrument monitoring to confirm the presence of a leak.

## 5.2 CLARIFYING OR TYPOGRAPHICAL EDITS

Comment: One commenter (VI-D-04) pointed out that in several places in the proposed amendments to subparts VV and V, we included the following language, "...routed to a process or



fuel gas system connected by a closed vent system to a control device..." The commenter also noted that we used some inconsistent language to get the point of this requirement across, and that common, consistent language would improve the clarity of the rule. The commenter suggested that the language should read, "...routed to a process or fuel gas system or connected by a closed vent system to a control device..." The commenter listed the following affected sections:

- §60.482-2(d)(1)(ii) of 40 CFR part 60, subpart VV;
- §60.482-4(c) of 40 CFR part 60, subpart VV;
- §61.242-3(h) of 40 CFR part 61, subpart V; and
- §61.242-4(c) of 40 CFR part 61, subpart V.

Response: We agree with the commenter that the suggested changes would clarify the intent of the rule, and have made the language consistent in the above mentioned affected sections.

Comment: One commenter (VI-D-04) pointed out that the language regarding the monitoring of pumps located at an unmanned site is slightly different in §§60.482-2(h) of 40 CFR part 60, subpart VV and 63.163(h) of the HON. The commenter suggested revising the list of exempt requirements in §60.482-2(h) to include the daily requirements of §60.482-2(d)(5).

Response: We agree with the commenter and note that we intended to include the daily requirements of §60.482-2(d)(5) to the list of exempt requirements at unmanned plant sites. We have edited §60.482-2(h) to reflect this.

Comment: Two commenters (IV-G-01, VI-D-04) advised that the sentence found at §61.242-2(d)(6)(iv) that reads "If there are indications of liquids dripping from the pump seal..." is not needed because it is redundant to §61.242-2(d)(6)(ii). The commenter recommended that the sentence at §61.242-2(d)(iv) be removed.

Response: We agree with the commenter that revising §61.242-2(d)(6)(iv) as proposed is unnecessary. The language proposed to be added is redundant to existing language at §61.242-2(d)(6)(ii). The final rule does not contain this sentence.

Comment: One commenter (VI-D-04) pointed out that in the proposed language in §61.242-11(k) of 40 CFR part 61, subpart V, the reference to paragraph (1)(2) may be in error. The commenter also pointed out that the reference in §61.242-11(l)(3) of subpart V to §60.486(c) of 40 CFR part 60, subpart VV may be in error. The commenter suggested that the appropriate reference within subpart V would be §61.246(c).

Response: We maintain that paragraph (1)(2) should be referenced from §61.242-11(k) because paragraph (1)(2) provides for the designation of the parts of the closed vent system that are difficult-to-inspect. We agree, however, that the reference in §61.242-11(l)(3) should be to §61.246(c), not §60.486(c). We have edited §61.242-11(l)(3) to correct the error.

## 6.0 MISCELLANEOUS

Comment: One commenter (IV-D-03) requested that we include a provision in the CAR confirming that the SOCMi rules and the CAR apply only to manufacture of materials produced from the 11 basic SOCMi chemical building blocks and not to extraction or derivation of chemicals from natural products. The commenter's request (IV-D-03) is specifically made in regard to turpentine and terpene alcohols. The commenter cited a body of evidence from past EPA regulations and background information documents to support that, currently, EPA does not intend to include chemicals derived from naturally occurring substances in the SOCMi regulations. The commenter (IV-D-03) noted that such an exclusion is not explicit in any SOCMi regulations except the SOCMi wastewater rule, and suggested adding an explicit exclusion to the CAR.

Response: We are not addressing issues of applicability within the referencing subparts under this rulemaking. The commenter's request is outside the scope of the CAR.

Comment: One commenter (VI-0G-02) alleged that our SOCMi regulations under 40 CFR part 60, subparts VV, III, NNN and RRR and 40 CFR part 63, subparts F and G do not include emission standards for hexachlorobenzene as required under section 112(d)(2) of the Act. The commenter (VI-0G-02) provided information from a January 25, 1999 petition from the Sierra Club to EPA for review of the parts 60 and 63 rules. The commenter (VI-0G-02) concludes that the aforementioned regulations are in violation of section 112(c)(6) of the Act and that the CAR likewise will be in violation of section 112(c)(6) of the Act because it consolidates these rules.

Response: As stated in the preamble to the CAR (63 FR 57749), it is not the purpose of the CAR to change the scope of the requirements or applicability of the referencing subparts. If future changes are made to the emission standards in the referencing subparts, then those changes will be incorporated into the CAR at that time if appropriate.

Comment: One commenter (VI-G-05) requested that we use the CAR to clarify the referencing subparts regarding a source becoming "no longer subject" to the rules. As an example, the commenter noted that the HON does not specifically provide for a facility that has decommissioned equipment, shut down high-emitting processes, or implemented pollution prevention process changes. Such facilities may no longer meet the HON's major source definition and are therefore no longer subject to the HON. The commenter contends that the referencing subparts do not provide a clear procedure for how to handle this situation, and the commenter would like the CAR to not only provide the procedure but also encourage its use.

Response: It is not the intent of the CAR to fundamentally or significantly change the referencing subparts. Each referencing subpart is different with regard to how and when to determine or re-determine applicability. The CAR is a compliance alternative available, for example, at facilities subject to the HON; the CAR does not attempt to alter the initial or any subsequent determinations of HON applicability to a source.

Comment: One commenter (VI-G-03) noted that the proposed CAR does not address the mechanism by which future updates for regulatory programs, such as the Miscellaneous Organics NESHAP, will be added to the CAR. The CAR should also address how the requirements for units subject to case-by-case MACT "hammer" requirements will be addressed under the CAR.

Response: This proposal cannot address mechanisms for opting to use the CAR in future rules, because these rules do not yet exist. However, the CAR would not necessarily require significant modification for use through a future rule. Future

rules could be written to contain pointers to the CAR. Any appropriate edits to the CAR to consolidate new referencing subparts would be made at the time the new referencing subparts are proposed and promulgated.



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