



National Highway Traffic Safety Administration

AUG -9 2011

CERTIFIED MAIL RETURN RECEIPT REQUESTED

Mr. Chris Sandvig Product Compliance Volkswagen of America, Inc. 3800 Hamlin Road Auburn Hills, MI 48326 NVS-212cag EA11-002

Dear Mr. Sandvig:

This letter is to inform you that the Office of Defects Investigation (ODI) of the National Highway Traffic Safety Administration (NHTSA) has opened an Engineering Analysis (EA11-002) to investigate allegations of engine compartment fires in model year (MY) 2001-2007 Volkswagen Passat vehicles equipped with 4-cylinder, turbocharged engines, and manufactured by Volkswagen of America, Inc. As part of the investigation, this letter requests certain information from Volkswagen.

This office has received a total of 39 complaints and some additional field reports on MY 2001-2007 Volkswagen Passat vehicles. Eighteen (18) complaints allege that a fire started in the engine compartment of the vehicle. The reports state that the fire may be related to faulty ignition coils. Twenty-one (21) complaints allege an ignition coil failure that did not result in a fire. The reports state that prior to the ignition coil failure, the vehicle hesitated or lost power, and the check engine or dashboard lights illuminated. Identification numbers for the 39 consumer complaints are provided at the end of this letter.

Unless otherwise stated in the text, the following definitions apply to these information requests:

- <u>Subject vehicles</u>: All MY 2001 2007 Volkswagen Passat and Passat Wagon vehicles equipped with a 4-cylinder, turbocharged engine, and manufactured for sale or lease in the United States.
- <u>VW</u>: Volkswagen of America, Inc., all of its past and present officers and employees, whether assigned to its principal offices or any of its field or other locations, including all of its divisions, subsidiaries (whether or not incorporated) and affiliated enterprises and all of their headquarters, regional, zone and other offices and their employees, and all agents, contractors, consultants, attorneys and law firms and other persons engaged directly or indirectly (e.g., employee of a consultant) by or under the control of VW (including all business units and persons previously referred to), who are or, in or after

1996, were involved in any way with any of the following related to the alleged defect in the subject vehicles:

- a. Design, engineering, analysis, modification or production (e.g. quality control);
- b. Testing, assessment, evaluation, service, or quality;
- c. Consideration, or recognition of potential or actual defects, reporting, record-keeping and information management, (e.g., complaints, field reports, warranty information, part sales), analysis, claims, or lawsuits; or
- d. Communication to, from or intended for zone representatives, fleets, dealers, or other field locations, including but not limited to people who have the capacity to obtain information from dealers.
- <u>Alleged defect</u>: Reports or allegations of a vehicle fire in the subject vehicles, related to failure or malfunction in the coil-on-plug ignition coil assembly.
- **Document:** "Document(s)" is used in the broadest sense of the word and shall mean all original written, printed, typed, recorded, or graphic matter whatsoever, however produced or reproduced, of every kind, nature, and description, and all non-identical copies of both sides thereof, including, but not limited to, papers, letters, memoranda, correspondence, communications, electronic mail (e-mail) messages (existing in hard copy and/or in electronic storage), faxes, mailgrams, telegrams, cables, telex messages, notes, annotations, working papers, drafts, minutes, records, audio and video recordings, data, databases, other information bases, summaries, charts, tables, graphics, other visual displays, photographs, statements, interviews, opinions, reports, newspaper articles, studies, analyses, evaluations, interpretations, contracts, agreements, jottings, agendas, bulletins, notices, announcements, instructions, blueprints, drawings, as-builts, changes, manuals, publications, work schedules, journals, statistical data, desk, portable and computer calendars, appointment books, diaries, travel reports, lists, tabulations, computer printouts, data processing program libraries, data processing inputs and outputs, microfilms, microfiches, statements for services, resolutions, financial statements, governmental records, business records, personnel records, work orders, pleadings, discovery in any form, affidavits, motions, responses to discovery, all transcripts, administrative filings and all mechanical, magnetic, photographic and electronic records or recordings of any kind, including any storage media associated with computers, including, but not limited to, information on hard drives, floppy disks, backup tapes, and zip drives, electronic communications, including but not limited to, the Internet and shall include any drafts or revisions pertaining to any of the foregoing, all other things similar to any of the foregoing, however denominated by VW, any other data compilations from which information can be obtained, translated if necessary, into a usable form and any other documents. For purposes of this request, any document which contains any note, comment, addition, deletion, insertion, annotation, or otherwise comprises a non-identical copy of another document shall be treated as a separate document subject to production. In all cases where original and any non-identical copies are not available, "document(s)" also means any identical copies of the original and all non-identical copies thereof. Any document, record, graph, chart, film or photograph originally produced in color must be provided in color. Furnish all documents whether verified by VW or not. If a document

is not in the English language, provide both the original document and an English translation of the document.

• Other Terms: To the extent that they are used in these information requests, the terms "claim," "consumer complaint," "dealer field report," "field report," "fire," "fleet," "good will," "make," "model," "model year," "notice," "property damage," "property damage claim," "rollover," "type," "warranty," "warranty adjustment," and "warranty claim," whether used in singular or in plural form, have the same meaning as found in 49 CFR 579.4.

In order for my staff to evaluate the alleged defect, certain information is required. Pursuant to 49 U.S.C. § 30166, please provide numbered responses to the following information requests. Insofar as VW has previously provided a document to ODI, VW may produce it again or identify the document, the document submission to ODI in which it was included and the precise location in that submission where the document is located. When documents are produced, the documents shall be produced in an identified, organized manner that corresponds with the organization of this information request letter (including all individual requests and subparts). When documents are produced and the documents would not, standing alone, be self-explanatory, the production of documents shall be supplemented and accompanied by explanation.

Please repeat the applicable request verbatim above each response. After VW's response to each request, identify the source of the information and indicate the last date the information was gathered.

- 1. State by model and model year, the number of subject vehicles VW has manufactured for sale or lease in the United States. Separately, for each subject vehicle manufactured to date by VW, state the following:
 - a. Vehicle's identification number (VIN);
 - b. Model Year:
 - c. Vehicle's date of manufacture:
 - d. Date warranty coverage commenced;
 - e. The State in the United States where the vehicle was originally sold or leased (or delivered for sale or lease);
 - f. Original equipment coil manufacturers/suppliers names;
 - g. Whether or not the vehicle is subject to NHTSA safety recall 08V-156;
 - h. If affected by 08V-156, the date the recall was completed, or "n/a" if not completed;
 - i. Whether or not the vehicle is subject to an EPA mandated emissions recall involving the ignition coil(s); and,
 - j. If affected by an emissions recall, the date the recall was completed, or "n/a" if not completed.

Provide the table in Microsoft Access 2007, or a compatible format, entitled "**PRODUCTION DATA**."

- 2. State the number of each of the following, received by VW, or of which VW is otherwise aware, which relate to, or may relate to, the alleged defect in the subject vehicles:
 - a. Consumer complaints, including those from fleet operators;
 - b. Field reports, including dealer and employee field reports;
 - c. Reports involving a crash, injury, burn injury, or fatality, notices received by the manufacturer alleging or proving that a death or injury was caused by a possible defect in a subject vehicle;
 - d. Property damage claims;
 - e. Subrogation claims by insurance companies;
 - f. Third-party arbitration proceedings where VW is or was a party to the arbitration; and
 - g. Lawsuits, both pending and closed, in which VW is or was a defendant or codefendant.

For subparts "a" through "e," state the total number of each item (e.g., consumer complaints, field reports, etc.) separately. Multiple incidents involving the same vehicle are to be counted separately. Multiple reports of the same incident are also to be counted separately (i.e., a consumer complaint and a field report involving the same incident in which a crash occurred are to be counted as a crash report, a field report and a consumer complaint).

In addition, for items "c" through "g," provide a summary description of the alleged problem and causal and contributing factors and VW's assessment of the problem, with a summary of the significant underlying facts and evidence. For items "f" and "g," identify the parties to the action, as well as the caption, court, docket number, and date on which the complaint or other document initiating the action was filed, as applicable.

- 3. Separately, for each item (i.e., complaint, report, claim, notice, or matter) within the scope of your response to Request No. 2, state the following information:
 - a. VW's file number or other identifier used;
 - b. The category of the item, as identified in Request No. 2 (e.g., consumer complaint, field report, etc.);
 - c. Vehicle's owner or fleet name (and fleet contact person), address, and telephone number;
 - d. Vehicle's VIN;
 - e. Vehicle's model year;
 - f. Vehicle's date of manufacture;
 - g. Vehicle's mileage at time of incident;
 - h. Incident date:
 - i. Report or claim date;
 - j. Whether a fire is alleged;
 - k. Whether the ignition key was on, off, or whether the position was unknown at time of the fire:
 - 1. Whether a crash is alleged;
 - m. Whether an injury is alleged, including burn injuries;
 - n. If an injury is alleged, the type of injury alleged;
 - o. Whether the vehicle was re-purchased by VW; and,
 - p. If a vehicle was re-purchased, the reason for the vehicle re-purchase, including a statement of action(s) taken with or on the vehicle.

Provide this information in Microsoft Access 2007, or a compatible format, entitled "COMPLAINT DATA".

- 4. Produce copies of <u>all</u> documents related to each item within the scope of Request No. 2. This should include any and all documents submitted by third parties including expert reports or analyses in support of a subrogation or other legal claim. Organize the documents separately by category (e.g., consumer complaints, field reports, etc.) and describe the method VW used for organizing the documents.
- 5. State, by model and model year, a total count for all of the following categories of claims, collectively, that have been paid by VW to date that relate to, or may relate to, the alleged defect in the subject vehicles: warranty claims; extended warranty claims; claims for good will services that were provided; field, zone, or similar adjustments and reimbursements; and warranty claims or repairs made in accordance with a procedure specified in a technical service bulletin or customer satisfaction campaign.

Separately, for each such claim, state the following information:

- a. VW's claim number;
- b. Vehicle's owner or fleet name (and fleet contact person) and telephone number;
- c. Vehicle's identification number (VIN);
- d. Model year;
- e. Vehicle's date of manufacture;
- f. Repair date;
- g. Vehicle's mileage at time of repair;
- h. Repairing dealer's or facility's name, telephone number, city and state or ZIP code;
- i. Labor operation number;
- i. Problem code;
- k. Replacement part number(s) and description(s);
- 1. Whether a fire is alleged;
- m. Whether the ignition key was on, off, or the ignition position was unknown at time of fire:
- n. Whether a crash is alleged;
- o. Whether an injury is alleged, including burn injuries;
- p. Type of injury, if any;
- q. Concern stated by customer; and
- r. Comment, if any, by dealer/technician relating to claim and/or repair.

Provide this information in Microsoft Access 2007, or a compatible format, entitled "WARRANTY DATA."

6. Describe in detail the search criteria used by VW to identify the claims identified in response to Request No. 5, including the labor operations, problem codes, part numbers and any other pertinent parameters used. Provide a list of all labor operations, labor operation descriptions, problem codes, and problem code descriptions applicable to the alleged defect in the subject vehicles. State, by make and model year, the terms of the new vehicle warranty coverage offered by VW on the subject vehicles (i.e., the number of months and mileage for which

coverage is provided and the vehicle systems that are covered). Describe any extended warranty coverage option(s) that VW offered for the subject vehicles and state by option, model, and model year, the number of vehicles that are covered under each such extended warranty.

- 7. Produce copies of all service, warranty, and other documents that relate to, or may relate to, the alleged defect in the subject vehicles that VW has issued to any dealers, regional or zone offices, field offices, fleet purchasers, or other entities. This includes, but is not limited to, bulletins, advisories, informational documents, training documents, or other documents or communications, with the exception of standard shop manuals. Include any such documents related to EPA emissions recalls or any related Service Action Circulars (service campaigns or VW petitions) that involve the ignition coils used in the subject vehicles. Also include the latest draft copy of any communication that VW is planning to issue within the next 120 days. For each such action, provide a list of the VW vehicles affected and provide the following information:
 - a. Vehicle's make;
 - b. Vehicle's model; and
 - c. Vehicle's model year.
- 8. Describe all assessments, analyses, tests, test results, studies, surveys, simulations, investigations, inquiries and/or evaluations (collectively, "actions") that relate to, or may relate to, the alleged defect in the subject vehicles that have been conducted, are being conducted, are planned, or are being planned by, or for, VW. For each such action, provide the following information:
 - a. Action title or identifier;
 - b. Actual or planned start date;
 - c. Actual or expected end date;
 - d. A brief summary of the subject and objective of the action;
 - e. Engineering group(s)/supplier(s) responsible for designing and for conducting the action; and
 - f. A brief summary of the findings and/or conclusions resulting from the action.

For each action identified, provide copies of all documents related to the action, regardless of whether the documents are in interim, draft, or final form. Organize the documents chronologically by action.

- 9. Describe all assessments, analyses, tests, test results, studies, surveys, simulations, investigations, inquiries and/or evaluations (collectively, "actions") that relate to, or may relate to, VW emission recalls J1-28F2 and/or P1-28F3 that have been conducted, are being conducted, are planned, or are being planned by, or for, VW. For each such action, provide the following information:
 - a. Action title or identifier;
 - b. Actual or planned start date;
 - c. Actual or expected end date;
 - d. A brief summary of the subject and objective of the action;

- e. Engineering group(s)/supplier(s) responsible for designing and for conducting the action;
- f. Any and all analyses of any safety consequences arising from the condition addressed by the action; and,
- g. A brief summary of the findings and/or conclusions resulting from the action.

For each action identified, provide copies of all documents related to the action, regardless of whether the documents are in interim, draft, or final form. Organize the documents chronologically by action.

- 10. In June 2008, VW conducted Recall 08V-156. Of the vehicles in the recall population, what is the actual number of ignition coil failures after the recall remedy is performed?
- 11. Discuss whether or not the subject vehicle's engine management system has the capability to detect an engine misfire (i.e., a loss of ignition to one of more spark plugs) and, if so, the method used to detect misfire and its detection sensitivity (how "capable" the system is at detecting misfire). State any potential impact(s) an engine misfire may have on the catalytic converter, and discuss specifically any impacts misfire has on the catalyst's exterior surface temperature. Discuss and explain any steps the engine management system takes once a misfire is detected, including driver warning and fault code storage, and any countermeasure(s) the system can implement to protect or otherwise mitigate catalytic converter damage and/or overheating. Discuss any applicable Federal or State regulations related to engine misfire detection and potential countermeasures for the subject vehicles, including any citations the regulations are identified by.
- 12. Furnish VW's assessment of the alleged defect in the subject vehicle, including:
 - a. The causal or contributory factor(s);
 - b. The failure mechanism(s);
 - c. The failure mode(s);
 - d. The effectiveness of Recall 08V-156 in reducing the risk of fire and/or coil failures;
 - e. The risk to motor vehicle safety that it poses;
 - f. What warnings, if any, the operator and the other persons both inside and outside the vehicle would have that the alleged defect was occurring or subject component was malfunctioning; and
 - g. The reports included with this inquiry.

This letter is being sent to VW pursuant to 49 U.S.C. § 30166, which authorizes NHTSA to conduct any investigation that may be necessary to enforce Chapter 301 of Title 49 and to request reports and the production of things. It constitutes a new request for information. VW's failure to respond promptly and fully to this letter could subject VW to civil penalties pursuant to 49 U.S.C. § 30165 or lead to an action for injunctive relief pursuant to 49 U.S.C. § 30163. (Other remedies and sanctions are available as well.) Section 5(a) of the TREAD Act, codified at 49 U.S.C. § 30165(b), provides for civil penalties of up to \$6,000 per day, with a maximum of \$17,350,000 for a related series of violations, for failing or refusing to perform an act required under 49 U.S.C. § 30166. See 49 CFR 578.6 (as amended by 75 Fed. Reg. 79978 (Dec. 21, 2010)). This includes failing to respond to ODI information requests.

If VW cannot respond to any specific request or subpart(s) thereof, please state the reason why it is unable to do so. If on the basis of attorney-client, attorney work product, or other privilege, VW does not submit one or more requested documents or items of information in response to this information request, VW must provide a privilege log identifying each document or item withheld, and stating the date, subject or title, the name and position of the person(s) from, and the person(s) to whom it was sent, and the name and position of any other recipient (to include all carbon copies or blind carbon copies), the nature of that information or material, and the basis for the claim of privilege and why that privilege applies.

VW's response to this letter, in duplicate, together with a copy of any confidentiality request, must be submitted to this office by September 23, 2011. All business confidential information must be submitted directly to the Office of Chief Counsel as described in the following paragraph and should not be sent to this office. In addition, do not submit any business confidential information in the body of the letter submitted to this office. Please refer to EA11-002 in VW's response to this letter and in any confidentiality request submitted to the Office of Chief Counsel. If VW finds that it is unable to provide all of the information requested within the time allotted, VW must request an extension from me at (202) 493-2631 no later than five business days before the response due date. If VW is unable to provide all of the information requested by the original deadline, it must submit a partial response by the original deadline with whatever information VW then has available, even if an extension has been granted.

If VW claims that any of the information or documents provided in response to this information request constitute confidential commercial material within the meaning of 5 U.S.C. § 552(b)(4), or are protected from disclosure pursuant to 18 U.S.C. § 1905, VW must submit supporting information together with the materials that are the subject of the confidentiality request, in accordance with 49 CFR Part 512, as amended, to the Office of Chief Counsel (NCC-111), National Highway Traffic Safety Administration, Room W41-227, 1200 New Jersey Avenue, S.E., Washington, D.C. 20590. VW is required to submit two copies of the documents containing allegedly confidential information (except only one copy of blueprints) and one copy of the documents from which information claimed to be confidential has been deleted. Please remember that the word "CONFIDENTIAL BUSINESS INFORMATION" must appear at the top of each page containing information claimed to be confidential, and the information must be clearly identified in accordance with 5 U.S.C. § 512.6. If you submit a request for confidentiality for all or part of your response to this IR, that is in an electronic format (e.g., CD-ROM), your request and associated submission must conform to the new requirements in NHTSA's Confidential Business Information Rule regarding submissions in electronic formats (49 CFR 512.6(c)). See Federal Register, volume 72, page 59434 (October 19, 2007).

Please send email notification to Scott Yon (scott.yon@dot.gov) and to ODI_IRresponse@dot.gov when VW sends its response to this office and indicate whether there is confidential information as part of VW response.

If you have any technical questions concerning this matter, please call Scott Yon of my staff at (202) 366-0139.

Sincerely,

Frank S. Borris, Director Office of Defects Investigation Enforcement

VOQ Numbers:

Fires That May Be Related To Faulty Ignition Coils

 $10263560, 10283274, 10285807, 10290841, 10293321, 10302338, 10303623, 10313156, \\10327020, 10347225, 10352745, 10361194, 10363544, 10382188, 10382707, 10386280, \\10406295, 10410803$

Ignition Coil Failures, No Fire

10253800, 10262591, 10266083, 10280415, 10284308, 10285456, 10298315, 10305187, 10316077, 10318922, 10323939, 10347821, 10351308, 10358511, 10359174, 10371845, 10374003, 10379727, 10380038, 10400009, 10403176