

APPENDIX E

PURPOSE AND RATIONALE FOR EACH REGULATORY PROVISION

This appendix provides the purpose and rationale for each proposed amendment or addition to regulation or test procedures. The proposed amendments and additions to regulations and test procedures, themselves, are included in Appendices A, C, and D, as follows:

- Appendix A contains the proposed amendments to title 13, California Code of Regulations (CCR), section 1956.8 and title 17, CCR, section 95663;
- Appendix C contains the proposed amendments to the “California Greenhouse Gas Exhaust Emission Standards and Test Procedures for 2014 and Subsequent Model Heavy-Duty Vehicles”; and
- Appendix D contains the proposed new “California Standards and Test Procedures for New 2021 and Subsequent Model Heavy-Duty Zero-Emission Powertrains.”

Proposed Amendments to Title 13, California Code of Regulations

Section 1956.8, Title 13

Subsection (a)(8)

Purpose: The subsection is being proposed to set forth zero-emission standards for electric and hydrogen fuel-cell powertrains and to specify the test procedures that must be used to certify to those standards.

Rationale: The standards, in combination with the certification procedures, are necessary to establish a process by which zero-emission powertrains could be certified.

Subsection (i)(12)

Purpose: The subsection is being proposed to set forth a definition for “zero-emission powertrain.”

Rationale: The amendment is necessary to define what components are covered by a zero-emission powertrain certification.

Proposed Amendments to Title 17, California Code of Regulations

Section 96553, Title 17

Subsection (d)

Purpose: The subsection is being modified to set forth the procedures that must be used to certify heavy-duty electric and fuel-cell vehicles to the proposed alternative certification provisions.

Rationale: This change is necessary to incorporate the proposed alternative certification provisions into California's Heavy-Duty Phase 2 Greenhouse Gas Regulation.

Proposed Amendments to "California Greenhouse Gas Exhaust Emission Standards and Test Procedures for 2014 and Subsequent Model Heavy-Duty Vehicles"

Section that incorporates other test procedures by reference

Purpose: The section is being amended to incorporate the test procedures document, the "California Standards and Test Procedures for New 2021 and Subsequent Model Heavy-Duty Zero-Emission Powertrains," which is being proposed as part of this rulemaking.

Rationale: This change is necessary to incorporate the certification requirements for zero-emission powertrains that would be installed in a heavy-duty electric or fuel-cell vehicle (HDEV and HDFCV, respectively) certifying to the proposed alternative certification provisions.

In addition, the following Code of Federal Regulation (CFR) sections, which are incorporated by reference, are being amended as described:

Title 40, CFR, section 1037.115

Sections 3, 3.1, 3.2, and 3.3 of the California Provisions

Purpose: The sections are being added to the California Provisions to set forth the requirements for HDEVs and HDFCVs certifying to the proposed alternative (or enhanced) certification provisions.

Rationale: This section is necessary to establish the requirements with which manufacturers would be required to comply in order to obtain an

enhanced-certification Executive Order. The purpose and rationale of the associated subsections are described below.

Section 3.1.1 of the California Provisions

Purpose: The section is being added to the California Provisions to require HDEVs and HDFCVs certifying to enhanced certification requirements to only use powertrains certified to the proposed zero-emission powertrain standards set forth in title 13, California Code of Regulations (CCR), section 1956.8.

Rationale: This modification is necessary to ensure that it would be clearly indicated that the powertrains used in vehicles certifying to the enhanced certification requirements must meet standards set forth for zero-emission powertrains.

Section 3.1.2 of the California Provisions

Purpose: The section is being added to the California Provisions to require manufacturers to provide optical tell-tales conforming to Society of Automotive Engineers (SAE) J2402, "Road Vehicles-Symbols for Controls, Indicators, and Tell-Tales"¹ or International Organization for Standardization (ISO) 2575, "Road Vehicles – Symbols for controls, indicators and tell-tales," as last revised on July 1, 2010².

Rationale: These tell-tales would inform the operator of the correct operation or malfunctioning of zero-emission powertrain components, which is necessary so malfunctions could be quickly identified by operators before leading to additional problems.

Section 3.1.3 of the California Provisions

Purpose: The section is being added to the California Provisions to require manufacturers to make accessible on the vehicle information about the vehicle's energy efficiency.

Rationale: This requirement would allow fleets to compare the efficiency of different vehicle models and different vehicle operators, which will facilitate fleet efforts to purchase the most-efficient vehicles and to maximize operator efficiency.

Section 3.1.4 of the California Provisions

Purpose: The section is being added to the California Provisions to require the vehicle manufacturer to ensure the diagnostic connector for the powertrain would be accessible from under the dash on the driver side.

¹ Society of Automotive Engineers International Standard J2402, "Road Vehicles-Symbols for Controls, Indicators, and Tell-Tales," revised January 1, 2010.

² International Organization for Standardization (ISO) 2575, "Road Vehicles – Symbols for controls, indicators and tell-tales," revised on July 1, 2010

Rationale: This requirement is necessary to standardize the position of the connector, so that it could be consistently located by repair technicians.

Section 3.1.5 of the California Provisions

Purpose: The section is being added to the California Provisions to require applicable HDEVs (and HDFCVs equipped with a battery pack capable of directly accepting charge from an off-board source) to be equipped with the on-board capability of determining energy capacity of the battery pack. In addition, the energy capacity information must be accessible by the vehicle owner. The on-board method used to determine energy capacity would be at the discretion of the manufacturer.

Rationale: This requirement is necessary because it would allow vehicle owners to evaluate battery degradation, which would be useful in many cases, including, but not limited to, when the battery condition needs to be assessed in order to support a warranty claim.

Section 3.1.6 of the California Provisions

Purpose: The section is being added to the California Provisions to require manufacturers to make repair tools available to third-party repair facilities.

Rationale: This requirement is necessary to support broad repairability of HDEVs and HDFCVs, and complements the requirement to make the diagnostic and repair manual available to third-party repair facilities. Allowing third-party repair facilities to access vehicle repair information and repair tools would facilitate the development of a more-efficient repair network.

Section 3.1.7 of the California Provisions

Purpose: The section is being added to the California Provisions to require manufacturers to provide a statement at the time of the sales transaction about factors that should be considered when purchasing an HDEV or HDFCV, such as the vehicle's ability to accelerate or maintain speed while climbing, range variations over different duty cycles, and access to infrastructure.

Rationale: This requirement is necessary because fleets have provided feedback that they have had unanticipated issues with battery-electric vehicle performance because they did not give consideration to the items mentioned in the statement (due to their unfamiliarity with the technology). In requiring this disclosure, it would help consumers make more-informed purchase decisions.

Section 3.1.8 of the California Provisions

Purpose: The section is being added to the California Provisions to require manufacturers to provide an attestation that the powertrain to be installed in the vehicle conforms to the design tolerances and performance specifications of all vehicle integration components.

Rationale: Many heavy-duty battery-electric or fuel-cell vehicles sold to date were built by integrating an electrified powertrain into an existing vehicle driveline. Information staff gathered during the regulatory development process suggests that this build process has resulted in vehicle reliability issues. This requirement is necessary because it would help ensure, especially in these cases, that manufacturers adequately assess the suitability of existing vehicle components before integrating a zero-emission powertrain.

Sections 3.2.1 through 3.2.6 of the California Provisions

Purpose: The sections are being added to the California Provisions to set forth the requirements of the owner's manual that must be provided with their vehicle. The owner's manual would be required to include information about maintenance and use of the vehicle, warranty, service and repair locations, mobile service repair offerings, and wireless diagnostic services.

Rationale: This requirement is necessary to ensure that at a minimum, a manufacturer would be providing the owner with information necessary to understand the requirements for maintenance as well as the scope of any warranty or service offerings. This would prevent situations in which an owner purchases a vehicle and is not well-informed about service locations or warranty limitations.

Sections 3.3, 3.3.1 through 3.3.5 of the California Provisions

Purpose: The sections are being added to the California Provisions to describe the diagnostic and repair information (including the diagnostic and repair manual) that would be required to be made available to third-party repair facilities (at a fair and reasonable price) and the Executive Officer (upon request).

Rationale: Allowing third-party repair facilities to access vehicle repair information would facilitate the development of a more-efficient repair network. In addition, by providing such information to the Executive Officer, it would allow CARB to create a repository of information related to service and diagnostics of battery-electric and fuel-cell vehicles, which could be used in the future to inform other zero-emission measures.

Sections 3.4, 3.4.1, and 3.4.2 of the California Provisions

Purpose: The sections are being added to the California Provisions to set forth requirements for fuel-fired heaters installed on certified HDEVs and HDFCVs.

Rationale: These sections are necessary to add clarity to the fuel-fired heater requirements for such vehicles and to align the requirements with those set forth in the Low Emission Vehicle II Program.

Title 40, CFR, section 1037.135

Section 4. of the Federal Provisions

Purpose: This section, which amends Title 40, CFR, section 1037.135(c)(8), is being modified to ensure the vehicle label includes the statement, "THIS VEHICLE ALSO COMPLIES WITH CALIFORNIA'S ENHANCED ELECTRIC AND FUEL-CELL VEHICLE CERTIFICATION PROCEDURES."

Rationale: This requirement is necessary to allow vehicles certified to the alternative certification procedures to be identified.

Section 1. of the California Provisions

Purpose: This section is being added to set forth labeling requirements for HDEVs and HDFCVs certified with a fuel-fired heater.

Rationale: This requirement is necessary to allow vehicles certified with a fuel-fired heater to be identified.

Title 40, CFR, section 1037.250

Section 1 of the California Provisions

Purpose: The section is being added to the California Provisions to require vehicle manufacturers to maintain records of the zero-emission powertrains installed in their vehicles for a minimum of three years after the completion of the model year.

Rationale: This requirement is necessary to enable the Executive Officer and powertrain manufacturers to locate vehicles with zero-emission powertrains subject to a recall or investigation.

Title 40, CFR, section 1037.615

Section 1 of the California Provisions

Purpose: The section is being added to the California Provisions to set forth the option for manufacturers to certify an HDEV or HDFCV to the enhanced certification requirements. In addition, the section clarifies that the vehicle manufacturer is responsible for all other components not originally part of the powertrain certification, including components related to the integration of the powertrain into the vehicle.

Rationale: This section is necessary to explicitly provide the option to certify HDEVs and HDFCVs to the enhanced certification requirements and to clarify the responsibilities of the vehicle manufacturer with respect to the zero-emission powertrains they use.

Title 40, CFR, section 1037.801

Purpose: Several definitions are being added to the California Provisions.

Rationale: These definitions are necessary to ensure the consistent application of the proposed requirements.

Proposed New “California Standards and Test Procedures for New 2021 and Subsequent Model Heavy-Duty Zero-Emission Powertrains”

Section that incorporates other test procedures by reference

Purpose: The section would incorporate the “California Greenhouse Gas Exhaust Emission Standards and Test Procedures For 2014 and Subsequent Model Heavy-Duty Vehicles.”

Rationale: This is necessary to reference the additional certification requirements that would apply to vehicles that utilize zero-emission powertrains certified in accordance with these proposed test procedures.

Part I: Heavy-Duty Zero-Emission Powertrain Certification Requirements

Part I.A. General Applicability

Purpose: This part sets forth the types of powertrains that the regulation is applicable to.

Rationale: This section is necessary to ensure consistent application of the certification requirements.

Part I.B. Definitions

Purpose: This part is a list of definitions for the terms that are used in this regulation.

Rationale: This section is necessary to ensure consistent application of the certification requirements.

Part I.C.1. Certification Families (including subordinate sections)

Purpose: This part sets forth the criteria for defining a zero-emission powertrain certification family.

Rationale: This section is necessary to ensure certification families would be defined such that information derived for a certification family (e.g., rated energy capacity as determined through testing) is applicable to all powertrain configurations covered by the certification family and that issues, such as failures, could be easily traced back to a particular zero-emission configuration.

Part I.C.2. System Monitoring and Diagnostics Information (including subordinate sections)

Purpose: This part sets forth the requirement for the manufacturer to provide a description of the monitoring and diagnostics system of the zero-emission powertrain it is certifying to the proposed zero-emission powertrain certification procedures.

Rationale: This part is necessary because it would facilitate greater understanding on current industry practices, and coupled with in-use data, the information provided could help staff understand how specific monitoring strategies impact performance and durability. As such, the information could be used, for example, to verify the effectiveness of proposed recall corrections or to inform future zero-emission measures.

Part I.C.3. Required Diagnostic Communications Tools Compatibility (including subordinate sections)

Purpose: This part sets forth that the monitoring and diagnostic system of zero-emission powertrains, certified to the proposed certification requirements, must be capable of communicating specific monitoring parameters and fault codes through the controller area network to a common automotive scan tool.

Rationale: This part is necessary because it would allow third-party repair facilities to perform limited diagnosis and repair of HDEVs and HDFCVs, which is expected to increase the efficiency of repair network for such vehicles.

Part I.C.4. Repairability (including subordinate sections)

Purpose: This part sets forth requirements that would increase the likelihood that zero-emission powertrains certified to the proposed certification requirements (and the HDEVs and HDFCVs that use them) could be repaired by third-party repair facilities. Specifically, the part would require zero-emission powertrain

manufacturers to make available repair tools, and diagnostic information to third-part repair facilities at reasonable cost. In addition, this part sets forth the requirements of the owner's manual that must be provided with their vehicle. The owner's manual would be required to include information about maintenance and use of the vehicle, warranty, service and repair locations, mobile service repair offerings, and wireless diagnostic services.

Rationale: This part is necessary because it is expected to help increase the efficiency of the repair network for such vehicles. It will also ensure that, at a minimum, a manufacturer would provide the owner with information necessary to understand the requirements for maintenance as well as the scope of any warranty or service offerings. This would prevent situations in which an owner purchases a vehicle and is not well-informed about service locations or warranty limitations.

Part I.D. Certification Testing for New Battery Packs (including subordinate sections)

Purpose: This part sets forth, as a condition for certification, the requirement for a manufacturer of a battery-electric powertrain to determine its rated energy capacity using a standardized test procedure.

Rationale: This part is necessary because the resultant test values would provide a consistent metric by which potential purchasers could compare different product offerings. Therefore, this part is expected to result in better-informed purchase decisions and vehicles that are better-suited for their intended applications.

Part I.E. Labeling (including subordinate sections)

Purpose: This part sets forth the label requirements for zero-emission powertrains that certify to the proposed certification requirements.

Rationale: This part is necessary because the required labels would provide a means by which to identify the certification family and configuration of a zero-emission powertrain after it has been deployed. The information available through the label would allow potential purchasers to acquire certification information about a specific zero-emission powertrain and could be used to track zero-emission powertrains subject to an on-going recall.

Part I.F. Certification Procedural Requirements (including subordinate sections)

Purpose: This part sets forth the items a manufacturer would be required to submit to the Executive Officer in order to apply for a certification under the proposed certification provisions for zero-emission powertrains. Specifically, the required items, which would support the implementation of the proposed certification provisions, would include a letter of intent, a technical description of the batteries used (if applicable), a description of each powertrain configuration, battery test data

(if applicable), projected sales information, a sample of their certification label, an end-of-life plan, and diagnostic and repair information and software (if applicable).

Rationale: This part is necessary to clearly describe to a manufacturer what would be required to be submitted in order to be granted a certification for a zero-emission powertrain.

Part II: Heavy-Duty Zero-Emission Powertrain Warranty and Recall Requirements

Part II.A. Purpose, Applicability, and Definitions

Purpose: This part (including subordinate parts) sets forth the purpose, applicability, and the definitions of the warranty, recall, and warranty reporting requirements for zero-emission powertrains.

Rationale: This part is necessary to clearly identify that the requirements only apply to zero-emission powertrains certified to the proposed certification provisions and to ensure uniform application of such requirements.

Part II.B. Defects Warranty Requirements

Purpose: This part (including subordinate parts) sets forth the warranty period, requirements, and exclusions for zero-emission powertrains certified to the proposed certification provisions.

Rationale: The part is necessary to ensure the warranty requirements are clearly stated.

Part II.B.1 General Warranty Coverage

Purpose: This part (including subordinate parts) sets forth the scope of the warranty that manufacturer's must provide for zero-emission powertrains certified to the proposed certification provisions.

Rationale: The part is necessary to establish the manufacturer's general obligations to the purchaser of a certified zero-emission powertrain.

Part II.B.2 Warranty Period

Purpose: This part sets forth the warranty period for zero-emission powertrains certified to the proposed certification provisions.

Rationale: This part is necessary to establish the manufacturer's obligation to warrant the certified zero-emission powertrains they produce for three years or 50,000 miles, whichever occurs first.

Part II.B.3

Purpose: This part (including subordinate parts) sets forth the manufacturer's specific warranty obligations for zero-emission powertrains certified to the proposed certification provisions.

Rationale: The part is necessary to ensure the warranty requirements are clearly stated.

Part II.B.4

Purpose: This part sets forth the manufacturer's requirement to provide maintenance instructions to the owner of zero-emission powertrains.

Rationale: This part is necessary to ensure powertrain owners are made aware of the maintenance that is required for proper operation of a zero-emission powertrain, so that such owners are able to fulfill the owner obligations set forth in Part II.C.

Part II.B.5

Purpose: This part sets forth the manufacturer's requirement to provide a list of all warranted parts to the owner of a zero-emission powertrain.

Rationale: This part is necessary to ensure powertrain owners are made aware of the specific components covered by the warranty.

Part II.B.6

Purpose: This part sets forth the requirement for manufacturers to submit maintenance instructions and the list of warranty parts as part of their certification application to the Executive Officer for review and approval.

Rationale: This part is necessary to allow the Executive Officer to ensure the information that would be provided to owners is consistent with the proposed warranty requirements.

Part II.B.7 Exclusions

Purpose: This part (including subordinate parts) sets forth the warranty exclusions for zero-emission powertrains certified to the proposed certification provisions.

Rationale: The part is necessary to release the manufacturer of its warranty liability for failures caused by the abuse, neglect, or improper maintenance by the owner.

Part II.C. Zero-Emission Powertrain Owner Obligations

Purpose: This part (including subordinate parts) sets forth the responsibility of powertrain owners to adequately maintain their zero-emission powertrains under the warranty provisions.

Rationale: This part is necessary to ensure manufacturers aren't held liable for component failures caused by poor maintenance practices of powertrain owners.

Part II.D. Mediation; Finding of Warrantable Condition

Purpose: This part (including subordinate parts) sets forth the mediation process for warranty claims.

Rationale: This part is necessary to clearly describe the mediation process, so that powertrain manufacturers and powertrain owners understand both the process as well as the Executive Officer's role as the mediator.

Part II.E. Severability

Purpose: This part sets forth that each part of the warranty, recall, and warranty reporting requirements is severable.

Rationale: This part is necessary to ensure that if any one part of these requirements is held to be invalid, the other parts would continue to be applicable.

Part II.F. Initiation and Approval of Voluntary and Influenced Recalls

Purpose: This part (including subordinate parts) sets forth the powertrain manufacturer's obligations to notify the Executive Officer of a voluntary recall and to submit a recall plan under either a voluntary or influenced recall.

Rationale: The part is necessary to clearly describe the powertrain manufacturer's obligation under either a voluntary or influenced recall.

Part II.G. Voluntary and Influenced Recall Plans

Purpose: This part (including subordinate parts) sets forth the required elements as well as the applicable capture rate for a voluntary or influenced recall plan.

Rationale: The part is necessary to ensure that, in the event of a voluntary or influenced recall, manufacturers develop a recall plan that is effective in both notifying powertrain owners and correcting failures.

Part II.H. Repair Label and Proof of Correction Certificate for Voluntary and Influenced Recall Plans

Purpose: This part (including subordinate parts) sets forth the requirements for the label that must be affixed to the powertrain and the correction certificate that must be issued once a powertrain repair has been completed under a voluntary or influenced recall.

Rationale: The part is necessary to ensure that repaired powertrains can be identified in use, the repair labels contain the appropriate information and cannot be readily removed, and powertrain owners are provided with a correction certificate that indicates the failure has been corrected.

Part II.I. Notification

Purpose: This part (including subordinate parts) sets forth what must be included in the notification sent to powertrain owners to inform them of a voluntary or influenced recall.

Rationale: This part is necessary to ensure recall notifications are provided in a consistent manner.

Part II.J. Recordkeeping and Reporting Requirements

Purpose: This part (including subordinate parts) sets forth the recordkeeping and reporting requirements under a voluntary or influence recall campaign.

Rationale: This part is necessary to ensure the Executive Officer is kept informed of progress and manufacturer efforts to fulfill the recall requirements.

Part II.K. Penalties

Purpose: This part sets forth the penalties that would apply to manufacturers for failing to notify powertrain owners as specified in their recall plans and for failing to show a good faith effort to achieve required recall capture rates.

Rationale: This part is necessary to ensure manufacturers are aware of the consequences of failing to meet their obligations under a recall campaign.

Part II.L. Initiation and Notification of Ordered Recalls

Purpose: This part (including subordinate parts) sets forth the powertrain manufacturer's obligation to submit an ordered recall plan once notified by the Executive Officer that the number of powertrain failures warrants an ordered recall.

Rationale: The part is necessary to clearly describe the powertrain manufacturer's obligation to submit an ordered recall plan, if warranted.

Part II.M. Availability of Public Hearing

Purpose: This part (including subordinate parts) sets forth the option for a manufacturer to request a public hearing to contest a finding of nonconformity or the scope of the ordered corrective action.

Rationale: This part is necessary to describe the process for contesting the determination of the Executive Officer in a public hearing.

Part II.N. Ordered Recall Plan

Purpose: This part (including subordinate parts) sets forth the required elements as well as the applicable capture rate for an ordered recall plan.

Rationale: The part is necessary to ensure that, in the event of an ordered recall, manufacturers develop a recall plan that is effective in both notifying powertrain owners and correcting the problem of concern.

Part II.O. Approval and Implementation of Recall Plan

Purpose: This part (including subordinate parts) sets forth the Executive Officers role in reviewing and approving ordered recall plans as well as the manufacturer's obligation to commence the implementation once a plan is approved.

Rationale: This part is necessary to enable the Executive Officer to review ordered recall plans to ensure they would be effective in both notifying powertrain owners and correcting the problems of concern. The part is also necessary to ensure manufacturers commence the implementation of an ordered recall plan in a timely manner once approved by the Executive Officer.

Part II.P. Notification of Owners

Purpose: This part (including subordinate parts) sets forth the requirements pertaining to the notification of powertrain owners under an ordered recall.

Rationale: This part is necessary to ensure recall notifications are provided in a consistent and effective manner.

Part II.Q. Repair Label and Proof of Correction Certificate for Ordered Recall Plans

Purpose: This part (including subordinate parts) sets forth the requirements for the label that must be affixed to the powertrain and the correction certificate that must be issued once a powertrain failure has been corrected under an ordered recall.

Rationale: The part is necessary to ensure that repaired powertrains can be identified in use, the repair labels contain the appropriate information and cannot be readily removed, and powertrain owners are provided with a correction certificate that indicates the failure has been corrected.

Part II.R. Preliminary Tests

Purpose: This part would allow the Executive Officer to require manufacturers to conduct tests on proposed recall repairs in order to determine their effectiveness.

Rationale: The part is necessary because it would give the Executive Officer the ability to verify that proposed recall repairs are capable of correcting the failure.

Part II.S. Communication with Repair Personnel

Purpose: This part sets forth that communications to repair facilities about a recall plan must also be sent to the Executive Officer at the same time.

Rationale: This part is necessary to allow the Executive Officer to review communications materials sent to repair facilities and to verify that such materials were sent.

Part II.T. Recordkeeping and Reporting Requirements for Ordered Recalls

Purpose: This part (including subordinate parts) sets forth the recordkeeping and reporting requirements under an ordered recall campaign.

Rationale: This part is necessary to ensure the Executive Officer is kept informed of progress and manufacturer efforts to fulfill the recall requirements.

Part II.U. Penalties and Extension of Time

Purpose: This part (including subordinate parts) sets forth the penalties that would apply to manufacturers for failing to carry out recall actions as ordered by the Executive Officer and to set forth that the Executive Officer could extend recall deadlines if such action is supported by good cause.

Rationale: This part is necessary to ensure manufacturers are aware of the consequences of failing to meet their obligations under a recall campaign and to allow the Executive Officer to extend recall deadlines, if warranted.

Part II.V. General Provisions for Reporting Requirements

Purpose: This part (including subordinate parts) sets forth the applicability of the warranty reporting requirements.

Rationale: This part is necessary to describe that warranty reporting is required for the warranty period of zero-emission powertrains certified to the proposed certification requirements. The required warranty reporting would allow the Executive Officer to determine when an ordered recall is necessary.

Part II.W. Alternative Procedures

Purpose: This part (including subordinate parts) sets forth that, with Executive Officer approval, alternative procedures could be used in lieu of the prescribed method for submitting information on component failures (i.e., a Warranty Information Report).

Rationale: The part is necessary to provide manufacturers with flexibility with respect to the manner in which they submit component failure information.

Part II.X. Failure Levels Triggering Recall

Purpose: This part sets forth the failure thresholds that would trigger an ordered recall.

Rationale: The part is necessary for the consistent and transparent implementation of the recall requirements.

Part II.Y. Unscreened Warranty Information Report

Purpose: This part sets forth the requirements for the unscreened warranty information report.

Rationale: The part is necessary to ensure manufacturers provide the Executive Officer with quarterly warranty information reports when unscreened warranty claims of a specific powertrain component equals or exceeds 1 percent or 10 powertrains (whichever is greater) of all powertrains within a certification family. This notification allows the Executive Officer to begin investigating warranty claims before an actual recall is triggered.

Part II.Z. Field Information Report

Purpose: This part sets forth the requirements of a field information report, which would be required if unscreened warranty claims reach the recall threshold, but the manufacturer has not yet committed to performing a recall.

Rationale: The part is necessary to provide a process that allows manufacturers to investigate further into unscreened warranty claims before committing to recall campaign.

Part II.AA. Screened Warranty Information Report

Purpose: This part sets forth the requirements for the screened warranty information report.

Rationale: The part is necessary to ensure manufacturers provide the Executive Officer with a screened warranty information report when screened warranty claims of a specific powertrain component equals or exceeds the recall threshold. This notification provides the Executive Officer with the necessary information to evaluate the need for a recall.

Part II.AB. Evaluation of Need for a Recall

Purpose: This part (including subordinate parts) sets forth the criteria used for determining if an ordered recall is needed.

Rationale: The part is required to ensure the consistent and transparent implementation of the recall requirements.