August 16, 2019

Second Annual Report

By the Independent Compliance Auditor for the VW Defendants

Larry D. Thompson, LLC

SECOND ANNUAL REPORT: TABLE OF CONTENTS

A.	INT	RODUCTION1			
B.	THE	E ICA'S FIRST ANNUAL REPORT1			
C.	THE	E U.S. AND CALIFORNIA CONSENT DECREES			
D.		E MONITOR'S MANDATE AND REPORTING UNDER THE A AGREEMENT			
E.	AUDIT PLANNING AND METHODOLOGY2				
	1.	Audit Plan2			
	2.	Audit Scope			
	3.	Approach			
	4.	Limitations4			
F.	THE VW DEFENDANTS' REPORTING OF VIOLATIONS4				
	1.	Violations Described in the ICA's First Annual Report5			
		a) <i>StiBa</i> Managers' Guide at VW GOA5			
		b) Notice to CARB of Commencement of PEMS Testing5			
	2.	VW Defendants' Semi-Annual Reports of Violations5			
G.	GEN	NERAL OBLIGATIONS UNDER THE CONSENT DECREES			
	1.	VW Defendants' Cooperation with the ICA (U.S. CD \P 28(b); Cal. CD \P 28(a))			
	2.	Environmental Compliance Officer (U.S. CD ¶ 28(b))6			
	3.	Annual Report by VW Defendants (U.S. CD ¶ 28(c); Cal. CD ¶ 28(b))			
H.	RECOMMENDED ACTIONS FROM THE ICA'S FIRST ANNUAL REPORT				
	1.	Procedures to Assess Compliance with the Consent Decrees7			
		a) Description of VW Defendants' Response			

	b)	Description of ICA Audit Activities Regarding Response			
	c)	ICA Evaluation of Response9			
2.	Anal	ysis of Golden Rules Implementation9			
	a)	Description of VW Defendants' Response9			
	b)	Description of ICA Audit Activities Regarding Response10			
	c)	ICA Evaluation of Response10			
3.	Impact of Golden Rules Internal Audit Results11				
	a)	Description of VW Defendants' Response11			
	b)	Description of ICA Audit Activities Regarding Response12			
	c)	Evaluation of Response12			
4.	New	Employee Code of Conduct Training Statistics			
	a)	Description of VW Defendants' Response13			
	b)	Description of ICA Audit Activities Regarding Response13			
	c)	Evaluation of Response13			
5.	Whis	stleblower Case Tracking Report13			
	a)	Description of VW Defendants' Response13			
	b)	Description of ICA Audit Activities Regarding Response14			
	c)	Evaluation of Response14			
6.	Documentation Concerning California Laws and Regulations14				
	a)	Description of VW Defendants' Response14			
	b)	Description of ICA Audit Activities Regarding Response15			
	c)	Evaluation of Response16			
7.	Distinguishing Between VW GOA and GOA Chattanooga16				
	a)	Description of VW Defendants' Response16			
	b)	Description of ICA Audit Activities Regarding Response17			
	c)	Evaluation of Response17			
NEW	V REC	OMMENDED ACTIONS TO ACHIEVE COMPLIANCE17			
		VE RELIEF RELATED TO THE PRODUCT MENT PROCESS			

I.

J.

1.	0	egation of Duties Between Product Development and ification Testing (U.S. CD ¶ 13; Cal. CD ¶ 12)	19
	a)	Activities by the VW Defendants	19
	b)	ICA Audit Activities and Evaluation of VW Defendants' Activities	20
2.	Grou	p Steering Committees (U.S. CD ¶ 14; Cal. CD ¶ 13)	21
	a)	Activities by the VW Defendants	21
	b)	ICA Audit Activities and Evaluation of VW Defendants' Activities	22
3.		able Emissions Measurement System Testing (U.S. CD ¶ 15; CD ¶ 14)	23
	a)	Activities by the VW Defendants	23
	b)	ICA Audit Activities and Evaluation of VW Defendants' Activities	24
4.		nition of Managers' Responsibilities (U.S. CD ¶ 17; Cal. CD	25
	a)	Activities by the VW Defendants	
	b)	ICA Audit Activities and Evaluation of VW Defendants' Activities	
5.	Obli	gations Regarding the "Golden Rules"	26
	a)	Activities by the VW Defendants	
	b)	ICA Audit Activities and Evaluation of VW Defendants' Activities	31
		STLEBLOWER SYSTEM (U.S. CD ¶¶ 20 & 21; CAL. CD	34
1.	Activ	vities by the VW Defendants	34
	a)	Implementation and Maintenance of the Group Whistleblower System	34
	b)	Retention of Professionally Educated and Trained Employees	36
	c)	Designation of Violations of U.S. Environmental Laws as "Serious Regulatory Violations"	36
	d)	Annual Reporting of Certain Whistleblower Alerts	36
	e)	Update on the Whistleblower Alerts Reported in the First Annual Report by VW Defendants	38

K.

		f)	Whistleblower Alerts Reported in the Second Annual Report by VW Defendants	8	
	2.	ICA	Audit Activities and Evaluation of VW Defendants' Activities	8	
L.			IS TO THE EMPLOYEE SURVEY (U.S. CD ¶ 22; CAL.	59	
	1.	Acti	vities by the VW Defendants	;9	
		a)	Integrity Question	;9	
		b)	StiBa Managers' Guides	;9	
		c)	Monitoring Employee Survey Responses4	0	
		d)	Summary of Survey Results4	0	
	2.	ICA	Audit Activities and Evaluation of VW Defendants' Activities4	1	
М.			NS TO THE CODE OF CONDUCT (U.S. CD ¶ 23; CAL.	1	
	1.	Acti	vities by the VW Defendants4	1	
		a)	Revision to Include Environmental Protection and Responsibility Provisions4	1	
		b)	Training of New Employees4	1	
		c)	Reporting of Training4	2	
	2.	ICA	Audit Activities and Evaluation of VW Defendants' Activities4	2	
N.	THIRD-PARTY EMS AUDITS (U.S. CD ¶¶ 24 & 25; CAL. CD ¶¶ 23 & 24)				
	1.	Acti	vities by the VW Defendants4	3	
		a)	EMS Auditor Team4	3	
		b)	Application of the ISO 14001:2015 Standard4	3	
		c)	2018 Audit Procedures4	4	
		d)	2018 Audit Reports4	5	
		e)	2019 Audit Planning4	8	
	2.	ICA	Audit Activities and Evaluation of VW Defendants' Activities4	8	
0.			OND ANNUAL REPORT BY VW DEFENDANTS (U.S. AL. CD ¶ 18)4	9	

2.	-	rting of Assessments of Effectiveness for Injunctive Relief ures and Related Corrective Actions
	a)	
	u)	Descriptions of Measures Implemented to Promote Consent Decree Compliance
	b)	Assessments of Effectiveness in Promoting Compliance with U.S. and California Environmental Law
	c)	Identification of Corrective Actions Taken to Improve Effectiveness
3.	Repo	rting of Certain Recorded Risks51
	a)	Background on the VW Defendants' GRC process51
	b)	Identification of Recorded Risks to be Included in the Second Annual Report by VW Defendants52
	c)	ICA Audit Activities and Evaluation of VW Defendants' Activities
NEX	Г STEI	PS 54

Appendix – Table of Consent Decree Obligations

Р.

Independent Compliance Auditor for the VW Defendants

Second Annual Report

A. INTRODUCTION

Larry D. Thompson, LLC submits this report pursuant to (1) the Third Partial Consent Decree between the United States and six Volkswagen entities, entered on April 13, 2017 and modified on June 1, 2018 ("U.S. Consent Decree" or "U.S. CD") and (2) the Third California Partial Consent Decree between the State of California and the same Volkswagen entities, entered on July 21, 2017 and modified on August 30, 2018 ("California Consent Decree" or "Cal. CD"). Together, the U.S. Consent Decree and the California Consent Decree are referred to as the "Consent Decrees." The Consent Decrees were entered by the United States District Court in San Francisco in the case *In re: Volkswagen "Clean Diesel" Marketing, Sales Practices, and Product Liability Litigation*, No. 3:15-md-02672-CRB (N.D. Cal.).

This is the second annual report ("Second Annual Report") by Mr. Thompson as part of his three-year assignment as Independent Compliance Auditor (together with the professionals assisting him, "ICA") under the Consent Decrees.

B. THE ICA'S FIRST ANNUAL REPORT

The ICA's First Annual Report was submitted on August 17, 2018. As required by the Consent Decrees, the VW Defendants (Volkswagen AG, AUDI AG, Volkswagen Group of America, Inc., and Volkswagen Group of America Chattanooga Operations, LLC) publicly published the ICA's First Annual Report in English and German. The English version can be found online at <u>www.vwcourtsettlement.com/wp-content/uploads/2018/08/ICAR-Aug2018-English.pdf</u>.

The First Annual Report covered the one-year time period of April 14, 2017 through April 13, 2018. It provided an overview of the processes and procedures for the ICA's role and work, and broadly described the ICA's understanding of the actions taken by the VW Defendants (and relevant third-parties retained by them) to address their specific injunctive relief obligations listed in the Consent Decrees.

The First Annual Report also described two violations of the Consent Decrees – a failure to include certain information in the Volkswagen Group of America's managers' guide to the annual employee survey, and a failure to provide the California Air Resources Board ("CARB") with advance notice of the commencement of Portable Emissions Measurement System ("PEMS") testing. Section F of this report provides an update on these issues.

Additionally, the First Annual Report set forth seven Recommended Actions to Achieve Compliance with the Consent Decrees ("Recommended Actions"). These Recommended Actions did not indicate violations of the Consent Decrees, and were not intended to be final assessments of compliance by the ICA; rather, they were intended to promote prospective compliance by the VW Defendants. Section H of this report summarizes the VW Defendants' responses to these seven Recommended Actions and provides the ICA's evaluation of those responses.

C. THE U.S. AND CALIFORNIA CONSENT DECREES

Background information concerning the Consent Decrees can be found in the First Annual Report, which is incorporated by reference here. The specific obligations imposed by the Consent Decrees are described in full in that report, and the relevant provisions of the Consent Decrees are included here as an Appendix.

The U.S. Consent Decree emphasized requirements related to U.S. environmental laws, while the California Consent Decree emphasized requirements related to California's environmental laws. In this report, unless otherwise stated, references to obligations in the Consent Decrees involving "U.S." laws, regulations, and requirements include California laws, regulations, and requirements.

D. THE MONITOR'S MANDATE AND REPORTING UNDER THE PLEA AGREEMENT

In addition to serving as the ICA, Larry D. Thompson, LLC serves as the Independent Compliance Monitor ("Monitor") under the plea agreement ("Plea Agreement") in the criminal case *United States v. Volkswagen AG*, No. 16-CR-20394-SFC (E.D. Mich.). The U.S. Consent Decree expressly provided for this dual role for the ICA. As described in the First Annual Report, there are significant differences between the role of the ICA and Monitor, and between the related reporting obligations.

In the annual reports under the Consent Decrees, the ICA informs the government and the public about the ICA's understanding of actions taken by the VW Defendants to address the specific, enumerated obligations and tasks outlined in the Consent Decrees, as part of the ICA's ongoing verification of the VW Defendants' compliance with the Consent Decrees. The Plea Agreement reports include a broader evaluation of the "effectiveness" of the overall compliance program of Volkswagen AG and its subsidiaries and affiliates ("Volkswagen").

E. AUDIT PLANNING AND METHODOLOGY

1. Audit Plan

The U.S. Consent Decree required that the ICA submit an audit plan to the U.S. Department of Justice ("DOJ") describing the activities planned by the ICA for each of the three one-year time periods covered. As required by the U.S. Consent Decree, the ICA's audit plan for the period covered by this report included "a checklist of relevant compliance requirements, procedures for the exchange of any documents and information that the Independent Compliance Auditor needs to perform its duties, and any other terms that the Independent Compliance Auditor may deem necessary to effectuate its duties."

After receiving comments by DOJ on a draft, the ICA submitted a final version of the audit plan for the period covered by this report to DOJ on November 9, 2018.

2. Audit Scope

As described in the First Annual Report, the ICA was tasked with evaluating the efforts of the four VW Defendants to comply with the injunctive relief obligations in the Consent Decrees. The ICA's duties, and this Second Annual Report, relate only to these four entities. The four VW Defendants have different areas of responsibility. Volkswagen AG ("VW AG") includes both parent-company functions, referred to as "Group" functions, and functions for VW Passenger Cars, one of the Volkswagen "brands." AUDI AG ("AUDI") is a separate brand. Volkswagen Group of America, Inc. ("VW GOA") houses the U.S. operations of VW AG, including the VW GOA subsidiary Volkswagen Group of America Chattanooga Operations, LLC ("GOA Chattanooga"), a manufacturing facility in Chattanooga, Tennessee.

This Second Annual Report covers the one-year time period from April 14, 2018 through April 13, 2019. However, as mentioned in the modifications to the Consent Decrees, the ICA may exercise discretion to report events occurring outside of this period.

As required by the Consent Decrees, on May 17, 2019 the ICA submitted a draft of this report to DOJ and the VW Defendants.

This Second Annual Report builds on the First Annual Report, and provides an update on the ICA's review of the VW Defendants' compliance with their injunctive relief obligations. Next year, at the close of the three-year auditing term, the ICA will submit a third and final annual report ("Third Annual Report").

The ICA's audit is ongoing, and the results of the audit will be reflected in the three annual reports, considered together. The ICA's ultimate findings regarding the VW Defendants' compliance with their injunctive relief obligations under the Consent Decrees will be made at the conclusion of the full three-year auditing term.

3. Approach

The ICA conducts oversight of the VW Defendants' compliance with the Consent Decrees through a wide range of activities. These activities include, but are not limited to: reviewing documents, including meeting minutes, organizational charts, policies, procedures, statistical data, training materials, and work papers; examining industry bestpractices and procedures; meeting with key Volkswagen personnel involved in implementing and observing actions related to the VW Defendants' obligations; observing audits and other activities; observing meetings and operations; independently analyzing and reviewing relevant data; and reviewing U.S., California, and international environmental laws and regulations. Where applicable, these activities concern both the VW Defendants and third parties, such as the third-party emissions tester and EMS auditor required by the Consent Decrees. The ICA does not re-perform work conducted by third-parties. During the one-year period covered by this report, where appropriate, and depending on the implementation status of specific injunctive relief, the ICA continued the testing phase of its work.

In order to understand and evaluate compliance by the VW Defendants with their Consent Decree obligations, the ICA performed testing procedures, including, but not limited to: meetings with appropriate personnel; inspection of relevant documentation; observation of audit procedures; process walk-throughs; and re-performance of procedures.

In conducting his work, the ICA considers guidance concerning the maintenance of effective internal controls, including the Committee of Sponsoring Organizations of the Treadway Commission ("COSO") Internal Control Framework. In addition, throughout the course of the planning and execution of his work, the ICA considers guidance issued by the Public Company Accounting Oversight Board, the American Institute of Certified Public Accountants, and the International Auditing and Assurance Standards Board.

4. Limitations

As noted above, the Consent Decrees established a three-year auditing term and annual reporting during that term. The ICA's audit of the VW Defendants' compliance with the Consent Decrees is ongoing, and the results of the audit will be reflected in the three annual reports, considered together. The ICA's ultimate conclusions regarding the VW Defendants' compliance with their obligations under the Consent Decrees will occur at the conclusion of the full three-year auditing term. However, any instances of noncompliance identified by the ICA at any point during the three-year term will be communicated to the VW Defendants, DOJ, and the California authorities, as appropriate. These discussions will be a part of the ICA's ongoing, continual dialogue with the VW Defendants regarding their obligations and compliance under the Consent Decrees.

Information required to complete this review was primarily obtained from the VW Defendants and, in certain circumstances, third parties. The ICA supplemented the review of that information with independent observation of the VW Defendants' activities, consideration of industry best-practices, and the exercise of professional judgment.

In addition, certain provisions of the Consent Decrees are subject to interpretation, since definitions were not provided for all terms within the documents. In instances where the VW Defendants provided an interpretation of a term, the ICA reports that interpretation, along with any representations by the VW Defendants concerning the completion of the respective obligation.

F. THE VW DEFENDANTS' REPORTING OF VIOLATIONS

The ICA's First Annual Report described two violations of the Consent Decrees' injunctive relief provisions by the VW Defendants, both of which had been reported by

the VW Defendants to the relevant governmental authorities. During the one-year period covered by this report, the VW Defendants did not identify or report any new violations.

1. Violations Described in the ICA's First Annual Report

a) StiBa Managers' Guide at VW GOA

The ICA reported that VW GOA had failed to include questions in its managers' guide for the 2017 employee survey called the *StiBa*, short for *Stimmungsbarometer* or "mood barometer" ("*StiBa* Managers' Guide"). The addition of this information, intended to assist with gauging compliance with U.S. environmental laws and regulations, was a requirement of the Consent Decrees.

In VW GOA's 2018 *StiBa* Managers' Guide, VW GOA included the required information. The information was distributed to the relevant VW GOA managers by e-mail on December 5, 2018.

b) Notice to CARB of Commencement of PEMS Testing

The ICA reported that the VW Defendants had failed to provide written notice to CARB 10 days before commencing Model Year 2017 PEMS testing, a requirement of the California Consent Decree.

On June 27, 2018, the VW Defendants provided CARB with written notice that Model Year 2018 PEMS testing would commence on or about July 16, 2018.

2. VW Defendants' Semi-Annual Reports of Violations

On January 28, 2019, the VW Defendants submitted their Fourth Semi-Annual Report of Violations under the U.S. Consent Decree, and Third Semi-Annual Report of Violations under the California Consent Decree, covering a reporting period of July 1, 2018 through December 31, 2018. The reports stated that the VW Defendants had not identified any new violations.

On July 31, 2019, the VW Defendants submitted their Fifth Semi-Annual Report of Violations under the U.S. Consent Decree, and Fourth Semi-Annual Report of Violations under the California Consent Decree, covering a reporting period of January 1, 2019 through June 30, 2019. The reports stated that the VW Defendants had not identified any new violations.

G. GENERAL OBLIGATIONS UNDER THE CONSENT DECREES

1. VW Defendants' Cooperation with the ICA (U.S. CD \P 28(b); Cal. CD \P 28(a))

The ICA deems the VW Defendants' overall approach during the one-year period covered by this report to have been cooperative. This large and complex project benefits from a cooperative approach, and continued cooperation and collaboration is essential as

this three-year assignment moves towards its completion. The ICA has received excellent cooperation from the Group and AUDI Works Councils.

2. Environmental Compliance Officer (U.S. CD ¶ 28(b))

The U.S. Consent Decree required that the VW Defendants "designate an Environmental Compliance Officer to liaise directly with the [ICA] regarding issues of information and access rights." Dr. Thomas Meiers continued to hold this role.

3. Annual Report by VW Defendants (U.S. CD ¶ 28(c); Cal. CD ¶ 28(b))

The Consent Decrees required the VW Defendants to submit their own second annual report to DOJ and the California authorities ("Annual Report by VW Defendants") on May 17, 2019, the same day a draft of this report was due to the parties.

The requirements for the Annual Report by VW Defendants are found in paragraphs 19, 21, 22, and 23 of the U.S. Consent Decree (18, 20, 21, and 22 of the California Consent Decree). According to paragraph 19 of the U.S. Consent Decree ("Paragraph 19"), beginning with the second Annual Report by VW Defendants, the VW Defendants are required to provide information on two substantial aspects of their Consent Decree activities. First, the VW Defendants must provide a description of the measures they have taken to promote compliance with numerous specific obligations in the Consent Decrees, an assessment of the effectiveness of those measures in promoting compliance with U.S. and California environmental law, and the identification of any related corrective actions.

Second, the VW Defendants must address in their reports: (1) all risks recorded as part of their annual Governance, Risk, and Compliance ("GRC") process relating to compliance with U.S. and California environmental laws and regulations, or risks of rule violations in the product development process; (2) the countermeasures taken in response to those risks; and (3) management controls implemented relating to those risks.

The ICA's review of the second Annual Report by VW Defendants with respect to these two requirements is found in Section O of this report. Beginning in late 2018, the ICA met with relevant personnel at the VW Defendants to discuss the VW Defendants' plans for their report, and to discuss the potential contents of the report to the extent possible. The ICA also received drafts of the second Annual Report by VW Defendants dated April 17, 2019 and May 10, 2019.

H. RECOMMENDED ACTIONS FROM THE ICA'S FIRST ANNUAL REPORT

As noted above, in the First Annual Report the ICA issued seven Recommended Actions. The First Annual Report emphasized that the Recommended Actions did not indicate violations of the Consent Decrees and were not intended as final assessments of compliance; rather, they were intended by the ICA to promote prospective compliance. The ICA has evaluated the VW Defendants' efforts in response to the Recommended Actions, as follows:

1. <u>Procedures to Assess Compliance with the Consent Decrees</u>

Design and implement additional, ongoing monitoring and auditing procedures to assess compliance by the VW Defendants with their obligations under the Consent Decrees.

a) Description of VW Defendants' Response

In response to Recommended Action 1, the VW Defendants performed three separate exercises. First, the VW Defendants performed a root-cause analysis of the two violations described above. Second, the VW Defendants performed an analysis of the monitoring activities by the Monitorship Project Management Office ("PMO") regarding the VW Defendants' fulfillment of their obligations under the Consent Decrees. Third, as part of their annual audit plan, the VW Defendants conducted two audits of their fulfillment of Consent Decree obligations.

(1) Root-Cause Analyses

The VW Defendants' root-cause analysis for the failure to provide PEMS-testing notice to CARB found two root causes for the failure to report: (1) "[k]ey management contacts were not fully aware of their obligations under the Third Partial Consent Decree"; and (2) the process flow-chart that was followed for PEMS testing in 2017 did not include the step to notify CARB of the commencement of PEMS testing.

In response to the findings, an external law firm provided executives at VW GOA with two training sessions in July 2018. Those in attendance included executives from VW GOA, Audi of America, and GOA Chattanooga. The focus of the training was on the VW Defendants' responsibilities under the Consent Decrees and the Plea Agreement. Additionally, those at VW GOA responsible for PEMS testing and notification of the commencement of testing updated their process documentation to include the notification obligation.

The root-cause analysis for VW GOA's failure to include the required information in the *StiBa* Managers' Guide identified three causes for the failure:

Key management contacts were not fully aware of their obligations under the Third Partial Consent Decree.

Relevant core task information was not received by the VW GOA business units in a sufficient manner likely due to insufficient internal communication – much of the information was received in some form by the PMO at VW GOA but was not effectively received by the relating business units. As a result not all relevant individuals were in attendance at key meetings relating to legal obligations.

The use of a third party IT system for the StiBa process at VW GOA increases the difficulty in adhering to global StiBa process because extra implementation steps are necessary whenever changes are made. For

those entities that use the global StiBa-system, many changes are automatically implemented in their processes.

In addition to the training provided by the external law firm, the VW GOA PMO implemented new procedures to ensure VW GOA's attendance at the "key meetings related to legal obligations." In regards to the global *StiBa* system, VW GOA has indicated it will move to this platform later in 2019.

(2) Analysis of PMO Monitoring

In addition to performing the root-cause analyses, the VW Defendants evaluated the monitoring activities completed by the PMO to track the status and fulfillment of the VW Defendants' obligations regarding the Consent Decrees. This evaluation was performed by Group Internal Audit during a workshop with PMO leadership.

Based on the results of the analysis of the PMO monitoring activities, the VW Defendants assigned to the PMO responsibility to ensure that all new personnel with responsibilities for obligations under the Consent Decree are educated on the Consent Decree requirements.

(3) Audits of Select Consent Decree Obligations

During an October 24, 2018 Group Monitorship Committee (K-VAM) meeting, the Group Board of Management member for Integrity and Legal Affairs "suggested that [Group Internal Audit] include one or two regular audit reviews per year [of Consent Decree obligations] into the Annual Audit Plan and into the response to the Monitor as well as 'succinct audits' of Chattanooga and VWGOA."

Group Internal Audit selected Consent Decree obligations related to the Definition of Managers' Responsibilities (U.S. CD ¶ 17; Cal. CD ¶ 16) and the Whistleblower system (U.S. CD ¶¶ 20 & 21; Cal. CD ¶¶ 19 & 20) to audit. At the end of the period covered by this report, fieldwork had been completed and a draft report issued for all of these audits, with the exception of the audit of the Definition of Managers' Responsibilities at VW GOA (including GOA Chattanooga). Fieldwork for that audit took place in May 2019 and the report was issued on July 30, 2019.

The audits related to the Definitions of Managers' Responsibilities began in the first quarter of 2019 and are further described in Section J of this report. The audits related to the Whistleblower system began in November 2018 and are further described in Section K.

b) Description of ICA Audit Activities Regarding Response

In order to understand and evaluate the response by the VW Defendants to this Recommended Action, the ICA's testing procedures included meeting with appropriate personnel, inspection of relevant documentation, and observation of certain audit procedures.

c) ICA Evaluation of Response

The VW Defendants generally took reasonable steps to address the concerns reflected in Recommended Action 1. The ICA will continue to evaluate and monitor the results of the audits of the Definition of Managers' Responsibilities and the Whistleblower system.

2. <u>Analysis of Golden Rules Implementation</u>

Prepare and provide a comprehensive written analysis of the implementation of the Golden Rules. The analysis should list every business unit of the VW Defendants required to implement any aspect of the Golden Rules under the Consent Decrees. For each listed business unit, list the specific Golden Rules and minimum requirements applicable. For all applicable Golden Rules and minimum requirements listed, identify: (1) what specific activities constituted implementation under the Consent Decrees; (2) the date by which the VW Defendants consider each activity to have been completed (or an explanation as to why the activity has not been completed); (3) whether any required documents related to the Golden Rules and/or minimum requirements were in draft form as of October 10, 2017; and (4) the documentation of each activity.

a) Description of VW Defendants' Response

The ICA issued Recommended Action 2 to facilitate an assessment of whether the VW Defendants had complied with their obligation to implement the Golden Rules by October 10, 2017. In response to the Recommended Action, the VW Defendants first requested that the ICA provide additional, detailed, written guidance about the Recommended Action. The ICA responded by providing written guidance emphasizing the need for the VW Defendants to clearly and concisely demonstrate the extent to which they had "established" the Golden Rules. (As discussed below, and in the First Annual Report, the VW Defendants have taken the position that the Consent Decree term "implement" in this context requires "[a]t a minimum, controls, rules of procedure, and tasks authorities and responsibilities" to be "documented" for the process involving engine control unit software development, emissions type identification, and Product Safety Committees.) Over several months, the ICA engaged with the VW Defendants to provide further guidance and clarification about Recommended Action 2.

In November 2018, the VW Defendants delivered a substantive response to the Recommended Action. The response consisted of numerous spreadsheets detailing: (1) the activities the business units undertook to implement the Golden Rules; (2) the date by which those activities had been completed; (3) the status of process documentation as of October 10, 2017; and (4) the specific reference to the process documentation. As described below, the VW Defendants delivered an updated response in March 2019 for VW Passenger Cars, based on feedback from the ICA.

b) Description of ICA Audit Activities Regarding Response

The November 2018 response did not provide sufficient information for the ICA to determine whether the VW Defendants had established all of the Golden Rules' minimum requirements across each of the relevant business units. The ICA identified six critical deficiencies in the response: (1) missing lists of business units involved in the processes; (2) lack of specificity in descriptions of business units' activities and citations; (3) imprecise references; (4) citations to internal databases the ICA could not access; (5) incorrect or incomplete naming of documents; and (6) missing references.

The ICA met with the VW Defendants to discuss the ICA's concerns regarding these deficiencies, and the overall organization of the response. Following those discussions, the VW Defendants provided a more complete response to the ICA in March 2019, regarding VW Passenger Cars only. Updated responses for Group, AUDI, and VW GOA were not received during the period covered by this report. (The Golden Rules are not implemented at GOA Chattanooga because the VW Defendants have determined that GOA Chattanooga is not involved in the "Product Development Process," as that term is defined in the Consent Decrees.) The ICA received updated responses from Group, AUDI, and VW GOA in June 2019, and will provide an evaluation of these updated responses during the next reporting period.

c) ICA Evaluation of Response

The March 2019 response for VW Passenger Cars was more comprehensive than the November 2018 submission, and addressed the concerns raised by the ICA. For example, imprecise citations were corrected to include specific references, and the document descriptions were supplemented to clarify when the documents became final. Further, the March 2019 response included all of the VW Passenger Cars business units affected by the Golden Rules processes.

Based on the ICA's review of the March 2019 response for VW Passenger Cars, the VW Defendants have made significant efforts to establish the Golden Rules throughout the applicable business units by finalizing process standards, policies, and procedures. The VW Defendants had finalized process documentation for most of the Golden Rules by the deadline set forth in the Consent Decrees, with three exceptions the Company explained as situations where documentation had been completed subject to final approval.

A notable exception involved Golden Rule 5, which addresses the approval of non-commissioned software functions from third-party software suppliers. Golden Rule 5, and the timeline for its implementation, are discussed in more detail below. Among other reasons for delay, the VW Defendants stated that it was critical to pilot the newly designed process (particularly for projects relevant to the North American Region) before full implementation. The process documentation was not finalized until August 2018. The process standard is now being applied by the applicable business units and third-party software suppliers.

Because the ICA was not provided with updated responses to the Recommended Action for Group, AUDI, and VW GOA during the period covered by this report, it has not been able to complete its evaluation. In sum, Group, AUDI, and VW GOA did not provide a timely or complete response to address the ICA's concerns communicated in the Recommended Action.

3. Impact of Golden Rules Internal Audit Results

Prepare and provide a written assessment of how the overall results reflected in the Golden Rules audit reports impact the determination of whether the VW Defendants complied with their obligation to implement the internal procedures in the Golden Rules Handbook, notwithstanding Internal Audit's assertion that the VW Defendants' obligations in Paragraphs 16 and 18 of the U.S. Consent Decree (Paragraphs 15 and 17 in the California Consent Decree) are independent of each other.

a) Description of VW Defendants' Response

As described in the First Annual Report, the VW Defendants' Golden Rules audits did not include an assessment of whether the procedures in question had been implemented by the October 10, 2017 deadline, and the VW Defendants took the position that the audits were not required to serve that purpose. Notwithstanding that position, following the ICA's inquiries and issuance of this Recommended Action, the VW Defendants began analyzing the "action items" identified in the audit reports in order to further assess the Golden Rules' implementation status under the Consent Decrees.

As part of that effort, in June 2018, the Group Board of Management asked Group Internal Audit to prepare a presentation, based on the Golden Rules audits, addressing the extent to which the VW Defendants had "implemented" the Golden Rules under the Consent Decrees. In July 2018, Group Internal Audit presented those results to the Group Board of Management, stating that a number of "action items" identified in the Golden Rules audit reports related to paragraph 16 of the U.S. Consent Decree (*i.e.*, the establishment and design of the Golden Rules) still needed to be resolved. The Golden Rules audits for engine, transmission, and other control units ("ECUs," "TCUs," and "OCUs"); Emissions Type Identification; and Product Safety Committees (*Ausschuss für Produktsicherheit* or "*APS*") identified 433 action items.

The VW Defendants responded to this Recommended Action by reviewing the 433 action items and applying criteria to determine which action items were potentially relevant to the VW Defendants' obligation to implement the Golden Rules. The VW Defendants considered action items relevant to their Consent Decree obligations if they related to ECUs and the design or establishment of the process documentation. After applying these criteria, the PMO determined that 64 of the 433 action items were potentially relevant to compliance with this element of the Consent Decrees.

In September 2018, the VW Defendants provided the ICA with explanations for each of the 64 outstanding "action items" identified in the audit reports, stating that none

represented a compliance issue with respect to the Consent Decrees' implementation requirement. To explain their position, the VW Defendants asserted, for example, that: (1) many of the deficiencies identified by the Internal Audit departments were either ministerial or immaterial to compliance with the Consent Decree (*e.g.*, instances where the internal audit departments identified a missing citation or cross-reference, or the failure to remove a superseded document reference); (2) any action items regarding Golden Rule 10 were irrelevant for Consent Decree compliance purposes because Golden Rule 10 addresses a European Union homologation standard, whereas the Consent Decrees' implementation requirements only apply to the U.S. product development process; and (3) IT-related requirements were not subject to a specific deadline.

Group Internal Audit did not comment on this assessment. However, during the period covered by this report, Group Internal Audit continued to deliver regular presentations to the Group Board of Management regarding the status of the action items. At the time of a presentation to the Group Board of Management in February 2019, only 10 of the 433 action items remained open. The ICA understands that since that presentation, five of the 10 remaining action items were closed, leaving five open action items remaining at the end of the period covered by this report.

b) Description of ICA Audit Activities Regarding Response

The ICA met with the VW Defendants as well as Group Internal Audit regarding this Recommended Action. The ICA also reviewed the written assessment provided by the VW Defendants, as well as the underlying supporting documents and all of the Golden Rules audit reports prepared by the Internal Audit departments.

c) Evaluation of Response

Based on the VW Defendants' interpretations of their obligations in the Consent Decrees, and the ICA's preliminary analysis, the ICA finds the explanations for the responses to the action items to be consistent with those obligations. The ICA will further evaluate the sufficiency of the remediation action items by performing risk-based testing of Internal Audit's work on the Golden Rules follow-up audits for VW Passenger Cars, AUDI, and VW GOA.

4. <u>New Employee Code of Conduct Training Statistics</u>

With respect to the required summary in the Annual Report by VW Defendants of training for all new employees on the Code of Conduct, provide uniform training statistics for the VW Defendants, covering the same time period.

Moreover, in light of the inaccuracies identified in the training statistics provided in the first Annual Report by VW Defendants, improve the process for calculating training statistics.

a) Description of VW Defendants' Response

In response to the Recommended Action, the VW Defendants developed and implemented a revised and uniform process for tracking and reporting the Code of Conduct training statistics for new employees. For example, the VW Defendants established a uniform definition of "new employee." The VW Defendants also developed a standardized form to be completed by each VW Defendant for the relevant time period.

The VW Defendants also designed and implemented several management controls for the reporting process, for the purpose of achieving accuracy in the statistics reported. After implementation of these management controls, Group Internal Audit performed testing procedures, and identified a weakness in the reporting process at VW AG. As a result, an enhanced control activity was implemented as of April 2019.

b) Description of ICA Audit Activities Regarding Response

The ICA gained a detailed understanding of the improved process for monitoring and reporting Code of Conduct training statistics for each of the VW Defendants. The improved process was designed to address the issues that caused the inconsistencies in the last reporting period. The ICA's review of the changes included inquiries of relevant personnel, inspection of relevant documentation, process walk-throughs, and reperformance of procedures.

c) Evaluation of Response

In the second Annual Report by VW Defendants, the Code of Conduct training statistics for all new employees were provided in a uniform manner for the VW Defendants, including the use of the same time period.

The improved process for calculating the Code of Conduct training statistics, including the identification of a uniform reporting template, time period, and definition of "new employee," as well as the implementation of additional management controls over the process, allow for more consistent, accurate, complete, and timely monitoring and reporting across the VW Defendants.

5. Whistleblower Case Tracking Report

Confirm that the current process used by the VW Defendants to identify Whistleblower alerts for inclusion in the Annual Report by VW Defendants effectively identifies all alerts relating to violations of U.S. environmental protection laws or regulations.

a) Description of VW Defendants' Response

In response to the Recommended Action, the VW Defendants established and implemented a process designed to ensure that all Whistleblower reports or "alerts" relating to violations of U.S. and California environmental protection laws and regulations are processed and reported in the Annual Report by VW Defendants. This process is described more fully in Section K below.

b) Description of ICA Audit Activities Regarding Response

The ICA performed testing procedures to enhance its understanding of the process established by the VW Defendants in connection with Recommended Action 5, including process walk-throughs, meetings with appropriate personnel, inspection of relevant documentation, and re-performance of procedures.

c) Evaluation of Response

The ICA identified multiple Whistleblower alerts related to potential violations of U.S. environmental laws and regulations that had not been initially flagged as relevant by the VW Defendants, and had not been provided to the PMO for possible inclusion in the second Annual Report by VW Defendants. The VW Defendants conducted a further review of the alerts identified by the ICA, and also conducted their own quality review check. As a result, the VW Defendants concluded that additional alerts were relevant and included them in the second Annual Report by VW Defendants. The ICA gained an understanding of the VW Defendants' review and the basis for their decisions about which alerts to include. The VW Defendants have identified several additional measures and improvements to increase the effectiveness of the process for identifying and reporting relevant Whistleblower alerts.

The ICA has issued a new Recommended Action to further increase the effectiveness of the process for identifying alerts related to potential violations of U.S. environmental laws and regulations. The new Recommended Action 5.1 appears in Section I below.

6. Documentation Concerning California Laws and Regulations

Where the California Consent Decree required that obligations regarding "U.S." laws and regulations include California state laws and regulations, demonstrate that the VW Defendants' efforts to comply with their obligations under the Consent Decrees have used this inclusive definition.

a) Description of VW Defendants' Response

In order to comply with this Recommended Action, the VW Defendants reviewed documentation relating to the paragraphs of California Consent Decree deemed applicable, conferred with relevant business units, and provided the ICA with extensive documentation summarizing their efforts to ensure that California laws and regulations were considered when implementing the Consent Decrees' injunctive relief.

For Consent Decree obligations related to the "Product Development Process" (a term defined in the Consent Decrees), the VW Defendants implemented a number of steps to incorporate California laws and regulations in their efforts. For the obligations related to the segregation of duties (Cal. CD \P 12), the VW Defendants implemented policies and procedures providing that each employee involved in any EPA-required

vehicle certification testing and monitoring is also responsible for compliance with California laws and regulations. These policies and procedures also incorporated California laws in other ways. For example, the VW Defendants' Certification Standard Timeline for the North American Region included deadlines for compliance with all U.S. regulations, including on-board diagnostic testing and other California requirements. Additionally, the VW Defendants' process standard and Rules of Procedure for their Technical Conformity – Laws and Regulations departments outlined how these departments identify, interpret, and communicate California regulations.

For the obligations related to the Group Steering Committees (Cal. CD ¶ 13), these committees tracked and facilitated compliance not only with U.S. laws related to vehicle certification and emissions but also with those of California. For the Tasks, Authorities, and Responsibilities ("TARs") requirements (Cal. CD ¶ 16), managers with TARs related to compliance with California environmental laws and regulations were included in the VW Defendants' required TARs analysis. Finally, regarding the Golden Rules audits (Cal. CD ¶ 17), the Internal Audit departments tracked the implementation of the internal procedures in the Golden Rules Handbook relating to vehicle approval procedures under California laws and regulations.

For the Environmental Management System ("EMS") audits of the product development process (Cal. CD \P 23), the independent auditor (Bureau Veritas or "BV") visited VW GOA's Test Center California ("TCC") and was provided with documents that referenced California environmental laws and regulations. For example, BV received the VW GOA Engineering and Environmental Office ("EEO") Compliance Report Calendar, which included reporting obligations for CARB. BV also received the EEO Obligations Register, which listed all important U.S. rules and regulations, including many California entries.

b) Description of ICA Audit Activities Regarding Response

The ICA reviewed the written response provided by the VW Defendants, as well as the documents supporting the response.

For the obligations related to the product development process, the ICA undertook a number of steps to assess the VW Defendants' response. First, for segregation of duties, the ICA reviewed relevant policies and procedures, including those related to the VW Defendants' vehicle certification testing and monitoring. The scope of the ICA's effort included the review of documents setting forth the referenced policies and procedures, meetings with responsible personnel to discuss the interpretation and application of those policies, walk-throughs of the VW Defendants' compliance with those policies, and observation of associated functions and operations at the VW Defendants' facilities.

For the obligations related to the Group Steering Committees, the ICA observed numerous GSC meetings addressing compliance with California laws and regulations. This included the majority of the meetings of the GSC–CO₂ addressing the VW Defendants' compliance with California greenhouse gas regulations. Additionally, the ICA observed meetings of the GSC on Emissions Legislation and Fleet Compliance, during which GSC members addressed issues related to compliance with California emissions standards.

For the TARs obligations, the ICA confirmed that a number of TARs reviewed by the ICA expressly reference responsibility for compliance with California laws and regulations. For the Golden Rules audits, the ICA reviewed all of the Golden Rules audit reports prepared by the Internal Audit departments.

For the third-party EMS audit, the ICA reviewed audit planning documents, which included documents indicating that the independent auditor's list of relevant U.S. laws and regulations included California laws and regulations. The ICA also observed the BV site visit to TCC, and reviewed other documents from the EEO Environmental Management System and confirmed that they reference California laws and regulations.

c) Evaluation of Response

Based on the ICA's review to date, the VW Defendants have demonstrated that their efforts to comply with their obligations under the Consent Decrees have applied a definition of U.S. laws and regulations that extends to, and is inclusive of, California laws and regulations.

7. Distinguishing Between VW GOA and GOA Chattanooga

When describing the VW Defendants' efforts to comply with their obligations under the Consent Decrees, distinguish between efforts by or involving VW GOA and efforts by or involving GOA Chattanooga.

a) Description of VW Defendants' Response

In order to comply with this Recommended Action, the VW Defendants used a two-pronged approach. Internally, they sought to improve communication between VW GOA and GOA Chattanooga. Externally, they proposed a communication protocol between themselves and the ICA for use in the ICA's requests for information.

To enhance internal communication between VW GOA and GOA Chattanooga, the VW Defendants adopted a number of new policies and procedures, including: (1) establishing an on-site lead at GOA Chattanooga for issues involving the ICA and Group PMO; (2) designating different individuals as "subject-matter experts" at VW GOA and GOA Chattanooga in a number of different areas, specifically Human Resources, Compliance, Purchasing, Risk Management, Quality Assurance, and the Environment; and (3) setting up and strengthening internal communication between the leadership of VW GOA and GOA Chattanooga.

The communication protocol proposed by the VW Defendants consisted of two components. First, the protocol proposed a common vocabulary between the ICA and the VW Defendants that differed depending on what information the ICA requested. Second, the protocol included explanations as to how the VW Defendants would handle ICA

requests for information involving VW GOA and GOA Chattanooga in different scenarios.

b) Description of ICA Audit Activities Regarding Response

For the EMS audits, the VW Defendants differentiated between VW GOA and GOA Chattanooga in their Request for Quotations from potential independent auditors. The latter was noted as "optional" because that site does not conduct activities related to the product development processes. The 2017 audit procedures included site visits to "the VW GOA Engineering and Planning Center (EPC-E) and Chattanooga Operations LLC, both located in Chattanooga, Tennessee," to verify that both were out-of-scope of the EMS assessments.

GOA Chattanooga is not currently involved in product development or certification, and therefore it was not necessary for the VW Defendants to address GOA Chattanooga in their efforts related to the Consent Decrees' other product development process obligations. The ICA therefore did not conduct audit procedures under this Recommended Action for those obligations.

During the period covered by this report, the ICA did not observe any instances in which the VW Defendants failed to distinguish between the two entities at issue and the distinction was necessary for the ICA's review.

c) Evaluation of Response

The VW Defendants have sufficiently distinguished between VW GOA and GOA Chattanooga for purposes of evaluating compliance with the Consent Decrees, particularly given that GOA Chattanooga is not relevant for the product development process or EMS obligations.

I. NEW RECOMMENDED ACTIONS TO ACHIEVE COMPLIANCE

Pursuant to paragraph 28(c) of the U.S. Consent Decree and paragraph 28(b) of the California Consent Decree, the ICA recommends the following actions by the VW Defendants to achieve compliance with the Consent Decrees. The Recommended Actions do not indicate current violations of the Consent Decrees and are not intended to be final assessments of compliance; rather, they are intended to promote prospective compliance by the VW Defendants. The ICA will evaluate the VW Defendants' responses to these Recommended Actions during the period covered by the ICA's third and final report.

2.1. <u>Analysis of Golden Rules Implementation</u>

In the draft of the ICA's Second Annual Report dated May 17, 2019, the ICA noted that not all of the VW Defendants had completed updates to their November 2018 response to Recommended Action 2. As such, the draft included a Recommended Action that those entities deliver their updates no later than June 30, 2019. The ICA received the updates by that

date, and will include an evaluation of the updates in the ICA's Third Annual Report.

5.1. <u>Process for Identification of Relevant Whistleblower Alerts</u>

In connection with their third and final annual report, the VW Defendants should ensure that the recent actions they have taken to improve effectiveness in this area (as reported in their second Annual Report by VW Defendants) are sufficient, together with the process already in place, to identify and report all Whistleblower alerts relating to violations of U.S. and California environmental laws and regulations.

8. <u>Procedures to Facilitate ICA's Review of Annual Report by VW</u> <u>Defendants</u>

The Annual Report by VW Defendants and the draft of this report are due on the same day, which increases the difficulty faced by the ICA in effectively commenting on the contents of VW Defendants' report. To facilitate the ICA's review of the Annual Report by VW Defendants prior to its submission to DOJ and the California authorities, the VW Defendants should implement procedures for periodically providing data and analysis of that data, including draft report content, compiled on a rolling basis, to the ICA during the period covered by the third and final Annual Report by VW Defendants. For example, regular reporting of data and analysis of Whistleblower system case-tracking of relevant alerts would aid the ICA's review. This is true of all areas in which reporting is required. These procedures should include determining and providing report content, data, and analysis on a regular basis, as prepared by the VW Defendants and requested by the ICA, rather than waiting until the period of time covered by the VW Defendants' report has ended.

After the ICA issued the draft Second Annual Report, the VW Defendants indicated that they intend to provide the ICA with regular updates reflecting available information, on at least three occasions: September 30, 2019, December 20, 2019, and February 14, 2020. The ICA will continue to track the VW Defendants' response to this Recommended Action, and will evaluate the VW Defendants' complete plan for the response when it is provided.

9. <u>Assessment of Effectiveness of Implemented Measures in</u> <u>Promoting Compliance with U.S. and California Environmental Law</u>

In connection with their third and final annual report, the VW Defendants should develop a uniform approach to the assessments of effectiveness required by U.S. Consent Decree Paragraph 19. The approach should be consistent with the Paragraph 19 requirement, and should consider specific available evidence (such as the results of the VW Defendants'

Governance, Risk, and Compliance ("GRC") processes and results of any audits relevant to the assessment) related to the numerous measures taken by the VW Defendants to comply with their Consent Decree injunctive relief obligations.

After the ICA issued the draft Second Annual Report, the VW Defendants indicated that they are developing a process to address this concern, and intend to provide the ICA with regular updates reflecting available information, on at least three occasions: September 30, 2019, December 20, 2019, and February 14, 2020. The ICA will continue to track the VW Defendants' response to this Recommended Action, and will evaluate the VW Defendants' complete plan for the response when it is provided.

10. Process for Reporting Certain Recorded Risks

In connection with the third and final Annual Report by VW Defendants, and specifically the process for reporting certain recorded risks in that report as required by U.S. Consent Decree Paragraph 19, Group Risk Management should (1) perform its own analysis of the scope of entities considered relevant for Consent Decree reporting requirements; and (2) ensure the accuracy of the reporting of countermeasures taken.

J. INJUNCTIVE RELIEF RELATED TO THE PRODUCT DEVELOPMENT PROCESS

The injunctive relief imposed on the VW Defendants by the Consent Decrees included a number of changes to the companies' "Product Development Process," which the Consent Decrees defined as the process to "manage the development of motor vehicles, including research and development, quality assurance, and compliance with U.S. environmental laws for vehicles marketed and sold by [VW Defendants] in the United States." As noted above, and in the First Annual Report, the ICA continues to plan and conduct audit procedures, and will do so with respect to these obligations throughout the three-year audit term. Also, as noted above, the ICA did not re-perform work conducted by third parties.

1. Segregation of Duties Between Product Development and Certification Testing (U.S. CD ¶ 13; Cal. CD ¶ 12)

a) Activities by the VW Defendants

(1) Organizational Separation of Product Development from Certification Testing and Monitoring

During the period covered by this report, the VW Defendants maintained a Certification Group that was organizationally separate from product development and was responsible for ensuring that the VW Defendants' certification and in-use performance testing complied with the regulations of the U.S. Environmental Protection Agency ("EPA") and CARB.

(2) Changes to the Certification Group

The Consent Decrees set forth specific Certification Group responsibilities, which were described in detail in the ICA's First Annual Report.

Responsibility for In-Use Verification Program ("IUVP") testing – a certification requirement unique to the U.S. which involves the verification of emissions performance of vehicles in actual use for up to five years – was reassigned during the period covered by this report. IUVP responsibilities had been split between VW GOA Quality Assurance and EEO. Following discussions with the ICA and a subsequent review by VW Defendants of their IUVP program, the VW Defendants brought their program into line with other major automotive manufacturers by assigning exclusive responsibility for IUVP-related activities to EEO, which is their U.S. certification department.

As of September 2018, primarily due to this exclusive assignment to EEO, VW GOA Quality Assurance was no longer a part of the VW Defendants' Certification Group.

b) ICA Audit Activities and Evaluation of VW Defendants' Activities

(1) Organizational Separation of Product Development from Certification Testing and Monitoring

The VW Defendants made significant efforts designed to address the segregation of product development from certification testing and monitoring, as well as the adoption and implementation of policies, procedures, and practices to comply with U.S. and California laws and regulations related to vehicle certification and emission standards. Moreover, the VW Defendants continue to engage in efforts intended to accomplish the latter objective going forward. The ICA undertook numerous activities as part of this assessment.

To begin with, the ICA obtained and reviewed updated organizational charts and corresponding budget authority for the Development and Technical Conformity departments involved in certification testing and monitoring.

The ICA also conducted on-site meetings and walk-throughs and met with relevant personnel at the management and operational levels within the Technical Conformity and Development departments – including Powertrain Development – to confirm and corroborate the segregation of duties reflected in the organizational charts.

Additionally, the ICA assessed the VW Defendants' emissions laboratories responsible for the generation of all emissions certification data for U.S.-directed vehicles, including Wolfsburg, Germany; Ingolstadt, Germany; Neckarsulm, Germany; and Oxnard, California. At these laboratories, the ICA observed laboratory operations, procedures, and emissions testing on actual vehicles in real time. The ICA also conducted numerous meetings with the business units bearing responsibility for program management and program readiness assessment for vehicles within the same class (*i.e.*, small, compact, mid- and full-size, and electric).

The ICA also verified the roles and observed the function of relevant departments interpreting regulatory requirements and providing those interpretations to both the Technical Conformity and Development departments.

(2) Formation of the Certification Group

During the period covered by this report, the ICA confirmed that the VW Defendants conducted their own emission certification testing for both production and inuse vehicles at sophisticated testing facilities, and that they have developed and employ substantive policies and procedures governing such testing. This was accomplished by observing actual vehicle preparation, vehicle access control, and testing at the abovereferenced VW Defendant emissions-testing facilities, including review of applicable procedures and control measures, confirming the nature and type of testing software and hardware employed, and observing the generation of test data and verifying that it was accurately recorded, stored in a secure and restricted-access document management system, and transferred to departments responsible for compiling the certification documentation submitted to regulatory agencies. The ICA also reviewed test operator training records and data validation tests.

The ICA held extensive meetings with VW Defendant personnel responsible for the execution and monitoring of these processes, and reviewed numerous external audit reports and test site commissioning efforts. In addition, the ICA assessed the VW Defendants' planning and execution of vehicle testing.

The ICA reviewed documentation related to numerous key procedures, including a complete emissions certification application from both VW Passenger Cars and AUDI.

2. Group Steering Committees (U.S. CD ¶ 14; Cal. CD ¶ 13)

a) Activities by the VW Defendants

(1) Establishment of Group Steering Committees

In 2018, the Group Steering Committee on Emissions Legislation and Fleet Compliance (GSC–EL&FC) and the GSC on Vehicle Compliance (GSC–VC) each met five times. The GSC on CO_2 (GSC– CO_2) met eight times. The ICA's efforts focused on the handling of U.S. -related compliance issues at all three GSCs.

(2) GSC Rules of Procedure

During the time period covered by this report, the GSCs made minor amendments to their Rules of Procedure.

b) ICA Audit Activities and Evaluation of VW Defendants' Activities

During the time period covered by this report, the ICA observed the majority of the meetings conducted by each of the GSCs, and evaluated whether they were operating in accordance with their respective Rules of Procedure.

(1) Establishment of Group Steering Committees

The ICA's activities included: obtaining and reviewing documentation regarding coordination between GSC members serving on more than one GSC; developing an understanding through document review and inquiry of relevant individuals about how fleet-wide compliance targets are generated, verified, and documented by the GSCs; inquiring as to how the three GSCs interact with one another on issues of process and substance; and obtaining and reviewing changes and amendments to GSC composition. Effective March 5, 2019, the leadership of the GSC–EL&FC transitioned to a new chair. Similarly, effective April 1, 2019, leadership of the GSC–CO₂ transitioned to a new co-chair.

In addition, the ICA obtained and reviewed documentation about the pre- and post-clearance processes for the three GSCs. The GSCs have extensive "pre-clearance" processes, which involve corresponding Group and brand committees and require vetting of issues with the Group, brands, and regions several weeks before the GSC meetings occur. For instance, one of the pre-clearance processes for the GSC–EL&FC involves a monthly meeting with North American Regional representatives to discuss and evaluate regulatory and compliance issues specific to North America, and in particular the U.S. Some of the issues discussed at these meetings include the regulatory interpretation used for U.S. exhaust emission regulation for certain model years, CO₂ requirements, and provincial zero-emission-vehicle mandates. The "pre-clearance" process culminates with discussions, recommendations, and voting at the GSC meetings.

(2) GSC Rules of Procedure

The ICA obtained and reviewed amendments to the Rules of Procedure, as well as the timeline for when those changes were proposed and approved. The ICA verified that amendments were themselves approved in accordance with the Rules of Procedure.

In the areas reviewed by the ICA, the GSCs generally complied with their respective Rules of Procedure. For example, they adhered to quorum requirements, voted on resolutions or recommendations, and escalated issues.

As one minor exception, during the period covered by this report the ICA observed the VW Defendants purchase greenhouse gas credits designed to enable the VW Defendants to comply with regulatory fleet requirements. The credit purchase initiated by senior management did not strictly follow the customary course of review observed by the GSC–CO₂ prior to approval. While this did not appear to have any negative regulatory compliance implications, this appears to have been a departure from the customary process.

VW GOA representatives – who are typically from EEO's Auburn Hills, Michigan office – experienced logistical challenges with respect to their participation in GSC meetings. Time-zone differences, remote participation by videoconference, and the addressing of U.S.-related issues in special meetings outside of regularly scheduled GSC meetings all presented challenges. However, EEO participated in the resolution of U.S.-related issues on a number of occasions.

3. Portable Emissions Measurement System Testing (U.S. CD ¶ 15; Cal. CD ¶ 14)

a) Activities by the VW Defendants

(1) Independent Third-Party Emissions Tester

Under the Consent Decrees, the VW Defendants were required to retain an independent third-party to: (1) conduct annual PEMs testing according to a test plan approved by EPA and CARB; and (2) submit a published report of the results of that testing to those agencies for their review. As VW Defendants did for model year 2017 PEMS testing, VW Defendants used University of California, Riverside ("UC-R") as its third-party emissions tester to conduct all Consent Decree PEMS testing for model year 2018.

In the ICA's First Annual Report, the ICA described a disclosed financial relationship between UC-R and Ramboll Environ US Corporation on behalf of VW GOA. The VW Defendants described the contractual relationship, commenced on July 5, 2017, as "confidential retention by Ramboll Environ US Corporation on behalf of VWGoA for purposes of conducting PEMS testing in connection with certain civil litigation matters." The VW Defendants developed a "Two-Side Ethical Wall Agreement" that required UC-R "to utilize different personnel to work on PEMS testing under the 3PCD/CA 3PCD and the litigation defense matter." On March 11, 2019, the VW Defendants informed the ICA that "UCR's work performing civil defense PEMS testing for Ramboll Environ ended in Q2 2018."

(2) Test Plan

On July 3, 2018, the VW Defendants submitted to EPA and CARB a supplement to the PEMS test plan approved by EPA on October 5, 2017. The supplement added an additional test group due to changes in production plans. The supplemental test plan provided for PEMS testing on 11 test groups (nine to represent 33% of the EPA-certified groups, and two to represent the models with the highest projected sales).

The VW Defendants reported in the test plan that the test groups selected covered the full range of configurations of emission control systems in the VW Defendants' lightduty vehicles for the 2018 model year, and did not include any test groups that were certified using carry-over emissions data.

(3) Testing

Pursuant to paragraph 14(c)(iii) of the California Consent Decree, the VW Defendants provided timely written notice to CARB before commencing Model Year 2018 PEMS testing.

For the 2018 model year, the deadline for completing PEMS testing was September 30, 2018. Model year 2018 testing was conducted between July 16, 2018 and August 19, 2018. UC-R reported that it conducted 2018 model year testing in accordance with the EPA-approved test plan, and "tested, configured, and operated [all vehicles] independent of VW operations." UC-R also reported that PEMS testing was conducted under real-world driving conditions over a range of ambient temperatures and pressures. In accordance with the test plan, UC-R installed the PEMS units and AVL List GmbH maintained and calibrated them.

(4) **PEMS Summary Report**

The deadline for submitting a PEMS summary report ("PEMS Summary Report") to EPA and CARB was November 30, 2018, and the deadline for publicly posting the PEMS Summary Report was December 21, 2018. On November 28, 2018, the VW Defendants submitted to EPA and CARB a Model Year 2018 PEMS Summary Report authored by UC-R. On December 17, 2018, the VW Defendants posted the report (redacted of vehicle identification numbers to protect owner privacy) in both English and German to the public website, <u>www.vwcourtsettlement.com</u>. The test groups in the PEMS Summary Report matched those listed in the EPA-approved test plan. U-CR reported that "the emissions presented [were] representative of valid in-use testing."

(5) California Consent Decree ¶ 14(g)

The VW Defendants notified the ICA that as of March 11, 2019, CARB had not submitted any requests pursuant to California Consent Decree paragraph 14(g) to discuss the potential presence of unauthorized AECDs or defeat devices. In the absence of such a request, the meet-and-confer and other requirements of this paragraph did not require additional action by the VW Defendants.

b) ICA Audit Activities and Evaluation of VW Defendants' Activities

During the time period covered by this report, documents obtained and reviewed by the ICA included: (1) a copy of the supplemental PEMS test plan submitted to EPA; (2) a copy of the notice to CARB providing notice before commencement of MY 2018 PEMS testing; and (3) a copy of the MY 2018 PEMS Summary Report posted to the VW court settlement website.

Additionally, the ICA observed PEMS vehicle preparation and testing from start to finish for one test group at VW Defendants' Test Center California facility and at UC-R. During this observation, the ICA confirmed adherence to the driving conditions and other specifications in the EPA-approved test plan. The ICA also documented the presence of a label on the windshield of the PEMS test vehicles indicating the vehicles were PEMS test vehicles that should not be modified.

The ICA concurs with UC-R's statement in the PEMS Summary Report that "the emissions presented [were] representative of valid in-use testing" methodology. The ICA notes that, while there are no specific EPA- or CARB-issued PEMS emissions standards, the regulations do establish methodologies regarding how to conduct valid emissions tests, including PEMS tests. Those methodologies address equipment minimum specifications, calibrations, preparation for field testing, verifications, and emissions calculations. The ICA's observation of model year 2018 PEMS testing and its review of the PEMS Summary Report did not reveal deviation from these established methodologies or the EPA-approved test plan. Furthermore, according to the VW Defendants, neither EPA nor CARB expressed any negative feedback, criticisms, or concerns with respect to the testing, the test results, or UC-R's PEMS Summary Report.

4. Definition of Managers' Responsibilities (U.S. CD ¶ 17; Cal. CD ¶ 16)

a) Activities by the VW Defendants

As detailed in the First Annual Report, the VW Defendants defined "tasks, authorities, and responsibilities" ("TARs") for certain managers, as required by the Consent Decrees. The VW Defendants continued to review and revise these TARs at least once a year. TARs are revised in response to restructuring or if the responsibilities of the position change. All revisions are tracked and documented. The VW Defendants commenced the process of performing internal audits with respect to the TARs for certain managers. At the end of the period covered by this report, audit fieldwork had been completed for VW AG and AUDI, and draft reports were in the process of being finalized. Fieldwork for VW GOA took place in May 2019.

b) ICA Audit Activities and Evaluation of VW Defendants' Activities

The ICA obtained copies of all revised TARs and reviewed a list of changes made since the First Annual Report. The ICA has not identified instances where the VW Defendants failed to properly update TARs. While the VW Defendants lacked descriptions for many positions prior to the Consent Decrees, these TARs now provide a written record that clearly assigns responsibilities to the holders of over a thousand relevant positions, and are structured to allow a replacement employee to use them to understand his or her responsibilities with respect to compliance with U.S. and California environmental laws. The ICA is in the process of evaluating the results of the internal audits of the TARs for VW AG and AUDI, and will evaluate the internal audit for VW GOA once completed.

5. Obligations Regarding the "Golden Rules"

a) Activities by the VW Defendants

(1) Implementation of the Golden Rules (U.S. CD ¶ 16; Cal. CD ¶ 15)

As discussed in the First Annual Report, the VW Defendants have taken the position that their Consent Decree obligation to "implement" the Golden Rules by October 10, 2017 called for "[a]t a minimum, controls, rules of procedure, and tasks authorities and responsibilities" to be "documented" for the process involving engine control unit software development, emissions type identification, and Product Safety Committees by that date. The VW Defendants have further stated that "[i]n the majority of instances," the documents that contained this information were "process standards, process descriptions (including swimlanes), work instructions, escalation rules, formal Rules of Procedure, and internal control matrices."

To the extent that any of this documentation was still in draft form as of October 10, 2017, the VW Defendants have taken the position that the Golden Rules were implemented if the business units were in fact carrying out the policies and procedures set forth in the draft documentation.

Although the VW Defendants also established the Golden Rules for the software development process for transmission control units ("TCUs") and other control units ("OCUs"), they have asserted that TCU- and OCU-related Golden Rules implementation was not required by the Consent Decrees. The VW Defendants have also interpreted the Consent Decrees to mean that the implementation requirement only applied to ECUs for vehicles marketed and sold in the United States.

The VW Defendants have undertaken considerable and well-coordinated efforts to comply with the injunctive relief obligations related to Golden Rules implementation, as evidenced, for example, in the voluminous and comprehensive process documentation developed by the business units. During the time period covered by this report, the business units took the actions necessary to establish the requisite policies, Rules of Procedure, process standards, work instructions, and other process documentation to implement the Golden Rules across the relevant business units. This effort was corroborated, for example, by the Golden Rules follow-up audits at AUDI, where no action items have been identified for the design assessment of the Golden Rules, indicating that the Golden Rules have been established. The business units also updated and revised the process documentation.

(2) Implementation of Golden Rule 5

As mentioned above in connection with Recommended Action 2, the VW Defendants faced particular challenges in implementing Golden Rule 5. Golden Rule 5 governs the processes for identifying and addressing non-commissioned software which the VW Defendants receive from third-party software suppliers. In the automotive industry, "non-commissioned" software is included in third-party suppliers' software code even though it was not specifically requested by the auto manufacturer. Because the software is proprietary to those suppliers, the VW Defendants engaged extensively with them in developing processes for complying with Golden Rule 5. As part of those efforts, the VW Defendants renegotiated existing agreements with the suppliers to impose additional standards and requirements in the change management process. Those requirements included adherence to automotive industry standards for software best-practices (known as "ASPICE"), periodic audits of the suppliers' software change management processes by certified VW Defendant ASPICE auditors, and the right to review software packages modified to remove undesired non-commissioned software functions.

VW Defendants have stated that, as of October 10, 2017, they had a "comprehensive concept" in place for Golden Rule 5, which consisted of draft process documentation, including Rules of Procedure. At that time, the VW Defendants also implemented a Golden Rule 5 pilot project for ECU development for the North American Region. The pilot was extended to gasoline and hybrid projects in Europe and other markets around the world in April 2018. In selecting which vehicle projects to incorporate as part of the pilot, the VW Defendants focused on new engine projects where they had exclusive development responsibility (*i.e.*, no sub-contractors) and high market-volume scope. In June 2018, the pilot was extended to diesel projects. Based on the lessons learned from that pilot phase, the processes, Rules of Procedure, and work instructions were revised. The VW Defendants did not release the final process documentation, including work instructions, Rules of Procedure, and internal controls, for implementing Golden Rule 5 for ECUs, until August 2018.

The VW Defendants reached agreements with their ECU software suppliers incorporating these additional standards and requirements, and at the end of the period covered by this report were negotiating similar agreements with their TCU software suppliers, which are expected to be finalized this year.

Since the August 2018 release of the process standard, the VW Defendants have also experienced some difficulty in obtaining "special properties" information (including software functions relevant to functional safety, emissions strategies, or on-board diagnostics) relating to third-party software changes. Such information is necessary for identifying auxiliary emissions control devices ("AECDs"), which must be disclosed to regulatory authorities in order to obtain EPA-issued Certificates of Conformity and CARB-issued Executive Orders. The August 2018 release included a work-around for this issue. The VW Defendants took formal steps to secure that information from the software suppliers through the implementation of revised process documentation by April 2019.

To evaluate the effectiveness of the process developed to implement Golden Rule 5, the VW Defendants also commenced audits of their third-party software suppliers to ensure that their change management processes meet their ASPICE standards and contractual requirements. The VW Defendants finalized their process standard for these software supplier audits. The ICA reviewed the initial audit reports and will continue that effort.

(3) Employee Training (U.S. CD ¶ 16; Cal. CD ¶ 15)

By the end of 2018, the VW Defendants developed and conducted training programs for every ECU- and TCU-related Golden Rule, with the exception of Golden Rule 5, for which training was still under development. The VW Defendants are also in the process of developing training programs for OCUs.

(4) Monitoring Golden Rules Implementation Using the GRC Process (U.S. CD ¶ 16; Cal. CD ¶ 15)

The Consent Decrees required the VW Defendants to monitor the implementation of the Golden Rules through their Governance, Risk, and Compliance ("GRC") process, the VW Defendants' process for identifying and monitoring key systemic and process risks. As discussed in the First Annual Report, the VW Defendants began with a pilot project that developed countermeasures and management controls to address the risks of non-compliance with three Golden Rules: 3, 4, and 13.

After the successful completion of the pilot project, the VW Defendants established and recorded the risks, countermeasures, and management controls for all of the remaining Golden Rules, which amounted to 65 risks, 228 countermeasures, and 371 management controls. With respect to Golden Rules 1 through 7, which deal with the software development process, VW Passenger Cars developed management controls for the software development process for ECUs, TCUs, and OCUs, whereas AUDI solely focused on ECUs and TCUs. After consultation with and approval by the respective business units, the Risk Management departments at Group and AUDI entered the management controls into the VW Defendants' RMS/ICS Compliance Reporting System ("RICORS") during the "recording phase" in the second quarter of 2018, which is when the annual update to RICORS occurs.

Another integral component to the GRC process is the "testing phase," when the countermeasures and management controls are tested for effectiveness, either through self-assessments, peer reviews, or external assessments. For the effectiveness testing of the countermeasures and management controls, Group and AUDI each hired a separate auditing firm to assess the design and test the operating effectiveness of the management controls for control unit software development, Emissions Type Identification, and Product Safety Committees.

AUDI commissioned its external firm "to investigate and report on the controls defined by AUDI so that AUDI management can form an opinion regarding the effectiveness of these controls." To carry out this objective, the firm agreed to "investigate the suitability of the countermeasures to cover risks and [] conduct control tests for the management controls using random samples." The contract made clear that the firm "will conduct the control tests as an 'inspection[,]" and that its work "do[es] not constitute an audit or an audit review" where it would "make an overall assessment."

The testing addressed the following aspects of the countermeasures and management controls: documentation, adequacy, operating effectiveness in the case of a management control, and an overall result, *i.e.*, confirmation of effectiveness. To complete its evaluation, the auditing firm hired by AUDI typically had one meeting with the applicable business unit, in which that business unit described its countermeasures and management controls, as well as the related processes and risks related those countermeasures and management controls. Then, based on the information it collected and meetings conducted, the firm rated each AUDI countermeasure and management control. For the operating effectiveness of management controls, 61% of the management controls were reported as effective, 28% as ineffective, and 11% as not assessable.

Similarly, the auditing firm hired by VW AG assessed the adequacy of the countermeasures and management controls and the operational effectiveness of the management controls. It reviewed the Golden Rules Handbook, conducted interviews with the business units, and reviewed the management control evidence. The firm published its findings in January 2019, finding that the countermeasures and management controls were largely adequate in design. For the operating effectiveness of management controls, 34% of the management controls were reported as effective, 34% as ineffective, and 32% as not assessable. The countermeasures and management controls for Golden Rule 5 were not incorporated in the assessment.

The Risk Management departments at Group and AUDI record the findings of these external assessments in RICORS, and discuss with the relevant departments corrective measures based on those findings. The progress of these corrective measures is also tracked in RICORS.

(5) Definition of TARs for Business Units, Committees, and Boards (U.S. CD ¶ 16; Cal. CD ¶ 15)

As part of the Golden Rules implementation required by the Consent Decrees, the VW Defendants defined the tasks, authorities, and responsibilities ("TARs") for the business units, committees, and boards involved in the Product Development Process. The VW Defendants review and revise the TARs within technical development at least once per year. The updates provided to the ICA have been primarily focused at VW GOA as positions have been changed or created.

(6) Internal Audit of Golden Rules Implementation (U.S. CD ¶ 18; Cal. CD ¶ 17)

(a) Status of Action Items from Original Golden Rules Audits

To fulfill the Consent Decree obligation to conduct "an internal audit to track the implementation" of the Golden Rules, the VW Passenger Cars and AUDI Internal Audit departments conducted 17 Golden Rules audits ("original Golden Rules audits") for ECU, TCU, and OCU software development, Emissions Type Identification, and Product Safety Committee at VW Passenger Cars, VW GOA, and AUDI, by April 2018. These

audits were discussed in detail in the First Annual Report. As noted there, each of these audits received red, red-yellow, or yellow ratings (known as "traffic lights"), meaning that deficiencies were identified in the design of the policies and procedures, their operating effectiveness, and/or the execution of their management controls. The scope of these audits extended beyond the Consent Decree requirements. Each audit report issued "action items" that the technical department was required to remedy by a specified deadline.

As mentioned above with respect to Recommended Action 3, the Internal Audit departments issued 433 action items in their original Golden Rules audits for ECU, TCU, and OCU software development, Emissions Type Identification, and Product Safety Committees. Many of these action items had associated remedial deadlines before June 2018. To remedy those action items, the technical departments submitted supporting documentation to the Internal Audit departments. The ICA understands that five of the action items remained open at the end of the period covered by this report.

(b) Follow-Up Golden Rules Audits

Pursuant to Internal Audit procedures, audit reports that receive a red traffic light score trigger a follow-up audit. Thus, the original Golden Rules audits that received red traffic light scores required follow-up audits. The Internal Audit departments at VW Passenger Cars and AUDI, however, decided to conduct follow-up audits for all ECU and TCU software development, Emissions Type Identification, and Product Safety Committee audits, including those that received a red-yellow or yellow traffic light score. VW Passenger Cars also decided to conduct follow-up audits for OCU software development. AUDI has yet to finalize the extent to which they will conduct those audits.

The VW Defendants are conducting the Golden Rules follow-up audits per their internal audit policies and discretion, and not pursuant to any Consent Decree obligation. As these follow-up audits incorporate the scope and action items of the original Golden Rules audits, they go beyond the scope of the Consent Decrees' requirements and assess the design, effectiveness, and internal controls of each Golden Rule.

For VW GOA, VW Passenger Cars Internal Audit commenced the fieldwork for the Emissions Type Identification and Product Safety Committee follow-up audits in June 2018. AUDI began its fieldwork for ECU and TCU software development, Emissions Type Identification, and Product Safety Committee follow-up audits in July 2018 and concluded in November 2018. VW Passenger Cars started its fieldwork for ECU and TCU software development and Emissions Type Identification in January 2019 and concluded in March 2019. The fieldwork for the two OCU software development audits commenced in April 2019.

The VW Passenger Cars and AUDI Internal Audit departments published the follow-up audit reports for Emissions Type Identification and Product Safety Committee at VW GOA, and ECU and TCU software development, Emissions Type Identification, and Product Safety Committee at AUDI. At the end of the period covered by this report, the Internal Audit department at VW Passenger Cars was still in the process of conducting Golden Rules follow-up audits for VW Passenger Cars and has not yet issued any of the related audit reports.

The following table presents the results of those follow-up audits. As shown here, the VW Defendants utilize a "traffic light" scoring system as a standard audit assessment approach. Each of the audit reports scored the results of the entire audit, as well as each of the Golden Rules, with a "traffic light" score. The scores indicate the criticality of the internal audit conclusions: green (low criticality); yellow (medium criticality); red-yellow (high criticality); and red (very high criticality). The results of the follow-up audits thus far indicate that Emissions Type Identification at AUDI and VW GOA comprise the areas with the highest criticality.

Audited Company	Year	Report Issue Date	Audit Title	Golden Rules Audited	Cockpit Traffic Light
VW GOA (including GOA Chattanooga)	2018	10/22/2018	Follow-Up Golden Rules APS and Emission Type Identification	9 – 11	•
AUDI		12/19/2018	Follow-Up Software Development ECU & TCU	1 – 7	•
	2018	11/14/2018	Follow-Up Escalation Management within the Product Safety Committee	11 – 13	•
		04/11/2019	Follow-Up Emissions Type Identification	8-10	•

b) ICA Audit Activities and Evaluation of VW Defendants' Activities

(1) Implementation

During the period covered by this report, the ICA reviewed extensive documentation produced by the VW Defendants outlining their efforts to implement the Golden Rules by the Consent Decree deadline of October 10, 2017. The ICA observed that the VW Defendants had updated their process standards, Rules of Procedure, and other process documentation related to the Golden Rules. The ICA met with the VW Defendants to evaluate how they attempted to address the requirement to implement the Golden Rules, and their position regarding the Golden Rules' applicability to various control units. The ICA also conducted meetings with the VW Defendants to assess the establishment and current status of Golden Rules-related processes, policies, and procedures, and to understand any Golden Rules-related challenges faced by the business units.

Despite the initial challenge of fully establishing the process for Golden Rule 5, based on the ICA's preliminary review, the VW Defendants have now designed and

implemented a robust set of procedures to address the approval of non-commissioned software functions from third-party software suppliers.

Given the challenges and delays in implementing Golden Rule 5, the ICA initiated a number of conversations with the VW Defendants to discuss whether Golden Rule 5 was implemented by the Consent Decrees' deadline of October 10, 2017. In these discussions, the VW Defendants have maintained that they have complied with the implementation obligation in all respects. The VW Defendants assert that the "comprehensive concept" – which included draft process documentation (including Rules of Procedure) and North American Region pilot projects – was established as of October 10, 2017, and therefore that Golden Rule 5 was "implemented" as of that date.

(2) Training

During the period covered by this report, the ICA also observed that the VW Defendants have established Golden Rules training programs and continued to conduct regular trainings.

The ICA reviewed the VW Defendants' Golden Rules training documents. The ICA also met with VW Defendant training departments to discuss the development and format of the Golden Rules training programs. In addition, the ICA observed in-person Golden Rules trainings. Finally, the ICA reviewed the on-boarding documents and materials provided to new employees.

(3) Monitoring

During the period covered by this report, the ICA met with Group Risk Management and AUDI Risk Management to discuss the monitoring of Golden Rules implementation through the GRC process and the assessments completed by the thirdparty auditing firms. The ICA also reviewed the management controls with each of the responsible technical departments to understand how each management control operates, viewed examples of the resulting underlying documents, and confirmed that the information recorded in RICORS reflected how the respective technical departments actually carry out the management controls. The ICA noted that there were numerous discrepancies, particularly with respect to the frequency with which the management controls were performed and the description of the evidence that proved the management control was performed. The VW Defendants represented to the ICA that these discrepancies will be remedied during the next annual recording phase of the GRC process in 2019, and that necessary corrections will be documented in the RICORS database in the second quarter of 2019.

To evaluate the scope of the third-party assessments, the ICA met with the two external auditing firms commissioned to review the design and operating effectiveness of the management controls. They had interviewed the technical department personnel and tested whether each management control was accurately described in RICORS. They had also reviewed on a sample basis evidence of the performance of the management controls. The firms were not asked to re-test management controls.

(4) TARs

The ICA also requested and reviewed any updates that were made to TARs relevant to Golden Rules implementation. These updates were almost entirely focused on VW GOA.

(5) Internal Audits of Golden Rules Implementation

During the period covered by this report, the ICA focused on evaluating the Golden Rules follow-up audits. The ICA met with the Internal Audit departments to review each of the original Golden Rules audit reports in order to understand the process followed, findings, and action items. During these meetings, the ICA noted that the Internal Audit departments' audit methodology and processes were thorough and robust.

The ICA also observed the fieldwork for the follow-up audits, and conducted various meetings with the internal auditors to understand their initial impressions and observations. In addition, the ICA observed several of the meetings the Internal Audit departments held with the technical departments to discuss the draft findings from the audit fieldwork and ensure that the internal auditors had properly understood the technical departments. The ICA also met with the AUDI Internal Audit Department to review the follow-up audit reports related to ECU and TCU software development and the Product Safety Committee.

In addition to the Golden Rules follow-up audits detailed in the table above, the ICA also observed follow-up audits at VW Passenger Cars for ECU, TCU, OCU software development, Emissions Type Identification, and Product Safety Committees. The final reports for those audits are forthcoming.

Without having the results of those follow-up audits, the ICA cannot yet fully assess what the results convey about the current status of implementation of the Golden Rules across all VW Defendants, as compared to the status at the time the original Golden Rules audits were completed.

Based on the results of the AUDI Golden Rules follow-up audit reports, AUDI has made progress, as follows:

- For ECU/TCU software development, the results went from a combined yellow/red-yellow rating to a combined yellow rating, with the number of action items decreasing from a combined 26 to a combined 10. Notwithstanding the yellow rating and the associated action items, Internal Audit assessed the design of Golden Rules 1 through 7 as "implemented" or "generally implemented."
- For Emissions Type Identification, the rating remained at a red-yellow score, indicating that further remediation is still necessary. However, the number of action items decreased from 44 to 33. Despite the red-yellow rating and associated action items, Internal Audit assessed the

implementation of the design of Golden Rules 8 through 10 as having been "sufficiently completed."

• For the Product Safety Committee, the rating improved, changing from a yellow in the original audit to a green in the follow-up audit. The number of action items decreased from 7 to 1. In the follow-up audit report, Internal Audit did not provide an explicit assessment of whether Golden Rules 11 through 13 were implemented, but the overall results strongly indicate they were.

Progress was also noticeable at VW GOA. The VW GOA results changed from a red in the original audit to a red-yellow in the follow-up audit. Consistent with that rating improvement, the number of action items decreased from 53 to 20. According to the VW Defendants, only two Golden Rule minimum requirements (71 and 72 of Golden Rule 9) apply to VW GOA for purposes of compliance with the Consent Decrees. Of the 20 action items, only one relates to Golden Rule 9. With respect to design, the Internal Audit department concluded that "the overall process design was basically defined in an adequate manner."

K. THE WHISTLEBLOWER SYSTEM (U.S. CD ¶¶ 20 & 21; CAL. CD ¶¶ 19 & 20)

This section of the Second Annual Report describes the VW Defendants' efforts to comply with their Consent Decree obligations regarding a Whistleblower system. The ICA continues to plan and conduct audit procedures related to these obligations, and will do so throughout the three-year audit term.

1. Activities by the VW Defendants

a) Implementation and Maintenance of the Group Whistleblower System

At the time the ICA's First Annual Report was published, the VW Defendants were in the process of implementing Version 2.0 of their Whistleblower system in 705 inscope brands and local entities. The implementation used a risk-based approach for staging the roll-out, incorporating various factors including ownership, operational activity, number of employees, and gross revenue figures.

However, before the roll-out of Version 2.0 was completed, the VW Defendants started to develop another version of the Whistleblower system ("Version 3.0"). Among other changes, Version 3.0 modified the roles and responsibilities of key departments involved in the operation of the Whistleblower system, and revised the definition of what constitutes an alert involving a Serious Regulatory Violation. Version 3.0 was adopted by the Group Board of Management on August 21, 2018, with an effective date of September 1, 2018. AUDI revised its Whistleblower system policy in accordance with Version 3.0, effective October 1, 2018.

The deadline for implementation of Version 3.0 across the 705 in-scope brands and local entities was March 2019.

Another Whistleblower policy revision is planned for 2019 ("Version 4.0"). The revision is intended to further clarify the roles and responsibilities of certain departments in the Whistleblower system, further define the types of Whistleblower alerts constituting Serious Regulatory Violations, and incorporate additional processes for monitoring the overall Whistleblower system.

The Whistleblower system maintained by VW GOA covers all Whistleblower alerts related to VW GOA and GOA Chattanooga. During the period covered by this report, VW GOA continued to use its Ethics Hotline, which existed prior to the Group Whistleblower system, as a primary tool for receiving Whistleblower alerts related to alleged misconduct. In February 2019, VW GOA's Board of Directors approved Version 3.0, with an effective date of February 15, 2019. VW GOA never implemented Version 2.0, in light of the planned roll-out of Version 3.0.

During the period covered by this report, the VW Defendants had policies and procedures in place to collect, triage, and investigate allegations of misconduct, and issue related sanctions. However, the ICA identified several process improvements needed to enhance the effectiveness of the Whistleblower system, including the need for more clearly defined roles and responsibilities for the departments responsible for operating the system. The VW Defendants, through Group Internal Audit, performed audits of certain components of the VW AG, AUDI, and VW GOA Whistleblower systems. These audits concluded that the Consent Decree requirements regarding the Whistleblower system had been formally implemented. With respect to the case tracking and reporting obligation in the Consent Decrees, the audits concluded that the first Annual Report by VW Defendants included reports on cases related to violations of U.S. environmental regulations, but the audits did not reach any conclusions on the effectiveness of the case tracking and reporting process.

Numerous process weaknesses related to the overall Whistleblower system were identified in the audit reports. The VW Defendants are engaged in efforts to remediate these process weaknesses and to enhance the effectiveness of the Whistleblower system, including through the development and implementation of Version 4.0.

The VW Defendants undertook other activities to enhance the Whistleblower system, including: (1) implementation of the 24/7 Whistleblower hotline, which the VW Defendants represented was available in 17 languages, covering 97% of all employees in 85% of Group entities as of December 2018; (2) implementation of the "LIMO" Whistleblower case-tracking IT tool in April 2019; (3) establishment of target timelines for the prioritization and processing of Whistleblower alerts; (4) implementation of various measures to clear an existing backlog of alerts and monitor the build-up of future alerts; and (5) implementation of a process for the Investigation Offices to monitor, across brands and local entities, the completion of the process for violations not classified as Serious Regulatory Violations.

b) Retention of Professionally Educated and Trained Employees

Under the current Whistleblower system structure, the employees responsible for administering the system at VW AG and AUDI sit in the Investigation Offices within the Compliance function. These individuals are all trained as attorneys, auditors, or compliance professionals, or have bachelor's or master's degrees in business administration, accounting, and/or commercial law.

The VW AG and AUDI Investigation Offices continued to expand their resources during the period covered by this report. As of April 13, 2019, the VW AG and AUDI Investigation Offices had a total of 17 and 11 FTE ("Full-Time Employee") resources, respectively. The majority of these resources joined the Investigation Offices during 2018 and 2019. As of April 13, 2019, VW AG had another three open FTE positions, which were in the process of being filled. In addition, the Group Board of Management approved six permanent FTEs in April 2019, resulting in a target structure of 26 FTEs in the VW AG Investigation Office.

VW GOA's Chief Ethics and Compliance Officer, a trained lawyer and experienced compliance professional, continued to have the primary role in the VW GOA Whistleblower system. Three additional Compliance personnel, also trained compliance professionals, were hired during 2018 and 2019 at both VW GOA and GOA Chattanooga, for a total of 7 Compliance FTEs for those entities as of April 2019.

c) Designation of Violations of U.S. Environmental Laws as "Serious Regulatory Violations"

The VW AG and AUDI Investigation Offices conduct a "plausibility check" for all incoming Whistleblower alerts, during which they conduct a preliminary investigation to assess whether there are sufficient facts to proceed with an investigation. Next, Whistleblower alerts are classified as Serious Regulatory Violations, Other Regulatory Violations, or Unsubstantiated. Similar to prior Whistleblower policy versions, Version 3.0 of the Whistleblower Policy at VW AG, AUDI, and VW GOA states that "violations of U.S. environmental regulations" are always processed as reports of Serious Regulatory Violations. Reports of Serious Regulatory Violations, if determined to be "plausible", are assigned to an investigating unit, and the investigation results are reported to the Investigation Offices. The current draft of Whistleblower policy Version 4.0 also provides that "violations of U.S. environmental regulations" are Serious Regulatory Violations.

d) Annual Reporting of Certain Whistleblower Alerts

In response to Recommended Action 5, the VW Defendants developed a process designed to ensure that all Whistleblower alerts relating to violations of U.S. environmental laws or regulations are identified, processed, and reported in the Annual Report by VW Defendants.

According to the description provided by VW AG and AUDI, the Compliance personnel responsible for administering the Whistleblower system received incoming

alerts from various sources, which were then manually documented and tracked in an Excel document ("Case Tracking Tool"). As of April 1, 2019, alerts were documented and tracked in the IT case management system LIMO. Next, during the plausibility check process, Compliance personnel assess whether U.S. environmental protection laws or regulations could have been violated. If a potential violation is detected, regardless of whether the alert is determined to be plausible, the case is deemed relevant for possible inclusion in the Annual Report by VW Defendants and flagged as such within the Case Tracking Tool or LIMO. If the alert is determined to be plausible, it is also categorized as a Serious Regulatory Violation.

Compliance personnel responsible for assessing Whistleblower alerts for potential inclusion in the Annual Report by VW Defendants are not required to conduct a thorough legal analysis regarding whether the alert relates to U.S. environmental law. Instead, the assessment is based on more general professional judgment. There has not been any specialized training related to U.S. environmental laws or regulations provided to all Compliance personnel at VW AG or AUDI involved in the case tracking and reporting process.

The VW Defendants represented that this screening of alerts for the Annual Report by VW Defendants is broad, and includes all allegations that might have an effect on the environment in the United States (*e.g.*, emissions, water pollution, waste disposal, toxic substances, and animal welfare). Allegations concerning emissions testing are flagged as relevant unless it can be confirmed that the relevant vehicles were never sold or marketed in the United States.

VW AG and AUDI implemented a "four-eyes" principle which requires that the general categorization of all Whistleblower alerts be reviewed by two peers. The VW Defendants represented that this principle also applies to the assessment for potential inclusion in the Annual Report by VW Defendants and the respective flagging within the Case Tracking Tool or LIMO.

Annually, the VW AG and AUDI Compliance departments provide the PMO an extract containing all alerts that were flagged as potential violations of U.S. environmental protection laws or regulations during the period covered by the Annual Report by VW Defendants. The list is shared with external counsel, who provide feedback on which alerts should be reported based on their expertise regarding U.S. environmental protection laws and regulations. The Group Chief Compliance Officer, the Head of Compliance and Integrity at AUDI, and the Chief Ethics and Compliance Officer at VW GOA are responsible for determining which Whistleblower alerts should be reported by their respective entities and included in the Annual Report by VW Defendants.

In accordance with Whistleblower policy Version 3.0, the VW GOA Chief Ethics and Compliance Officer reviews all incoming alerts and forwards Serious Regulatory Violations, including alerts relating to U.S. environmental laws, to VW AG. Following this process, VW GOA and GOA Chattanooga are not responsible for assessing the relevance of alerts for inclusion in the Annual Report by VW Defendants. Consistent with this process, VW AG and AUDI submitted to the PMO a listing of Whistleblower alerts that had been flagged during the period covered by this report as potentially relevant. This listing of cases was then submitted to and reviewed by external counsel, who provided feedback to the VW Defendants regarding conclusions about alerts relating to potential violations of U.S. environmental protection laws or regulations.

e) Update on the Whistleblower Alerts Reported in the First Annual Report by VW Defendants

The first Annual Report by VW Defendants included descriptions of Whistleblower cases relating to potential violations of U.S. environmental protection laws or regulations. The report provided the case title, description, and investigation status for each case. During the period covered by this report, the ICA followed-up on each of these cases, and enhanced its understanding of the process used to investigate and resolve them by conducting process walk-throughs, interviewing relevant personnel, and inspecting relevant documentation.

f) Whistleblower Alerts Reported in the Second Annual Report by VW Defendants

The second Annual Report by VW Defendants included descriptions of Whistleblower cases relating to potential violations of U.S. environmental protection laws or regulations. The report provided the case title, description, response, and investigation status for each case. The report also provided updates on the status of the cases that had been reported in the first Annual Report by VW Defendants.

2. ICA Audit Activities and Evaluation of VW Defendants' Activities

During the period covered by this report, the ICA conducted testing procedures across all phases of the Whistleblower system, which included inquiries to and meetings with appropriate personnel, inspection of relevant documentation, process walk-throughs, re-performance of procedures, and sample testing of Whistleblower cases. While a Whistleblower policy was approved and rolled-out at the VW Defendants, there continue to be significant developments associated with Whistleblower system. The implementation of Version 3.0 and the proposed changes in Version 4.0 may change the process for reporting, categorizing, and investigating, and sanctions related to, Whistleblower alerts. The ICA will continue to track and monitor developments in the Whistleblower system during the remainder of the ICA's term.

In regards to the Whistleblower case tracking and reporting obligation and the ICA's related Recommended Action 5, the ICA enhanced its understanding of the process for tracking and reporting cases, performed limited reviews including inquiries to appropriate personnel, inspected relevant documentation, conducted process walk-throughs, and re-performed procedures.

The ICA identified multiple Whistleblower alerts related to potential violations of U.S. environmental laws and regulations that had not been initially flagged as relevant by the VW Defendants, and had not been provided to the PMO for possible inclusion in the

second Annual Report by VW Defendants. The VW Defendants conducted a further review of the alerts identified by the ICA and also conducted their own quality review check. As a result, the VW Defendants concluded additional alerts were relevant and included them in the second Annual Report by VW Defendants. The ICA gained an understanding of the VW Defendants' review and the basis for their decisions about which alerts to include.

Based on additional quality review procedures performed, VW AG Compliance personnel identified additional alerts that had not been initially flagged, and included them in the second Annual Report by VW Defendants as well.

In light of the number of hints that had not been initially flagged as relevant or provided to the PMO for potential inclusion in the second Annual Report by VW Defendants, the second Annual Report by VW Defendants contained descriptions of actions intended to improve the effectiveness of the controls and processes related to the Whistleblower case tracking and reporting process. These actions included providing additional training to employees related to U.S. environmental protection laws or regulations, and implementing additional quality review controls.

L. ADDITIONS TO THE EMPLOYEE SURVEY (U.S. CD \P 22; CAL. CD \P 21)

This section of the Second Annual Report describes the VW Defendants' efforts to comply with Consent Decree obligations regarding Volkswagen's annual employee survey, referred to as the "mood barometer" or *Stimmungsbarometer* (*StiBa* for short). The ICA continues to plan and conduct audit procedures related to these obligations, and will do so throughout the three-year audit term.

1. Activities by the VW Defendants

a) Integrity Question

During the period covered by this report, the VW Defendants did not make any changes to the *StiBa* Integrity Question, which was developed in conjunction with the 2017 *StiBa*. The Integrity Question solicits the reaction of employees to the statement: "In our OU [Organizational Unit], everyone can act with integrity." The Integrity Question, and its accompanying explanatory text, was unchanged in the 2018 *StiBa*, conducted during the period October – November 2018.

b) StiBa Managers' Guides

The VW Defendants continued to include questions in their *StiBa* guide for certain managers ("*StiBa* Managers' Guide") to gauge compliance with U.S. and California environmental laws and regulations. The list of five questions was reviewed during the period covered by this report by a combination of individuals from Compliance, Group Academy, Integrity Management, Human Resources, and Legal, at each of the VW Defendants. VW AG, AUDI, and VW GOA Chattanooga updated one of the five questions included in the *StiBa* Managers' Guide to reflect the applicable training

system referenced. VW GOA did not make any changes to the content of the *StiBa* Managers' Guide, but rather updated the format so that the questions became statements.

From September through December 2018, the VW Defendants distributed the *StiBa* Managers' Guides through multiple channels, including Manager and *StiBa* Coordinator newsletters, e-mail correspondence from certain members of the Group Board of Management, e-mail correspondence from Human Resources personnel at VW GOA and GOA Chattanooga, and publication on the VW AG and AUDI intranets.

c) Monitoring Employee Survey Responses

The VW Defendants' approach for monitoring and addressing *StiBa* responses relating to the Integrity campaign was to maintain and expand upon both the centralized and decentralized activities established in the prior reporting period.

The centralized activities included: (1) the "Centers of Excellence" (for certain organizational units), which are intended to identify areas where the integrity culture could be improved long-term; and (2) "Best Practice Workshops" (for managers of those teams) where the Centers of Excellence insights are shared and measures to strengthen the integrity culture are identified. "Focus Groups" were added in the period covered by this report for select Development departments to further track and implement the action plans from the prior year's Centers of Excellence and Best Practice Workshops.

The decentralized activities, which are executed by individual managers within the organizational units, included: (1) "Team Dialogue" discussions; and (2) meetings to evaluate the results of the *StiBa* and identify corresponding action plans. Team Dialogue discussions were introduced in the current reporting period within each organizational unit, with the goal of creating a common understanding of the newly developed set of Group values, called the "Group Essentials." The Group Essentials aim to address the key behaviors lacking during the diesel misconduct, such as honesty, candor, and respect for the environment, and each of the seven Group Essentials are linked to a specific question within the *StiBa*, one of which is the Integrity Question. Depending on the score from answers to these seven questions, an additional action plan to address the integrity and compliance issues identified by the organizational unit is required. During the period covered by this report, the VW Defendants created a new role, the *StiBa* Consultant, to assist managers in developing their respective action plans and identifying best practices.

While individual organizational units remain primarily responsible for monitoring the *StiBa* results, as of 2018, all managers were required to document completion of the Team Dialogue and action plans in a centralized tool. The VW Defendants plan on utilizing this tool to identify global themes for addressing identified weaknesses, referred to as "worldwide action plans."

d) Summary of Survey Results

In the second Annual Report by VW Defendants, the VW Defendants provided a summary of *StiBa* results related to the Integrity campaign.

2. ICA Audit Activities and Evaluation of VW Defendants' Activities

The ICA reviewed the 2018 *StiBa* survey and confirmed that the Integrity Question was included and that the wording did not change from the 2017 *StiBa*.

The ICA performed inquiries of relevant personnel and reviewed the 2018 *StiBa* Managers' Guides containing the questions (or in the case of VW GOA, statements) gauging compliance with U.S. environmental laws or regulations, and confirmed the Guides were distributed at each of the VW Defendants in 2018. The violation previously identified at VW GOA regarding a failure to include the required questions in its *StiBa* Managers' Guide did not re-occur.

The ICA performed activities to confirm the VW Defendants continued to develop and implement an approach to monitor and address employee survey responses relating to the Integrity campaign. The ICA observed a sample of Team Dialogue discussions at VW AG, AUDI, VW GOA, and GOA Chattanooga, in which the topic of integrity was discussed within individual organizational units. The ICA met with the *StiBa* Consultants at VW AG, AUDI, VW GOA, and GOA Chattanooga to understand their role in supporting the managers' action plans and identifying best practices. The ICA also observed various workshops as a part of the Centers of Excellence, aimed at identifying action plans to address the low scores achieved by specific organizational units in response to the Integrity Question. The Centers of Excellence monitor the identified needs for action over a six-month period within selected departments.

M. ADDITIONS TO THE CODE OF CONDUCT (U.S. CD ¶ 23; Cal. CD ¶ 22)

This section describes the VW Defendants' efforts to comply with their Consent Decree obligations regarding the companies' Code of Conduct. The ICA continues to plan and conduct audit procedures related to the Code of Conduct obligations, and will do so throughout the three-year audit term.

1. Activities by the VW Defendants

a) Revision to Include Environmental Protection and Responsibility Provisions

The provisions in the VW Defendants' uniform Code of Conduct content regarding environmental protection and responsibility for compliance did not change during the period covered by this report.

b) Training of New Employees

The overall process for informing new employees of their obligation to attend training on the Code of Conduct was consistent with the process previously reported, with minor modifications. At AUDI, employees and their direct supervisors now have increased visibility into the status of required trainings on the internal portal used to track training participation.

At each of the VW Defendants, the escalation process for non-compliance with the training obligations was refined. For example, VW AG and AUDI implemented new processes to encourage timely employee participation, including reminder e-mails to the employees as well as their direct supervisors, interviews between the employees and their direct supervisors or HR coordinators, and concrete disciplinary measures. At VW GOA and GOA Chattanooga, employees now have 60 days, instead of the previous 30 days, to complete Code of Conduct training. VW GOA and GOA Chattanooga defined disciplinary measures for continued non-completion of the training after the expiration of this period. For all VW Defendants, non-completion of the training can lead to dismissal.

c) Reporting of Training

As discussed above, in response to Recommended Action 4 (regarding the reporting of training statistics in the Annual Report by VW Defendants), the VW Defendants implemented a uniform process for tracking and reporting new employees' participation in the Code of Conduct training. VW AG reported to the ICA in July 2018 that there were inaccuracies in the calculation of the training numbers. These inaccuracies resulted in the Recommended Action, and were largely due to inconsistencies among the VW Defendants in the process to track and report. For example, the definition of what constitutes a "new employee" and the relevant reporting period were not aligned.

The new process defines "new employees" across all VW Defendants as any new, permanent employee who has not previously participated in the Code of Conduct training. The most recent annual reporting period was defined as April 14, 2018 through April 13, 2019. The VW Defendants performed interim testing to obtain comfort about the accuracy of the new process. Group Internal Audit performed testing procedures and identified a weakness in the reporting process at VW AG. As a result, an enhanced control activity was implemented as of April 2019.

In the second Annual Report by VW Defendants, a summary of the Code of Conduct training participation by new employees was included for each of the four VW Defendants. The summary included the total number of new employees entered in the reporting period and the percentage of new employees who have completed the Code of Conduct training. The percentage of new employees who have not yet completed the training were reported as either "not-due" or "overdue," depending on the date participation was required. This information was provided in a uniform manner covering the same time period.

2. ICA Audit Activities and Evaluation of VW Defendants' Activities

The ICA performed inquiries of relevant personnel and reviewed the Code of Conduct to confirm that the provisions regarding both environmental protection and responsibility for compliance had not changed during the period covered by this report. The ICA gained a detailed understanding of the improved process for monitoring and reporting the Code of Conduct training statistics at each of the VW Defendants. The ICA's review of the changes included inquiries of relevant personnel, inspection of relevant documentation, process walk-throughs, and re-performance of procedures. The results of the ICA's procedures indicated that the improved process was designed to address the issues that caused the inconsistencies in the last period.

N. THIRD-PARTY EMS AUDITS (U.S. CD ¶¶ 24 & 25; CAL. CD ¶¶ 23 & 24)

This section describes the VW Defendants' efforts to comply with their Consent Decree obligations regarding an Environmental Management System ("EMS") audit of product development processes, conducted by an independent third-party. The ICA continues to plan and conduct audit procedures related to these obligations, and will do so throughout the three-year audit term. As noted above and in the First Annual Report, the ICA did not re-perform work conducted by third parties.

References to a particular set of audit procedures by year (*i.e.*, "2018 audit procedures") refer collectively to the planning, site visits, and reports issued for that stage of the audit, but do not necessarily mean all procedures were conducted or completed during the calendar year.

1. Activities by the VW Defendants

a) EMS Auditor Team

During the period covered by this report, the EMS auditor BV re-shaped its audit team, retaining two of the four auditors from the 2017 audit procedures and adding BV's Senior Vice President of Technical Quality and Risk to form a three-person team for the 2018 audit procedures. Throughout the 2018 audit process, the VW Defendants worked with BV to determine the audit budget, audit plan content, selection of audited departments and sites, content of audit sessions, and content of BV's final audit reports.

In planning for the 2019 audit procedures, BV articulated a need to increase the size and capacity of its audit team, and a commensurate increase the budget, in order to audit additional VW Defendant departments, as well as add auditor expertise, specifically regarding ISO 14001:2015 and the automobile industry. The negotiation process for expanding resources for the 2019 audit procedures was ongoing at the end of the period covered by this report.

b) Application of the ISO 14001:2015 Standard

The Consent Decrees required the independent third-party EMS auditor to "conduct an EMS audit pursuant to an industry-recognized standard for product development processes." As described in the First Annual Report, the VW Defendants selected the ISO 14001:2015 standard for these audits. The ISO standard has ten clauses with multiple sub-clauses, all describing various possible elements of an EMS. For an audit, the standard can be used "in whole or in part." For the 2017 audit procedures, BV

evaluated the applicability of all clauses of the ISO 14001:2015 standard, and those found to be inapplicable were not included in the scope of the audit procedures.

In the 2018 audit procedures, BV included four sub-clauses in the audit scope, dealing with resources and communications, that were not included in the 2017 audit procedures. Eight sub-clauses (regarding scope, objectives, documentation, and emergency preparedness) remained out-of-scope.

c) 2018 Audit Procedures

As with the 2017 audit procedures, for the 2018 audit procedures BV relied on the VW Defendants to identify the scoping boundaries of the required EMS audit. BV's audits focused on the "company's PDP," defined by VW Defendants as "the procedures used at Volkswagen to develop new cars starting with planning and ending with Start of Production (SOP)." BV used SOP as a limitation of audit scope at the recommendation of the VW Defendants, to whom BV ultimately deferred to select relevant entity departments given their familiarity with their own systems.

Based on its understanding of the Consent Decrees' scope, BV audited the following locations in 2018, which it described as directly related to or having "organizational interfaces and/or responsibilities within the brand specific PDPs", at VW Defendants' suggestion: (1) VW AG's Wolfsburg facility; (2) AUDI's Ingolstadt facility; and (3) VW GOA's EEO facility. GOA Chattanooga had been determined out-of-scope during the 2017 audit procedures and therefore was not audited in 2018.

Though BV audited TCC in 2017, and considered including TCC in its 2018 audit procedures, BV stated in its 2017 report that "TCC is not intended to be audited unless they implement certification testing for VW vehicles intended for sale in the US market." The decision to exclude TCC from BV's 2018 audit procedures was based on BV's 2017 audit results, as well as assurances by the VW Defendants during audit planning that they were not conducting certification testing at that location for cars sold in the U.S.

However, during the September 2018 site visits in Wolfsburg, BV learned that VW AG was anticipating conducting certification testing at TCC in 2019, which prompted BV to conduct on-site audit procedures at the facility in March 2019. BV plans to conduct audit procedures again at TCC in September 2019. While BV's March 2019 audit procedures at TCC occurred during the ICA's second audit reporting period, the corresponding BV report will be finalized during the ICA's third audit reporting period, and therefore will be discussed in the ICA's Third Annual Report.

During the 2018 audit procedures, BV prepared an internal list of applicable U.S. environmental laws and regulations for auditor reference, identifying twenty-four U.S. EPA and CARB regulations. This list was limited to mobile-source emissions regulations, though BV has expressed an intent to consider other regulatory requirements in its 2019 procedures.

During the 2018 audit procedures, at each of the three audited facilities, the VW Defendants gave presentations regarding the entities' processes for tracking and

addressing environmental legal obligations, including, but not limited to, mobile source emissions. These presentations included overviews of the VW Defendants' legal database and process for appointing regulatory coordinators to collaboratively address the implementation of regulatory requirements (known as the "VKO/VEX" process).

d) 2018 Audit Reports

As in the 2017 audit procedures, BV prepared separate EMS audit reports for VW AG, AUDI, and VW GOA. BV completed its report for VW AG in December 2018, following its audit of the Wolfsburg facility on September 24-28, 2018. VW AG disclosed the completed report to DOJ and CARB on December 20, 2018, and posted the audit report on the public website, <u>www.vwcourtsettlement.com</u>, in German and English on January 8, 2019. No redactions were made in the report.

BV completed its EMS audit report for AUDI in December 2018, following its audit of the Ingolstadt facility on October 15-19, 2018. AUDI disclosed this report to DOJ and CARB on December 20, 2018, and posted the report on the public website cited above in German and English on January 8, 2019 as well. No redactions were made in the report.

BV completed its report for VW GOA in December 2018, following its October 30-31, 2018 audit of the EEO facility in Auburn Hills, Michigan. VW GOA disclosed this report to DOJ and CARB on January 22, 2019, and posted it on the public website above in German and English on February 6, 2019. No redactions were made in the report.

As previously noted, BV conducted on-site audit procedures at the TCC facility in March 2019, in advance of the scheduled September 2019 audit procedures. The BV report for the March 2019 TCC audit procedures was still pending at the end of the period covered by this report.

(1) EMS Auditor's Recommendations for Corrective Actions

Consistent with the requirements of the Consent Decrees, BV's audit reports for the 2018 audit procedures provided recommendations for corrective actions in cases where BV identified deviations. BV classified deviations as major or minor deviations. A major deviation is defined as "the absence or significant failure to implement and/or maintain conformance to the requirements of the applicable clauses of ISO 14001:2015 or Volkswagen's internal EMS," based on objective evidence. Minor deviations are those where "requirements of ISO 14001:2015 (as defined in [BV's] audit criteria) are implemented but a management system weakness is detected, but it does not affect the capability of the EMS to achieve its intended outcomes." The resulting corrective actions for both types of deviations must be addressed by the VW Defendants.

In the closing meetings where BV previewed its findings, the ICA observed vigorous discussion between BV and VW Defendants regarding the basis for classification of an audit conclusion (as a major deviation, minor deviation, or an

opportunity for improvement ("OFI")) and whether the conclusion was sufficiently supported. Some of these discussions resulted in the downgrading or removal of findings. No findings were increased in severity.

In the audit reports for the 2017 audit procedures, BV identified no major deviations. It did, however, identify several minor deviations for the VW Defendants' audited facilities and provided corresponding corrective actions.

In its 2018 reports, BV revisited those deviations to assess the Defendants' actions since the prior reporting period. BV concluded that the minor deviations at VW AG (three), AUDI (one), and VW GOA (two) were all "effective and complete" at the time of their 2018 report. The 2017 deviations and the Defendants' corrective actions, as tracked by BV since its first reporting period, are replicated from the 2018 reports in the following table:

	2017 Minor Deviation	BV Description of VW Defendants' Corrective Actions
VW AG	The environmental policy has been updated strengthening the responsibility for environmental compliance. This policy had not been finalized or formally published at the time of the audit.	The updated version of the Environmental Policy was updated and approved on 12/1/2017.
	Defined key process indicators related to the Environmental Management System do not consider the performance evaluation.	 The following process indicators have been defined to assess the environmental management system: Number of planned vs. conducted audits Number of major and minor deviations per audit Number of improvements (per audit) Review of open measures The key performance indicators ("KPIs") listed above were included in the Environmental Management Report and shared with the Board.
	The independence of internal environmental auditors was not documented in the description of the work instruction for internal environmental audits so the independence of the internal audit completed in 2016 could not be fully ensured.	The independence for the execution of the internal audit is now formally defined a work instruction/process standard published in 2018. Audits were conducted in 2018 utilizing the updated process standard.

	2017 Minor Deviation	BV Description of VW Defendants' Corrective Actions
AUDI	It was not yet possible to fully evaluate the effectiveness of the management system, because most processes have only recently been implemented. There is no integral evaluation of the processes on the basis of key process indicators.	Definition KPIs for processes in the different action levels in the R&D department. All processes will include KPIs in conjunction with the Quality management handbook. This will be implemented no later than calendar week 42 in 2018.
VW GOA (EEO only)	An Environmental Management Manual at EEO has been developed but had not been finalized or approved yet at the time of the audit.	The EMS Manual was finalized and approved by EEO's management on February 5, 2018. The manual was updated and approved on October 29, 2018.
	An internal audit at EEO specific to the elements of the newly developed EMS had not yet occurred at the time of the audit but was scheduled for Q1 of 2018.	The internal audit was conducted March 27-28, 2018. Audit plans will be developed for all future internal audits at VW GOA.

In the 2018 reports, BV reported no minor or major deviations for any of the VW Defendants.

(2) **Opportunities for Improvement**

In both its 2017 and 2018 reports, BV identified OFIs for the VW Defendants' audited facilities. BV identified an OFI when the "[e]vidence presented indicates a requirement has been effectively implemented, but based on auditor experience and knowledge, additional effectiveness or robustness might be possible with consideration of a modified approach."

In its 2018 reports, BV assessed the VW Defendants' implementation of the 23 OFIs listed in BV's 2017 reports. BV concluded that Defendants had either started to address or had fully addressed 14 of the 2017 OFIs, as summarized in the chart below.

	Total Number of 2017 OFIs	Indicated as Complete in BV 2018 Reports	Assessed by BV as Ongoing in 2018 Reports	Not Addressed (by VW Defendant or BV) in 2018 Reports
VW AG	6	5	1	0
AUDI	14	5	2	7

	Total Number of 2017 OFIs	Indicated as Complete in BV 2018 Reports	Assessed by BV as Ongoing in 2018 Reports	Not Addressed (by VW Defendant or BV) in 2018 Reports
VW GOA (EEO and TCC)	1 (EEO) 2 (TCC)	0 N/A	1 N/A	0 N/A (BV did not assess TCC in its 2018 report)

For the three facilities audited in 2018, BV identified 21 new OFIs, which address issues related to governance/structure, environmental policy, EMS Internal Audit, training, and test bench issues.

e) 2019 Audit Planning

As BV and the VW Defendants discussed 2019 audit procedures, BV requested that VW Defendants continue to assist with defining the Consent Decree-required scope of "product development processes." In line with such requests, the VW Defendants agreed to provide detailed mappings of their product development process in order to aid in 2019 audit planning, as well as assist with the training of new auditors supporting the 2019 audit procedures.

2. ICA Audit Activities and Evaluation of VW Defendants' Activities

The ICA applied a risk-based methodology to review the VW Defendants' compliance with their EMS audit obligations, including: comprehensive observation of the audit design and planning procedures; review of key work papers and documents; review of audit reports, supporting evidence, basis for conclusions and reporting process; and meetings with BV and the Defendants, as needed, to clarify questions regarding their procedures, while maintaining independence and avoiding interference with active audit procedures. The ICA also continued its review of the VW Defendants' relationship with BV, including changes in BV's audit team composition and negotiations between BV and the VW Defendants regarding BV's expanded resource needs for the 2019 audit procedures. The ICA's evaluation of the VW Defendants' actions in response to the minor deviations and OFIs identified in the 2017 and 2018 reports is ongoing and will be further addressed in the next ICA report.

During the period covered by this report, the VW Defendants were involved in all activities related to the EMS audits, including: audit planning; determination of audit scope; document production; coordination of field procedures (including ensuring relevant employees were available and providing logistical support); establishment of operating parameters during the field procedures; and review and comment regarding the required audit reports.

Occasionally, VW Defendants disagreed with BV's protocols and decisions regarding 2018 audit procedures and report drafting, and addressed those disagreements directly with the BV auditors. Ultimately, the BV auditors proceeded in the ways they thought necessary to conduct and complete the audit, at times over the VW Defendants' objection.

Following the close of the 2018 audit procedures, and during the start of the 2019 audit planning process, the VW Defendants remained heavily engaged in audit design, providing detailed edits and feedback to BV for audit planning – largely through weekly meetings between the third-party auditors and the VW Defendants' lead representatives for the audited departments.

The VW Defendants remained engaged throughout the audit planning and site visits, supplying necessary personnel from the audited entities, and providing documents as requested by BV. However, the ICA notes that it will be critical in the next and final auditing period for the VW Defendants to pursue this involvement while clearly acknowledging BV's independence and objectivity. The successful execution of BV's final auditing period, in compliance with the Consent Decrees, will also depend on the VW Defendants and BV reaching an appropriate agreement for audit resources, staffing, and scoping.

O. THE SECOND ANNUAL REPORT BY VW DEFENDANTS (U.S. CD ¶ 19; CAL. CD ¶ 18)

This section of the ICA's Second Annual Report describes the VW Defendants' efforts to comply with their Consent Decree obligations regarding their own second annual report to DOJ and the California authorities. The ICA continues to plan and conduct audit procedures related to these obligations, and will do so throughout the three-year audit term.

The ICA received and reviewed a draft of the second Annual Report by VW Defendants dated April 17, 2019, and provided feedback to the VW Defendants on the draft. The ICA notes that the April 17 draft did not include the Group and AUDI Whistleblower cases to be reported under U.S. Consent Decree paragraph 21 and California Consent Decree paragraph 20. The VW Defendants provided the ICA with a revised draft of their annual report on May 10, 2019. The final second Annual Report by VW Defendants was issued on May 17, 2019.

1. Reporting of Whistleblower Case Tracking/*StiBa* Results/Code of Conduct Training

The Consent Decree paragraphs related to Whistleblower case tracking, the *StiBa* employee survey, and the Code of Conduct all contain stand-alone requirements that certain information be included in each Annual Report by VW Defendants. The VW Defendants' compliance with those provisions is addressed above in Sections K, L, and M of this report.

2. Reporting of Assessments of Effectiveness for Injunctive Relief Measures and Related Corrective Actions

Paragraph 19 of the U.S. Consent Decree and paragraph 18 of the California Consent Decree ("Paragraph 19") required the VW Defendants to include specific information in their second and third annual reports regarding their obligations under paragraphs 13, 14, 15, 16, 17, 21, 22, and 23 of the U.S. Consent Decree (and the corresponding paragraphs in the California Consent Decree). Specifically, the VW Defendants must include: (1) a description of the measures implemented to promote compliance with those Consent Decree injunctive relief measures; (2) an assessment of the effectiveness of those measures in promoting compliance with U.S. environmental law, including California law; and (3) any corrective actions the VW Defendants have undertaken to improve this effectiveness.

a) Descriptions of Measures Implemented to Promote Consent Decree Compliance

The second Annual Report by VW Defendants described numerous measures implemented by the VW Defendants to comply with their injunctive relief obligations under the Consent Decrees.

b) Assessments of Effectiveness in Promoting Compliance with U.S. and California Environmental Law

For each of the eight Consent Decree injunctive relief paragraphs identified in Paragraph 19, the second Annual Report by VW Defendants included at least one section entitled "Assessment of the Effectiveness of those measures in promoting Compliance with U.S. and California Environmental Laws." These sections contained additional details regarding the measures implemented in order to comply with the Consent Decrees. These sections also described controls and process enhancements intended to ensure Consent Decree compliance.

In each of these sections, the VW Defendants described positive assessments of effectiveness of the measures implemented. For certain measures, the VW Defendants described the basis for their evaluation, such as internal reviews completed in conjunction with the preparation of the second Annual Report by VW Defendants, or reviews or audits conducted by Internal Audit or third parties. However, for other measures, the VW Defendants only referred generally to their conclusions of effectiveness.

Based on the ICA's review, the approach taken by the VW Defendants to assess effectiveness and report the results was inconsistent across the different Consent Decree obligations. The ICA has included a new Recommended Action 9 to address this issue in the VW Defendants' third and final annual report.

c) Identification of Corrective Actions Taken to Improve Effectiveness

The VW Defendants also included descriptions of actions they have taken in order to improve the effectiveness of their Consent Decree compliance measures, or indicated that, for the Consent Decree obligation in question, they have not identified any deficiencies related to their compliance that would require corrective actions. During the period covered by the ICA's third and final report, the ICA will review the corrective actions identified in the final version of the second Annual Report by VW Defendants.

3. Reporting of Certain Recorded Risks

a) Background on the VW Defendants' GRC process

At VW AG, Group Risk Management ("GRM") is the designated governance owner for the risk management function. GRM is responsible for the establishment, operation, and development of the processes surrounding the Risk Management System/ Internal Control System ("RMS/ICS") for Volkswagen, including the VW Defendants.

The primary risk assessment process for evaluating systemic risks (the broad category of longer-term risks which are inherent to a particular business process) is the annual GRC ("Annual GRC") process. Under the Annual GRC process, systemic risks are identified and assessed, and countermeasures and management controls are identified to reduce those risks. The identification and assessment of risks, countermeasures, and management controls are recorded in the RMS, ICS, and Compliance Reporting System or "RICORS." Based on the inputs into RICORS, the system automatically calculates a "Risk Score," which considers factors such as risk impact, likelihood, and materiality.

Countermeasures are evaluated in the risk assessment process to determine the degree to which it is expected they will reduce a Risk Score. The Company has defined the scale ("None," "Weak," "Noticeable," "Strong," and "Very Strong") to measure the risk reduction "intensity" of the countermeasures.

Management controls are identified and implemented to ensure the successful execution of the countermeasures. The Company uses risk reduction intensity to identify the countermeasures that are expected to be most impactful in mitigating the risk, and therefore should be tested for effectiveness.

There is a significant degree of judgement involved in evaluating factors used to calculate the Risk Score, determining the risk reduction intensity of the countermeasures, and reaching a conclusion about the effectiveness of the management controls. GRM reviews a sample of the management control testing results to assess whether, among other things, evidence was sufficiently documented by the tester, and the sample sizes used adhered to GRM's methodology.

In addition to the Annual GRC process, Group Risk Management employs a quarterly process for identifying and managing acute and imminent risks. These risks are recorded, assessed, and managed outside of the Annual GRC process in the form of Quarterly Risk Reports, which document top acute risks across all Volkswagen functions, along with corresponding countermeasures, and are provided to the Group Board of Management. The quarterly process was implemented across the organization through 2017 and 2018.

b) Identification of Recorded Risks to be Included in the Second Annual Report by VW Defendants

Paragraph 19 required the VW Defendants to use their second and third annual reports to "address: (1) all risks assessed and recorded as part of the annual GRC process relating to either compliance with U.S. environmental laws and regulations or risks of rule violations in the Product Development Process; (2) countermeasures taken by the VW Defendants' business units in response to those risks; and (3) management controls implemented by the VW Defendants' business units relating to those risks."

The ICA received an overview of the activities and steps taken by GRM to respond to the reporting requirements found in Paragraph 19. Relevant risk "focus areas" or categories were selected by GRM in order to gather relevant risks from RICORS. After several discussions with the ICA, a total of 11 of the 104 focus areas used in RICORS were selected by GRM for this purpose. These focus areas were determined by the VW Defendants to potentially contain risks relating to one of the two categories required to be reported under Paragraph 19 – those relating to "compliance with U.S. environmental laws and regulations" and those relating to "risks of rule violations in the Product Development Process."

Because the Consent Decree term "Product Development Process" is limited to those vehicles "marketed and sold by the VW Defendants in the United States," in order to understand which risks were potentially reportable GRM also had to determine which of the Volkswagen *entities* were relevant for these vehicles. GRM relied upon a scoping of entity analysis that had been performed by the PMO for a different purpose in 2018. As a result of a discussion with the ICA, GRM identified two entities to be added to the PMO's list, which resulted in a total of 16 entities in Europe and North America. The VW Defendants determined that these entities satisfied the requirements of Paragraph 19.

Based on the analysis performed, the VW Defendants identified 135 risks which could potentially relate to either compliance with U.S. environmental laws and regulations or risks of rule violations in the Product Development Process. Of these risks, 124 were identified as having a minimum of one countermeasure and management control with a reduction intensity of "Noticeable" or stronger.

GRM reported the countermeasures and management controls implemented based on the information the local entity had recorded in RICORS. According to the second Annual Report by VW Defendants, there were a total of 209 countermeasures and 225 management controls implemented for the risks identified. These totals do not include risks, countermeasures, and management controls related to the Golden Rules. In the final phase of this process, GRM shared the results with the Risk Management departments of the VW Defendants and obtained "sign-offs" from each department. To meet the Consent Decree requirement that they "address" these risks, countermeasures, and management controls, as required under Paragraph 19, the VW Defendants provided tables in their second annual report that listed the number of "risks identified," "implemented countermeasures," and "implemented management controls" by focus area for each VW Defendant, as well as for the "Other VW Group Entities."

c) ICA Audit Activities and Evaluation of VW Defendants' Activities

In the months prior to the VW Defendants' submission of the second Annual Report by VW Defendants, the ICA met with GRM on a recurring basis to understand how it intended to respond to the requirements of Paragraph 19. The ICA held meetings with GRM to discuss the VW Defendants' interpretation of the Paragraph 19 reporting requirements, as well as GRM's approach to fulfilling these requirements. One concern that the ICA repeatedly raised with GRM was the VW Defendants' reliance on a simple table to "address" in its report the risks, countermeasures, and management controls referenced in Paragraph 19, and whether such a table presented a sufficient amount of information for purposes of the Consent Decrees, especially since the table only denoted the number of risks in each risk focus area.

The ICA worked closely with the VW Defendants to review and discuss potential additional risks for inclusion in the second Annual Report by VW Defendants. Additional risks (along with corresponding entities and risk focus areas) were added to the VW Defendants' report as a result of these discussions. For the VW Defendants' third and final annual report, the ICA will continue to engage with the VW Defendants regarding the reporting of risks.

Based on the information obtained during this process, the ICA makes the following two observations for purposes of the VW Defendants' third and final annual report to DOJ and the California authorities:

(1) Completeness and Accuracy of Entities Considered

In identifying the risks to be reported under Paragraph 19, the VW Defendants relied upon an entity scoping performed by the PMO in 2018, conducted for a different purpose, rather than conduct its own analysis of which entities were relevant. Based on discussions with the ICA, as noted earlier, GRM added two entities to the list received from the PMO, for a total of 16 entities. The accuracy of the VW Defendants' risk reporting process may be improved by using an analysis of relevant entities that has been conducted by GRM rather than the PMO. The ICA's Recommended Action 10 is intended to address this issue.

(2) Accuracy of Countermeasures Reporting

In preparing their response to Paragraph 19, the VW Defendants did not perform any additional analysis on the countermeasures and management controls related to the risks reported. To the extent a local entity had classified a countermeasure in RICORS as "implemented," GRM considered the countermeasure "taken" (the term used by the Consent Decrees) and therefore reportable for purposes of Paragraph 19. However, the second Annual Report by VW Defendants included a summary of effectiveness testing of management controls, which indicated that three of the controls tested negative for effectiveness. GRM did not determine whether ineffective management controls resulted in countermeasures that were not in fact taken, and therefore should not have been reported. Recommended Action 10 is intended to address this issue as well.

P. NEXT STEPS

Subject to the provisions of the Consent Decrees, the ICA's Third Annual Report will address the time period from April 14, 2019 through April 13, 2020, although the ICA has discretion to report on any events occurring before June 16, 2020. During the period covered by the Third Annual Report, the ICA will continue to assess the VW Defendants' ongoing compliance with the Consent Decrees' requirements, along with the VW Defendants' responses to this report's new Recommended Actions. The ICA's Third Annual Report will set forth the ICA's ultimate findings regarding the VW Defendants' compliance with the injunctive relief imposed by the Consent Decrees.

Appendix

Paragraph(s) in Consent Decrees	Injunctive Relief for the VW Defendants [Volkswagen Parties]*
¶¶ 13 – 19 (U.S. CD) ¶¶ 12 – 18 (Cal. CD)	Product Development Process
¶ 13 (U.S. CD)	Segregation of Duties between Product Development and Certification Testing/Monitoring
¶ 12 (Cal. CD)	 for the VW Defendants. Within 180 Days after the Effective Date, the VW Defendants shall implement measures to ensure that employees involved in certification testing and monitoring for purposes of vehicle certification under the Clean Air Act [and California law] are organizationally separate from product development. The VW Defendants shall form and maintain an organizationally separate certification group ("Certification Group") to manage, supervise, and conduct certification testing and monitoring. The Certification Group shall: a. Ensure that the VW Defendants have policies, procedures, practices, or processes for vehicle development that include emission control systems designed to comply with U.S. laws and regulations [including California laws and regulations] related to vehicle certification and emission standards; b. Conduct, or retain a qualified contractor to conduct, emissions certification testing of both production and in-use vehicles; c. Plan the testing program, obtain the vehicles, confirm that the configuration of the test vehicles is representative of the production vehicles, and test or retain a qualified contractor to test the certification vehicles consistent with EPA's [and CARB's] regulations for certification and in-use performance testing. The Certification Group may utilize testing facilities and technicians assigned to other units within the VW Defendants' organization provided that the Certification Group controls the certification testing; and d. Supervise all certification personnel, provide appropriate training, and control access to certification vehicles.
¶ 14 (U.S. CD)	Establishment of VW Defendants' Group Steering Committee(s) [Project Management]
¶ 14 (0.5. CD) ¶ 13 (Cal. CD)	<u>Office(s)]</u> .
	Within 90 Days after the Effective Date, the VW Defendants shall establish and maintain one or more Group Steering Committees [<i>Project Management Office(s)</i>], for monitoring and complying with current and future U.S. laws [<i>including California laws</i>] regarding vehicle certification and vehicle emissions. The VW Defendants shall establish rules of procedure for the Group Steering Committee(s) [<i>Project Management Office(s)</i>] and shall define its tasks, authorities, and responsibilities, which shall include: (1) to document significant

^{*} Places where the California Consent Decree differs from the U.S. Consent Decree are *[bracketed in italics with blue font]*. The California Consent Decree uses "Volkswagen Parties" to refer to the same four entities named "VW Defendants" in the U.S. Consent Decree, and "Porsche Parties" to refer to the "Porsche Defendants" in the U.S. Consent Decree. Except for here, this Appendix does not note that difference or other differences that are stylistic only.

	current U.S. laws, regulations, and legislation [(including California laws, regulations, and legislation)] related to vehicle certification and automotive emissions, and track future developments in U.S. law [(including California law)] related to vehicle certification and automotive emissions; (2) to monitor and assist the VW Defendants' compliance with U.S. requirements [including California requirements] regarding exhaust emission standards and technology; and (3) to establish internal procedures and controls for the VW Defendants in order to achieve compliance with U.S. requirements [including California requirements] regarding exhaust emission standards are to achieve compliance with U.S. requirements [including California requirements] regarding exhaust emission standards and technology; and (3) to establish internal procedures and controls for the VW Defendants in order to achieve compliance with U.S. requirements [including California requirements] regarding exhaust emission standards and technology.
¶ 15 (U.S. CD) ¶ 14 (Cal. CD)	 PEMS Testing by the VW Defendants. (The testing required by this paragraph is the same testing required by paragraph 15 of the US Third Partial Consent Decree, subject to certain additional terms applicable to the Volkswagen Parties and CARB.) a. The VW Defendants (under the supervision of the Certification Group) shall test certain model year 2017, 2018, and 2019 light-duty motor vehicles using portable emissions measurement system ("PEMS") testing. For each model year, the VW Defendants shall perform PEMS testing on 33% of VW Defendants' EPA-certified test groups within that model year ("VW Test Groups"). For purposes of determining the number of VW Test Groups composing 33%, the VW Defendants shall round up or down to the nearest whole VW Test Group number closest to 33%. EPA may select the VW Test Groups for testing under this Paragraph 15.a pursuant to the following schedule: for model year 2017, by no later than February 1, 2017; for model year 2018, by no later than December 31, 2017, or at the annual certification meeting with EPA, whichever is earlier. If EPA does not select the VW Test Groups pursuant to the schedule set forth in this Paragraph 15.a, then the VW Defendants shall select the VW Test Groups for PEMS testing. The VW Defendants shall select the VW Test Groups for model year 2017, model year 2018, and model year 2019 that will cover, in the aggregate, the full range of configurations of emission control systems on their light-duty vehicles for those model years, and shall not select a VW Test Group that was certified using carryover emissions data from another VW Test Group that as already been tested pursuant to this Paragraph 15.a for model year 2018 and 2019 shall be completed by December 31, 2017. All testing under Paragraph 15.a for model years 2018 and 2019 shall be completed by September 30 of the calendar year for which the applicable model year is name, except that the VW Defendants to complete PEMS testing of the selected model year. The VW D

	model year, the Volkswagen Parties shall perform PEMS testing on 33% of
	Volkswagen Parties' EPA-certified test groups within that model year
	("Volkswagen Test Groups"). For purposes of determining the number of
	Volkswagen Test Groups composing 33%, the Volkswagen Parties shall round up
	or down to the nearest whole Volkswagen Test Group number closest to 33%.
	Volkswagen shall test those Volkswagen Test Groups selected by EPA pursuant to
	Paragraph 15(a) of the Third Partial Consent Decree between Defendants and the
	United States, lodged with the Court on January 11, 2017 (Dkt. #2758 in 15-MD-
	2672) (the "US Third Partial Consent Decree"). If EPA does not select the
	Volkswagen Test Groups pursuant to the schedule set forth in Paragraph 15(a) of
	the US Third Partial Consent Decree, CARB will attempt to confer with EPA in an
	effort to arrive at a common list of test groups to be tested by the Volkswagen
	Defendants, and, if EPA fails to select the Volkswagen Test Groups for any given
	year by the applicable deadline, CARB will have 10 business days following the
	applicable EPA selection deadline to designate the Volkswagen Test Groups for
	that model year. If CARB also fails to select the Volkswagen Test Groups for any
	given year by the applicable deadline, Volkswagen will designate the Volkswagen
	Test Groups for that model year. The Volkswagen Parties shall select the
	Volkswagen Test Groups for model year 2017, model year 2018, and model year
	2019 that will cover, in the aggregate, the full range of configurations of emission
	control systems on their light-duty vehicles for those model years, and shall not
	select a Volkswagen Test Group that was certified using carryover emissions data
	from another Volkswagen Test Group that has already been tested pursuant to this
	Paragraph (unless necessary to meet the 33% requirement). All testing under this
	Paragraph 14.a for model year 2017 shall be completed by December 31, 2017. All
	testing under Paragraph 14.a for model years 2018 and 2019 shall be completed
	by September 30 of the calendar year for which the applicable model year is
	named, except that the Volkswagen Parties and EPA may agree, under the US
	Third Partial Consent Decree, to a later date (but in no case later than December
	31 of the applicable model year) sufficient to enable the Volkswagen Parties to
	complete PEMS testing of the selected model year. The Volkswagen Parties may,
	but are not required to, use the Third-Party Emissions Tester required by
	Paragraph 14.b to conduct the testing required by this Paragraph 14.a.]
b.	
	retain an independent third-party emissions tester ("Third-Party Emissions Tester").
	(The VW Defendants and Porsche Defendants may hire the same Third-Party
	Emissions Tester.) No attorney-client relationship shall exist or be formed between
	any VW Defendant and the Third-Party Emissions Tester. For each of model year
	2017, 2018, and 2019, the VW Defendants shall ensure that the Third-Party
	Emissions Tester conducts PEMS testing on a vehicle from each of two VW Test
	Groups. Testing under this Paragraph 15.b [14.b] does not count toward the testing
	required under Paragraph 15.a [14.a]. These VW Test Groups selected for testing
	under this Paragraph 15.b [14.b] shall be the VW Test Groups with the highest
	projected sales for the model year at the time of certification, or if applicable those
	VW Test Groups selected by EPA [(or if EPA fails to make a selection pursuant to

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с.	<i>selected by CARB)]</i> by letter to the VW Defendants, pursuant to Section XV [XIV] (Notices). Any such letters shall be provided no later than June 30 of the year for which the model year is named. All testing under this Paragraph 15.b [14.b] shall be completed by December 31 of the calendar year for which the applicable model year is named. The VW Defendants shall satisfy the testing required by Paragraph 15.a [14.a] as
	follows, and shall ensure that the Third-Party Emissions Tester satisfies the testing required by Paragraph 15.a and b [14.a and b] as follows:
	 i. Test a VW Test Group by testing one sample vehicle procured at random from the series production vehicles from that selected VW Test Group; ii. Perform the required third-party PEMS testing on public roads in the United States, and perform all PEMS testing under real-world driving conditions over a range of ambient temperatures and pressures (including conditions not represented on the Federal Test Procedure <i>[or any other test procedure designated by CARB]</i>) to measure emissions that are detectable on a serial vehicle via PEMS of the vehicle's regulated criteria air pollutants and CO₂;
	and
	iii. Conduct the required PEMS testing according to test methods recorded
	before the testing commences. The Third-Party Emissions Tester shall use
	test methods independently from the VW Defendants. [The Volkswagen
	Parties and Third-Party Emissions Testers will make best efforts to provide
	10 days written notice to CARB before commencing testing.]
d.	Within 120 Days after the Effective Date, the VW Defendants shall submit to EPA
	[CARB] for review and approval [(for CARB approval, if EPA fails to approve or
	disapprove a plan for PEMS testing submitted by the Volkswagen Parties to EPA)]
	in accordance with Section VII (Approval of Submissions) a plan for PEMS testing
	under this Paragraph. Such plan shall include:
	i. A list of those test groups the VW Defendants will test for model year 2017;
	i. A written statement of qualifications for the proposed Third-Party
	Emissions Tester including its name, affiliation, and address, its experience
	in conducting PEMS testing, and a description of previous contracts or
	financial relationships of the proposed Third-Party Emissions Tester with
	the VW Defendants;
	iii. A list of all emissions and vehicle and engine parameters the VW
	Defendants will measure and record during each PEMS test they perform
	under this Paragraph [14];iv. A description of the test methods the VW Defendants propose to use
	including the routes and ambient conditions over which the vehicles shall be
	tested;
	v. A template for the VW Defendants' summary report as described below; and
	vi. A description of how the VW Defendants intend to satisfy all requirements
	of this Paragraph [14].
	For each model year, for the PEMS testing required by Paragraph 15.a [14.a], the
e.	VW Defendants shall provide the test data, a detailed statement of all test methods
	used, and an executive summary of the data and methods (that includes the

f	 measured emissions of the vehicle's regulated criteria air pollutants and CO₂) for all tests the VW Defendants performed under this Paragraph for that model year ("VW Defendants' Summary Report") to EPA [CARB] as specified in Section XV [XIV] (Notices). The VW Defendants' Summary Report for model year 2017 shall be due no later than March 1, 2018. The VW Defendants' Summary Report for model years 2018 and 2019 shall be due no later than November 30 of the calendar year for which the model year is named, unless the VW Defendants and the United States [EPA] agree to a later date [that is no later than January 15 of the following calendar year, unless also agreed to by CARB]. Within 21 Days following submission of the VW Defendants' Summary Report to EPA [CARB], the VW Defendants shall post their Summary Report (redacted of any Confidential Business Information ("CBI") or personal information the disclosure of which is restricted by applicable law; however no emissions test methods and results may be claimed as CBI) in English and German at the public website required by Paragraph 51 [50]. For each model year, for the PEMS testing required by Paragraph 15.b [14.b], the VW Defendants shall ensure that the Third-Party Emissions Tester prepares one or more "Third-Party Emissions Tester Summary Report" including the test data, a detailed statement of all test methods used, and an executive summary of the data and methods (that includes the measured emissions of the vehicle's regulated criteria air pollutants and CO₂) for all testing the Third-Party Emissions Tester performed under this Paragraph for that model year. The VW Defendants shall provide the Third-Party Emissions Tester Summary Report to EPA [CARB] as specified in Section XV [XIV] (Notices) by no later than March 1 of the calendar year immediately after the calendar year for which the model year is named. Within 30 Days following submission of the Third-Party Emissions Tester Summary Report to EPA [CARB], the VW Defendants shall post th
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	which PEMS testing can be used to determine compliance for purposes of certification under Title II of the Clean Air Act. [Sub-paragraph 14.g of the California Consent Decree reads as follows: If any of the PEMS data produced pursuant to the testing in Paragraph 14.a or Paragraph 14.b suggest the potential presence of an undisclosed AECD or defeat device, or are otherwise anomalous or inconsistent with the certification application for the Volkswagen Test Groups being tested, the Volkswagen Parties shall, upon CARB's reasonable written request: meet and confer with CARB to discuss the PEMS data; work collaboratively with CARB to determine why the PEMS data suggest the potential presence of an undisclosed AECD or defeat device, or are otherwise anomalous or inconsistent with the certification application for the Volkswagen Test Groups being tested; provide relevant information and documents to CARB; and provide CARB with vehicles and vehicle components (including without limitation hardware and software) for PEMS or other testing by CARB.]

	h. [The Parties agree and acknowledge that neither U.S. law nor California law set
	forth a standard by which PEMS testing can be used to determine compliance for purposes of certification under California law.]
¶ 16 (U.S. CD)	Business Units within the Product Development Process.
¶ 16 (0.3. CD) ¶ 15 (Cal. CD)	Within 180 Days after the Effective Date, the VW Defendants shall implement the internal procedures set out in the "Golden Rules" Handbook by establishing internal controls and rules of procedure, and by defining the tasks, authorities, and responsibilities for the business units, committees, and boards involved in the Product Development Process, including, but not limited to, the Product Safety Committee (also known as "APS"), the Change Control Board, and the Type Approval, Recyclability and Functional Safety Department (also known as "EGDT"); provided however, that implementation of software and information technology may extend beyond 180 Days after the Effective Date, and that these additional Days shall not count in determining the three-year period set forth in Paragraph 26 [25]. The "Golden Rules" Handbook and the internal controls and internal rules of procedure developed by the VW Defendants may be subject to reasonable modification, in consultation with the Department of Justice [and California]. The VW Defendants shall conduct regular employee training regarding the internal procedures, and shall monitor implementation of these procedures through the VW Defendants' Governance, Risk, and Compliance ("GRC") process.
¶ 17 (U.S. CD) ¶ 16 (Cal. CD)	Definition of Managers' Responsibilities. Within 120 Days after the Effective Date, the VW Defendants shall define the tasks, authorities, and responsibilities of the managers involved in the Product Development Process with respect to compliance with U.S. [California] environmental laws and regulations.
¶ 18 (U.S. CD) ¶ 17 (Cal. CD)	<u>Internal Audit</u> . Within one year after the Effective Date, the VW Defendants shall conduct and complete an internal audit to track the implementation of the internal procedures in the "Golden Rules" Handbook relating to vehicle approval procedures with respect to U.S. <i>[California]</i> environmental laws and regulations, ECM Software development in the Product Development Process, and escalation management in the Product Safety Committee ("APS"). The audit shall assess the effectiveness of those internal procedures and propose any corrective actions to improve their effectiveness.
¶ 19 (U.S. CD) ¶ 18 (Cal. CD)	Reporting on Injunctive Relief Measures. The first annual report provided to the Department of Justice [<i>California</i>] pursuant to Paragraph 47 [<i>VIII.46</i>] shall include the information required by Paragraphs 18, 21, 22, and 23 [17, 20, 21, and 22]. In the second and third annual reports provided to the Department of Justice [<i>California</i>] pursuant to Paragraph 47 [46], the VW Defendants shall describe the measures that they have implemented to promote compliance with the requirements of Paragraphs 13, 14, 15, 16, 17, 21, 22, and 23 [12, 13, 14, 15, 16, 20, 21, and 22] of this Section V (Injunctive Relief for the VW Defendants), together with an assessment of the effectiveness of those measures in promoting compliance with U.S. environmental law [<i>including California law</i>] and any corrective actions the VW Defendants have undertaken to improve their effectiveness in promoting compliance with

	U.S. environmental law <i>[including California law]</i> . In the second and third annual reports provided to the Department of Justice <i>[California]</i> pursuant to this Paragraph 19 <i>[18]</i> , Defendants shall also address: (1) all risks assessed and recorded as part of the annual GRC process relating to either compliance with U.S. <i>[California]</i> environmental laws and regulations or risks of rule violations in the Product Development Process; (2) countermeasures taken by the VW Defendants' business units in response to those risks; and (3) management controls implemented by the VW Defendants' business units relating to those risks. The information required to be provided in the annual reports pursuant to this Paragraph 19 <i>[18]</i> , shall be certified in accordance with Paragraph 52 <i>[51]</i> . <i>[The Volkswagen Parties may elect to fulfill their reporting obligations under this Paragraph 18 by submitting the required information in a single joint report to the Department of Justice and California.]</i>
¶¶ 20 & 21 (U.S. CD) ¶¶ 19 & 20 (Cal. CD)	Whistleblower System
¶ 20 (U.S. CD) ¶ 19 (Cal. CD)	Implementation of Whistleblower System. Within 180 Days of the Effective Date, the VW Defendants shall implement and maintain the Volkswagen Group whistleblower system that was approved by the Board in September 2016. The VW Defendants shall retain professionally educated and trained employees to administer the system. Any whistleblower policy that applies to individuals whose work the VW Defendants reasonably anticipate may involve or relate to vehicles to be certified for sale in the United States [<i>California</i>] shall designate violations of U.S. environmental laws or regulations [including California laws or regulations] as "serious violations" within the meaning of the policy.
¶ 21 (U.S. CD) ¶ 20 (Cal. CD)	<u>Report on case tracking</u> . In each annual report provided to the Department of Justice [<i>CARB</i>] pursuant to Paragraph 47 [<i>VIII.46</i>], the VW Defendants shall submit a report, with a certification in accordance with Paragraph 52 [51] of the Consent Decree, regarding case tracking under the Volkswagen Group whistleblower system of all whistleblower alerts relating to violations of U.S. environmental protection laws or regulations [including California laws or regulations].
¶¶ 22 & 23 (U.S. CD) ¶¶ 21 & 22 (Cal. CD)	Employee Survey and Code of Compliance
¶ 22 (U.S. CD) ¶ 21 (Cal. CD)	<u>Annual Employee Survey</u> . Within 90 Days after the Effective Date, the VW Defendants shall create for inclusion in their annual employee survey a question to monitor progress of the VW Defendants' integrity campaign as introduced on June 16, 2016, and, for teams whose work includes matters related to compliance with U.S. environmental laws, <i>[including California laws]</i> questions in appropriate managers' guides to the annual employee survey to gauge compliance with U.S. laws or regulations <i>[(including California laws or regulations)]</i> relating to environmental compliance. The VW Defendants shall establish a centralized

	process to monitor and address employee survey responses relating to the integrity campaign. In each annual report to the Department of Justice [<i>CARB</i>] pursuant to Paragraph 47 [46], the VW Defendants shall provide a summary of survey results relating to the integrity campaign.
¶ 23 (U.S. CD) ¶ 22 (Cal. CD)	<u>Code of Conduct</u> . Within 180 Days after the Effective Date, the VW Defendants shall ensure that the VW Defendants' corporate Code of Conduct includes provisions regarding (1) environmental protection and (2) responsibility for compliance. The VW Defendants shall require all new employees to attend training regarding the Code of Conduct. In each annual report to the Department of Justice [CARB] pursuant to Paragraph 47 [46], the VW Defendants shall provide a summary of training provided to employees regarding the Code of Conduct.
¶¶ 24 & 25 (U.S. CD) ¶¶ 23 & 24 (Cal. CD)	Environmental Management System ("EMS") Audit
¶ 24 (U.S. CD) ¶ 23 (Cal. CD)	EMS Audit. Within 90 Days after the Effective Date, the VW Defendants shall contract with and retain an independent third party to conduct an EMS audit pursuant to an industry-recognized standard for product development processes for vehicles to be certified for sale in the United States for each year for calendar years 2017, 2018, and 2019. Beginning with the EMS audit covering calendar year 2017, the EMS audit shall include: (1) an assessment of the VW Defendants' processes to comply with U.S. environmental laws and regulations [(including California laws and regulations)]; and (2) a recommendation for corrective actions.
¶ 25 (U.S. CD) ¶ 24 (Cal. CD)	Annual EMS Audit Report. Upon completion of each annual EMS audit report, the VW Defendants shall provide to the Department of Justice [<i>CARB</i>] a copy of their annual EMS audit report covering calendar year 2017, 2018, and 2019. To the extent that any such report contains CBI, the VW Defendants shall simultaneously submit to Department of Justice [<i>CARB</i>] for its review a summary version that can be made publicly available. Within 21 Days after a copy is provided to the Department of Justice [<i>CARB</i>], the VW Defendants shall post a copy of the annual EMS audit report (redacted of any CBI or personal information the disclosure of which is restricted by applicable law; however no emissions test methods and results may be claimed as CBI) in English and German on the public website required by Paragraph 51 [50].