

dKC de la Torre Klausmeier Consulting

**1401 Foxtail Cove
Austin, TX 78704
(512) 447-3077
E-mail: delaklaus@aol.com**

**ANNUAL EVALUATION OF
CONNECTICUT'S INSPECTION/MAINTENANCE PROGRAM**

2014

FINAL REPORT

Prepared for:

Connecticut Department of Energy and Environmental Protection

Prepared by:

dKC – de la Torre Klausmeier Consulting

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Executive Summary

As required by the Clean Air Act (CAA) Amendments of 1990, the Connecticut Department of Energy and Environmental Protection (DEEP) in partnership with the Connecticut Department of Motor Vehicles (DMV) conducts periodic evaluations of its enhanced Motor Vehicle Inspection and Maintenance (I/M) Program. This report is being submitted in fulfillment of the requirements to provide an annual I/M report per 40 CFR 51.366. This report addresses data collected from January 1, 2014 through December 31, 2014. As evidenced by the high compliance rate, limited fraud and low waiver rate, this report demonstrates that Connecticut's I/M program effectively achieves air quality benefits.

The United States Environmental Protection Agency (EPA) provided a checklist (Appendix A), which identified the data elements to be included in this report. The 2014 data elements are compiled in Appendix B and correspond to the indexing system used in EPA's checklist. Due to the structure of Connecticut's I/M program, the following requirements of the attached checklist are not applicable: (a)(2)(xiii), (xiv), (xv), (xvi), (xvii), (xviii), (xx) and (5); (b)(3)(ii), and (iv); (4)(iii), (6), (7); (d)(3) and (4).

Connecticut's I/M program, which dates back to 1983, has a long history of effectively reducing vehicle emissions and results in more emission reductions than any other state-implemented reduction strategy. The I/M program, designed to identify vehicles that emit pollutants that exceed acceptable standards and require such vehicles to get repaired, is an important part of the strategy to ensure that Connecticut is positioned to attain and maintain the National Ambient Air Quality Standard (NAAQS) for Ozone (i.e., smog). Current estimates indicate that in 2010, this program would have provided approximately 19 of the 200 tons per day of air pollutant reductions that are included in [Connecticut's Attainment Demonstration for the 1997 Ozone NAAQS](#). The emission reductions resulting from this program are an integral part of Connecticut's air quality attainment efforts, and important as part of a balanced strategy that includes reductions from stationary, area and mobile source sectors to ensure that Connecticut attains the 1997 Ozone NAAQS. EPA has since strengthened the Ozone NAAQS in 2008 resulting in Connecticut's designation of nonattainment for this standard as well. Connecticut failed to comply with the 2008 Ozone NAAQS in the timeframe provided by the federal CAA and will be subject to additional requirements upon formal notification by EPA. Furthermore, EPA is expected to issue an even more stringent Ozone NAAQS in 2015. If EPA does so, Connecticut will need to achieve even greater emission reductions from motor vehicles.

Since the inception of the I/M program in 1983, the primary source of Connecticut's 'home grown' air pollution has shifted from large industrial facilities like power plants and factories to motor vehicles and others sources in the transportation sector. In Connecticut, motor vehicles now account for the largest share of carbon dioxide emissions (40%), a greenhouse gas, and nitrogen oxide emissions (49%), a key precursor pollutant for ground level ozone. Given these realities along with Connecticut's aggressive greenhouse gas reduction targets, the state must evaluate additional measures to reduce emissions from motor vehicles and the transportation sector. Two strategies, which may significantly curb emissions quickly and cost effectively, include adopting of the California aftermarket catalytic converter rule, and expanding the I/M program to include heavy duty diesel trucks. Failing to effectively reduce transportation

emissions and meet our federal air quality goals may require the imposition of additional and even more severe, control measures in the future, like reduced speed limits or congestion pricing. Therefore, it is imperative to view the effectiveness of the existing I/M program against the back drop of likely additional control programs necessary to achieve Connecticut's short term and long term air quality goals.

This report focuses on the effectiveness of Connecticut's I/M program. Key program highlights include:

- In 2014, over 99% of the vehicles subject to testing were in compliance with I/M program requirements. The overall compliance rate in Connecticut exceeds the compliance rate of 96% specified in Connecticut's State Implementation Plan (SIP). Connecticut actively investigates non-compliance and assesses fines for late inspections. In 2014, 162,311 fines were assessed for late inspections. Linking registration to compliance in addition to late inspection fines contribute to Connecticut's very high compliance rate.
- Approximately 10% of vehicles failed their initial emissions test and 12% of these vehicles also failed their first retest in 2014. Failure rates under the decentralized I/M program are equal to or higher than failure rates recorded under centralized I/M programs. Ongoing efforts designed to decrease failure rates, such as incorporating the I/M program contractor's (Applus) Data Acquisition Device to enhance vehicle communication should offer solutions to emerging challenges, such as testing plug in hybrid electric vehicles.
- DMV and Applus perform extensive quality assurance checks on the program. Evaluation of these quality assurance data demonstrates that the program performs accurate inspections.
- Connecticut's anti-fraud efforts are models for other I/M programs. Connecticut conducted audits at all stations as part of an extensive anti-fraud program. For example, Connecticut conducted 1,529 video surveillance audits and 775 covert audits during 2014. Covert audits addressed On-Board Diagnostics (OBD), Acceleration Simulation Mode (ASM) and Pre-Conditioned Two Speed Idle (PCTSI) inspection performance. In addition, DMV and Applus run extensive trigger reports. Less than 0.10% of the inspections in Connecticut are suspect, which is far lower than the "suspect test" rate in most other states' I/M programs.
- DMV's fleet testing program is transitioning to a new vendor, Applus to correct challenges faced by the previous equipment. DMV expects that full implementation of the new fleet program will be completed during the first half of 2016.

Connecticut consistently conducts thoughtful analysis of its vehicle inspection and maintenance program, which has led to numerous enhancements. In the past year, improvements were implemented in the areas of training, emissions database, testing equipment and auditing. A full iteration of the changes to the program can be found in this report. Connecticut's analysis repeatedly has demonstrated the program effectively produces air pollutant reductions. DEEP and DMV continue to evaluate opportunities to improve the program and cost effectively increase the air quality benefits.

1.0 Introduction

This report presents an analysis of data collected in Connecticut's Motor Vehicle Inspection and Maintenance (I/M) program in 2014 to meet the United States Environmental Protection Agency's (EPA) annual reporting requirements of 40 CFR Part 51.366. In an I/M program, vehicles are periodically inspected, and those with evidence that they exceed design emission standards must be repaired. I/M programs are mandated by the Clean Air Act and were limited to areas that EPA designated as "serious" or "severe" non-attainment for the ozone National Ambient Air Quality Standard (NAAQS). Connecticut's program, which dates back to 1983, has a long history of effectively reducing vehicle emissions and is an important part of the strategy to ensure that Connecticut is positioned to attain the NAAQS for ozone. Since Connecticut's ozone levels exceed the 2008 Ozone NAAQS, additional emission reductions from all sectors, including motor vehicles, remain critical.

Connecticut's I/M program results in more emission reductions than any other state implemented reduction strategy. Estimates indicate that in 2010, this program would have resulted in approximately 19 of the 200 tons per day of air pollutant reductions that are included in Connecticut's Attainment Demonstration for the 1997 Ozone NAAQS¹. The emissions reductions resulting from this program are an integral part of Connecticut's air quality attainment efforts and important as part of a cost effective and balanced strategy that includes reductions from stationary, area and mobile source sectors.

Emissions reduction determinations are estimated using modeling that is approved by the EPA. The most recent State Implementation Plan (SIP) Revision, which addresses the I/M program, was developed using MOBILE6.2, the model which was approved for use by EPA at that time. EPA has since updated its modeling platform and now requires states to use the Motor Vehicle Emissions Simulator (MOVES) for attainment demonstrations, hot spot analysis and transportation conformity.

Connecticut's I/M program identifies vehicles that have been tampered with, or have received improper maintenance. These vehicles must be repaired until they comply with emission standards. The Connecticut Department of Motor Vehicles (DMV) oversees the I/M program operated by a private contractor; the Connecticut Department of Energy and Environmental Protection (DEEP) ensures that the program achieves the air quality benefits as outlined in Connecticut's SIP.

The original program implemented in 1983 subjected vehicles to two inspections – an idle test where exhaust concentrations of hydrocarbons (HC) and carbon monoxide (CO) were measured while the vehicle was idling and a visual inspection for the presence of the catalytic converter. Vehicles with gross vehicle weight ratings (GVWR) of 10,000 pounds (lbs.) or less were included in the program. In 1998, Connecticut

¹ Connecticut's Attainment Demonstration for the 1997 Ozone NAAQS details Connecticut's strategies designed to bring the state's air quality into compliance with the 1997 8-hour ozone NAAQS of 84 ppb.

substantially enhanced its existing I/M program to meet new SIP requirements, as well as federal requirements for I/M improvements. The emission test changed from an unloaded idle emission test to a loaded-mode test (ASM2525²). With this change, Connecticut began evaluating emissions of oxides of nitrogen³ (NO_x) along with HC and CO. The loaded-mode test uses a chassis dynamometer to simulate on-road driving. If the vehicle could not be safely tested on a dynamometer, it received a pre-conditioned two-speed idle (PCTSI) test. In addition, the inspection included a gas cap pressure test to check to see if the gas cap holds pressure. Leaking gas caps are a major source of evaporative HC emissions. The program continued to include a visual emission control component check. Also, at this time Connecticut began diesel testing.

In 2003, Connecticut again made substantial revisions to the program. The inspection network was changed from a centralized system with about 25 inspection stations to a decentralized system with a contractor equipped limit of 300 stations⁴. The goals of these changes were to improve customer convenience to the public by decreasing the waiting time for emissions testing, directly involve the repair industry with emissions testing, and enhance opportunities for small business development. In addition, 1996 and newer gasoline-powered models started receiving on-board diagnostic (OBD) tests⁵, instead of ASM2525 or PCTSI exhaust emissions tests. All 1996 and later model year light-duty vehicles sold in the United States contain the second generation of OBD, termed OBDII. Connecticut also performs OBD tests on diesel powered vehicles that are model year 1997 and newer having a GVWR of 8500 lbs. and less. OBDII systems can detect malfunctions or deterioration of emission control components, often well before the motorist becomes aware of any problem. Inspecting vehicles by reading the OBDII system codes can identify vehicles with serious emission control malfunctions more accurately and cost-effectively than traditional tailpipe tests, and help technicians diagnose and repair those malfunctions. Diesel powered vehicles having a GVWR of 10,000 lbs. or less, receive tests for excessive exhaust smoke, if they cannot receive OBDII tests. Evaluating OBDII test results presents special challenges, since tailpipe emission results are not available for each vehicle.

In 2011, the state embarked upon a new program with upgraded equipment and computer systems to correct challenges faced by the previous system. While the new program introduced many improvements, as part of this new program, DMV is working with their contractor, Applus, to evaluate and implement additional new improvement

2 The ASM2525 or Acceleration Simulation Mode test measures HC, CO and NO emissions while the vehicle is driven at a constant speed (25 MPH) on a treadmill-like device termed a dynamometer.

3 Nitric oxide (NO) is measured as a surrogate for oxides of nitrogen (NO_x). NO_x along with HC emissions are considered to be the major ozone precursors.

4 This number dropped from 300 stations to 250 stations by the end of 2008. At the end of 2014, there were 222 stations in the network.

5 1997 and newer light-duty diesels (<8500 lbs. GVWR) also get OBD inspections.

measures to maximize the cost effectiveness and air quality benefits of the program.

The methodology for this report has utilized data on different inspection components to determine if the appropriate number of vehicles are being failed and repaired. This multifactorial approach is consistent with the purpose of the OBDII system, since it assures that Connecticut is identifying, and requiring the repair of vehicles that exceed design emission standards by more than 50%, as required by the EPA. Evaluating decentralized inspections requires a comprehensive assessment of how well stations comply with mandated inspection procedures. Generally, there are greater opportunities for fraud in decentralized facilities, because there are more stations that need policing. Using data and procedures provided by the DMV, de la Torre Klausmeier Consulting, Inc. (dKC) assessed effectiveness and enforcement of Connecticut's program.

2.0 Observed Failure Rates for Gasoline-Powered Vehicles

Failure rates for gasoline-powered vehicles were calculated using test results from I/M test stations. Below is a brief description of the criteria used to determine if a vehicle passes or fails inspection.

Pass/Fail Criteria

ASM2525 or Pre-Conditioned Two-Speed Idle (PCTSI) Inspection (pre-1996 vehicles): Vehicles fail if they exceed Connecticut's cut points or emissions standards. For the ASM2525 test, HC, CO and NO_x emissions are evaluated. For the PCTSI test, HC and CO emissions are evaluated. Connecticut uses EPA's recommended cut points for the ASM2525 and PCTSI tests.

Gas Cap Test: Vehicles fail if their gas cap cannot hold pressure. Beginning in November 2004, only pre-1996 light-duty vehicles receive gas cap tests. The OBDII system adequately tests a vehicle's evaporative system on most 1996 and newer vehicles.

OBDII Inspection: 1996 and newer light-duty vehicles are subject to an OBDII inspection. The emissions test system is plugged into the OBDII connector and information on the status of the vehicle's OBD system is downloaded. Vehicles fail the OBDII inspection if they have the following problems:

- Malfunction Indicator Lamp (MIL⁶) is commanded-on;
- MIL not working (Termed Key-On Engine-Off, KOEO, failure⁷);
- The number of readiness monitors that are not ready exceed EPA's limit⁸;
 - 1996-2000 models: Two monitors are allowed to be not ready;
 - 2001+ models: One monitor is allowed to be not ready;
- OBD Diagnostic Link Connector (DLC) damaged; or
- Vehicle could not communicate with the Connecticut inspection system.

⁶ MIL is a term used for the light on the instrument panel, which notifies the vehicle operator of an emission-related problem. The MIL is required to display the phrase "check engine" or "service engine soon" or the ISO engine symbol. The MIL is required to illuminate when a problem has been identified that could cause emissions to exceed a specific multiple of the standards the vehicle was certified to meet.

⁷ The Key-On Engine-Off (KOEO) determines if the MIL bulb is working. The bulb should illuminate when the vehicle is turned on but not started.

⁸ OBDII systems have up to 11 diagnostic monitors, which run periodic tests on specific systems and components to ensure that they are performing within their prescribed range. OBDII systems must indicate whether or not the onboard diagnostic system has monitored each component. Components that have been diagnosed are termed "ready", meaning they were tested by the OBDII system.

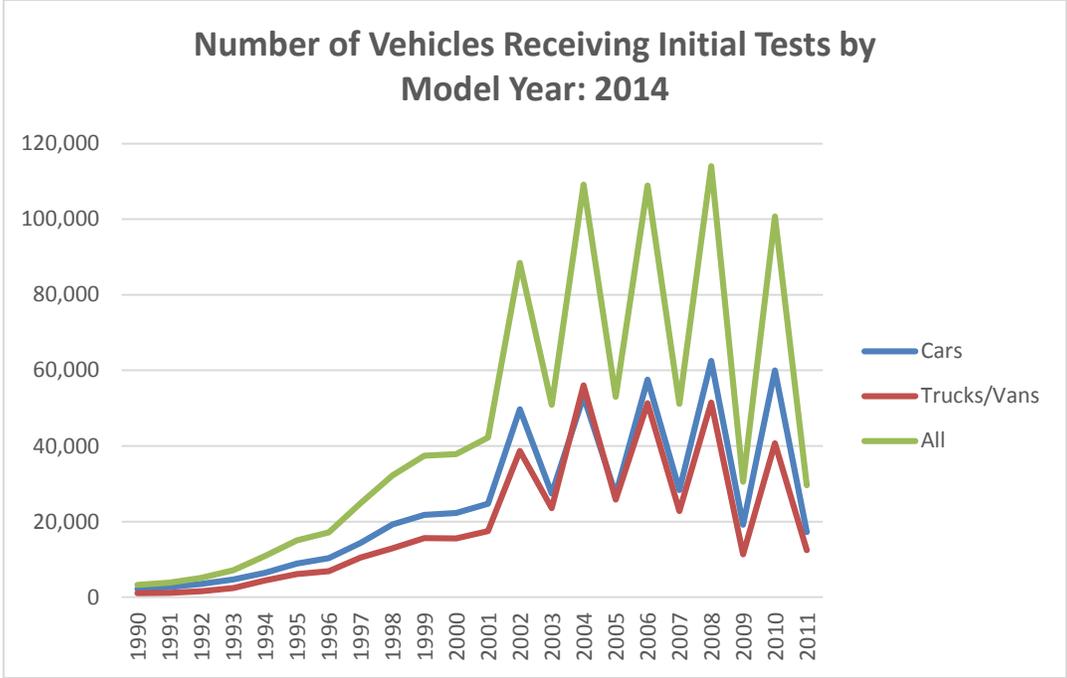
Summary of Fail Rates for Gasoline-Powered Vehicles

Following is a summary of test results from January 1, 2014 to December 31, 2014. In 2014, 959,921 gasoline-powered vehicles received initial tests.

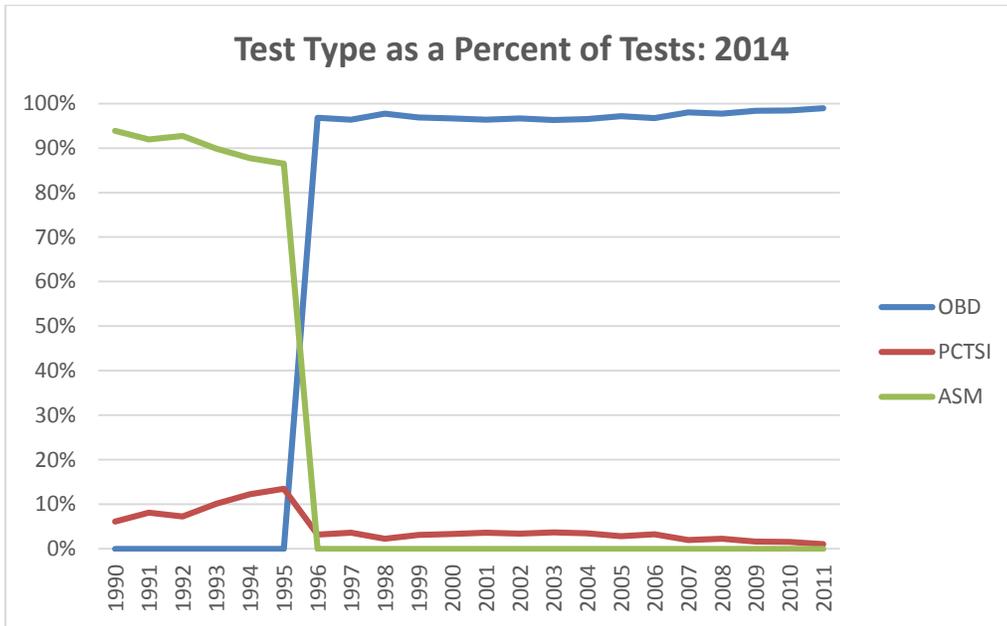
Test Type	Parameter	2014 Result
OBD	% Fail Initial (any reason)	10.2%
	% Fail for MIL Commanded-on	5.3%
	% Fail First Retest	10.9%
ASM	% Fail Initial	14.0%
	% Fail First Retest	27.5%
PCTSI	% Fail Initial	8.9%
	% Fail First Retest	14.5%
Gas Cap	% Fail Initial	6.3%
	% Fail First Retest	7.3%
All Tests	% Fail Initial	10.3%
	% Fail First Retest	12.1%

Conclusion: These failure rates are comparable to results in previous years. Failure rates in Connecticut's I/M program are in line with those reported in Test-Only programs⁹. Test-Only programs generally are considered by EPA to be the model for peak I/M performance. Based on failure rates, Connecticut's I/M program is failing an appropriate number of vehicles.

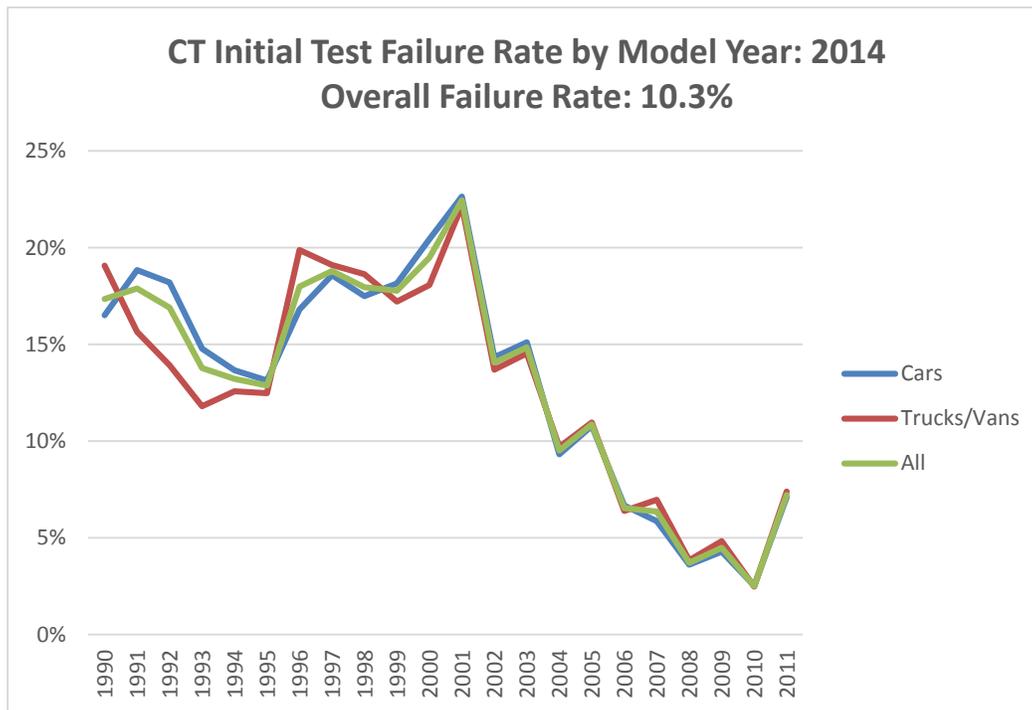
⁹ At the end of this section is a chart that compares failure rates for the OBD test in Connecticut with failure rates in Delaware. Delaware is a well enforced Test-Only I/M program. Failure rates in both programs are nearly identical.



This chart shows the total number of inspections by vehicle model year, and vehicle type. The first four vehicle model years are exempted from testing, so the number drops sharply after the 2011 model year. All vehicles have a 10,000 lbs. or less GVWR.

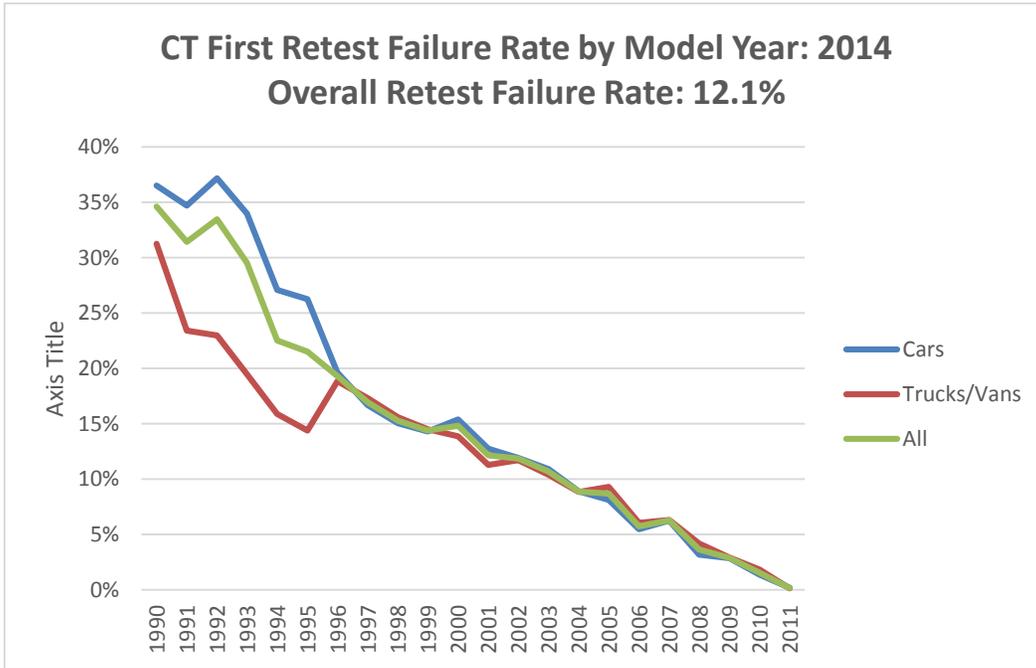


This chart shows the total number of inspections by vehicle model year and final inspection type. Most 1996+ vehicles received OBDII tests. A small percent (2%) of the vehicles newer than 1996 were models over 8500 lbs. GVWR without OBD systems.

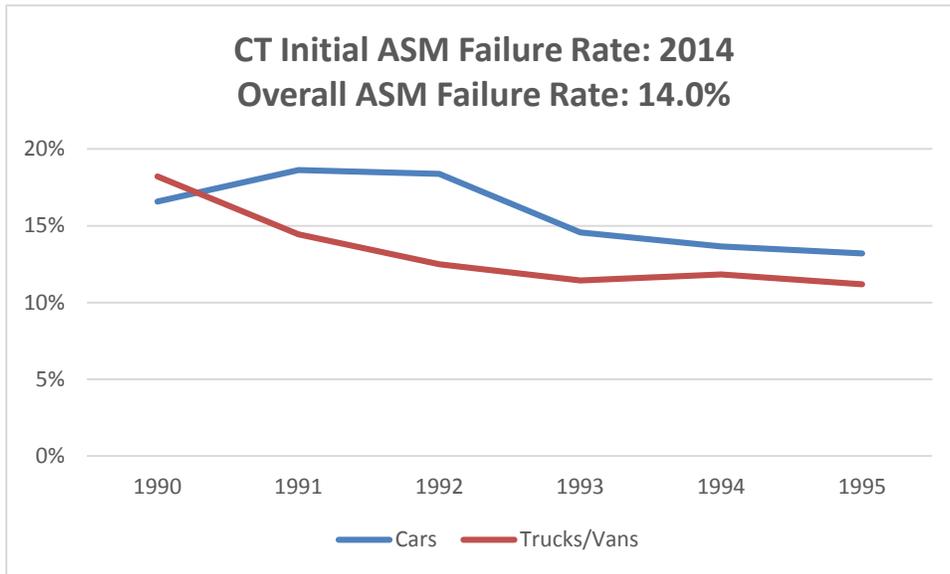


This chart shows the overall percentage of vehicles that failed the tailpipe test, gas cap test, visual emission control component test, or the OBD test. Some vehicles failed more than one inspection component. As expected, the failure rate is generally lowest for new vehicles. Following the pattern seen previously, the failure rate for cars and trucks spiked upwards for 1996 model year vehicles, due to increased stringency associated with the implementation of the OBDII test. Compliance with the OBDII test is considered to be more difficult than compliance with the ASM2525 or PCTSI test. The failure rate is consistent with failure rates reported in test-only programs in other jurisdictions. EPA requires that 2001 and newer model year vehicles have, at most, one monitor not ready as opposed to two for 2000 and older model year vehicles. This change in readiness requirement explains the elevated failure rate for 2001 model year vehicles. The high initial failure rate for 2011 model year vehicles is due to the fact that over half of these vehicles tested had dealer plates. Vehicles owned by dealers typically have high not ready rates because their batteries are often insufficiently charged, or had been disconnected during dealer prep¹⁰.

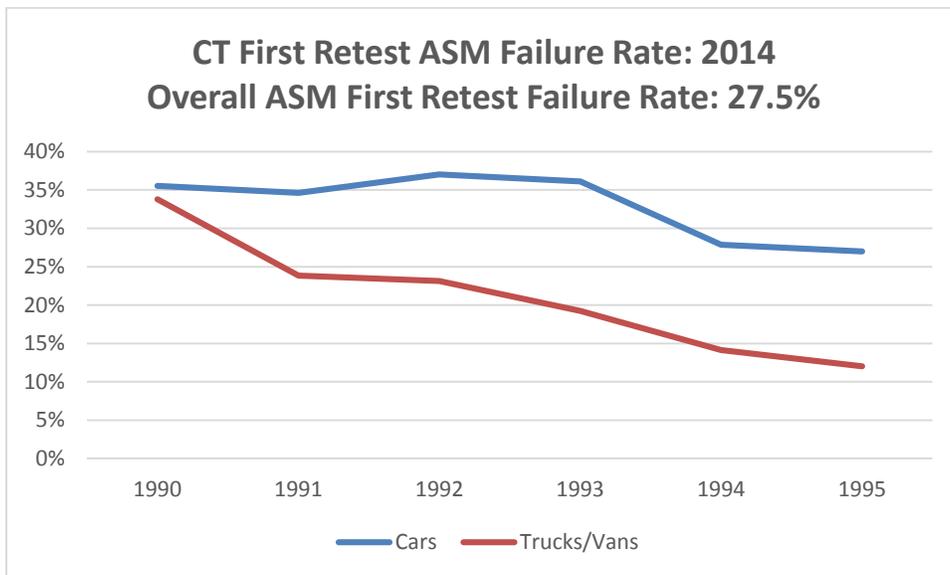
¹⁰ Readiness status for all monitors usually sets to not ready when a vehicle's battery is disconnected.



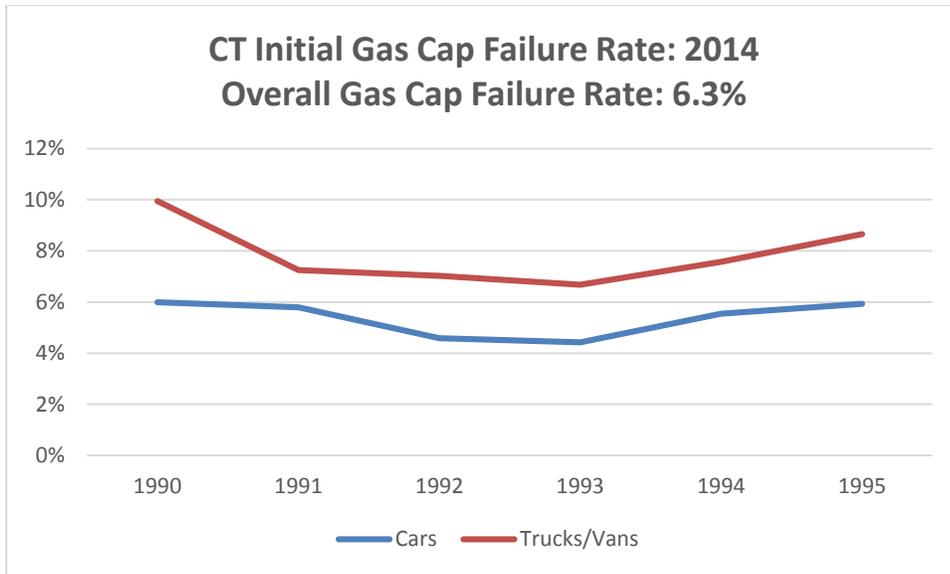
This chart shows the percent of vehicles by model year that failed their first retest. The failure rate is highest for the older model year vehicles, which is typical. Overall, 12.1% of the vehicles tested failed their first retest.



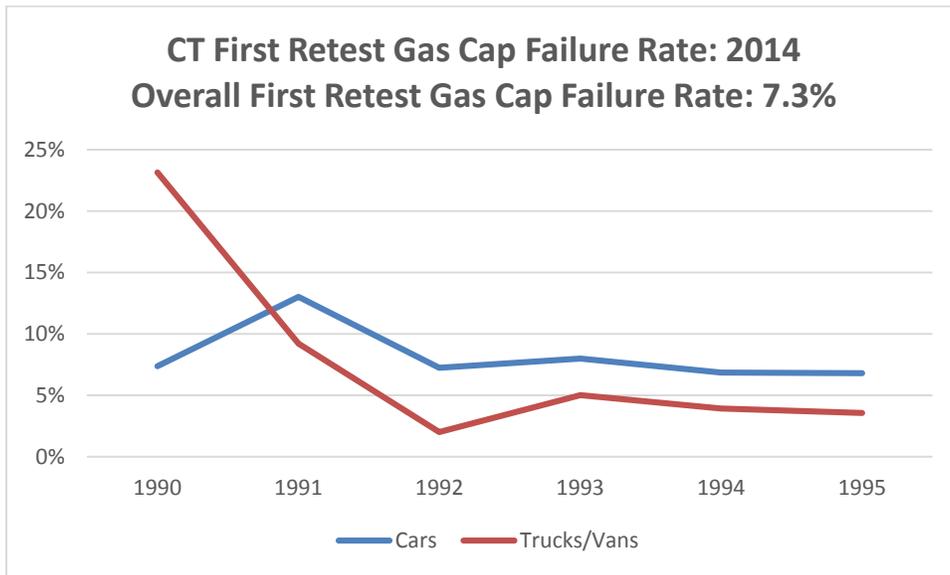
This chart shows failure rates by vehicle model year for the ASM test. The average ASM test failure rate for all vehicles was 14.0%. 1996 and newer model year vehicles received OBDII tests.



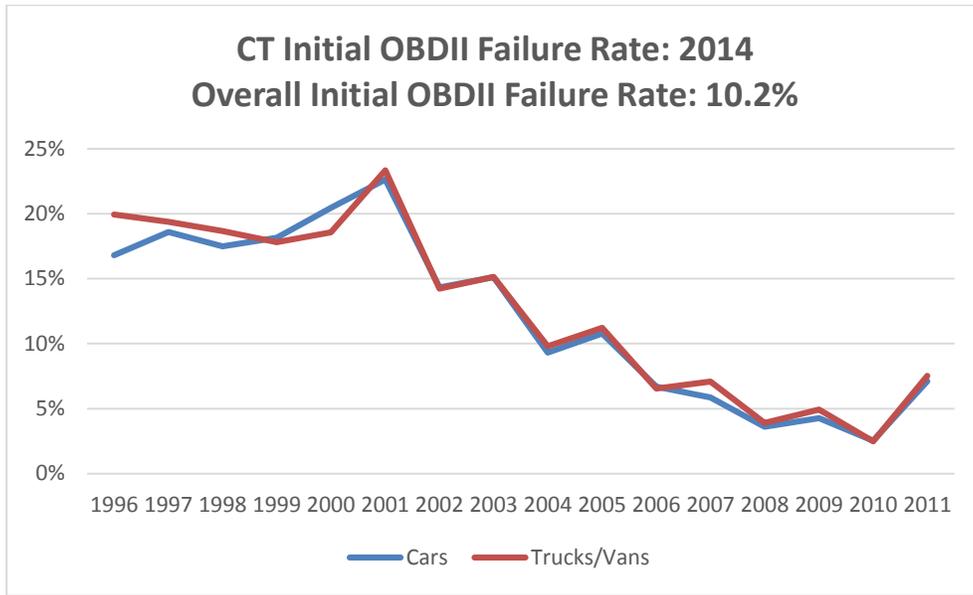
This chart shows the percentage of vehicles by vehicle model year that failed their first ASM retest. Overall, 27.5% of the vehicles failed the first ASM retest.



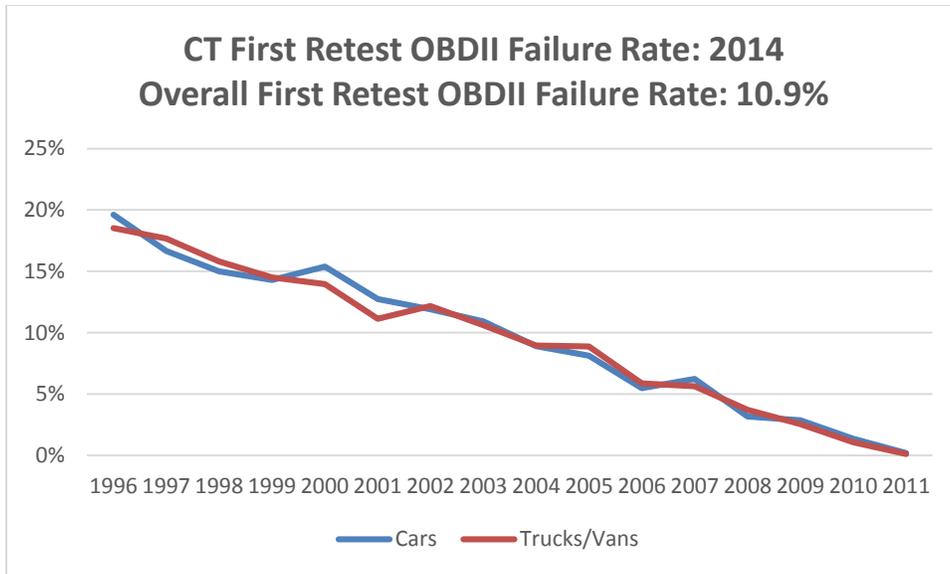
This chart shows the gas cap pressure test failure rate by vehicle model year. Overall, 6.3% of the vehicles that receive gas cap tests fail the test. 1996 and newer light-duty vehicles no longer receive gas cap tests.



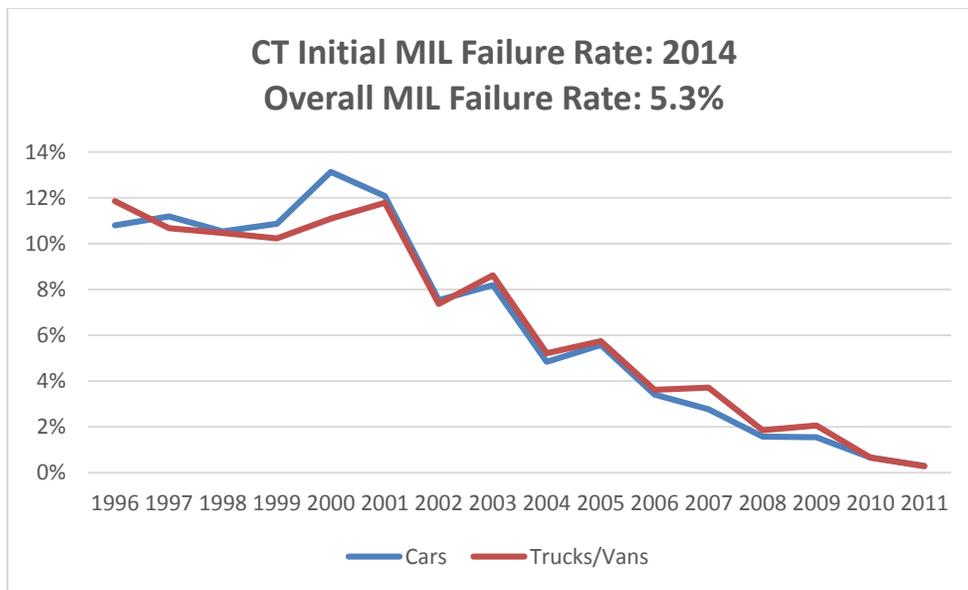
This chart shows the gas cap retest failure rate by vehicle model year. Overall, 7.3% of the vehicles that failed their initial gas cap test fail the first gas cap retest.



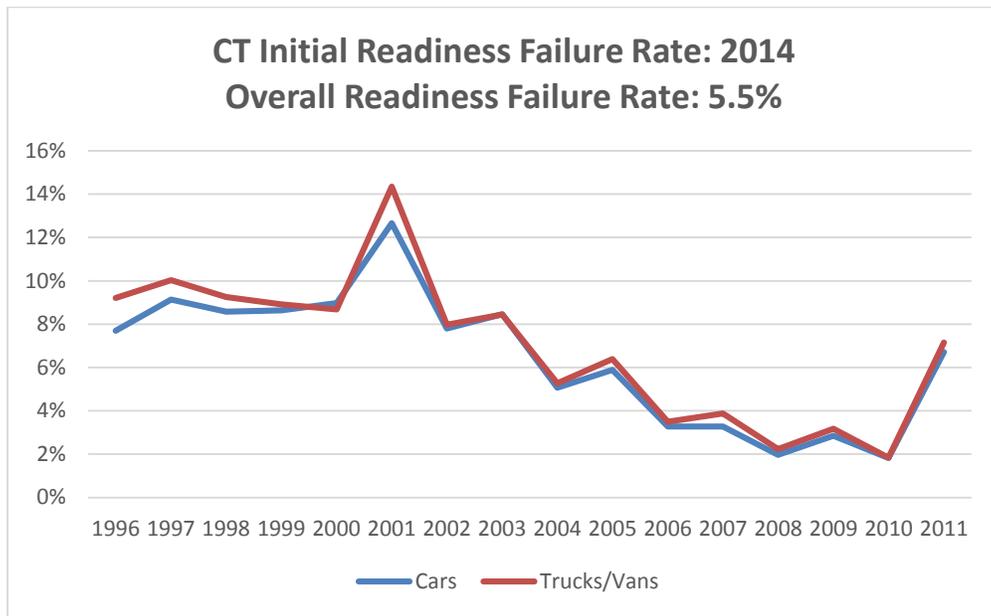
This chart shows failure rates by vehicle model year for the OBD test. The average OBD test failure rate for all vehicles was 10.2%. Typically, a higher failure rate for older model year vehicles is expected. 18% of the 1996 model year vehicles failed the test. EPA requires that the 2001 and newer model year vehicles have at most one monitor not ready as opposed to two for 2000 and older model year vehicles. This change in readiness requirement explains the slightly elevated failure rate for 2001 model year vehicles. The increase in failure rates for 2011 model year vehicles reflects a high “not-ready” rate for these models. The high initial failure rate for 2011 model year vehicles is due to the fact that over half of these vehicles had dealer plates. Vehicles owned by dealers typically have high not ready rates, because their batteries are often insufficiently charged, or had been disconnected during dealer prep.



This chart shows failure rates by vehicle model year for the first OBD retest. The average failure rate for all vehicles in the first OBD retest was 10.9%. Connecticut requires OBD failures to meet readiness requirements when retested. If a vehicle does not meet readiness requirements when retested, the inspection is aborted. Vehicles that are not ready on retest are not included in the above failed percentages.

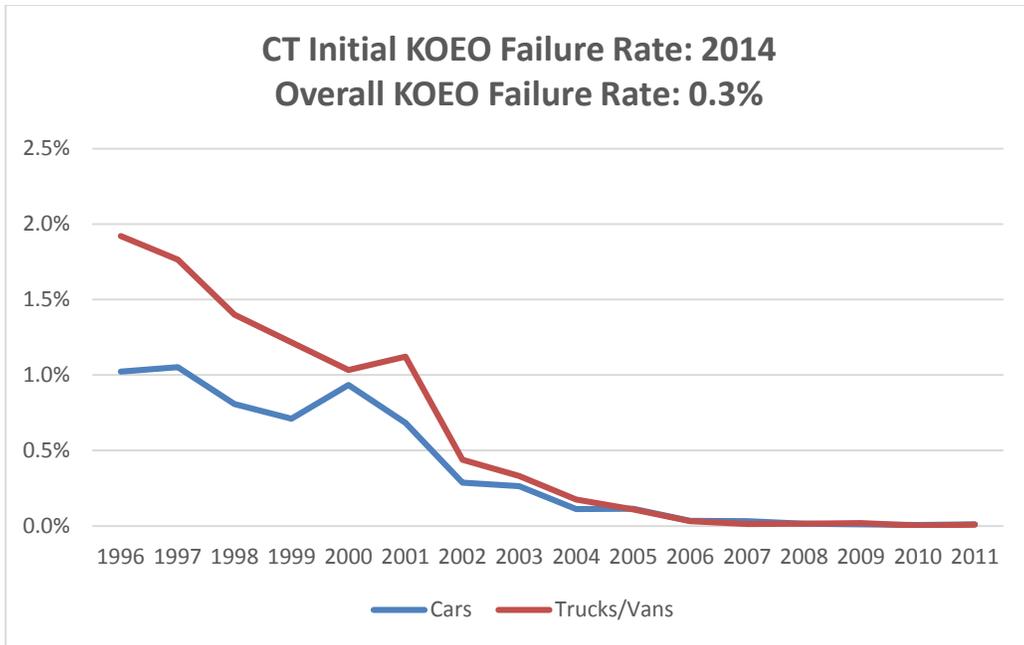


This chart shows the percentage of vehicles that fail the MIL Command check that's part of the OBD test. About half of the OBDII failures are for the MIL Command check. The average MIL failure rate for all vehicles was 5.3%. This graph shows that older model year vehicles have a higher failure rate, as expected.

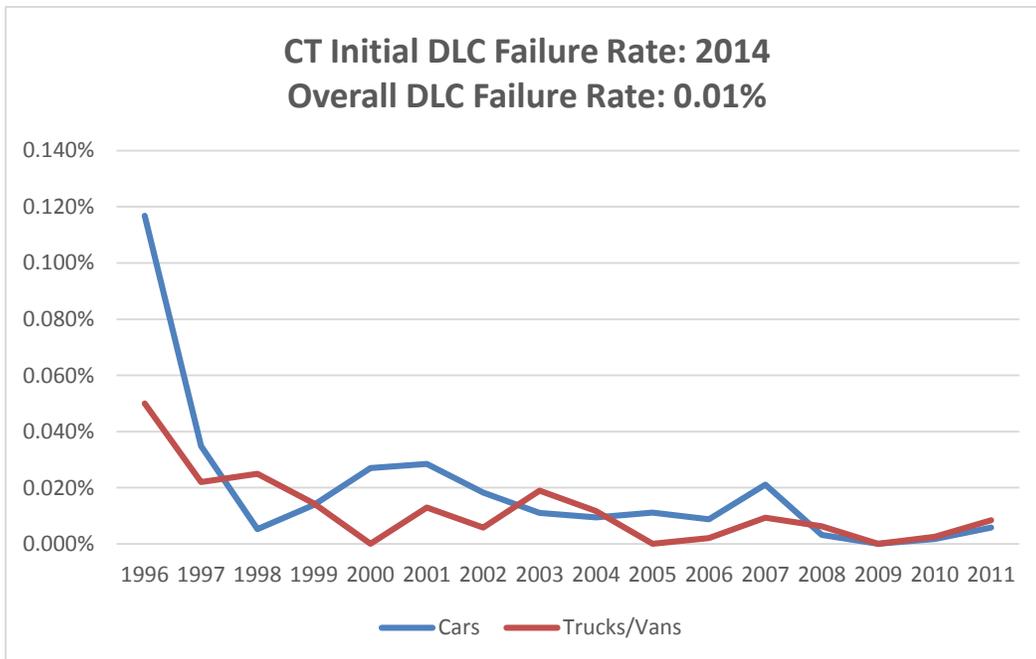


This chart shows the percentage of vehicles that exceed EPA’s readiness criteria. OBDII systems must indicate whether or not the onboard diagnostic system has monitored each component. Components that have been diagnosed are termed “ready”, meaning they were tested by the OBDII system. EPA requires that 2001 and newer model year vehicles have at most one monitor not ready as opposed to two for 2000 and older model year vehicles. This change in readiness requirement explains the elevated failure rate for 2001 model year vehicles. The high “not ready” rate for 2011 models is due to the fact that over half of the 2011 vehicles tested, had dealer plates. Vehicles owned by dealers typically have high not ready rates, because their batteries are often insufficiently charged, or had been disconnected during dealer prep¹¹. Overall, 5.5% of the vehicles failed EPA’s readiness criteria.

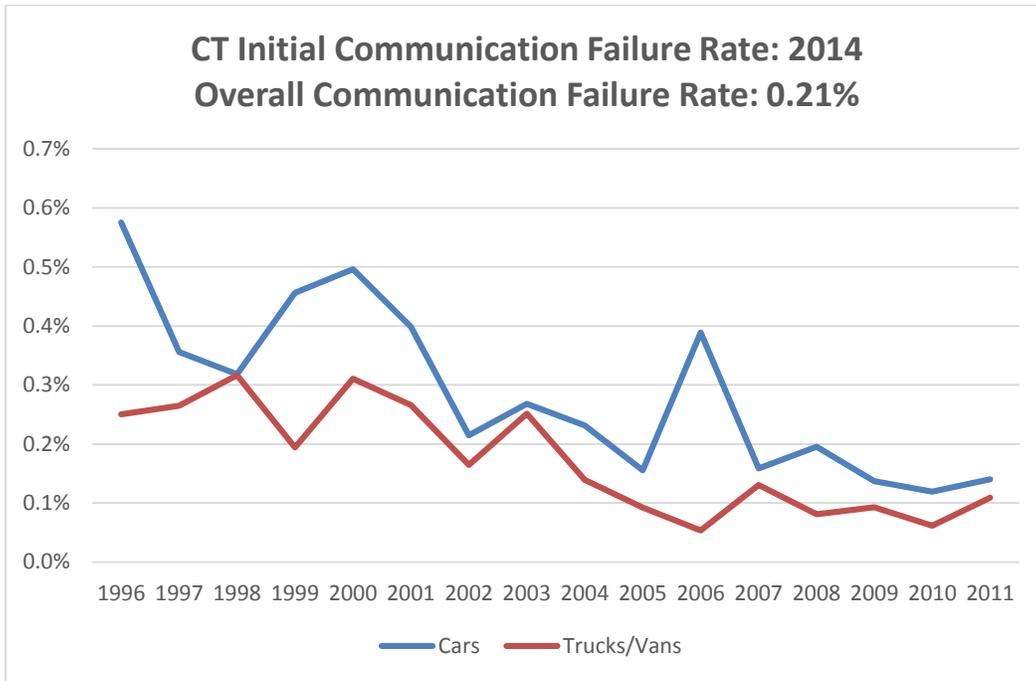
¹¹ Readiness status for all monitors usually sets to not ready when a vehicle’s battery is disconnected.



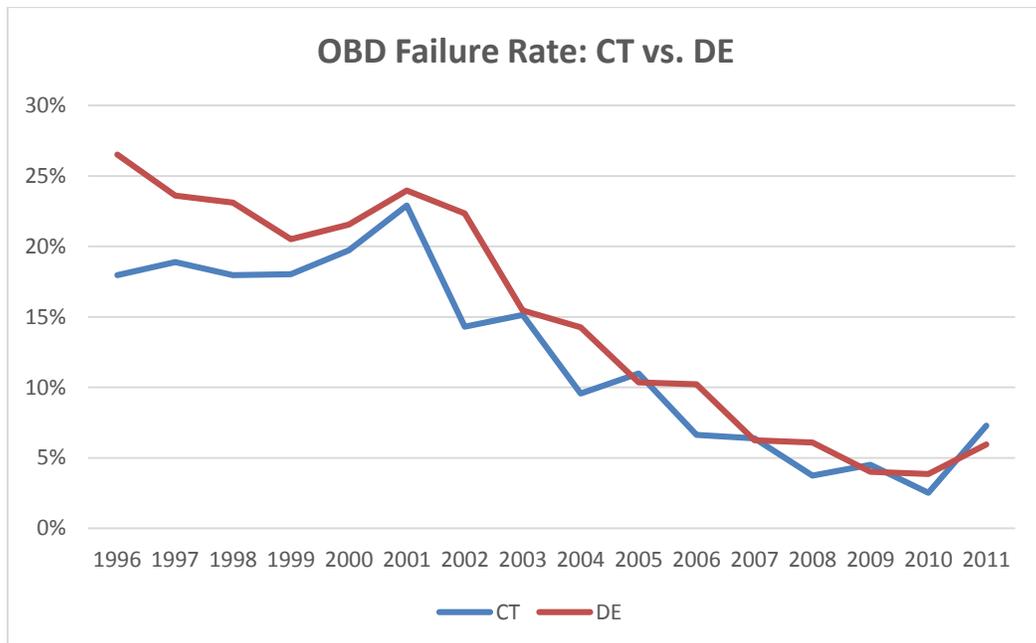
This chart shows failure rates by vehicle model year for the Key-On Engine-Off (KOEO) test, which is part of the OBD test. The KOEO determines if the MIL bulb is operational. The bulb should illuminate when the vehicle is turned on, but not started. The average KOEO failure rate for all vehicles was 0.3%.



This chart shows the percentage of vehicles that failed because the OBDII connector, termed the Data Link Connector or DLC, is missing, damaged or obstructed. Overall, few vehicles (0.01%) failed for this reason.



This chart shows the percentage of vehicles that failed to communicate with the OBDII test equipment. Overall, 0.21% of the vehicles failed for this reason.



This chart compares failure rates for the OBDII tests in Connecticut and Delaware. Delaware is a state-operated test-only program, which is considered by EPA to be a model for peak I/M performance. Failure rates in both programs are similar, which indicates that Connecticut's I/M program is failing an appropriate number of vehicles.

3.0 Observed Failure Rates for Diesel-Powered Vehicles

Diesel-powered vehicles with a GVWR of 10,000 lbs. or less are also tested in Connecticut's I/M program. Although the testing and reporting of diesel-powered vehicles is not required, historically Connecticut has reported on diesel testing. This report and Appendix B includes additional information on diesel initial testing, first retest as well as second and later retesting. If the vehicle is equipped with an OBDII system, an OBDII test is performed. Otherwise, the vehicle receives a test designed to identify excessive exhaust smoke opacity.

Failure rates for diesel-powered vehicles were calculated using test results from I/M test stations. Below is a brief description of the criteria used to determine if a vehicle passes or fails inspection.

Pass/Fail Criteria

Modified Snap Acceleration (MSA) Test: With this test, the throttle is "snapped" (i.e., accelerator is quickly pressed and then released) and exhaust smoke opacity is measured. This test is performed with the vehicle being in "neutral". The average of three snaps is calculated, and compared to the standard recommended by the federal government.

Loaded Mode Diesel (LMD) Test: Vehicles are tested using a dynamometer to simulate driving at 30 mph. Exhaust smoke opacity is measured.

OBDII Inspection: 1997 and newer model year diesels vehicles with GVWR of 8500 lbs. or less receive an OBDII inspection. The emissions test system is plugged into the OBDII connector and information on the status of the vehicle's OBD system is downloaded. Diesel-powered vehicles will fail the OBDII inspection if they have any of the following problems:

- Malfunction Indicator Lamp (MIL) is commanded-on and DTCs are stored;
- MIL not working (Termed Key-On Engine-Off, KOEO, failure);
- OBD diagnostic link connector damaged, missing or obstructed; and
- Excessive readiness monitors not ready based on the model year

Summary of Failure Rates for Diesel-Powered Vehicles

Following is a summary of test results for the January 1, 2014 to December 31, 2014 period. In 2014, 9,929 diesel-powered vehicles received opacity tests, and an additional 4,028 vehicles received OBD tests.

Test Type	Parameter	2014 Result
OBD	% Fail Initial	10.2%
	% Fail First Retest	6.3%
MSA	% Fail Initial	6.7%
	% Fail First Retest	28.8%
LMD	% Fail Initial	1.3%
	% Fail First Retest	1.3%

Appendix B has details on the OBD, MSA, and LMD test results for diesel and gasoline powered vehicles.

Conclusion: These failure rates are similar to rates found in previous evaluation reports. Outside of Connecticut, few states perform periodic tests on diesel-powered vehicles, so there is little basis for a comparison of Connecticut's diesel-powered vehicle failure rate with failure rates in other states.

4.0 Enforcement of Connecticut's I/M Program

Connecticut's program uses both registration denial and late fee assessment to assure compliance. This section presents an analysis of data relevant to the enforcement of Connecticut's I/M program. Statistics required by 40 CFR 51.366 are presented below, and in the Appendix B, with exception of 40 CFR 51.366(d)(1)(iv) and (v) which are not applicable to Connecticut's program.

Overall Compliance Rate

The overall compliance rate is based on an audit of registered vehicles. Connecticut committed to a 96% compliance rate for the vehicles subject to I/M requirements in the SIP. In 2014, 960,366 registration renewals were audited, resulting in 52,987 denials, of which 93.5% later complied. This works out to a 99.6% compliance rate, so the overall compliance rate exceeds the compliance rate specified in the SIP.

Late Fees: In 2014, 162,311 late fees were assessed for total fines to motorists of \$3.2 million. These fines serve as an effective motivation for compliance with inspection requirements.

Preventing Circumvention of Connecticut's I/M Requirement

EPA requires states to prevent motorists from avoiding I/M requirements by falsely registering vehicles out of the program area, or falsely changing fuel type or weight class on the vehicle registration. EPA also requires states to report on results of special studies to investigate the frequency of such activity.

- **Circumventing I/M Tests in Connecticut** – Circumventing I/M tests in Connecticut is nearly impossible. First, Connecticut implements the I/M program on a statewide basis. Second, Connecticut tests all fuel types, including hybrids, so motorists cannot avoid inspection by changing fuel type. It may be possible to avoid inspection by registering the vehicle with a GVWR greater than 10,000 lbs., but likely is limited in scope due to the added expense. The majority of vehicles registered with an incorrect GVWR are those where the vehicle owner registers the vehicle at a lower weight to avoid the added expense and would not be emission eligible (>10,000 lbs.) with their corrected weight.
- **Detection and enforcement against motorists that falsely change vehicle classifications to circumvent program requirements** – Historically, 99% of emission eligible vehicles in Connecticut are in the Passenger, Commercial or Combination classifications. Incidents of motorists modifying a vehicle's registration classification to a non-emission eligible class are rare, most likely because of the added expense, documentation and inspection requirements.
- **Vehicles registered in Connecticut that are operated out-of-state** – DMV took a random sample of approximately 20-25 time extension requests, to ascertain whether these vehicles had received numerous time extensions. As a result, it was found that many of the requests had received multiple time

extensions. Accordingly, DMV changed its policy so that it now complies with the intent of the extension. Specifically, under its current procedures, DMV will not allow a vehicle owner to receive numerous time extensions. These efforts are definitely helping to make vehicles registered in Connecticut emissions compliant. DMV assumes that vehicles are scrapped or registered out-of-state if they do not comply with I/M requirements.

Percent of Failed Vehicles That Ultimately Pass

To estimate whether *vehicles that failed their emissions test ultimately pass*, the fate of vehicles failing the I/M test in 2014 was evaluated. As Connecticut has done in previous reports per EPA recommendations, these results are calculated as the percentage of vehicles with no known final outcome as compared to vehicles that initially failed and do not receive a final pass.

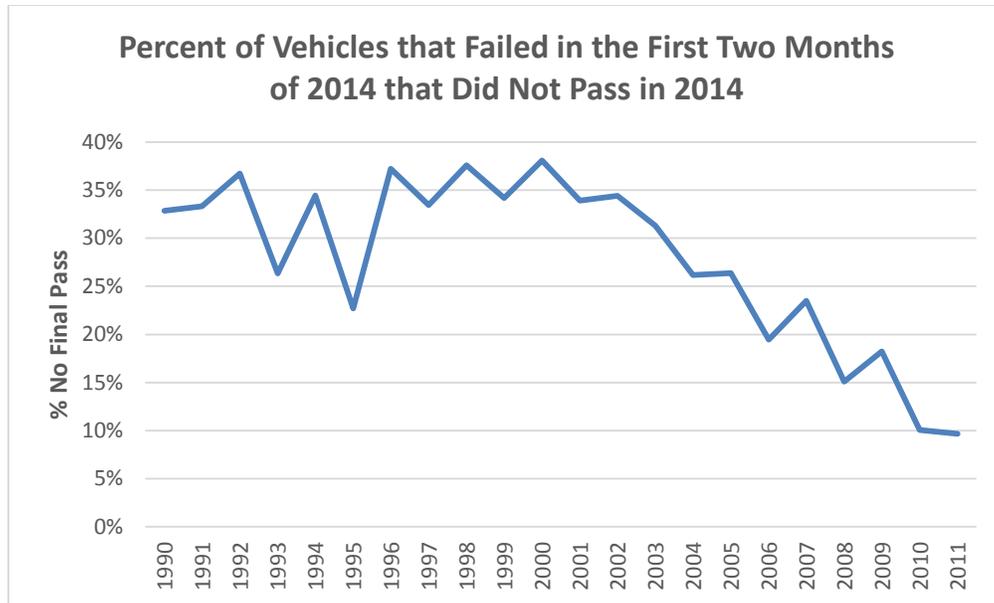
Failures for the first two months of 2014 were tracked through December 31, 2014. Results are shown in the table and figure below. Twenty nine percent of the failures during this two month period had not yet received a passing result or waiver. As noted in Appendix B, section (a) (2) (vi), the number of vehicles that passed retests equaled 81% of the number of failures in 2014¹². Ultimately, all vehicles must comply, or they cannot be registered in Connecticut, since I/M compliance is a prerequisite for vehicle registration. As noted above, Connecticut levied \$3.2 million in fines for late inspections. Overall, over 99% of the vehicles that were tested complied with I/M program requirements.

EPA's comments on the 2012-2013 Biennial Evaluation Report encourages states to improve the program performance by reducing the number of vehicles with no final outcome. This year's evaluation found that 19% of the failed vehicles had not successfully passed emissions testing by the end of 2014. To avoid vehicles that fail in a state with a strong enforcement program, such as Connecticut's, from subsequent re-registration, perhaps in a different state/area with more relaxed testing requirements, EPA suggests that state/areas with I/M programs consider developing Vehicle Identification Number (VIN)-based databases for vehicles that fail I/M tests and do not receive final passing results. Connecticut looks forward to EPA's leadership in developing partnerships with the other jurisdictions to improve the program by addressing the number of vehicles with no final outcome.

¹² The number of vehicles that passed retests in 2014 included vehicles that failed in 2013.

**Vehicles Tested from 1/1/14 to 3/1/14
with No Known Outcome**

Model Year	Initial Fail	Final Retest Pass	No Final Pass	% No Final Pass
1990	70	47	23	33%
1991	123	82	41	33%
1992	147	93	54	37%
1993	148	109	39	26%
1994	212	139	73	34%
1995	370	286	84	23%
1996	470	295	175	37%
1997	894	595	299	33%
1998	849	530	319	38%
1999	1,232	811	421	34%
2000	1,192	738	454	38%
2001	1,509	997	512	34%
2002	1,276	837	439	34%
2003	1,281	880	401	31%
2004	1,498	1,106	392	26%
2005	884	651	233	26%
2006	1,079	869	210	19%
2007	579	443	136	23%
2008	617	524	93	15%
2009	236	193	43	18%
2010	438	394	44	10%
2011	486	439	47	10%
TOTAL	15,590	11,058	4,532	29%



This chart shows the percentage of vehicles that failed the emission test in the first two months of 2014 that did not have a passing result in 2014. The increase from the 1995 to 1996 model year indicates that compliance with the OBD test may be more difficult than the tailpipe test used for pre-1996 vehicles. Ultimately, all of these vehicles must pass to be registered in Connecticut.

Waivers Issued

Another metric related to program efficacy is the number of waivers issued. Program effectiveness is inversely proportional to the waiver rate. As the following table shows, less than 0.2% of the vehicles that failed received waivers, indicating that the program is effective. This is much lower than the waiver rate committed to in the SIP and also much lower than the rates in many other states' I/M programs. Connecticut's I/M SIP committed to a waiver rate of 1%.

% of Failed Vehicles Receiving Waivers¹³ in 2014

Model Year	Passenger Car (P)	Truck (T)	Total # of Waivers	# of Failed Vehicles	% of Failed Vehicles Receiving Waivers
1990	3	0	3	564	0.53%
1991	1	0	1	685	0.15%
1992	2	0	2	861	0.23%
1993	0	0	0	976	0.00%
1994	1	0	1	1441	0.07%
1995	4	0	4	1930	0.21%
1996	3	0	3	3032	0.10%
1997	7	6	13	4589	0.28%
1998	6	3	9	5740	0.16%
1999	7	3	10	6558	0.15%
2000	13	3	16	7291	0.22%
2001	18	7	25	9344	0.27%
2002	13	7	20	12269	0.16%
2003	12	7	19	7489	0.25%
2004	8	9	17	10282	0.17%
2005	6	6	12	5704	0.21%
2006	6	6	12	7053	0.17%
2007	5	0	5	3239	0.15%
2008	1	1	2	4232	0.05%
2009	0	0	0	1388	0.00%
2010	0	0	0	2664	0.00%
2011	0	0	0	2161	0.00%
Total	116	58	174	99,492	0.17%

¹³ Diagnostic and Cost waivers combined.

Waiver of late fees for special conditions

General Motors initiated a massive safety recall to address vehicle ignition switch problems. Public safety concerns called for the expedient repair of these vehicles. However, a delay in receiving the necessary parts, prompted Governor Dannel Malloy and DMV Commissioner Melody Currey to waive late inspection fees for owners of affected vehicles. Also, late fees were also waived due to severely inclement weather during the winter of 2013-14. DMV staff verbally reported that their review of records revealed that all of the vehicles receiving time extensions were ultimately tested and these testing results are incorporated into the program metrics. Statistics are summarized below:

- Total number of General Motors vehicles whose late fees were waived between April 9, 2014 and October 31, 2014: 792
- Total vehicles whose late fees were waived for inclement weather February 5 – 11, 2014: 86
- Total vehicles whose late fees were waived by for inclement weather February 13 – 22, 2014

Fleet equipment issues

Connecticut initiated a pilot fleet testing program in 2004, with two fleet testing stations: AT&T and Cablevision Systems Corporation. The program expanded in 2005 and 2006 to include additional fleet testing stations, including several municipalities and state agencies. The fleet program is voluntary and exists as a means to assist businesses by offering them the flexibility to test their own vehicles. However, DMV, in an attempt to formalize the program, suggested that the vendor offer maintenance contracts to support the fleet testing equipment. Thus, the vendor offered one and two year maintenance contracts.

Even though these maintenance contracts expired in 2007 and 2008, the vendor continued to maintain the equipment until 2013, when maintenance support decreased. One issue that arose in 2014, not addressed by the vendor, was a VIN decoding software glitch that would not allow the fleet analyzer to test vehicles newer than 2009. As a result, DMV reported issuing 106 six month time extensions to affected vehicles so they could be registered. Of the 106 time extensions, 83 were issued for the VIN decoding issue and 23 were issued because the fleet testing equipment was out of service for repair. Of the 106 vehicles that received time extensions, 12 were subsequently tested and passed. For the other vehicles which are not registered and therefore not subject to registration denial, such as municipal vehicles, DMV advised their fleet managers to wait until a resolution to the problem was implemented.

DMV began transitioning the fleet program to Applus with new equipment and a new database in 2013. The owners or operators of all fleets will be invited to participate in the revised fleet vehicle testing program. Once then new fleet program is implemented, fleet vehicles that are out of compliance will be tested in the new program. If an existing fleet facility does not participate in the new program, its fleet vehicles will revert to the standard I/M program.

There are currently (32) fleet test stations. Three of the existing state agencies and two new state police testing stations will receive new analyzers first. The remaining 29 fleet stations may then choose to participate in the new fleet program. Any non-exempt fleet vehicles no longer within the fleet program will be tested in the standard I/M program. , since the systems are linked. The transition time line for the fleet testing program is dependent on implementation of DMV's upgraded computer system. DMV expects that full implementation of the new fleet program will be completed during the first half of 2016. DMV is unable to determine the number of fleet vehicles that have not received timely emissions testing.

Two year waivers issued to plug-in hybrid electric vehicles due to testing equipment issues

Challenges presented by testing the General Motors 2011 model year Volt resulted in two year waivers being issued while Connecticut's emissions testing equipment is upgraded to accommodate these vehicles. DMV is working with Applus to adopt testing methods used in Applus equipment being operated in California.

In conclusion, Connecticut exceeds SIP requirements for enforcement of motorist compliance. The compliance rate in the Connecticut SIP is 96%. Connecticut actively investigates non-compliance, and assesses a large number of fines for vehicles that are not presented for emission inspection, in a timely manner.

Enforcement of Proper Test Procedures through Trigger Reports and Video Audits

Connecticut is a model for other states in how to enforce proper I/M test procedures. Connecticut actively looks for cases where inspectors may be performing improper inspections, passing vehicles that otherwise should fail. The following is a summary of how Connecticut ensures that stations perform proper inspections.

Trigger Audits

DMV and its contractor, Applus, run extensive trigger reports to assure that inspection stations follow proper test procedures. DMV requires Applus to maintain quality assurance measures, which they meet by conducting additional audits. Specifically, Applus performs a large number of digital audits and quality assurance reviews on a daily, weekly and monthly basis. Many of the reports are automated by the Applus MiniVID, and distributed, via email to DMV and Applus QA staff. In addition, the reports are available on the program dashboard for review at any time, and they are available for any time frame.

Trigger reports look for anomalies in data recorded during inspection. These reports help DMV identify stations performing fraudulent or inaccurate inspections. Triggers focus on finding the following types of fraud:

- Clean Scanning: Performing an OBDII test on a fault-free vehicle instead of the vehicle that should be tested;
- Clean Piping: Performing a tailpipe test on a passing vehicle instead of the vehicle that should be tested.

These reports are generated frequently to identify stations performing improper inspections. Connecticut promptly investigates all significant cases of possible inspection fraud. Following is a list of some of the trigger reports:

- OBD Testing Triggers:
 - All OBD Monitors Unsupported;
 - A/C Monitor Ready or Not Ready;
 - OBD Short Time Test, less than 30 minutes;
 - OBD VIN Mismatch;
 - Monitor Mismatch;
 - PID/PCM Mismatch;
- ASM/PCTSI Triggers:
 - ASM Short Time Test, less than 30 minutes;
 - Looser ASM Cut Points;
 - Vehicles with GVWR greater than 8,500 pounds;
- Other Triggers:
 - VIN Entry Type;
 - Inspector ID Entry;
 - Offline Percentage;
 - RPM Bypass;
 - No Saturday/Holiday Testing; and
 - Missing Video/Test Image.

Applus' MiniVID also generates the following automated alerts:

- Weather (temperature, humidity, pressure);
- EDBMS Offline;
- CDAS Offline;
- Test Center Not Testing; and
- Failed/Expired Calibrations Report.

A new quality assurance process was put in place to identify those stations that either perform the minimum amount of calibrations, or fail to contact Applus for service, when one of the calibrations fails. Each day, Applus performs a Failed/Expired Calibration Report to ensure that the entire network is in compliance with calibrations. Test Centers with failed calibrations, and no open service tickets, or facilities with expired calibrations are immediately locked out, to prevent use of the analyzer. This process was put in place to discourage Test Centers from waiting until a motorist arrives to complete the remaining calibration (ASM, PCTSI, opacity tests).

Special Triggers for Diesel Opacity Tests

All diesel-powered vehicles up to 10,000 lbs. GVWR are subject to the loaded mode opacity test utilizing the dynamometer. Because inspectors are accustomed to performing PCTSI tests on non-diesel-powered vehicles over 8,501 lbs. GVWR, most assumed the larger diesel vehicles would require the equivalent stationary diesel test. Unlike the ASM tests, which require authorization to switch a vehicle from ASM to PCTSI test, opacity tests require no such authorization. In 2014, Applus implemented a new quality assurance report to identify these vehicles and inspectors for corrective action.

Camera Audits

There are three cameras connected to the emissions analyzer. If anyone of them fail or become unplugged, the emissions analyzer will set a lockout to prevent the use of the workstation. In addition, the Applus VID will generate non-compliance report for any emissions test transmitted with a missing test and video file. However during the normal operations at the Test Centers, cameras may become misaligned or obstructed. Using the program dashboard, Applus performs camera audits of all three cameras, at each Test Center. Each camera is turned on to ensure it operates as it should, the viewing angle is verified with no obstructions and the test video is recording. If an issue is identified that requires an onsite visit at the Test Center, a service ticket is generated and dispatched to the Applus field service. In 2014, Applus performed 2,075 Test Center camera audits; eight service tickets were opened to address alignment/refocusing issues, and three service tickets were opened to improve video recording angle.

DMV Video Audits

At any given time, two DMV auditors are assigned to perform video audits and other functions. Video audits monitor inspections during station operating hours via digital web cameras. Video audits have the following features:

- Real time monitoring/control of vehicle inspections;
- Video auditors can selectively view inspections; and
- If violations are detected, DMV cites the CTI.

Fraudulent Test Rate

Based on an independent review of trigger data, less than 0.1% of the inspections were suspect. This indicates that inspection fraud is not a serious problem in Connecticut.

Conclusion: Evaluation of the data demonstrates that Connecticut vigorously enforces proper inspection procedures. Inspection fraud is not a problem in Connecticut's I/M program. Connecticut actively investigates possible cases of inspection fraud and initiates corrective action. Less than 0.1% of the tests in Connecticut are suspect.

5.0 Quality Assurance Audits

The DMV and their contractor, Applus, perform the quality assurance (QA) audits required by EPA. Following is an overview of Connecticut's audits, and other QA activities conducted by DMV.

Overt Audits

EPA requires that Overt Audits be performed twice per year per station. DMV meets these requirements through use of the Emission Test Monitoring Report (ETMR). DMV Motor Vehicle Agents perform Overt Audits, and during each audit, they complete an ETMR form, which is then turned into their supervisor for review. These reports are then kept on file for three years. Each ETMR represents one station's overt audit.

Connecticut prepares ETMRs more frequently than required by EPA. Each month, at least one ETMR is performed on each station. In addition, Applus also performs overt audits. Connecticut also checks more items than required by EPA. Connecticut is continuing to evaluate the auditing process to build upon the program's success.

Stations	2014
Total Overt Audits Performed	2,388
No. of Stations Audited	225
No. of Times Each Station Was Audited (range)	1 ¹⁴ -21
No. of Stations That Passing Audits for the Entire Year	143
Total Number of Audits for which One or More Issues Were Reported	152
No. of Stations That Had Issues	82
No. of Stations That Had 1-3 Issues	75
No. of Stations That Had 4-6 Issues	5
No. of Stations That Had 7-9 Issues	2

<u>Agents</u>	2014
No. of Agents That Performed Audits During the Course of the Year	10
No. of Agents That Are No Longer Performing Overt Audits	2
No. of Agents That Are Currently Assigned to Perform Audits	8
No. of Audits per Agent (range)	9-603
No. of Station Issues Reported per Agent (range)	1-82

¹⁴ Some stations only received one audit because they either left the program in the beginning of the year or entered the program toward the end of the year.

Equipment Audits

Connecticut meets EPA's requirements for equipment audits. EPA requires that equipment audits be performed twice per year per station. In Connecticut, DMV performs at least two equipment audits each year in stations performing tailpipe tests. In addition, Applus performs additional equipment audits. Connecticut checks more equipment items than required by EPA. While an audit may require a station to discontinue tailpipe testing, it can continue OBD testing. Therefore, no stations were totally shut down due to a failed gas equipment audit. Results are presented below. In 2011 before the new equipment was installed, 67% of the stations failed equipment (gas) audits, while in 2014 this percentage dropped to 29%. The drop was due to the roll out of new, more reliable emission test benches in the new program.

Results of Equipment Audits

Parameter	2014
Total Equipment Audits (Some stations either left the program in the beginning of the year or entered the program toward the end of the year.)	447
Total Stations that Failed Equipment Audit	130
Percentage of stations that failed an equipment (gas) audit	29.08%
Number of stations totally shut down as a result of a failed equipment (gas) audit ¹⁵	0
Percentage of stations shut down as a result of failed equipment (gas) audit	0.00%

The Connecticut Vehicle Inspection Program, by Federal guidance, does not have any emissions testing stations that perform enough emissions tests to be classified as high volume. Final Technical Guidance (EPA 420-B-04-011 July 2004) provides that high volume stations are those that perform 4,000 or more emissions tests per year. High volume stations are required to be audited monthly. Below is a list of 25 emissions testing stations with the largest volume of ASM Testing for testing year 2014. None perform close to 4,000 inspections per year.

¹⁵ Stations that fail equipment audit are prohibited from performing tailpipe emission testing until the equipment problem was resolved. Stations were allowed to continue to perform OBD testing.

ASM Test Volume by Station

Station ID	Total of all Test Types	Fail	Pass	# of ASM Tests
ST0003449	15,371	221	853	1074
ST0003192	15,501	173	696	869
ST0003432	14,184	178	598	776
ST0004867	10,751	159	487	646
ST0004257	9,885	128	510	638
ST0001193	9,473	128	493	621
ST0000725	9,113	125	467	592
ST0003548	10,093	110	463	573
ST0004107	14,830	108	436	544
ST0000581	10,865	79	460	539
ST0001876	9,475	56	437	493
ST0001805	7,724	99	388	487
ST0002880	7,244	72	404	476
ST0004722	14,677	80	391	471
ST0003498	8,352	75	372	447
ST0004854	10,573	73	371	444
ST0004788	6,580	103	338	441
ST0005016	7,840	63	375	438
ST0000386	11,060	63	368	431
ST0003107	6,536	69	349	418
ST0001401	5,349	91	320	411
ST0001297	5,953	74	335	409
ST0002964	8,834	73	336	409
ST0000776	7,728	56	341	397
ST0001216	9,196	64	327	391

Covert Audits

EPA requires that covert audits be performed at least once per year per station. DMV meets these requirements by performing covert audits and video surveillance audits. During 2014, DMV performed 775 covert audits and 1,529 video surveillance audits. Video audits repeatedly have been proven to be as or more effective than covert audits in detecting fraud. DMV performs video surveillance audits on a semi-random basis. After each station receives a video audit, DMV starts a new cycle of audits.

As noted above, DMV performed 775 covert vehicle audits in 2014. Most stations received at least two audits. To address EPA's comments on the 2012 Annual Report, vehicles requiring OBD, ASM and PCTSI tests are used for covert audits. Some of the vehicles are set to fail. Details are provided in Appendix B. Connecticut exceeds EPA's requirements for covert audits by a significant margin.

Warnings are routinely issued for false passes if DMV does not find that the CTI intentionally or negligently falsely passed a vehicle, thus there can be a difference between the number of false passes and suspensions. Suspensions are usually associated with violations found from trigger reports and data audits. Most false passes are for minor procedural errors, such as failing to perform the visual MIL check correctly. Unless the station repeats these errors, they are issued warnings rather than being suspended.

As stated in the Applus contract, and in the Applus Station Agreement, a CTI is suspended (pending an investigation) when it is determined that the false pass was the result of intentionally improperly passing a failing vehicle. Most errors identified by covert and video surveillance audits were determined to be unintentional and due to poor attention to detail. However, a second occurrence of making a careless error, such as missing or incorrectly answering the MIL question, results in an automatic suspension.

As noted above, the Connecticut I/M program is a model for running trigger reports and following-up on the issues identified as a result of these reports. Suspensions for violations other than covert audit findings or triggers were for various reasons as outlined in the contract under "Inspector Violations," including, but not limited to data entry errors or incorrect test procedures. The statutory and regulatory authority for the I/M program does not allow Connecticut to issue fines or hold hearings concerning inspectors that falsely pass vehicles in covert audits. Instead, these inspectors are suspended from testing. Whether or not to suspend a station depends on the assessment of the severity of the infraction by Applus.

Contractor Quality Assurance (QA) Activities

The contractor, Applus, performs comprehensive overt and equipment audits biennially, at each facility that participates in the inspection program. These unannounced audits include:

- The visual inspection and physical condition of the testing equipment;
- Equipment integrity checks using traceable/certified audit equipment; and
- Observation of the proficiency of at least one inspector.

The contractor's auditor evaluates the physical condition, functionality, and inventory of all the required emissions components and any ancillary safety items (restraining straps, wheel chocks, dynamometer tie down hooks, etc.). The emissions analyzer must pass calibrations (leak check, gas bench, dynamometer, gas cap, OBD, and opacity, if equipped).

In addition, there are several system components that are audited using National Institute of Standards and Technology (NIST) certified and traceable audit equipment:

- Gas Bench(s) Audit – NIST traceable audit gas
- Weather Station Audit - Certified temperature/humidity/pressure probes
- Opacity Audit - Reference filters (20%, 35%, 50%, and 75%)
- OBD System Audit – EASE OBDII Verification Tester

In accordance with the Quality Assurance and Quality Control Plan, the contractor's auditor uses a pre-printed checklist to inventory and record the physical condition of the test equipment. All non-conforming items are addressed immediately; the auditor's van is equipped to replace missing station inventory at the time of the audit. If an issue is identified that cannot be addressed by the auditor, he or she will create a service ticket for Applus field service.

In 2014, the contractor's auditor performed 442 audits; 329 audits passed, and 113 failed. Most common failures included gas bench calibration or gas bench audit.

Built-in Anti-Fraud Prevention Systems

In addition to Connecticut's efforts to eliminate fraudulent and inaccurate tests, the State's contractor, Applus, has implemented systems to prevent fraud, including the Connecticut Decentralized Analyzer System (CDAS), provided by Applus, which has features to assure that accurate emissions tests are performed. These systems and features are listed below:

- Secure iris recognition system – use of biometrics
- Sample system leak check
- Analyzer gas calibrations – Every 72 hours or system will lock out testing

- CDAS units require a two point calibration with BAR 97 high gas followed by BAR 97 low gas blend
- CDAS units have passed BAR 97 certification tests
- Dynamometer undergo a coast down every 72 hours
- Raw transport time verification
- Various other hardware checks are done every 72 hours
- Low sample flow, sample dilution checks etc.

Conclusion: Connecticut exceeds EPA's recommended levels of quality assurance. High quality, fraud-free inspections are the norm in Connecticut.

6.0 Assessment of OBD Testing Issues

Vehicles with Readiness Issues that are Not Currently Exempted from Readiness Requirements

EPA allows states to exempt vehicles from readiness requirements if they have design flaws that cause them to frequently fail for readiness. In 2007, Connecticut updated its readiness exemption list to include vehicles that had extremely high not ready rates. Based on data from tests performed in 2014, no additional vehicle models need to be added to the readiness exemption list. ***Connecticut does not need to update its readiness exemption list at this time.***

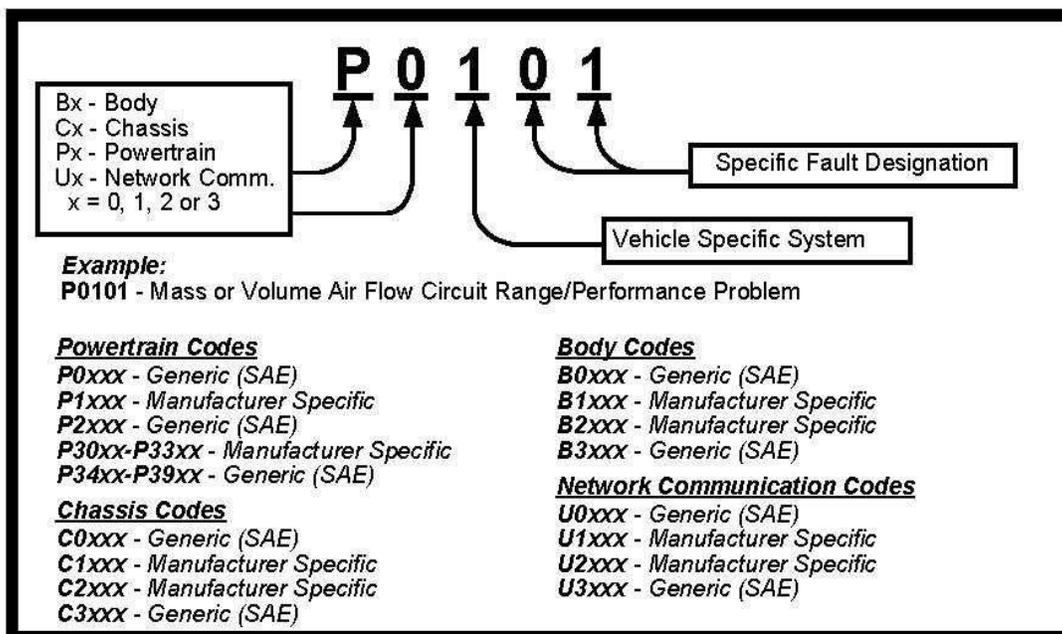
Vehicles That Fail to Communicate with Connecticut's Test System

A small percentage (0.2%) of the vehicles with OBDII systems fail to communicate with Connecticut's inspection system. This is much lower than the no-communication rate observed with the old testing equipment in 2011 and earlier years, indicating that the new OBD inspection equipment works well. For this report, Connecticut analyzed 2014 inspection data to determine no communication rates by year, make, and model. Specific year/make/models that had high no-communication rates are shown below. Applus continues to investigate why CDAS have difficulty communicating with these vehicles. As mentioned in the next section, Applus will be implementing a new OBDII interface termed DAD (Data Acquisition Device).

Specific Vehicles with High No Communication Rates			
Year Make Model	# Fail COM	% Fail COM	Count
2006_Mercedes-Benz_C-Class	107	29.40%	364
1996_Hyundai_Accent	4	20.00%	20
2009_Mitsubishi_Eclipse	3	12.00%	25
2003_Mazda_MAZDA6	23	11.33%	203
1999_Audi_A8	2	10.00%	20
1999_Mazda_626	14	9.59%	146
2004_Mazda_MAZDA6	55	9.34%	589
2001_Mazda_MPV	7	8.97%	78
2010_BMW_1 Series	3	8.57%	35
2002_Mazda_MPV	8	7.21%	111
1996_Ford_Thunderbird	2	6.90%	29
2000_Audi_A6	12	6.22%	193
1997_Hyundai_Elantra	2	6.06%	33

Diagnostic Trouble Codes (DTCs) Recorded in OBDII Failures

The Malfunction Indicator Light (MIL) is part of the OBD system and is used to alert the driver of a potential issue with the vehicle's computerized engine management system. Whenever the MIL is illuminated a Diagnostic Trouble Code (DTC) should be stored in the vehicle's computer. DTCs describe the problem that caused illumination of the MIL. Before OBDII, each manufacturer had their own specific trouble code list and code definitions. Under the OBDII requirements, all manufacturers must comply with a standardized convention for DTCs. The universal DTC format consists of a 5-character alphanumeric code, consisting of a single letter character followed by four numbers. The following is an example of the standardized coding for DTCs.



Top 10 DTCs in Connecticut

Following is a list of the most prevalent DTCs in Connecticut in 2014. This table lists the ranking of the most prevalent DTCs along with the frequency of its occurrence, expressed as a percentage of MIL-On cases. Note that the top 10 DTCs are present in about 61% of the MIL-on cases in 2014, even though there are over 1000 possible DTCs.

Connecticut's Top 10 DTCs -- 2014

DTC	Rank	%
P0420 – Low Catalyst Efficiency	1	13.61%
P0171 -- System Too Lean: Bank 1	2	7.92%
P0442 -- Evaporative Emission Control System Leak Detected (small leak)	3	7.43%
P0455 -- Evaporative Emission Control System Leak Detected (gross leak)	4	7.09%
P0300 -- Random Misfire	5	5.79%
P0174 -- System Too Lean: Bank 2	6	4.46%
P0141 -- O2 Sensor Heater Circuit Malfunction	7	3.85%
P0440 -- Evaporative Emission Control System Malfunction	8	3.85%
P0135 -- O2 Sensor Heater Circuit Malfunction	9	3.71%
P0128 -- Coolant Thermostat (Coolant Temperature Below Thermostat Regulating Temperature)	10	3.62%
Total of the top 10		61.33%

7.0 Program Enhancements in 2014 and in the Future

DEEP and DMV evaluate Connecticut's I/M program to ensure that it continues to operate accurately and effectively while assuring air quality benefits are achieved. In 2011, DMV executed a new contract to upgrade the I/M program. The new program continues to perform tailpipe tests on pre-1996 vehicles, which do not have OBD systems. This will maintain the air quality benefits necessary to meet Clean Air Act requirements and statutory restrictions.

The new program upgraded the inspection equipment. A new type of bench, which is known to be more reliable, was utilized, resolving the high rate of equipment (gas) auditing failures. The OBDII interface has much lower no-communication rates than the old interface. Another significant improvement is that the vendor now supplies the vehicles for covert auditing, while DMV staff continues to conduct the audits. Connecticut will continue with stringent quality assurance and fraud detection activities.

In 2014, additional enhancements were made in the following areas:

1. Cleaned-up the Certified Inspector (CTI) records in the Electronic Data-Base Management System (EDBMS): For various reasons, over the years, there were inspectors that should have been deactivated, locked-out, and unassigned from stations but instead remained in the EDBMS. To ensure that only currently certified CTIs test, the list of active CTIs in the EDBMS was reviewed and updated in 2014, which resulted in a reduction from previous years. Furthermore, DMV took the following additional steps to ensure that the list remains as up to date as possible:
 - a. All test stations were contacted, and asked to verify their currently employed CTIs, and the EDBMS was updated, accordingly.
 - b. Based upon this change in policy, a monthly query is now run that identifies CTIs that have not performed tests in the last six months, or more. Once these individuals are identified, the CTI gets locked out, deactivated, and unassigned. At this juncture, the CTI would be required to attend a full eight hour training session, in order to resume testing.
 - c. Stations are now required to provide a staffing plan before any new training applications are processed. Any assigned inspectors not on the staffing plan will be locked out, deactivated, and unassigned.
2. Diversity Language Changes: DMV expanded efforts to inform stakeholders of its zero tolerance policy for any type of discrimination or inappropriate comments.
 - a. The DMV added a diversity section to the CTI and recertification training classes. This issue was merged into the state portion of the class, and is taught by DMV personnel. This new section explains zero tolerance, within any aspect of the emissions program, for any type of

discrimination, including but not limited to race, gender, creed, color, sexual orientation, or any other type of discrimination.

3. New Emissions Database Management System (EDBMS): The old EDBMS was old and had frequent outages. The EDBMS has been in service since 2003. In 2014, there were multiple outages, mostly for unknown and unexplained reasons. Often, when the server was slow, or not responding, the resolution was to shut it down and restart it. During 2014, DMV worked with a consultant to develop specifications for the new EDBMS:
 - a. DMV began developing the new EDBMS with the new EDBMS vendor (Applus) and began preparing to transition from the old vendor.
 - b. DMV initiated the integration of the Connecticut Integrated Vehicle and Licensing System (CIVLS), which is the new upgraded computer system that will be used by DMV for licensing and registration, into the EDBMS
4. Improved Auditing Procedures:
 - a. The calibration gas manufacturer now guarantees that the gas cylinders have been recently filled. This eliminates the problem of DMV purchasing expired or close to expired gases.
 - b. In 2014, DMV revised the Emission Test Monitoring Report (ETMR). The revised ETMR now requires a station manager's signature, requires the agent to record the expiration dates of all calibration gas cylinders that are in use, and instructs the agent to observe only one emissions test, if available, before proceeding to the next station.
5. Analyzer Upgrades: The following analyzer upgrades were made in 2014:
 - a. To ensure that an accurate engine temperature is recorded during inspections, a software change was implemented in the Connecticut Decentralized Analyzer System (CDAS). This change prevents ASM, TSI, and opacity tests from going forward if the recorded engine temperature exceeds 250°F.
 - b. During PCTSI and opacity tests, Applus added a screen prompt for the CTI to use the cooling fan when the ambient temperature exceed 70 degrees. Previously, this prompt only appeared during ASM tests.
 - c. Preventative maintenance on CDAS was enhanced:
 - i. DMV now frequently accesses the enhanced comprehensive Work Order database. This practice enhances DMV oversight of program repair and maintenance. A review of the work order database in 2014 brought about a service campaign of the roller stop brake pads for all of the Mustang Dynamometers used in the program.
 - ii. DMV now directly communicates with the manufacturers of equipment used in the program to ensure product reliability and conformance to the manufacturers' maintenance requirements and

repair procedures.

- iii. In 2014, DMV introduced an improved OBDII testing cable. This provided an increase in the reliability in the CT VIP.
 - d. DMV initiated the process to incorporate the California Data Acquisition Device (DAD) into CDAS units.
 - i. This device will improve analyzer to vehicle communication and will allow for the analyzer to perform a calibration before each OBD test. The device is already installed in all CDAS units, testing the software is complete, and DMV anticipates the DAD will be in use before the fall of 2015.
 - ii. There are several major benefits of switching to the DAD, including improved internal and external self-checks. The self-check performed by the analyzer will be able to quickly identify a bad OBD cable. In addition to the improved cable integrity, the DAD will offer faster interrogation with vehicle OBD systems resulting in quicker tests and offers more accurate collection of Mode/PID data and various combinations. The firmware in the DAD will also be upgradable; therefore if a problematic vehicle is identified, updates can occur without doing a full analyzer software change and Acceptance Test Plan.
 - iii. Software was designed to work with both the current Multiplex and future DAD modules. In anticipation of releasing the software, the DAD hardware components have been installed on the all the analyzers.
 - iv. Chevrolet Volts are being successfully tested by Applus equipment in California using the DAD device. The developers at Applus are confident that the DAD device will communicate with Chevrolet Volts here as well, to resolve the plug in hybrid electric vehicle testing issue.
6. Changes to waiver procedure: Now motorists must send in their repair data forms before an agent meets them out in the field. The prior procedure was to verify over the phone that the paperwork such as such as failed emissions tests, repair receipts for qualifying repairs, and a repair data form signed by the certified repairer meets all waiver requirements. Then, a Motor Vehicle Agent would meet the customer, verify paperwork, inspect the vehicle, and issue or deny the waiver. Sometimes the motorist would not bring all, or in some cases, any paperwork, therefore, the system was put in place for the vehicle owner to submit all paperwork prior to the inspection. Once office personnel verify that all documentation indicates that the vehicle may qualify for a waiver, an appointment is made and the physical inspection of the vehicle is done. This eliminates cases where field staff meets motorists only to find out that not all required items were brought for inspection. Additionally, motorists still have the option to visit the DMV headquarters, in Wethersfield, to apply for a waiver in

person. At the DMV headquarters, customers have the option to make an appointment, or walk in, to receive the paperwork review and vehicle inspection all in one visit.

7. CTI Recertification: CTI recertification is now automated, and the CTI can now take the recertification pre-entrance exam on any PC including the emissions analyzer itself. The revamped exam includes updated questions, including a question about diversity.
8. Reducing Failure Rates: There are many efforts underway to decrease failure rates in CT and they are as follows:
 - a. Incorporating DAD as discussed above will reduce failures due to no communication between CDAS and the vehicle's OBD system.
 - b. New Temperature Gun: An emissions test cannot continue if the recorded engine temperature exceeds 250°F. Prior to the change, some engine temperature readings exceeded 250°F with some as high as the maximum of 999°F. Most of the excessive readings were due to the location where the CTI was aiming the IR temp gun. However, some of the 999°F readings were also due to errors resulting from a low battery in the temperature gun.
 - c. Repair Effectiveness Index (REI) – Currently under development. DMV received a demonstration of some of the features of the new REI that is under development. The REI will help motorists get their vehicles repaired at stations that have proven track records.
 - d. Automotive Service Excellence (ASE) certification and manufacturer trained technicians will be able to become Certified Emissions Repair Technicians (CERTS). Repairs by ASE certified repair and certain manufacturer trained technicians will be accepted as qualifying repairs towards cost waiver qualifications. This change should improve repair quality and reduce failure rates during the next inspection cycle.

Connecticut will continue to seek out additional opportunities to increase the effectiveness of the program.

8.0 Conclusions

Key conclusions from this analysis:

- ❖ Connecticut's I/M program is achieving air quality benefits. Key indicators include a high compliance rate (99%), limited fraud, low waiver rate and an overall failure rate of 10% in 2014, which demonstrates that Connecticut is failing the expected number of vehicles, a key metric of program success.
- ❖ Connecticut actively investigates non-compliance and assesses fines for late inspections. In 2014, 162,311 fines were assessed for late inspections. Linking registration to compliance in addition to assessing late inspection fines contribute to Connecticut's very high compliance rate. The enforcement of Connecticut's I/M program exceeds the enforcement levels assumed in emissions modeling for the Connecticut SIP.
- ❖ Connecticut conducts extensive compliance assurance activities on the I/M program. Evaluation of these quality assurance data demonstrates that the program performs accurate inspections. Connecticut is a national model for other states' enforcement activities.
- ❖ Connecticut's new I/M contract is designed to ensure the I/M program continues to effectively achieve the expected air quality benefits. Of note, the program has successfully addressed key equipment challenges, including requiring more reliable emission test benches and better communication between vehicles and the OBD inspection equipment. DMV will continue to resolve challenges as they arise, such as testing for plug in hybrid electric vehicles and fleet vehicles.

Appendix A

EPA Checklist

Appendix A:
40 CFR Part 51 - Subpart S Inspection/Maintenance Program Requirements
51.366 - Data Analysis and Reporting Requirements

<u>Reporting Requirement</u>	<u>Reviewer Comments / Location in State Report</u>	<u>Has the State Met the Requirement?</u>
<p>(a) <u>Test Data Report</u></p> <p>The program shall submit to EPA by July of each year a report providing basic statistics on the testing program for January through December of the previous year, including:</p>		
<p>(1) The number of vehicles tested by model year and vehicle type;</p>		
<p>(2) By model year and vehicle type, the number and percentage of vehicles:</p>		
<p>(i) Failing initially, per test type;</p>		
<p>(ii) Failing the first retest per test type;</p>		
<p>(iii) Passing the first retest per test type;</p>		

<u>Reporting Requirement</u>	<u>Reviewer Comments / Location in State Report</u>	<u>Has the State Met the Requirement?</u>
(iv) Initially failed vehicles passing the second or subsequent retest per test type;		
(v) Initially failed vehicles receiving a waiver; and		
(vi) Vehicles with no known final outcome (regardless of reason). (vii)-(x) [Reserved]		
(xi) Passing the on-board diagnostic check;		
(xii) Failing the on-board diagnostic check;		
(xiii) Failing the on-board diagnostic check and passing the tailpipe test (if applicable);		
(xiv) Failing the on-board diagnostic check and failing the tailpipe test (if applicable);		
(xv) Passing the on-board diagnostic check and failing the I/M gas cap evaporative system test (if applicable);		
(xvi) Failing the on-board diagnostic check and passing the I/M gas cap evaporative system test (if applicable);		

<u>Reporting Requirement</u>	<u>Reviewer Comments / Location in State Report</u>	<u>Has the State Met the Requirement?</u>
(xvii) Passing both the on-board diagnostic check and I/M gas cap evaporative system test (if applicable);		
(xviii) Failing both the on-board diagnostic check and I/M gas cap evaporative system test (if applicable);		
(xix) MIL is commanded on and no codes are stored;		
(xx) MIL is not commanded on and codes are stored;		
(xxi) MIL is commanded on and codes are stored;		
(xxii) MIL is not commanded on and codes are not stored;		
(xxiii) Readiness status indicates that the evaluation is not complete for any module supported by on-board diagnostic systems;		
(3) The initial test volume by model year and test station;		
(4) The initial test failure rate by model year and test station; and		

<u>Reporting Requirement</u>	<u>Reviewer Comments / Location in State Report</u>	<u>Has the State Met the Requirement?</u>
(5) The average increase or decrease in tailpipe emission levels for HC, CO, and NOX (if applicable) after repairs by model year and vehicle type for vehicles receiving a mass emissions test.		
(b) <u>Quality assurance report.</u> The program shall submit to EPA by July of each year a report providing basic statistics on the quality assurance program for January through December of the previous year, including:		
(1) The number of inspection stations and lanes:		
(i) Operating throughout the year; and		
(2) The number of inspection stations and lanes operating throughout the year:		
(i) Receiving overt performance audits in the year;		
(ii) Not receiving overt performance audits in the year;		
(iii) Receiving covert performance audits in the year;		

<u>Reporting Requirement</u>	<u>Reviewer Comments / Location in State Report</u>	<u>Has the State Met the Requirement?</u>
(iv) Not receiving covert performance audits in the year; and		
(v) That have been shut down as a result of overt performance audits;		
(3) The number of covert audits:		
(i) Conducted with the vehicle set to fail per test type;		
(ii) Conducted with the vehicle set to fail any combination of two or more test types;		
(iii) Resulting in a false pass per test type;		
(iv) Resulting in a false pass for any combination of two or more test types;		
(4) The number of inspectors and stations:		
(i) That were suspended, fired, or otherwise prohibited from testing as a result of covert audits;		
(ii) That were suspended, fired, or otherwise prohibited from testing for other causes; and		

<u>Reporting Requirement</u>	<u>Reviewer Comments / Location in State Report</u>	<u>Has the State Met the Requirement?</u>
(iii) That received fines;		
(5) The number of inspectors licensed or certified to conduct testing;		
(6) The number of hearings:		
(i) Held to consider adverse actions against inspectors and stations; and		
(ii) Resulting in adverse actions against inspectors and stations;		
(7) The total amount collected in fines from inspectors and stations by type of violation;		
(8) The total number of covert vehicles available for undercover audits over the year; and		
(9) The number of covert auditors available for undercover audits.		

<u>Reporting Requirement</u>	<u>Reviewer Comments / Location in State Report</u>	<u>Has the State Met the Requirement?</u>
<p><u>(c) Quality control report</u></p> <p>The program shall submit to EPA by July of each year a report providing basic statistics on the quality control program for January through December of the previous year, including:</p>		
<p>(1) The number of emission testing sites and lanes in use in the program;</p>		
<p>(2) The number of equipment audits by station and lane;</p>		
<p>(3) The number and percentage of stations that have failed equipment audits; and</p>		
<p>(4) Number and percentage of stations and lanes shut down as a result of equipment audits.</p>		

<u>Reporting Requirement</u>	<u>Reviewer Comments / Location in State Report</u>	<u>Has the State Met the Requirement?</u>
<p>(d) <u>Enforcement report.</u></p> <p>(1) All varieties of enforcement programs shall, at a minimum, submit to EPA by July of each year a report providing basic statistics on the enforcement program for January through December of the previous year, including:</p>		
<p>(i) An estimate of the number of vehicles subject to the inspection program, including the results of an analysis of the registration data base;</p>		
<p>(ii) The percentage of motorist compliance based upon a comparison of the number of valid final tests with the number of subject vehicles;</p>		
<p>(iii) The total number of compliance documents issued to inspection stations;</p>		
<p>(iv) The number of missing compliance documents;</p>		
<p>(v) The number of time extensions and other exemptions granted to motorists; and</p>		

<u>Reporting Requirement</u>	<u>Reviewer Comments / Location in State Report</u>	<u>Has the State Met the Requirement?</u>
(vi) The number of compliance surveys conducted, number of vehicles surveyed in each, and the compliance rates found.		
(2) Registration denial based enforcement programs shall provide the following additional information:		
(i) A report of the program's efforts and actions to prevent motorists from falsely registering vehicles out of the program area or falsely changing fuel type or weight class on the vehicle registration, and the results of special studies to investigate the frequency of such activity; and		
(ii) The number of registration file audits, number of registrations reviewed, and compliance rates found in such audits.		
(3) Computer-matching based enforcement programs shall provide the following additional information:		
(i) The number and percentage of subject vehicles that were tested by the initial deadline, and by other milestones in the cycle;		

<u>Reporting Requirement</u>	<u>Reviewer Comments / Location in State Report</u>	<u>Has the State Met the Requirement?</u>
(ii) A report on the program's efforts to detect and enforce against motorists falsely changing vehicle classifications to circumvent program requirements, and the frequency of this type of activity; and		
(iii) The number of enforcement system audits, and the error rate found during those audits.		
(4) Sticker-based enforcement systems shall provide the following additional information:		
(i) A report on the program's efforts to prevent, detect, and enforce against sticker theft and counterfeiting, and the frequency of this type of activity;		
(ii) A report on the program's efforts to detect and enforce against motorists falsely changing vehicle classifications to circumvent program requirements, and the frequency of this type of activity; and		
(iii) The number of parking lot sticker audits conducted, the number of vehicles surveyed in each, and the noncompliance rate found during those audits.		

<u>Reporting Requirement</u>	<u>Reviewer Comments / Location in State Report</u>	<u>Has the State Met the Requirement?</u>
<p>(e) <u>Additional reporting requirements.</u></p> <p>In addition to the annual reports in paragraphs (a) through (d) of this section, programs shall submit to EPA by July of every other year, biennial reports addressing:</p>		
<p>(1) Any changes made in program design, funding, personnel levels, procedures, regulations, and legal authority, with detailed discussion and evaluation of the impact on the program of all such changes; and</p>		
<p>(2) Any weaknesses or problems identified in the program within the two-year reporting period, what steps have already been taken to correct those problems, the results of those steps, and any future efforts planned.</p>		

Appendix B
2014 CT I/M Program Data

**Appendix B
2014 CT I/M Program Data**

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Table (a) (1)**Number of Vehicles Tested by Model Year and Vehicle Type
(Network Testing)
Includes Initial Tests and Retests**

Model Year	Passenger Car (P)	Truck (T)	Total
1990	2,657	1,364	4,021
1991	3,302	1,403	4,705
1992	4,369	1,844	6,213
1993	5,591	2,834	8,425
1994	7,486	5,058	12,544
1995	10,322	6,954	17,276
1996	11,916	8,126	20,042
1997	16,950	12,447	29,397
1998	22,270	15,232	37,502
1999	25,307	18,137	43,444
2000	26,578	18,258	44,836
2001	30,118	21,285	51,403
2002	55,825	43,286	99,111
2003	31,246	26,822	58,068
2004	57,237	60,818	118,055
2005	29,837	28,530	58,367
2006	60,874	54,189	115,063
2007	29,951	24,385	54,336
2008	64,450	53,149	117,599
2009	19,961	11,863	31,824
2010	61,369	41,601	102,970
2011	18,299	13,238	31,537
Grand Total	595,915	470,823	1,066,738

Table (a) (1)			
Number of Vehicles Tested by Model Year and Vehicle Type (Fleet Testing)			
Includes Initial Tests and Retests			
Model Year	Passenger Car (P)	Truck (T)	Total
1991	0	1	1
1992	1	1	2
1993	0	1	1
1995	1	0	1
1996	1	0	1
1997	18	2	20
1998	5	0	5
1999	57	26	83
2000	118	67	185
2001	15	52	67
2002	10	26	36
2003	4	10	14
2004	5	29	34
2005	11	5	16
2006	49	204	253
2007	79	85	164
2008	332	416	748
2009	9	37	46
Grand Total	715	962	1,677

Table (a) (2)(i). Initial Test Results (Network Testing)

Test Type	Vehicle Type	Model Year	# Fail	# Pass	Total	% Fail	
OBD Gasoline	P	1996	1,726	8,547	10,273	16.8%	
		1997	2,670	11,697	14,367	18.6%	
		1998	3,355	15,816	19,171	17.5%	
		1999	3,941	17,759	21,700	18.2%	
		2000	4,535	17,632	22,167	20.5%	
		2001	5,562	18,998	24,560	22.6%	
		2002	7,069	42,205	49,274	14.3%	
		2003	4,093	23,016	27,109	15.1%	
		2004	4,893	47,543	52,436	9.3%	
		2005	2,880	23,658	26,538	10.9%	
		2006	3,786	52,582	56,368	6.7%	
		2007	1,635	25,969	27,604	5.9%	
		2008	2,216	58,085	60,301	3.7%	
		2009	801	17,797	18,598	4.3%	
		2010	1,430	55,174	56,604	2.5%	
	2011	1,199	15,572	16,771	7.1%		
	P Total			51,791	452,050	503,841	10.3%
	T	1996	1,196	4,798	5,994	20.0%	
		1997	1,759	7,314	9,073	19.4%	
		1998	2,241	9,759	12,000	18.7%	
		1999	2,476	11,422	13,898	17.8%	
		2000	2,571	11,281	13,852	18.6%	
		2001	3,602	11,823	15,425	23.4%	
		2002	4,928	29,693	34,621	14.2%	
		2003	3,194	17,887	21,081	15.2%	
		2004	4,998	45,986	50,984	9.8%	
		2005	2,670	21,114	23,784	11.2%	
2006		3,036	42,820	45,856	6.6%		
2007		1,513	19,738	21,251	7.1%		
2008	1,858	45,697	47,555	3.9%			
2009	524	10,135	10,659	4.9%			
2010	957	37,578	38,535	2.5%			
2011	897	10,993	11,890	7.5%			
T Total			38,420	338,038	376,458	10.2%	
OBD Gasoline Total			90,211	790,088	880,299	10.2%	

Table (a) (2)(i). Initial Test Results (Network Testing)							
Test Type	Vehicle Type	Model Year	# Fail	# Pass	Total	% Fail	
OBD Diesel	P	1997	3	33	36	8.3%	
		1998	10	63	73	13.7%	
		1999	12	100	112	10.7%	
		2000	14	91	105	13.3%	
		2001	13	87	100	13.0%	
		2002	29	281	310	9.4%	
		2003	17	132	149	11.4%	
		2004	26	296	322	8.1%	
		2005	11	129	140	7.9%	
		2006	19	471	490	3.9%	
		2007	0	16	16	0.0%	
		2008	1	13	14	7.1%	
		2009	25	160	185	13.5%	
		2010	142	1,217	1,359	10.4%	
		2011	17	129	146	11.6%	
	P Total			339	3,218	3,557	9.5%
	T	1997	5	7	12	41.7%	
		1998	2	6	8	25.0%	
		1999	0	9	9	0.0%	
		2000	0	2	2	0.0%	
		2001	0	2	2	0.0%	
		2002	0	1	1	0.0%	
		2003	0	3	3	0.0%	
		2004	2	8	10	20.0%	
		2005	1	18	19	5.3%	
		2006	5	52	57	8.8%	
		2007	2	34	36	5.6%	
2008		3	25	28	10.7%		
2009	4	40	44	9.1%			
2010	28	131	159	17.6%			
2011	21	60	81	25.9%			
T Total			73	398	471	15.5%	
OBD Diesel Total			412	3,616	4,028	10.2%	

Table (a) (2)(i). Initial Test Results (Network Testing)							
Test Type	Vehicle Type	Model Year	# Fail	# Pass	Total	% Fail	
OBD Hybrid	P	2000	2	20	22	9.1%	
		2001	8	41	49	16.3%	
		2002	11	102	113	9.7%	
		2003	26	109	135	19.3%	
		2004	22	292	314	7.0%	
		2005	30	427	457	6.6%	
		2006	28	689	717	3.9%	
		2007	27	719	746	3.6%	
		2008	42	2,132	2,174	1.9%	
		2009	10	390	400	2.5%	
		2010	56	1,982	2,038	2.7%	
	2011	14	300	314	4.5%		
	P Total			276	7,203	7,479	3.7%
	T	2005	1	37	38	2.6%	
		2006	13	674	687	1.9%	
		2007	4	174	178	2.2%	
		2008	16	596	612	2.6%	
		2009	5	81	86	5.8%	
		2010	7	288	295	2.4%	
	T Total			46	1,886	1,932	2.4%
OBD Hybrid Total			322	9,089	9,411	3.4%	

Table (a) (2)(i). Initial Test Results (Network Testing)

Test Type	Vehicle Type	Model Year	# Fail	# Pass	Total	% Fail
PCTSI	P	1990	10	59	69	14.5%
		1991	37	131	168	22.0%
		1992	30	168	198	15.2%
		1993	62	297	359	17.3%
		1994	78	489	567	13.8%
		1995	106	730	836	12.7%
		1996	0	0	0	
		1997	1	0	1	100.0%
		1998	0	0	0	
		1999	0	3	3	0.0%
		2000	0	4	4	0.0%
		2001	0	2	2	0.0%
		2002	0	3	3	0.0%
		2003	0	2	2	0.0%
		2004	0	5	5	0.0%
		2005	1	5	6	16.7%
		2006	1	13	14	7.1%
		2007	0	3	3	0.0%
		2008	0	12	12	0.0%
		2009	4	6	10	40.0%
		2010	2	20	22	9.1%
		2011	0	0	0	
		P Total			332	1,952
PCTSI	T	1990	33	97	130	25.4%
		1991	34	106	140	24.3%
		1992	43	127	170	25.3%
		1993	49	306	355	13.8%
		1994	122	636	758	16.1%
		1995	205	948	1,153	17.8%
		1996	103	436	539	19.1%
		1997	143	738	881	16.2%
		1998	130	596	726	17.9%
		1999	115	1,041	1,156	9.9%
		2000	157	1,080	1,237	12.7%
		2001	150	1,345	1,495	10.0%
		2002	214	2,715	2,929	7.3%
		2003	142	1,726	1,868	7.6%
		2004	315	3,450	3,765	8.4%
		2005	102	1,376	1,478	6.9%
		2006	151	3,335	3,486	4.3%
		2007	49	972	1,021	4.8%
		2008	77	2,489	2,566	3.0%
		2009	14	469	483	2.9%
		2010	36	1,485	1,521	2.4%
		2011	9	338	347	2.6%
		T Total			2,393	25,811
PCTSI Total			2,725	27,763	30,488	8.9%

Table (a) (2)(i). Initial Test Results (Network Testing)							
Test Type	Vehicle Type	Model Year	# Fail	# Pass	Total	% Fail	
ASM	P	1990	349	1,757	2,106	16.6%	
		1991	466	2,034	2,500	18.6%	
		1992	615	2,731	3,346	18.4%	
		1993	632	3,705	4,337	14.6%	
		1994	810	5,125	5,935	13.6%	
		1995	1,060	6,975	8,035	13.2%	
	P Total			3,932	22,327	26,259	15.0%
	T	1990	171	768	939	18.2%	
		1991	144	853	997	14.4%	
		1992	170	1,190	1,360	12.5%	
		1993	229	1,772	2,001	11.4%	
		1994	421	3,136	3,557	11.8%	
		1995	527	4,184	4,711	11.2%	
	T Total			1,662	11,903	13,565	12.3%
ASM Total			5,594	34,230	39,824	14.0%	

Table (a) (2)(i). Initial Test Results (Network Testing)							
Test Type	Vehicle Type	Model Year	# Fail	# Pass	Total	% Fail	
MSA	P	0	0	4	4	0.0%	
		0	0	2	2	0.0%	
		0	0	5	5	0.0%	
		0	2	5	7	28.6%	
		0	0	1	1	0.0%	
		0	0	1	1	0.0%	
		0	0	2	2	0.0%	
		0	0	1	1	0.0%	
		0	0	1	1	0.0%	
		0	0	3	3	0.0%	
		0	0	1	1	0.0%	
	0	0	1	1	0.0%		
	P Total			2	27	29	6.9%
	T	1990	0	11	11	0.0%	
		1991	0	6	6	0.0%	
		1992	2	15	17	11.8%	
		1993	4	21	25	16.0%	
		1994	7	21	28	25.0%	
		1995	5	55	60	8.3%	
		1996	3	62	65	4.6%	
		1997	6	108	114	5.3%	
		1998	2	41	43	4.7%	
		1999	10	128	138	7.2%	
		2000	8	73	81	9.9%	
		2001	6	106	112	5.4%	
		2002	12	176	188	6.4%	
		2003	6	86	92	6.5%	
		2004	12	193	205	5.9%	
		2005	6	88	94	6.4%	
		2006	9	218	227	4.0%	
		2007	5	62	67	7.5%	
	2008	9	115	124	7.3%		
	2009	0	8	8	0.0%		
2010	4	46	50	8.0%			
2011	3	18	21	14.3%			
T Total			119	1,657	1,776	6.7%	
MSA Total			121	1,684	1,805	6.7%	

Table (a) (2)(i). Initial Test Results (Network Testing)

Test Type	Vehicle Type	Model Year	# Fail	# Pass	Total	% Fail
LMD	P	1990	1	12	13	7.7%
		1991	2	34	36	5.6%
		1992	1	24	25	4.0%
		1993	0	15	15	0.0%
		1994	1	4	5	20.0%
		1995	0	27	27	0.0%
		1996	2	29	31	6.5%
		1997	0	3	3	0.0%
		1998	0	0	0	
		1999	0	2	2	0.0%
		2000	0	1	1	0.0%
		2001	0	2	2	0.0%
		2002	0	2	2	0.0%
		2003	0	1	1	0.0%
		2004	0	9	9	0.0%
		2005	0	1	1	0.0%
		2006	0	6	6	0.0%
		2007	0	1	1	0.0%
		2008	0	2	2	0.0%
		2009	0	0	0	
		2010	0	3	3	0.0%
		2011	0	0	0	
		P Total			7	178
LMD	T	1990	0	29	29	0.0%
		1991	2	43	45	4.4%
		1992	0	46	46	0.0%
		1993	0	93	93	0.0%
		1994	2	115	117	1.7%
		1995	27	208	235	11.5%
		1996	0	277	277	0.0%
		1997	2	430	432	0.5%
		1998	0	195	195	0.0%
		1999	4	446	450	0.9%
		2000	4	375	379	1.1%
		2001	3	486	489	0.6%
		2002	6	987	993	0.6%
		2003	11	485	496	2.2%
		2004	14	1051	1065	1.3%
		2005	2	431	433	0.5%
		2006	5	991	996	0.5%
		2007	4	271	275	1.5%
		2008	10	601	611	1.6%
		2009	1	49	50	2.0%
		2010	2	176	178	1.1%
		2011	1	54	55	1.8%
		T Total			100	7,839
LMD Total			107	8,017	8,124	1.3%
Grand Total*			99,492	874,487	973,979	10.2%

Table (a)(2)(i) Initial Test Results (Fleet Testing)							
Test Type	Vehicle Type	Model Year	# Fail	# Pass	Total	% Fail	
OBD	P	1996	0	1	1	0.00%	
		1997	1	16	17	5.88%	
		1998	0	5	5	0.00%	
		1999	3	52	55	5.45%	
		2000	9	102	111	8.11%	
		2001	3	9	12	25.00%	
		2002	1	9	10	10.00%	
		2003	1	2	3	33.33%	
		2004	0	5	5	0.00%	
		2005	1	10	11	9.09%	
		2006	1	46	47	2.13%	
		2007	5	73	78	6.41%	
		2008	6	318	324	1.85%	
	2009	1	7	8	12.50%		
	P Total			32	655	687	4.66%
	T	1997	0	1	1	0.00%	
		1999	2	21	23	8.70%	
		2000	5	58	63	7.94%	
		2001	3	47	50	6.00%	
		2002	0	26	26	0.00%	
		2003	2	6	8	25.00%	
		2004	3	22	25	12.00%	
		2005	0	5	5	0.00%	
2006		19	161	180	10.56%		
2007		10	68	78	12.82%		
2008	11	393	404	2.72%			
2009	1	35	36	2.78%			
T Total			56	843	899	6.23%	
Fleet OBD Total			88	1498	1586	5.55%	

Table (a)(2)(i) Initial Test Results (Fleet Testing)							
Test Type	Vehicle Type	Model Year	# Fail	# Pass	Total	% Fail	
PCTSI	P	1992	0	1	1	0.00%	
		1995	0	1	1	0.00%	
		2008	0	2	2	0.00%	
	P PCTSI Total			0	4	4	0.00%
	T	1991	0	1	1	0.00%	
		1992	0	1	1	0.00%	
		1993	0	1	1	0.00%	
		1997	0	1	1	0.00%	
		1999	0	2	2	0.00%	
		2003	0	1	1	0.00%	
		2004	0	1	1	0.00%	
		2006	0	9	9	0.00%	
	2008	0	5	5	0.00%		
T PCTSI Total			0	22	22	0.00%	
Fleet PCTSI Total			0	26	26	0.00%	
Fleet Initial Test Totals (OBD & PCTSI)			88	1524	1612	5.46%	

Table (a) (2)(ii, iii). First Retest Results (Network Tests)

Test Type	Vehicle Type	Model Year	# Fail	# Pass	Total	% Fail	% Pass	
OBD Gasoline	P	1996	271	1,097	1,368	19.8%	80.2%	
		1997	374	1,815	2,189	17.1%	82.9%	
		1998	405	2,248	2,653	15.3%	84.7%	
		1999	458	2,608	3,066	14.9%	85.1%	
		2000	605	3,137	3,742	16.2%	83.8%	
		2001	666	4,151	4,817	13.8%	86.2%	
		2002	594	5,014	5,608	10.6%	89.4%	
		2003	363	3,133	3,496	10.4%	89.6%	
		2004	303	3,553	3,856	7.9%	92.1%	
		2005	184	2,297	2,481	7.4%	92.6%	
		2006	154	2,977	3,131	4.9%	95.1%	
		2007	81	1,397	1,478	5.5%	94.5%	
		2008	56	1,809	1,865	3.0%	97.0%	
		2009	17	700	717	2.4%	97.6%	
		2010	16	1,150	1,166	1.4%	98.6%	
	2011	2	1,044	1,046	0.2%	99.8%		
	P Total			4,549	38,130	42,679	10.7%	89.3%
	T	1996	165	784	949	17.4%	82.6%	
		1997	261	1,205	1,466	17.8%	82.2%	
		1998	297	1,552	1,849	16.1%	83.9%	
		1999	316	1,786	2,102	15.0%	85.0%	
		2000	324	1,870	2,194	14.8%	85.2%	
		2001	404	2,812	3,216	12.6%	87.4%	
		2002	397	3,562	3,959	10.0%	90.0%	
		2003	279	2,595	2,874	9.7%	90.3%	
		2004	325	3,824	4,149	7.8%	92.2%	
		2005	189	2,192	2,381	7.9%	92.1%	
2006		148	2,413	2,561	5.8%	94.2%		
2007		74	1,350	1,424	5.2%	94.8%		
2008		47	1,449	1,496	3.1%	96.9%		
2009		11	487	498	2.2%	97.8%		
2010		8	777	785	1.0%	99.0%		
2011	1	776	777	0.1%	99.9%			
T Total			3,246	29,434	32,680	9.9%	90.1%	
OBD Gasoline Total			7,795	67,564	75,359	10.34%	89.7%	
OBD Diesel Total (too few tests for vehicle type and model year breakout)			21	314	335	6.3%	93.7%	
OBD Hybrid Total (too few tests for vehicle type and model year breakout)			12	273	285	4.2%	95.8%	

Table (a) (2)(ii, iii). First Retest Results (Network Tests)

Test Type	Vehicle Type	Model Year	# Fail	# Pass	Total	% Fail	% Pass	
PCTSI	P	1990	7	4	11	63.6%	36.4%	
		1991	10	18	28	35.7%	64.3%	
		1992	10	15	25	40.0%	60.0%	
		1993	9	51	60	15.0%	85.0%	
		1994	10	45	55	18.2%	81.8%	
		1995	18	75	93	19.4%	80.6%	
		2005	0	1	1	0.0%	100.0%	
		2006	0	1	1	0.0%	100.0%	
		2009	0	3	3	0.0%	100.0%	
		2010	0	2	2	0.0%	100.0%	
	P Total			64	215	279	22.9%	77.1%
	T	1990	4	21	25	16.0%	84.0%	
		1991	6	22	28	21.4%	78.6%	
		1992	9	31	40	22.5%	77.5%	
		1993	11	43	54	20.4%	79.6%	
		1994	23	80	103	22.3%	77.7%	
		1995	37	141	178	20.8%	79.2%	
		1996	21	75	96	21.9%	78.1%	
		1997	18	115	133	13.5%	86.5%	
		1998	14	100	114	12.3%	87.7%	
		1999	14	85	99	14.1%	85.9%	
		2000	18	126	144	12.5%	87.5%	
		2001	20	112	132	15.2%	84.8%	
		2002	11	184	195	5.6%	94.4%	
		2003	11	126	137	8.0%	92.0%	
		2004	24	280	304	7.9%	92.1%	
		2005	17	87	104	16.3%	83.7%	
		2006	11	120	131	8.4%	91.6%	
		2007	10	39	49	20.4%	79.6%	
		2008	8	68	76	10.5%	89.5%	
2009		2	12	14	14.3%	85.7%		
2010	6	29	35	17.1%	82.9%			
2011	1	7	8	12.5%	87.5%			
T Total			296	1,903	2,199	13.5%	86.5%	
PCTSI Total			360	2,118	2,478	14.5%	85.5%	

Table (a) (2)(ii, iii). First Retest Results (Network Tests)

Test Type	Vehicle Type	Model Year	# Fail	# Pass	Total	% Fail	% Pass	
ASM	P	1990	108	196	304	35.5%	64.5%	
		1991	125	236	361	34.6%	65.4%	
		1992	187	318	505	37.0%	63.0%	
		1993	195	345	540	36.1%	63.9%	
		1994	180	466	646	27.9%	72.1%	
		1995	246	666	912	27.0%	73.0%	
	P Total			1,044	2,227	3,271	31.9%	68.1%
	T	1990	51	100	151	33.8%	66.2%	
		1991	31	99	130	23.8%	76.2%	
		1992	34	113	147	23.1%	76.9%	
		1993	41	172	213	19.2%	80.8%	
		1994	54	328	382	14.1%	85.9%	
		1995	59	431	490	12.0%	88.0%	
	T Total			270	1,243	1,513	17.8%	82.2%
ASM Total			1,314	3,470	4,784	27.5%	72.5%	
MSA Total (too few tests for vehicle type and model year breakout)			32	79	111	28.8%	71.2%	
LMD Diesel Total (too few tests for vehicle type and model year breakout)			1	74	75	1.3%	98.7%	
Grand Total			9,535	73,893	83,428	11.4%	88.6%	

Table (a) (2) (iv). Second and Later Retest Results (Network Tests)

Test Type	Vehicle Type	Model Year	# Fail	# Pass	Total	% Fail	% Pass	
OBD Gasoline	P	1996	81	149	230	35.2%	64.8%	
		1997	123	226	349	35.2%	64.8%	
		1998	121	241	362	33.4%	66.6%	
		1999	125	287	412	30.3%	69.7%	
		2000	162	354	516	31.4%	68.6%	
		2001	159	412	571	27.8%	72.2%	
		2002	99	379	478	20.7%	79.3%	
		2003	73	233	306	23.9%	76.1%	
		2004	56	189	245	22.9%	77.1%	
		2005	35	140	175	20.0%	80.0%	
		2006	16	95	111	14.4%	85.6%	
		2007	11	60	71	15.5%	84.5%	
		2008	7	37	44	15.9%	84.1%	
		2009	0	15	15	0.0%	100.0%	
		2010	0	13	13	0.0%	100.0%	
	2011	0	1	1	0.0%	100.0%		
	P Total			1,068	2,831	3,899	27.4%	72.6%
	T	1996	59	110	169	34.9%	65.1%	
		1997	90	201	291	30.9%	69.1%	
		1998	89	179	268	33.2%	66.8%	
		1999	67	185	252	26.6%	73.4%	
		2000	93	241	334	27.8%	72.2%	
		2001	105	278	383	27.4%	72.6%	
		2002	102	261	363	28.1%	71.9%	
		2003	45	199	244	18.4%	81.6%	
		2004	45	236	281	16.0%	84.0%	
		2005	33	126	159	20.8%	79.2%	
2006		19	114	133	14.3%	85.7%		
2007		6	52	58	10.3%	89.7%		
2008	6	35	41	14.6%	85.4%			
2009	1	6	7	14.3%	85.7%			
2010	0	5	5	0.0%	100.0%			
T Total			760	2,228	2,988	25.4%	74.6%	
OBD Gasoline Total			1,828	5,059	6,887	26.5%	73.5%	
OBD Diesel Total (too few tests for vehicle type and model year breakout)			3	15	18	16.7%	83.3%	
OBD Hybrid Total (too few tests for vehicle type and model year breakout)			2	12	14	14.3%	85.7%	

Table (a) (2) (iv). Second and Later Retest Results (Network Tests)

Test Type	Vehicle Type	Model Year	# Fail	# Pass	Total	% Fail	% Pass	
PCTSI	P	1990	6	2	8	75.0%	25.0%	
		1991	8	9	17	47.1%	52.9%	
		1992	1	9	10	10.0%	90.0%	
		1993	9	6	15	60.0%	40.0%	
		1994	8	8	16	50.0%	50.0%	
		1995	10	19	29	34.5%	65.5%	
	P Total			42	53	95	44.2%	55.8%
	T	1990	8	5	13	61.5%	38.5%	
		1991	4	3	7	57.1%	42.9%	
		1992	5	7	12	41.7%	58.3%	
		1993	10	13	23	43.5%	56.5%	
		1994	16	16	32	50.0%	50.0%	
		1995	30	32	62	48.4%	51.6%	
		1996	12	15	27	44.4%	55.6%	
		1997	18	10	28	64.3%	35.7%	
		1998	4	13	17	23.5%	76.5%	
		1999	7	13	20	35.0%	65.0%	
		2000	11	11	22	50.0%	50.0%	
		2001	2	18	20	10.0%	90.0%	
		2002	3	9	12	25.0%	75.0%	
		2003	2	11	13	15.4%	84.6%	
		2004	6	22	28	21.4%	78.6%	
		2005	6	17	23	26.1%	73.9%	
		2006	3	11	14	21.4%	78.6%	
		2007	2	10	12	16.7%	83.3%	
	2008	0	8	8	0.0%	100.0%		
	2009	0	2	2	0.0%	100.0%		
2010	3	5	8	37.5%	62.5%			
2011	0	1	1	0.0%	100.0%			
T Total			152	252	404	37.6%	62.4%	
PCTSI Total			194	305	499	38.9%	61.1%	
ASM	P	1990	79	67	146	54.1%	45.9%	
		1991	102	84	186	54.8%	45.2%	
		1992	132	127	259	51.0%	49.0%	
		1993	132	131	263	50.2%	49.8%	
		1994	127	134	261	48.7%	51.3%	
		1995	203	182	385	52.7%	47.3%	
	P Total			778	727	1,505	51.7%	48.3%
	T	1990	30	36	66	45.5%	54.5%	
		1991	22	28	50	44.0%	56.0%	
		1992	24	24	48	50.0%	50.0%	
		1993	30	35	65	46.2%	53.8%	
		1994	30	39	69	43.5%	56.5%	
		1995	19	38	57	33.3%	66.7%	
T Total			155	200	355	43.7%	56.3%	
ASM Total			933	927	1,860	50.2%	49.8%	

Table (a) (2) (iv). Second and Later Retest Results (Network Tests)

Test Type	Vehicle Type	Model Year	# Fail	# Pass	Total	% Fail	% Pass
MSA Total (too few tests for vehicle type and model year breakout)			18	30	48	37.5%	62.5%
LMD Diesel Total (too few tests for vehicle type and model year breakout)			1	4	5	20.0%	80.0%
Grand Total			2,979	6,352	9,331	31.9%	68.1%

(a) (2) (v). Waivers Issued					
Model Year	Passenger Car (P)	Truck (T)	Total # of Waivers	# of Failed Vehicles	% of Failed Vehicles Receiving Waivers
1990	3	0	3	564	0.53%
1991	1	0	1	685	0.15%
1992	2	0	2	861	0.23%
1993	0	0	0	976	0.00%
1994	1	0	1	1441	0.07%
1995	4	0	4	1930	0.21%
1996	3	0	3	3032	0.10%
1997	7	6	13	4589	0.28%
1998	6	3	9	5740	0.16%
1999	7	3	10	6558	0.15%
2000	13	3	16	7291	0.22%
2001	18	7	25	9344	0.27%
2002	13	7	20	12269	0.16%
2003	12	7	19	7489	0.25%
2004	8	9	17	10282	0.17%
2005	6	6	12	5704	0.21%
2006	6	6	12	7053	0.17%
2007	5	0	5	3239	0.15%
2008	1	1	2	4232	0.05%
2009	0	0	0	1388	0.00%
2010	0	0	0	2664	0.00%
2011	0	0	0	2161	0.00%
Total	116	58	174	99,492	0.17%

Table (a) (2)(vi). Vehicles with No Final Pass

Vehicle Type	Model Year	# of Initial Tests	Fail Initial Test	Pass 1st Retest	Pass 2nd+ Retest	Total # that Pass After Fail	# That do not Pass *	% No Final Pass *	% No Final Pass as % of Fails
P	1990	2,188	360	200	69	269	91	4.2%	25.3%
	1991	2,708	505	256	93	349	156	5.8%	30.9%
	1992	3,569	646	334	136	470	176	4.9%	27.2%
	1993	4,713	694	396	137	533	161	3.4%	23.2%
	1994	6,507	889	512	142	654	235	3.6%	26.4%
	1995	8,903	1,166	741	201	942	224	2.5%	19.2%
	1996	10,311	1,730	1,099	150	1,249	481	4.7%	27.8%
	1997	14,407	2,674	1,816	228	2,044	630	4.4%	23.6%
	1998	19,244	3,365	2,253	243	2,496	869	4.5%	25.8%
	1999	21,817	3,953	2,618	287	2,905	1,048	4.8%	26.5%
	2000	22,300	4,551	3,153	356	3,509	1,042	4.7%	22.9%
	2001	24,714	5,583	4,165	413	4,578	1,005	4.1%	18.0%
	2002	49,704	7,109	5,043	382	5,425	1,684	3.4%	23.7%
	2003	27,397	4,136	3,173	236	3,409	727	2.7%	17.6%
	2004	53,087	4,941	3,593	193	3,786	1,155	2.2%	23.4%
	2005	27,142	2,922	2,332	142	2,474	448	1.7%	15.3%
	2006	57,598	3,834	3,010	95	3,105	729	1.3%	19.0%
	2007	28,370	1,662	1,425	61	1,486	176	0.6%	10.6%
2008	62,504	2,259	1,845	37	1,882	377	0.6%	16.7%	
2009	19,193	840	730	18	748	92	0.5%	11.0%	
2010	60,027	1,630	1,312	13	1,325	305	0.5%	18.7%	
2011	17,231	1,230	1,065	1	1,066	164	1.0%	13.3%	
P Total		543,634	56,679	41,071	3,633	44,704	11,975	2.2%	21.1%

* Percent of vehicles tested.

Table (a) (2)(vi). Vehicles with No Final Pass

Vehicle Type	Model Year	# of Initial Tests	Fail Initial Test	Pass 1st Retest	Pass 2nd+ Retest	Total # that Pass After Fail	# That do not Pass *	% No Final Pass *	% No Final Pass as % of Fails
T	1990	1,109	204	121	41	162	42	3.8%	20.6%
	1991	1,188	180	121	31	152	28	2.4%	15.6%
	1992	1,593	215	146	32	178	37	2.3%	17.2%
	1993	2,474	282	218	49	267	15	0.6%	5.3%
	1994	4,460	552	410	61	471	81	1.8%	14.7%
	1995	6,159	764	578	71	649	115	1.9%	15.1%
	1996	6,875	1,302	863	126	989	313	4.6%	24.0%
	1997	10,512	1,915	1,332	212	1,544	371	3.5%	19.4%
	1998	12,972	2,375	1,659	195	1,854	521	4.0%	21.9%
	1999	15,651	2,605	1,880	200	2,080	525	3.4%	20.2%
	2000	15,551	2,740	2,005	254	2,259	481	3.1%	17.6%
	2001	17,523	3,761	2,930	297	3,227	534	3.0%	14.2%
	2002	38,732	5,160	3,760	273	4,033	1,127	2.9%	21.8%
	2003	23,540	3,353	2,733	211	2,944	409	1.7%	12.2%
	2004	56,029	5,341	4,122	261	4,383	958	1.7%	17.9%
	2005	25,846	2,782	2,288	147	2,435	347	1.3%	12.5%
	2006	51,309	3,219	2,563	129	2,692	527	1.0%	16.4%
	2007	22,828	1,577	1,402	63	1,465	112	0.5%	7.1%
2008	51,496	1,973	1,546	44	1,590	383	0.7%	19.4%	
2009	11,330	548	509	9	518	30	0.3%	5.5%	
2010	40,738	1,034	833	11	844	190	0.5%	18.4%	
2011	12,430	931	803	2	805	126	1.0%	13.5%	
T Total		430,345	42,813	32,822	2,719	35,541	7,272	1.7%	17.0%
Grand Total		973,979	99,492	73,893	6,352	80,245	19,247	2.0%	19.3%

* Percent of vehicles tested.

Table (a) (2)(xi, xii). Passing and Failing OBD Tests (Network Tests)

Vehicle Type	Model Year	Fail OBD	Pass OBD	Grand Total	% Fail
P	1996	2,078	9,793	11,871	17.5%
	1997	3,171	13,774	16,945	18.7%
	1998	3,893	18,374	22,267	17.5%
	1999	4,538	20,764	25,302	17.9%
	2000	5,320	21,252	26,572	20.0%
	2001	6,409	23,704	30,113	21.3%
	2002	7,805	48,013	55,818	14.0%
	2003	4,576	26,666	31,242	14.6%
	2004	5,305	51,917	57,222	9.3%
	2005	3,142	26,687	29,829	10.5%
	2006	4,004	56,846	60,850	6.6%
	2007	1,757	28,190	29,947	5.9%
	2008	2,323	62,112	64,435	3.6%
	2009	856	19,092	19,948	4.3%
2010	1,645	59,696	61,341	2.7%	
2011	1,232	17,067	18,299	6.7%	
P Total		58,054	503,947	562,001	10.3%
T	1996	1,420	5,692	7,112	20.0%
	1997	2,115	8,732	10,847	19.5%
	1998	2,629	11,497	14,126	18.6%
	1999	2,859	13,402	16,261	17.6%
	2000	2,988	13,394	16,382	18.2%
	2001	4,111	14,915	19,026	21.6%
	2002	5,427	33,517	38,944	13.9%
	2003	3,518	20,684	24,202	14.5%
	2004	5,370	50,056	55,426	9.7%
	2005	2,896	23,492	26,388	11.0%
	2006	3,224	46,092	49,316	6.5%
	2007	1,599	21,354	22,953	7.0%
	2008	1,931	47,815	49,746	3.9%
	2009	546	10,758	11,304	4.8%
2010	1,000	38,802	39,802	2.5%	
2011	919	11,882	12,801	7.2%	
T Total		42,552	372,084	414,636	10.3%
Grand Total		100,606	876,031	976,637	10.3%

Table (a) (2) (xix, xxi, xxii). # and % Fail for MIL Commanded On (Network Tests): All Fuels

Vehicle Type	Model Year	MIL Command On Result (#)				Total
		MIL Commanded-On With Codes	MIL Commanded-On Without Codes	MIL Not Commanded-On	No Communication	
P	1996	1,431	5	10,360	75	11,871
	1997	2,064	8	14,776	97	16,945
	1998	2,522	6	19,670	69	22,267
	1999	2,915	7	22,270	110	25,302
	2000	3,648	11	22,785	128	26,572
	2001	3,758	9	26,226	120	30,113
	2002	4,395	8	51,280	135	55,818
	2003	2,652	17	28,478	95	31,242
	2004	2,903	9	54,161	149	57,222
	2005	1,721	4	28,045	59	29,829
	2006	2,095	26	58,486	243	60,850
	2007	870	5	29,012	60	29,947
	2008	1,038	4	63,254	139	64,435
	2009	327	4	19,586	31	19,948
	2010	457	0	60,806	78	61,341
2011	54	0	18,220	25	18,299	
P Total		32,850	123	527,415	1,613	562,001
T	1996	916	2	6,173	21	7,112
	1997	1,291	4	9,521	31	10,847
	1998	1,610	4	12,468	44	14,126
	1999	1,753	14	14,462	32	16,261
	2000	1,921	3	14,414	44	16,382
	2001	2,296	6	16,681	43	19,026
	2002	3,016	10	35,858	60	38,944
	2003	2,107	23	22,014	58	24,202
	2004	2,988	22	52,335	81	55,426
	2005	1,576	11	24,775	26	26,388
	2006	1,830	22	47,436	28	49,316
	2007	876	1	22,046	30	22,953
	2008	945	3	48,753	45	49,746
	2009	235	0	11,059	10	11,304
	2010	273	0	39,503	26	39,802
2011	36	0	12,751	14	12,801	
T Total		23,669	125	390,249	593	414,636
Grand Total		56,519	248	917,664	2,206	976,637

Table (a) (2) (xix, xxi, xxii). # and % Fail for MIL Commanded On					
Vehicle Type	Model Year	MIL Command On Result (%)			
		MIL Commanded-On With Codes	MIL Commanded-On Without Codes	MIL Not Commanded-On	No Communication
P	1996	12.05%	0.04%	87.27%	0.63%
	1997	12.18%	0.05%	87.20%	0.57%
	1998	11.33%	0.03%	88.34%	0.31%
	1999	11.52%	0.03%	88.02%	0.43%
	2000	13.73%	0.04%	85.75%	0.48%
	2001	12.48%	0.03%	87.09%	0.40%
	2002	7.87%	0.01%	91.87%	0.24%
	2003	8.49%	0.05%	91.15%	0.30%
	2004	5.07%	0.02%	94.65%	0.26%
	2005	5.77%	0.01%	94.02%	0.20%
	2006	3.44%	0.04%	96.12%	0.40%
	2007	2.91%	0.02%	96.88%	0.20%
	2008	1.61%	0.01%	98.17%	0.22%
	2009	1.64%	0.02%	98.19%	0.16%
2010	0.75%	0.00%	99.13%	0.13%	
2011	0.30%	0.00%	99.57%	0.14%	
P Total		5.85%	0.02%	93.85%	0.29%
T	1996	12.88%	0.03%	86.80%	0.30%
	1997	11.90%	0.04%	87.78%	0.29%
	1998	11.40%	0.03%	88.26%	0.31%
	1999	10.78%	0.09%	88.94%	0.20%
	2000	11.73%	0.02%	87.99%	0.27%
	2001	12.07%	0.03%	87.67%	0.23%
	2002	7.74%	0.03%	92.08%	0.15%
	2003	8.71%	0.10%	90.96%	0.24%
	2004	5.39%	0.04%	94.42%	0.15%
	2005	5.97%	0.04%	93.89%	0.10%
	2006	3.71%	0.04%	96.19%	0.06%
	2007	3.82%	0.00%	96.05%	0.13%
	2008	1.90%	0.01%	98.00%	0.09%
	2009	2.08%	0.00%	97.83%	0.09%
2010	0.69%	0.00%	99.25%	0.07%	
2011	0.28%	0.00%	99.61%	0.11%	
T Total		5.71%	0.03%	94.12%	0.14%
Grand Total		5.79%	0.03%	93.96%	0.23%

Table (a) (2)(xxiii). # and % Not Ready (Network Tests): All Fuels

Vehicle Type	Model Year	Fail Readiness	Exempted from Readiness	Pass Readiness	Total**	% Fail Readiness
P	1996	696	2,436	8,664	11,871	5.9%
	1997	1,367	986	14,495	16,945	8.1%
	1998	1,697	1,339	19,162	22,267	7.6%
	1999	2,018	231	22,943	25,302	8.0%
	2000	2,150	354	23,940	26,572	8.1%
	2001	3,335	380	26,278	30,113	11.1%
	2002	4,031	5	51,647	55,818	7.2%
	2003	2,285	1,669	27,193	31,242	7.3%
	2004	2,773	0	54,300	57,222	4.8%
	2005	1,646	0	28,124	29,829	5.5%
	2006	1,897	0	58,710	60,850	3.1%
	2007	946	0	28,941	29,947	3.2%
	2008	1,250	0	63,046	64,435	1.9%
	2009	558	0	19,359	19,948	2.8%
2010	1,173	0	60,090	61,341	1.9%	
2011	1,160	0	17,114	18,299	6.3%	
P Total		28,982	7,400	524,006	562,001	5.2%
T	1996	565	561	5,965	7,112	7.9%
	1997	942	487	9,387	10,847	8.7%
	1998	1,168	414	12,500	14,126	8.3%
	1999	1,311	304	14,614	16,261	8.1%
	2000	1,282	13	15,043	16,382	7.8%
	2001	2,223	1,240	15,520	19,026	11.7%
	2002	2,877	253	35,754	38,944	7.4%
	2003	1,674	2,463	20,007	24,202	6.9%
	2004	2,778	32	52,535	55,426	5.0%
	2005	1,580	87	24,695	26,388	6.0%
	2006	1,671	47	47,570	49,316	3.4%
	2007	849	10	22,064	22,953	3.7%
	2008	1,086	0	48,615	49,746	2.2%
	2009	346	0	10,948	11,304	3.1%
2010	735	0	39,041	39,802	1.8%	
2011	873	0	11,914	12,801	6.8%	
T Total		21,960	5,911	386,172	414,636	5.3%
Grand Total		50,942	13,311	910,178	976,637	5.2%

** Total includes no communication

Table (a) (3 & 4). # of Tests by Station, % Fail by Station

Station ID	Model Year	Fail	Pass	Total	% Fail
ST0000014	1990	1	4	5	20.00%
	1991		4	4	0.00%
	1992		4	4	0.00%
	1993	1	4	5	20.00%
	1994	1	7	8	12.50%
	1995	1	14	15	6.67%
	1996		9	9	0.00%
	1997	6	25	31	19.35%
	1998	10	29	39	25.64%
	1999	7	32	39	17.95%
	2000	6	36	42	14.29%
	2001	3	35	38	7.89%
	2002	10	75	85	11.76%
	2003	10	45	55	18.18%
	2004	11	112	123	8.94%
	2005	7	59	66	10.61%
	2006	8	121	129	6.20%
	2007	6	56	62	9.68%
	2008	6	127	133	4.51%
2009	5	56	61	8.20%	
2010	6	111	117	5.13%	
2011	10	89	99	10.10%	
ST0000014 Total		115	1054	1169	9.84%
ST0000020	1990	1	14	15	6.67%
	1991	5	18	23	21.74%
	1992	7	24	31	22.58%
	1993	2	35	37	5.41%
	1994	10	66	76	13.16%
	1995	18	80	98	18.37%
	1996	12	72	84	14.29%
	1997	29	102	131	22.14%
	1998	38	140	178	21.35%
	1999	56	178	234	23.93%
	2000	47	187	234	20.09%
	2001	66	245	311	21.22%
	2002	68	391	459	14.81%
	2003	46	273	319	14.42%
	2004	65	557	622	10.45%
	2005	46	357	403	11.41%
	2006	55	601	656	8.38%
	2007	22	349	371	5.93%
	2008	36	639	675	5.33%
2009	11	234	245	4.49%	
2010	25	640	665	3.76%	
2011	22	387	409	5.38%	
ST0000020 Total		687	5589	6276	10.95%

Table (a) (3 & 4). # of Tests by Station, % Fail by Station

Station ID	Model Year	Fail	Pass	Total	% Fail
ST0000023	1990	4	12	16	25.00%
	1991	5	20	25	20.00%
	1992	9	27	36	25.00%
	1993	4	40	44	9.09%
	1994	9	46	55	16.36%
	1995	15	84	99	15.15%
	1996	26	97	123	21.14%
	1997	32	137	169	18.93%
	1998	29	142	171	16.96%
	1999	47	175	222	21.17%
	2000	39	163	202	19.31%
	2001	63	204	267	23.60%
	2002	74	408	482	15.35%
	2003	36	197	233	15.45%
	2004	53	524	577	9.19%
	2005	38	236	274	13.87%
	2006	39	543	582	6.70%
	2007	25	237	262	9.54%
	2008	18	519	537	3.35%
2009	6	131	137	4.38%	
2010	14	417	431	3.25%	
2011	5	59	64	7.81%	
ST0000023 Total		590	4418	5008	11.78%
ST0000034	1990		9	9	0.00%
	1991	5	16	21	23.81%
	1992	7	16	23	30.43%
	1993	2	18	20	10.00%
	1994	4	35	39	10.26%
	1995	5	44	49	10.20%
	1996	13	60	73	17.81%
	1997	9	59	68	13.24%
	1998	19	102	121	15.70%
	1999	11	114	125	8.80%
	2000	13	97	110	11.82%
	2001	20	134	154	12.99%
	2002	36	323	359	10.03%
	2003	22	157	179	12.29%
	2004	32	427	459	6.97%
	2005	15	163	178	8.43%
	2006	23	411	434	5.30%
	2007	14	198	212	6.60%
	2008	19	512	531	3.58%
2009	8	132	140	5.71%	
2010	12	493	505	2.38%	
2011	6	154	160	3.75%	
ST0000034 Total		295	3674	3969	7.43%

Table (a) (3 & 4). # of Tests by Station, % Fail by Station

Station ID	Model Year	Fail	Pass	Total	% Fail
ST0000036	1990		6	6	0.00%
	1991	1	8	9	11.11%
	1992	5	7	12	41.67%
	1993	1	4	5	20.00%
	1994	2	15	17	11.76%
	1995	7	12	19	36.84%
	1996	4	20	24	16.67%
	1997	12	38	50	24.00%
	1998	5	44	49	10.20%
	1999	15	46	61	24.59%
	2000	11	51	62	17.74%
	2001	10	50	60	16.67%
	2002	20	145	165	12.12%
	2003	9	72	81	11.11%
	2004	28	179	207	13.53%
	2005	12	99	111	10.81%
2006	21	204	225	9.33%	
2007	9	112	121	7.44%	
2008	9	269	278	3.24%	
2009	7	110	117	5.98%	
2010	22	351	373	5.90%	
2011	29	233	262	11.07%	
ST0000036 Total		239	2075	2314	10.33%
ST0000065	1990	7	7	14	50.00%
	1991	2	8	10	20.00%
	1992		13	13	0.00%
	1993	1	13	14	7.14%
	1994	5	26	31	16.13%
	1995	1	27	28	3.57%
	1996	7	47	54	12.96%
	1997	13	52	65	20.00%
	1998	5	81	86	5.81%
	1999	13	100	113	11.50%
	2000	12	86	98	12.24%
	2001	20	103	123	16.26%
	2002	35	263	298	11.74%
	2003	20	120	140	14.29%
	2004	39	324	363	10.74%
	2005	20	116	136	14.71%
2006	25	366	391	6.39%	
2007	10	166	176	5.68%	
2008	14	386	400	3.50%	
2009	15	107	122	12.30%	
2010	20	367	387	5.17%	
2011	16	145	161	9.94%	
ST0000065 Total		300	2923	3223	9.31%

Table (a) (3 & 4). # of Tests by Station, % Fail by Station

Station ID	Model Year	Fail	Pass	Total	% Fail
ST0000107	1990	3	13	16	18.75%
	1991	3	10	13	23.08%
	1992	8	22	30	26.67%
	1993	8	29	37	21.62%
	1994	10	55	65	15.38%
	1995	11	56	67	16.42%
	1996	8	66	74	10.81%
	1997	21	105	126	16.67%
	1998	26	118	144	18.06%
	1999	32	157	189	16.93%
	2000	32	108	140	22.86%
	2001	45	165	210	21.43%
	2002	50	400	450	11.11%
	2003	29	225	254	11.42%
	2004	50	509	559	8.94%
	2005	16	226	242	6.61%
	2006	43	457	500	8.60%
	2007	13	195	208	6.25%
2008	23	480	503	4.57%	
2009	4	126	130	3.08%	
2010	14	514	528	2.65%	
2011	5	144	149	3.36%	
ST0000107 Total		454	4180	4634	9.80%
ST0000112	1990	6	17	23	26.09%
	1991	4	19	23	17.39%
	1992	3	22	25	12.00%
	1993	7	33	40	17.50%
	1994	7	47	54	12.96%
	1995	3	53	56	5.36%
	1996	5	49	54	9.26%
	1997	12	85	97	12.37%
	1998	18	128	146	12.33%
	1999	20	127	147	13.61%
	2000	16	152	168	9.52%
	2001	31	157	188	16.49%
	2002	34	370	404	8.42%
	2003	22	190	212	10.38%
	2004	39	487	526	7.41%
	2005	26	234	260	10.00%
	2006	26	474	500	5.20%
	2007	10	230	240	4.17%
2008	5	478	483	1.04%	
2009	6	126	132	4.55%	
2010	8	402	410	1.95%	
2011	4	110	114	3.51%	
ST0000112 Total		312	3990	4302	7.25%

Table (a) (3 & 4). # of Tests by Station, % Fail by Station

Station ID	Model Year	Fail	Pass	Total	% Fail
ST0000120	1990	7	11	18	38.89%
	1991	2	18	20	10.00%
	1992	7	20	27	25.93%
	1993	15	25	40	37.50%
	1994	5	43	48	10.42%
	1995	12	62	74	16.22%
	1996	16	73	89	17.98%
	1997	18	99	117	15.38%
	1998	24	104	128	18.75%
	1999	33	140	173	19.08%
	2000	49	171	220	22.27%
	2001	41	171	212	19.34%
	2002	50	309	359	13.93%
	2003	40	278	318	12.58%
	2004	55	491	546	10.07%
	2005	20	311	331	6.04%
	2006	25	486	511	4.89%
	2007	12	241	253	4.74%
2008	19	479	498	3.82%	
2009	8	128	136	5.88%	
2010	19	448	467	4.07%	
2011	22	284	306	7.19%	
ST0000120 Total		499	4392	4891	10.20%
ST0000125	1990	11	29	40	27.50%
	1991	13	35	48	27.08%
	1992	6	23	29	20.69%
	1993	5	46	51	9.80%
	1994	6	50	56	10.71%
	1995	17	100	117	14.53%
	1996	12	99	111	10.81%
	1997	25	152	177	14.12%
	1998	22	180	202	10.89%
	1999	35	188	223	15.70%
	2000	30	220	250	12.00%
	2001	38	241	279	13.62%
	2002	73	548	621	11.76%
	2003	35	289	324	10.80%
	2004	59	669	728	8.10%
	2005	32	290	322	9.94%
	2006	46	674	720	6.39%
	2007	16	261	277	5.78%
2008	22	706	728	3.02%	
2009	7	136	143	4.90%	
2010	10	534	544	1.84%	
2011	2	52	54	3.70%	
ST0000125 Total		522	5522	6044	8.64%

Table (a) (3 & 4). # of Tests by Station, % Fail by Station

Station ID	Model Year	Fail	Pass	Total	% Fail
ST0000132	1990	7	6	13	53.85%
	1991	1	12	13	7.69%
	1992	1	4	5	20.00%
	1993	1	7	8	12.50%
	1994	5	27	32	15.63%
	1995	3	22	25	12.00%
	1996	7	39	46	15.22%
	1997	3	42	45	6.67%
	1998	5	72	77	6.49%
	1999	7	75	82	8.54%
	2000	11	61	72	15.28%
	2001	20	96	116	17.24%
	2002	23	250	273	8.42%
	2003	22	118	140	15.71%
	2004	36	366	402	8.96%
	2005	20	200	220	9.09%
	2006	26	448	474	5.49%
	2007	20	246	266	7.52%
2008	22	493	515	4.27%	
2009	10	130	140	7.14%	
2010	11	486	497	2.21%	
2011	12	117	129	9.30%	
ST0000132 Total		273	3317	3590	7.60%
ST0000171	1990	5	13	18	27.78%
	1991	7	18	25	28.00%
	1992	2	17	19	10.53%
	1993	2	13	15	13.33%
	1994	3	27	30	10.00%
	1995	4	36	40	10.00%
	1996	2	39	41	4.88%
	1997	9	53	62	14.52%
	1998	4	83	87	4.60%
	1999	11	108	119	9.24%
	2000	21	97	118	17.80%
	2001	24	108	132	18.18%
	2002	35	348	383	9.14%
	2003	14	168	182	7.69%
	2004	38	517	555	6.85%
	2005	10	194	204	4.90%
	2006	20	560	580	3.45%
	2007	5	216	221	2.26%
2008	23	607	630	3.65%	
2009	7	160	167	4.19%	
2010	15	626	641	2.34%	
2011	4	137	141	2.84%	
ST0000171 Total		265	4145	4410	6.01%

Table (a) (3 & 4). # of Tests by Station, % Fail by Station

Station ID	Model Year	Fail	Pass	Total	% Fail
ST0000193	1990	2	21	23	8.70%
	1991	2	20	22	9.09%
	1992	4	31	35	11.43%
	1993	11	43	54	20.37%
	1994	6	61	67	8.96%
	1995	16	83	99	16.16%
	1996	15	90	105	14.29%
	1997	29	133	162	17.90%
	1998	29	181	210	13.81%
	1999	35	195	230	15.22%
	2000	40	175	215	18.60%
	2001	53	190	243	21.81%
	2002	76	572	648	11.73%
	2003	47	272	319	14.73%
	2004	63	723	786	8.02%
	2005	33	335	368	8.97%
	2006	53	784	837	6.33%
	2007	26	356	382	6.81%
2008	26	790	816	3.19%	
2009	13	197	210	6.19%	
2010	12	758	770	1.56%	
2011	26	300	326	7.98%	
ST0000193 Total		617	6310	6927	8.91%
ST0000229	1990		1	1	0.00%
	1991		3	3	0.00%
	1992	1	1	2	50.00%
	1993		2	2	0.00%
	1994	6	7	13	46.15%
	1995	3	5	8	37.50%
	1996	3	9	12	25.00%
	1997	3	17	20	15.00%
	1998	3	15	18	16.67%
	1999	1	23	24	4.17%
	2000	7	21	28	25.00%
	2001	8	29	37	21.62%
	2002	11	64	75	14.67%
	2003	4	34	38	10.53%
	2004	5	98	103	4.85%
	2005	3	50	53	5.66%
	2006	2	120	122	1.64%
	2007	4	70	74	5.41%
2008	8	193	201	3.98%	
2009	3	55	58	5.17%	
2010	15	222	237	6.33%	
2011	10	181	191	5.24%	
ST0000229 Total		100	1220	1320	7.58%

Table (a) (3 & 4). # of Tests by Station, % Fail by Station

Station ID	Model Year	Fail	Pass	Total	% Fail
ST0000326	1990	7	17	24	29.17%
	1991	4	14	18	22.22%
	1992	2	28	30	6.67%
	1993	10	41	51	19.61%
	1994	5	56	61	8.20%
	1995	8	70	78	10.26%
	1996	16	86	102	15.69%
	1997	30	113	143	20.98%
	1998	34	178	212	16.04%
	1999	47	206	253	18.58%
	2000	56	205	261	21.46%
	2001	56	231	287	19.51%
	2002	64	479	543	11.79%
	2003	39	283	322	12.11%
	2004	70	598	668	10.48%
	2005	36	264	300	12.00%
	2006	40	649	689	5.81%
	2007	20	283	303	6.60%
	2008	19	611	630	3.02%
	2009	2	144	146	1.37%
2010	12	560	572	2.10%	
2011	2	45	47	4.26%	
ST0000326 Total		579	5161	5740	10.09%
ST0000328	1990	8	20	28	28.57%
	1991	8	21	29	27.59%
	1992	8	39	47	17.02%
	1993	6	42	48	12.50%
	1994	15	85	100	15.00%
	1995	20	75	95	21.05%
	1996	24	125	149	16.11%
	1997	30	158	188	15.96%
	1998	51	215	266	19.17%
	1999	53	220	273	19.41%
	2000	52	225	277	18.77%
	2001	74	250	324	22.84%
	2002	104	559	663	15.69%
	2003	39	297	336	11.61%
	2004	88	657	745	11.81%
	2005	37	311	348	10.63%
	2006	48	558	606	7.92%
	2007	19	275	294	6.46%
	2008	23	576	599	3.84%
	2009	4	161	165	2.42%
2010	19	506	525	3.62%	
2011	17	196	213	7.98%	
ST0000328 Total		747	5571	6318	11.82%

Table (a) (3 & 4). # of Tests by Station, % Fail by Station

Station ID	Model Year	Fail	Pass	Total	% Fail
ST0000329	1990	2	5	7	28.57%
	1991		9	9	0.00%
	1992	4	12	16	25.00%
	1993	1	16	17	5.88%
	1994	6	29	35	17.14%
	1995	10	40	50	20.00%
	1996	14	53	67	20.90%
	1997	28	89	117	23.93%
	1998	27	118	145	18.62%
	1999	28	115	143	19.58%
	2000	38	151	189	20.11%
	2001	52	154	206	25.24%
	2002	50	287	337	14.84%
	2003	39	213	252	15.48%
	2004	42	430	472	8.90%
	2005	29	202	231	12.55%
	2006	26	484	510	5.10%
	2007	14	222	236	5.93%
2008	18	456	474	3.80%	
2009	4	120	124	3.23%	
2010	7	348	355	1.97%	
2011	3	48	51	5.88%	
ST0000329 Total		442	3601	4043	10.93%
ST0000359	1990	5	14	19	26.32%
	1991	4	12	16	25.00%
	1992	4	38	42	9.52%
	1993	10	35	45	22.22%
	1994	6	38	44	13.64%
	1995	10	81	91	10.99%
	1996	10	56	66	15.15%
	1997	15	94	109	13.76%
	1998	23	119	142	16.20%
	1999	23	131	154	14.94%
	2000	27	140	167	16.17%
	2001	27	166	193	13.99%
	2002	50	369	419	11.93%
	2003	21	196	217	9.68%
	2004	35	494	529	6.62%
	2005	16	245	261	6.13%
	2006	27	469	496	5.44%
	2007	8	190	198	4.04%
2008	19	477	496	3.83%	
2009	5	104	109	4.59%	
2010	14	451	465	3.01%	
2011	1	65	66	1.52%	
ST0000359 Total		360	3984	4344	8.29%

Table (a) (3 & 4). # of Tests by Station, % Fail by Station

Station ID	Model Year	Fail	Pass	Total	% Fail
ST0000373	1990		6	6	0.00%
	1991		1	1	0.00%
	1992	1	3	4	25.00%
	1993		7	7	0.00%
	1994	4	9	13	30.77%
	1995		15	15	0.00%
	1996	5	14	19	26.32%
	1997	2	26	28	7.14%
	1998	5	23	28	17.86%
	1999	4	35	39	10.26%
	2000	7	37	44	15.91%
	2001	14	45	59	23.73%
	2002	10	99	109	9.17%
	2003	8	57	65	12.31%
	2004	19	156	175	10.86%
	2005	6	71	77	7.79%
	2006	16	142	158	10.13%
2007	4	71	75	5.33%	
2008	5	145	150	3.33%	
2009	1	37	38	2.63%	
2010	6	155	161	3.73%	
2011	1	22	23	4.35%	
ST0000373 Total		118	1176	1294	9.12%
ST0000375	1990		1	1	0.00%
	1991	1		1	100.00%
	1992		2	2	0.00%
	1993		5	5	0.00%
	1994		12	12	0.00%
	1995	3	14	17	17.65%
	1996	2	13	15	13.33%
	1997	3	21	24	12.50%
	1998	8	35	43	18.60%
	1999	5	31	36	13.89%
	2000	3	38	41	7.32%
	2001	12	40	52	23.08%
	2002	8	106	114	7.02%
	2003	8	50	58	13.79%
	2004	9	135	144	6.25%
	2005	7	73	80	8.75%
	2006	5	161	166	3.01%
2007	3	74	77	3.90%	
2008	5	157	162	3.09%	
2009		32	32	0.00%	
2010	6	151	157	3.82%	
2011	1	11	12	8.33%	
ST0000375 Total		89	1162	1251	7.11%

Table (a) (3 & 4). # of Tests by Station, % Fail by Station

Station ID	Model Year	Fail	Pass	Total	% Fail
ST0000386	1990	5	40	45	11.11%
	1991	4	23	27	14.81%
	1992	8	40	48	16.67%
	1993	13	53	66	19.70%
	1994	20	104	124	16.13%
	1995	20	150	170	11.76%
	1996	41	213	254	16.14%
	1997	55	258	313	17.57%
	1998	57	347	404	14.11%
	1999	66	401	467	14.13%
	2000	80	374	454	17.62%
	2001	82	442	524	15.65%
	2002	163	1021	1184	13.77%
	2003	98	536	634	15.46%
	2004	98	1192	1290	7.60%
	2005	61	506	567	10.76%
	2006	76	1179	1255	6.06%
	2007	35	450	485	7.22%
	2008	46	1204	1250	3.68%
2009	3	240	243	1.23%	
2010	20	1067	1087	1.84%	
2011	11	158	169	6.51%	
ST0000386 Total		1062	9998	11060	9.60%
ST0000412	1990	6	24	30	20.00%
	1991	11	31	42	26.19%
	1992	5	38	43	11.63%
	1993	3	53	56	5.36%
	1994	7	62	69	10.14%
	1995	8	87	95	8.42%
	1996	22	81	103	21.36%
	1997	21	111	132	15.91%
	1998	37	178	215	17.21%
	1999	40	173	213	18.78%
	2000	41	184	225	18.22%
	2001	54	191	245	22.04%
	2002	63	353	416	15.14%
	2003	34	229	263	12.93%
	2004	36	431	467	7.71%
	2005	23	241	264	8.71%
	2006	32	433	465	6.88%
	2007	12	196	208	5.77%
	2008	16	456	472	3.39%
2009	5	117	122	4.10%	
2010	7	459	466	1.50%	
2011	2	77	79	2.53%	
ST0000412 Total		485	4205	4690	10.34%

Table (a) (3 & 4). # of Tests by Station, % Fail by Station					
Station ID	Model Year	Fail	Pass	Total	% Fail
ST0000434	1990		11	11	0.00%
	1991	1	13	14	7.14%
	1992	2	24	26	7.69%
	1993	4	23	27	14.81%
	1994	3	43	46	6.52%
	1995	6	63	69	8.70%
	1996	12	69	81	14.81%
	1997	20	133	153	13.07%
	1998	28	187	215	13.02%
	1999	35	208	243	14.40%
	2000	33	222	255	12.94%
	2001	67	266	333	20.12%
	2002	70	610	680	10.29%
	2003	37	344	381	9.71%
	2004	68	945	1013	6.71%
	2005	34	386	420	8.10%
	2006	49	1027	1076	4.55%
	2007	18	390	408	4.41%
	2008	36	1188	1224	2.94%
2009	13	237	250	5.20%	
2010	40	1099	1139	3.51%	
2011	28	378	406	6.90%	
ST0000434 Total		604	7866	8470	7.13%
ST0000469	1990	7	15	22	31.82%
	1991	3	21	24	12.50%
	1992	5	31	36	13.89%
	1993	3	36	39	7.69%
	1994	9	59	68	13.24%
	1995	12	89	101	11.88%
	1996	14	86	100	14.00%
	1997	18	147	165	10.91%
	1998	15	172	187	8.02%
	1999	27	216	243	11.11%
	2000	30	183	213	14.08%
	2001	51	236	287	17.77%
	2002	45	513	558	8.06%
	2003	26	238	264	9.85%
	2004	34	635	669	5.08%
	2005	15	296	311	4.82%
	2006	33	549	582	5.67%
	2007	15	227	242	6.20%
	2008	17	601	618	2.75%
2009	4	137	141	2.84%	
2010	13	531	544	2.39%	
2011	5	68	73	6.85%	
ST0000469 Total		401	5086	5487	7.31%

Table (a) (3 & 4). # of Tests by Station, % Fail by Station

Station ID	Model Year	Fail	Pass	Total	% Fail
ST0000493	1990	1	3	4	25.00%
	1991	1	9	10	10.00%
	1992	4	6	10	40.00%
	1993		5	5	0.00%
	1994	1	18	19	5.26%
	1995	4	23	27	14.81%
	1996	1	26	27	3.70%
	1997	5	37	42	11.90%
	1998	12	68	80	15.00%
	1999	11	63	74	14.86%
	2000	8	56	64	12.50%
	2001	18	77	95	18.95%
	2002	33	210	243	13.58%
	2003	14	101	115	12.17%
	2004	22	286	308	7.14%
	2005	9	95	104	8.65%
	2006	14	299	313	4.47%
2007	4	108	112	3.57%	
2008	11	342	353	3.12%	
2009	1	75	76	1.32%	
2010	5	294	299	1.67%	
2011	1	25	26	3.85%	
ST0000493 Total		180	2226	2406	7.48%
ST0000516	1990	3	14	17	17.65%
	1991	6	18	24	25.00%
	1992	3	21	24	12.50%
	1993	3	26	29	10.34%
	1994	7	46	53	13.21%
	1995	3	43	46	6.52%
	1996	7	58	65	10.77%
	1997	12	111	123	9.76%
	1998	18	111	129	13.95%
	1999	15	128	143	10.49%
	2000	16	100	116	13.79%
	2001	28	134	162	17.28%
	2002	39	426	465	8.39%
	2003	15	182	197	7.61%
	2004	34	555	589	5.77%
	2005	10	219	229	4.37%
	2006	28	615	643	4.35%
2007	12	204	216	5.56%	
2008	14	699	713	1.96%	
2009	6	165	171	3.51%	
2010	7	585	592	1.18%	
2011	6	150	156	3.85%	
ST0000516 Total		292	4610	4902	5.96%

Table (a) (3 & 4). # of Tests by Station, % Fail by Station

Station ID	Model Year	Fail	Pass	Total	% Fail
ST0000520	1990	2	12	14	14.29%
	1991	3	13	16	18.75%
	1992	1	9	10	10.00%
	1993		19	19	0.00%
	1994	7	26	33	21.21%
	1995	6	36	42	14.29%
	1996	7	50	57	12.28%
	1997	14	61	75	18.67%
	1998	10	79	89	11.24%
	1999	15	98	113	13.27%
	2000	13	81	94	13.83%
	2001	17	98	115	14.78%
	2002	20	269	289	6.92%
	2003	11	160	171	6.43%
	2004	23	429	452	5.09%
	2005	5	124	129	3.88%
	2006	12	396	408	2.94%
	2007	8	141	149	5.37%
	2008	8	417	425	1.88%
2009	3	93	96	3.13%	
2010	5	388	393	1.27%	
2011		41	41	0.00%	
ST0000520 Total		190	3040	3230	5.88%
ST0000525	1990	4	9	13	30.77%
	1991	2	10	12	16.67%
	1992	1	13	14	7.14%
	1993	8	25	33	24.24%
	1994	4	27	31	12.90%
	1995	6	44	50	12.00%
	1996	12	74	86	13.95%
	1997	10	67	77	12.99%
	1998	19	118	137	13.87%
	1999	26	132	158	16.46%
	2000	28	124	152	18.42%
	2001	29	155	184	15.76%
	2002	40	425	465	8.60%
	2003	26	245	271	9.59%
	2004	47	639	686	6.85%
	2005	19	296	315	6.03%
	2006	39	676	715	5.45%
	2007	10	330	340	2.94%
	2008	25	818	843	2.97%
2009	4	229	233	1.72%	
2010	12	765	777	1.54%	
2011	2	76	78	2.56%	
ST0000525 Total		373	5297	5670	6.58%

Table (a) (3 & 4). # of Tests by Station, % Fail by Station					
Station ID	Model Year	Fail	Pass	Total	% Fail
ST0000549	1991		3	3	0.00%
	1993		1	1	0.00%
	1994	1	2	3	33.33%
	1995		2	2	0.00%
	1996		4	4	0.00%
	1997		6	6	0.00%
	1998		9	9	0.00%
	1999	2	17	19	10.53%
	2000	1	6	7	14.29%
	2001		10	10	0.00%
	2002		5	5	0.00%
	2003	4	14	18	22.22%
	2004	1	23	24	4.17%
	2005		5	5	0.00%
	2006	1	18	19	5.26%
	2007	1	11	12	8.33%
	2008		33	33	0.00%
2009		8	8	0.00%	
2010	2	23	25	8.00%	
2011		8	8	0.00%	
ST0000549 Total		13	208	221	5.88%
ST0000557	1990	1	13	14	7.14%
	1991	1	13	14	7.14%
	1992	8	17	25	32.00%
	1993	2	17	19	10.53%
	1994	5	42	47	10.64%
	1995	3	41	44	6.82%
	1996	15	62	77	19.48%
	1997	12	71	83	14.46%
	1998	14	97	111	12.61%
	1999	22	112	134	16.42%
	2000	19	85	104	18.27%
	2001	24	126	150	16.00%
	2002	46	283	329	13.98%
	2003	24	139	163	14.72%
	2004	40	386	426	9.39%
	2005	14	137	151	9.27%
	2006	23	408	431	5.34%
2007	4	145	149	2.68%	
2008	17	433	450	3.78%	
2009	2	90	92	2.17%	
2010	7	358	365	1.92%	
2011	2	42	44	4.55%	
ST0000557 Total		305	3117	3422	8.91%

Table (a) (3 & 4). # of Tests by Station, % Fail by Station

Station ID	Model Year	Fail	Pass	Total	% Fail
ST0000581	1990	4	39	43	9.30%
	1991	9	43	52	17.31%
	1992	15	73	88	17.05%
	1993	12	77	89	13.48%
	1994	18	117	135	13.33%
	1995	27	163	190	14.21%
	1996	38	191	229	16.59%
	1997	59	289	348	16.95%
	1998	85	356	441	19.27%
	1999	78	363	441	17.69%
	2000	85	362	447	19.02%
	2001	115	452	567	20.28%
	2002	142	879	1021	13.91%
	2003	91	510	601	15.14%
	2004	89	1098	1187	7.50%
	2005	54	516	570	9.47%
	2006	75	1062	1137	6.60%
	2007	45	479	524	8.59%
2008	33	918	951	3.47%	
2009	13	301	314	4.14%	
2010	31	861	892	3.48%	
2011	63	535	598	10.54%	
ST0000581 Total		1181	9684	10865	10.87%
ST0000616	1990	1	3	4	25.00%
	1991		3	3	0.00%
	1992	3	3	6	50.00%
	1993	5	13	18	27.78%
	1994	4	16	20	20.00%
	1995	4	19	23	17.39%
	1996	3	24	27	11.11%
	1997	10	59	69	14.49%
	1998	9	91	100	9.00%
	1999	13	93	106	12.26%
	2000	19	102	121	15.70%
	2001	25	125	150	16.67%
	2002	38	304	342	11.11%
	2003	22	164	186	11.83%
	2004	33	384	417	7.91%
	2005	12	171	183	6.56%
	2006	22	430	452	4.87%
	2007	14	242	256	5.47%
2008	15	446	461	3.25%	
2009	4	133	137	2.92%	
2010	9	431	440	2.05%	
2011	4	80	84	4.76%	
ST0000616 Total		269	3336	3605	7.46%

Table (a) (3 & 4). # of Tests by Station, % Fail by Station

Station ID	Model Year	Fail	Pass	Total	% Fail
ST0000648	1990	1	7	8	12.50%
	1991	3	10	13	23.08%
	1992	2	12	14	14.29%
	1993	4	22	26	15.38%
	1994	2	32	34	5.88%
	1995	2	35	37	5.41%
	1996	8	46	54	14.81%
	1997	11	60	71	15.49%
	1998	11	92	103	10.68%
	1999	18	108	126	14.29%
	2000	16	102	118	13.56%
	2001	31	115	146	21.23%
	2002	34	332	366	9.29%
	2003	22	134	156	14.10%
	2004	18	369	387	4.65%
	2005	13	164	177	7.34%
	2006	22	399	421	5.23%
	2007	8	136	144	5.56%
	2008	11	359	370	2.97%
2009	2	68	70	2.86%	
2010	7	366	373	1.88%	
2011		18	18	0.00%	
ST0000648 Total		246	2986	3232	7.61%
ST0000697	1990	1	8	9	11.11%
	1991	5	17	22	22.73%
	1992	5	20	25	20.00%
	1993	15	32	47	31.91%
	1994	10	41	51	19.61%
	1995	19	68	87	21.84%
	1996	30	83	113	26.55%
	1997	43	103	146	29.45%
	1998	55	156	211	26.07%
	1999	56	160	216	25.93%
	2000	67	185	252	26.59%
	2001	69	183	252	27.38%
	2002	101	333	434	23.27%
	2003	57	187	244	23.36%
	2004	64	390	454	14.10%
	2005	44	216	260	16.92%
	2006	42	347	389	10.80%
	2007	12	155	167	7.19%
	2008	25	343	368	6.79%
2009	5	85	90	5.56%	
2010	11	272	283	3.89%	
2011		25	25	0.00%	
ST0000697 Total		736	3409	4145	17.76%

Table (a) (3 & 4). # of Tests by Station, % Fail by Station

Station ID	Model Year	Fail	Pass	Total	% Fail
ST0000725	1990	12	30	42	28.57%
	1991	17	41	58	29.31%
	1992	17	56	73	23.29%
	1993	22	84	106	20.75%
	1994	32	131	163	19.63%
	1995	45	188	233	19.31%
	1996	71	196	267	26.59%
	1997	96	267	363	26.45%
	1998	97	264	361	26.87%
	1999	104	339	443	23.48%
	2000	138	410	548	25.18%
	2001	171	399	570	30.00%
	2002	177	745	922	19.20%
	2003	97	460	557	17.41%
	2004	102	777	879	11.60%
	2005	65	490	555	11.71%
	2006	78	782	860	9.07%
	2007	28	371	399	7.02%
2008	36	798	834	4.32%	
2009	10	224	234	4.27%	
2010	12	524	536	2.24%	
2011	4	106	110	3.64%	
ST0000725 Total		1431	7682	9113	15.70%
ST0000776	1990	6	22	28	21.43%
	1991	3	28	31	9.68%
	1992	9	46	55	16.36%
	1993	7	48	55	12.73%
	1994	18	99	117	15.38%
	1995	20	125	145	13.79%
	1996	33	155	188	17.55%
	1997	30	184	214	14.02%
	1998	37	257	294	12.59%
	1999	48	241	289	16.61%
	2000	48	236	284	16.90%
	2001	63	287	350	18.00%
	2002	97	748	845	11.48%
	2003	49	370	419	11.69%
	2004	81	797	878	9.23%
	2005	53	369	422	12.56%
	2006	61	844	905	6.74%
	2007	21	344	365	5.75%
2008	34	822	856	3.97%	
2009	10	195	205	4.88%	
2010	12	660	672	1.79%	
2011	5	106	111	4.50%	
ST0000776 Total		745	6983	7728	9.64%

Table (a) (3 & 4). # of Tests by Station, % Fail by Station

Station ID	Model Year	Fail	Pass	Total	% Fail
ST0000790	1990	8	17	25	32.00%
	1991	7	26	33	21.21%
	1992	6	38	44	13.64%
	1993	9	56	65	13.85%
	1994	7	74	81	8.64%
	1995	31	100	131	23.66%
	1996	14	93	107	13.08%
	1997	37	148	185	20.00%
	1998	45	168	213	21.13%
	1999	47	197	244	19.26%
	2000	55	214	269	20.45%
	2001	70	246	316	22.15%
	2002	87	494	581	14.97%
	2003	50	298	348	14.37%
	2004	55	576	631	8.72%
	2005	30	293	323	9.29%
	2006	35	545	580	6.03%
	2007	17	208	225	7.56%
	2008	16	488	504	3.17%
2009	7	131	138	5.07%	
2010	16	433	449	3.56%	
2011	1	101	102	0.98%	
ST0000790 Total		650	4944	5594	11.62%
ST0000809	1990	1	9	10	10.00%
	1991	6	6	12	50.00%
	1992	6	11	17	35.29%
	1993	1	14	15	6.67%
	1994	1	26	27	3.70%
	1995	3	26	29	10.34%
	1996	4	37	41	9.76%
	1997	8	71	79	10.13%
	1998	6	68	74	8.11%
	1999	16	76	92	17.39%
	2000	9	77	86	10.47%
	2001	20	119	139	14.39%
	2002	21	227	248	8.47%
	2003	17	158	175	9.71%
	2004	22	290	312	7.05%
	2005	12	149	161	7.45%
	2006	9	261	270	3.33%
	2007	5	122	127	3.94%
	2008	5	252	257	1.95%
2009	1	58	59	1.69%	
2010	4	223	227	1.76%	
2011	3	51	54	5.56%	
ST0000809 Total		180	2331	2511	7.17%

Table (a) (3 & 4). # of Tests by Station, % Fail by Station

Station ID	Model Year	Fail	Pass	Total	% Fail
ST0000963	1990	1	12	13	7.69%
	1991	3	5	8	37.50%
	1992		19	19	0.00%
	1993	3	25	28	10.71%
	1994	4	43	47	8.51%
	1995	10	53	63	15.87%
	1996	22	78	100	22.00%
	1997	24	95	119	20.17%
	1998	28	140	168	16.67%
	1999	30	159	189	15.87%
	2000	45	154	199	22.61%
	2001	49	194	243	20.16%
	2002	60	381	441	13.61%
	2003	35	233	268	13.06%
	2004	63	589	652	9.66%
	2005	34	322	356	9.55%
	2006	39	664	703	5.55%
	2007	11	338	349	3.15%
2008	20	729	749	2.67%	
2009	8	217	225	3.56%	
2010	16	683	699	2.29%	
2011	3	141	144	2.08%	
ST0000963 Total		508	5274	5782	8.79%
ST0000969	1990	2	9	11	18.18%
	1991	4	3	7	57.14%
	1992	4	5	9	44.44%
	1993		8	8	0.00%
	1994	4	24	28	14.29%
	1995	1	15	16	6.25%
	1996	7	29	36	19.44%
	1997	9	57	66	13.64%
	1998	16	39	55	29.09%
	1999	11	61	72	15.28%
	2000	17	84	101	16.83%
	2001	16	64	80	20.00%
	2002	21	119	140	15.00%
	2003	14	84	98	14.29%
	2004	19	163	182	10.44%
	2005	6	88	94	6.38%
	2006	10	154	164	6.10%
	2007	10	76	86	11.63%
2008	7	156	163	4.29%	
2009		45	45	0.00%	
2010	7	140	147	4.76%	
2011	2	33	35	5.71%	
ST0000969 Total		187	1456	1643	11.38%

Table (a) (3 & 4). # of Tests by Station, % Fail by Station					
Station ID	Model Year	Fail	Pass	Total	% Fail
ST0000972	1990	9	18	27	33.33%
	1991	5	29	34	14.71%
	1992	12	39	51	23.53%
	1993	10	55	65	15.38%
	1994	16	68	84	19.05%
	1995	24	119	143	16.78%
	1996	15	108	123	12.20%
	1997	36	187	223	16.14%
	1998	35	238	273	12.82%
	1999	45	257	302	14.90%
	2000	54	265	319	16.93%
	2001	70	317	387	18.09%
	2002	91	634	725	12.55%
	2003	61	419	480	12.71%
	2004	68	708	776	8.76%
	2005	46	414	460	10.00%
	2006	43	682	725	5.93%
	2007	30	475	505	5.94%
2008	43	756	799	5.38%	
2009	11	228	239	4.60%	
2010	31	759	790	3.92%	
2011	13	478	491	2.65%	
ST0000972 Total		768	7253	8021	9.57%
ST0000986	1990	3	20	23	13.04%
	1991	3	12	15	20.00%
	1992	5	23	28	17.86%
	1993	4	39	43	9.30%
	1994	9	48	57	15.79%
	1995	9	66	75	12.00%
	1996	15	60	75	20.00%
	1997	13	94	107	12.15%
	1998	27	142	169	15.98%
	1999	18	163	181	9.94%
	2000	25	190	215	11.63%
	2001	36	206	242	14.88%
	2002	49	488	537	9.12%
	2003	25	220	245	10.20%
	2004	36	589	625	5.76%
	2005	23	287	310	7.42%
	2006	41	607	648	6.33%
	2007	16	319	335	4.78%
2008	30	652	682	4.40%	
2009	12	217	229	5.24%	
2010	39	724	763	5.11%	
2011	80	598	678	11.80%	
ST0000986 Total		518	5764	6282	8.25%

Table (a) (3 & 4). # of Tests by Station, % Fail by Station					
Station ID	Model Year	Fail	Pass	Total	% Fail
ST0000994	1990	9	23	32	28.13%
	1991		12	12	0.00%
	1992	5	20	25	20.00%
	1993	8	47	55	14.55%
	1994	9	35	44	20.45%
	1995	19	61	80	23.75%
	1996	14	81	95	14.74%
	1997	14	121	135	10.37%
	1998	38	153	191	19.90%
	1999	39	200	239	16.32%
	2000	23	158	181	12.71%
	2001	37	192	229	16.16%
	2002	61	433	494	12.35%
	2003	27	219	246	10.98%
	2004	45	519	564	7.98%
	2005	21	225	246	8.54%
	2006	29	532	561	5.17%
	2007	12	195	207	5.80%
	2008	16	569	585	2.74%
	2009	3	113	116	2.59%
2010	10	476	486	2.06%	
2011	1	40	41	2.44%	
ST0000994 Total		440	4424	4864	9.05%
ST0001010	1990	6	18	24	25.00%
	1991	13	12	25	52.00%
	1992	7	30	37	18.92%
	1993	6	35	41	14.63%
	1994	6	41	47	12.77%
	1995	7	62	69	10.14%
	1996	23	85	108	21.30%
	1997	27	109	136	19.85%
	1998	34	136	170	20.00%
	1999	33	167	200	16.50%
	2000	41	177	218	18.81%
	2001	44	213	257	17.12%
	2002	71	374	445	15.96%
	2003	38	189	227	16.74%
	2004	66	413	479	13.78%
	2005	28	206	234	11.97%
	2006	31	346	377	8.22%
	2007	13	147	160	8.13%
	2008	23	287	310	7.42%
	2009	3	88	91	3.30%
2010	10	221	231	4.33%	
2011	3	19	22	13.64%	
ST0001010 Total		533	3375	3908	13.64%

Table (a) (3 & 4). # of Tests by Station, % Fail by Station

Station ID	Model Year	Fail	Pass	Total	% Fail
ST0001056	1990	4	29	33	12.12%
	1991	5	18	23	21.74%
	1992	5	36	41	12.20%
	1993	5	51	56	8.93%
	1994	6	54	60	10.00%
	1995	13	96	109	11.93%
	1996	21	107	128	16.41%
	1997	20	164	184	10.87%
	1998	29	183	212	13.68%
	1999	30	209	239	12.55%
	2000	34	205	239	14.23%
	2001	45	238	283	15.90%
	2002	66	576	642	10.28%
	2003	28	250	278	10.07%
	2004	63	782	845	7.46%
	2005	32	327	359	8.91%
	2006	38	805	843	4.51%
2007	13	300	313	4.15%	
2008	19	757	776	2.45%	
2009	11	167	178	6.18%	
2010	17	669	686	2.48%	
2011	91	606	697	13.06%	
ST0001056 Total		595	6629	7224	8.24%
ST0001095	1990	11	18	29	37.93%
	1991	5	21	26	19.23%
	1992	9	29	38	23.68%
	1993	15	40	55	27.27%
	1994	12	61	73	16.44%
	1995	12	104	116	10.34%
	1996	26	112	138	18.84%
	1997	42	160	202	20.79%
	1998	51	214	265	19.25%
	1999	59	226	285	20.70%
	2000	57	243	300	19.00%
	2001	74	283	357	20.73%
	2002	89	527	616	14.45%
	2003	62	337	399	15.54%
	2004	64	533	597	10.72%
	2005	35	295	330	10.61%
	2006	44	559	603	7.30%
2007	21	308	329	6.38%	
2008	16	523	539	2.97%	
2009	11	149	160	6.88%	
2010	14	440	454	3.08%	
2011	8	106	114	7.02%	
ST0001095 Total		737	5288	6025	12.23%

Table (a) (3 & 4). # of Tests by Station, % Fail by Station

Station ID	Model Year	Fail	Pass	Total	% Fail
ST0001193	1990	10	39	49	20.41%
	1991	10	48	58	17.24%
	1992	26	60	86	30.23%
	1993	18	87	105	17.14%
	1994	41	144	185	22.16%
	1995	32	195	227	14.10%
	1996	66	192	258	25.58%
	1997	77	282	359	21.45%
	1998	109	390	499	21.84%
	1999	97	378	475	20.42%
	2000	137	445	582	23.54%
	2001	173	487	660	26.21%
	2002	161	821	982	16.40%
	2003	113	491	604	18.71%
	2004	95	778	873	10.88%
	2005	69	440	509	13.56%
	2006	62	810	872	7.11%
	2007	31	363	394	7.87%
	2008	34	662	696	4.89%
2009	7	201	208	3.37%	
2010	15	570	585	2.56%	
2011	7	200	207	3.38%	
ST0001193 Total		1390	8083	9473	14.67%
ST0001216	1990	6	25	31	19.35%
	1991	9	29	38	23.68%
	1992	11	50	61	18.03%
	1993	13	53	66	19.70%
	1994	11	93	104	10.58%
	1995	16	106	122	13.11%
	1996	47	154	201	23.38%
	1997	62	218	280	22.14%
	1998	73	282	355	20.56%
	1999	52	265	317	16.40%
	2000	64	297	361	17.73%
	2001	106	297	403	26.30%
	2002	124	768	892	13.90%
	2003	86	431	517	16.63%
	2004	105	916	1021	10.28%
	2005	57	465	522	10.92%
	2006	70	984	1054	6.64%
	2007	25	471	496	5.04%
	2008	34	990	1024	3.32%
2009	10	285	295	3.39%	
2010	17	856	873	1.95%	
2011	2	161	163	1.23%	
ST0001216 Total		1000	8196	9196	10.87%

Table (a) (3 & 4). # of Tests by Station, % Fail by Station

Station ID	Model Year	Fail	Pass	Total	% Fail
ST0001235	1990	1	14	15	6.67%
	1991	1	14	15	6.67%
	1992	6	26	32	18.75%
	1993	7	25	32	21.88%
	1994	8	37	45	17.78%
	1995	8	59	67	11.94%
	1996	10	64	74	13.51%
	1997	20	119	139	14.39%
	1998	17	153	170	10.00%
	1999	38	192	230	16.52%
	2000	33	190	223	14.80%
	2001	50	241	291	17.18%
	2002	73	587	660	11.06%
	2003	40	331	371	10.78%
	2004	73	921	994	7.34%
	2005	41	447	488	8.40%
	2006	65	1036	1101	5.90%
	2007	19	518	537	3.54%
	2008	30	1217	1247	2.41%
2009	6	301	307	1.95%	
2010	16	1052	1068	1.50%	
2011	4	114	118	3.39%	
ST0001235 Total		566	7658	8224	6.88%
ST0001253	1990	7	23	30	23.33%
	1991	16	22	38	42.11%
	1992	7	33	40	17.50%
	1993	22	47	69	31.88%
	1994	21	64	85	24.71%
	1995	21	113	134	15.67%
	1996	35	136	171	20.47%
	1997	61	190	251	24.30%
	1998	61	231	292	20.89%
	1999	70	285	355	19.72%
	2000	100	280	380	26.32%
	2001	91	299	390	23.33%
	2002	121	551	672	18.01%
	2003	69	340	409	16.87%
	2004	67	614	681	9.84%
	2005	47	345	392	11.99%
	2006	46	609	655	7.02%
	2007	20	287	307	6.51%
	2008	18	590	608	2.96%
2009	8	149	157	5.10%	
2010	7	433	440	1.59%	
2011	1	43	44	2.27%	
ST0001253 Total		916	5684	6600	13.88%

Table (a) (3 & 4). # of Tests by Station, % Fail by Station					
Station ID	Model Year	Fail	Pass	Total	% Fail
ST0001264	1990	12	24	36	33.33%
	1991	6	36	42	14.29%
	1992	10	34	44	22.73%
	1993	12	58	70	17.14%
	1994	15	74	89	16.85%
	1995	19	119	138	13.77%
	1996	24	130	154	15.58%
	1997	27	168	195	13.85%
	1998	50	244	294	17.01%
	1999	45	287	332	13.55%
	2000	47	264	311	15.11%
	2001	70	323	393	17.81%
	2002	99	708	807	12.27%
	2003	53	360	413	12.83%
	2004	83	906	989	8.39%
	2005	40	399	439	9.11%
	2006	61	785	846	7.21%
	2007	26	350	376	6.91%
	2008	22	756	778	2.83%
2009	11	183	194	5.67%	
2010	19	692	711	2.67%	
2011	15	181	196	7.65%	
ST0001264 Total		766	7081	7847	9.76%
ST0001267	1990		18	18	0.00%
	1991	4	16	20	20.00%
	1992	4	26	30	13.33%
	1993	8	25	33	24.24%
	1994	5	37	42	11.90%
	1995	5	57	62	8.06%
	1996	9	62	71	12.68%
	1997	13	105	118	11.02%
	1998	13	112	125	10.40%
	1999	25	125	150	16.67%
	2000	37	129	166	22.29%
	2001	22	168	190	11.58%
	2002	42	298	340	12.35%
	2003	24	175	199	12.06%
	2004	36	390	426	8.45%
	2005	15	157	172	8.72%
	2006	21	407	428	4.91%
	2007	6	155	161	3.73%
	2008	13	430	443	2.93%
2009	8	98	106	7.55%	
2010	11	413	424	2.59%	
2011	2	72	74	2.70%	
ST0001267 Total		323	3475	3798	8.50%

Table (a) (3 & 4). # of Tests by Station, % Fail by Station

Station ID	Model Year	Fail	Pass	Total	% Fail
ST0001270	1990	2	3	5	40.00%
	1991		4	4	0.00%
	1992	8	10	18	44.44%
	1993	3	18	21	14.29%
	1994		16	16	0.00%
	1995	2	28	30	6.67%
	1996	9	30	39	23.08%
	1997	8	49	57	14.04%
	1998	10	62	72	13.89%
	1999	15	86	101	14.85%
	2000	15	58	73	20.55%
	2001	25	81	106	23.58%
	2002	29	122	151	19.21%
	2003	8	68	76	10.53%
	2004	17	147	164	10.37%
	2005	12	74	86	13.95%
	2006	21	134	155	13.55%
2007	5	41	46	10.87%	
2008	6	126	132	4.55%	
2009		29	29	0.00%	
2010		88	88	0.00%	
2011	2	13	15	13.33%	
ST0001270 Total		197	1287	1484	13.27%
ST0001284	1990	2	11	13	15.38%
	1991	2	8	10	20.00%
	1992	2	18	20	10.00%
	1993	2	25	27	7.41%
	1994	5	46	51	9.80%
	1995	2	35	37	5.41%
	1996	8	48	56	14.29%
	1997	7	56	63	11.11%
	1998	15	104	119	12.61%
	1999	21	147	168	12.50%
	2000	18	99	117	15.38%
	2001	32	138	170	18.82%
	2002	42	339	381	11.02%
	2003	18	163	181	9.94%
	2004	49	485	534	9.18%
	2005	20	179	199	10.05%
	2006	26	497	523	4.97%
2007	10	193	203	4.93%	
2008	26	591	617	4.21%	
2009	5	131	136	3.68%	
2010	18	506	524	3.44%	
2011	2	73	75	2.67%	
ST0001284 Total		332	3892	4224	7.86%

Table (a) (3 & 4). # of Tests by Station, % Fail by Station

Station ID	Model Year	Fail	Pass	Total	% Fail
ST0001294	1990	1	5	6	16.67%
	1991	5	5	10	50.00%
	1992		5	5	0.00%
	1993	4	13	17	23.53%
	1994	1	10	11	9.09%
	1995	3	13	16	18.75%
	1996	2	12	14	14.29%
	1997	4	16	20	20.00%
	1998	3	28	31	9.68%
	1999	5	38	43	11.63%
	2000	9	40	49	18.37%
	2001	11	45	56	19.64%
	2002	13	118	131	9.92%
	2003	10	73	83	12.05%
	2004	18	186	204	8.82%
	2005	6	87	93	6.45%
	2006	7	191	198	3.54%
	2007	6	104	110	5.45%
	2008	9	266	275	3.27%
2009	1	82	83	1.20%	
2010	3	282	285	1.05%	
2011	1	43	44	2.27%	
ST0001294 Total		122	1662	1784	6.84%
ST0001297	1990	10	21	31	32.26%
	1991	9	24	33	27.27%
	1992	13	39	52	25.00%
	1993	16	71	87	18.39%
	1994	10	82	92	10.87%
	1995	23	122	145	15.86%
	1996	67	163	230	29.13%
	1997	104	211	315	33.02%
	1998	105	248	353	29.75%
	1999	106	316	422	25.12%
	2000	123	331	454	27.09%
	2001	141	364	505	27.92%
	2002	158	500	658	24.01%
	2003	94	420	514	18.29%
	2004	76	469	545	13.94%
	2005	51	301	352	14.49%
	2006	34	337	371	9.16%
	2007	21	194	215	9.77%
	2008	22	235	257	8.56%
2009	5	79	84	5.95%	
2010	5	189	194	2.58%	
2011	3	41	44	6.82%	
ST0001297 Total		1196	4757	5953	20.09%

Table (a) (3 & 4). # of Tests by Station, % Fail by Station

Station ID	Model Year	Fail	Pass	Total	% Fail
ST0001299	1990	4	16	20	20.00%
	1991	8	29	37	21.62%
	1992	10	23	33	30.30%
	1993	11	36	47	23.40%
	1994	11	71	82	13.41%
	1995	22	81	103	21.36%
	1996	33	101	134	24.63%
	1997	50	131	181	27.62%
	1998	64	172	236	27.12%
	1999	71	214	285	24.91%
	2000	72	253	325	22.15%
	2001	76	239	315	24.13%
	2002	79	345	424	18.63%
	2003	64	267	331	19.34%
	2004	67	358	425	15.76%
	2005	48	259	307	15.64%
	2006	36	322	358	10.06%
	2007	18	196	214	8.41%
	2008	19	251	270	7.04%
2009	4	81	85	4.71%	
2010	2	145	147	1.36%	
2011	4	42	46	8.70%	
ST0001299 Total		773	3632	4405	17.55%
ST0001363	1990	4	9	13	30.77%
	1991	13	17	30	43.33%
	1992	10	22	32	31.25%
	1993	4	33	37	10.81%
	1994	11	49	60	18.33%
	1995	10	57	67	14.93%
	1996	12	44	56	21.43%
	1997	36	51	87	41.38%
	1998	32	81	113	28.32%
	1999	32	100	132	24.24%
	2000	35	99	134	26.12%
	2001	53	99	152	34.87%
	2002	52	139	191	27.23%
	2003	39	92	131	29.77%
	2004	37	183	220	16.82%
	2005	14	112	126	11.11%
	2006	10	120	130	7.69%
	2007	11	92	103	10.68%
	2008	7	113	120	5.83%
2009	5	56	61	8.20%	
2010	1	76	77	1.30%	
2011		16	16	0.00%	
ST0001363 Total		428	1660	2088	20.50%

Table (a) (3 & 4). # of Tests by Station, % Fail by Station

Station ID	Model Year	Fail	Pass	Total	% Fail
ST0001371	1990	4	19	23	17.39%
	1991	2	19	21	9.52%
	1992	4	26	30	13.33%
	1993	5	44	49	10.20%
	1994	8	42	50	16.00%
	1995	13	71	84	15.48%
	1996	13	88	101	12.87%
	1997	29	108	137	21.17%
	1998	23	143	166	13.86%
	1999	31	172	203	15.27%
	2000	27	174	201	13.43%
	2001	48	169	217	22.12%
	2002	61	413	474	12.87%
	2003	38	212	250	15.20%
	2004	46	480	526	8.75%
	2005	24	196	220	10.91%
	2006	33	461	494	6.68%
	2007	8	195	203	3.94%
	2008	16	393	409	3.91%
2009	6	90	96	6.25%	
2010	13	360	373	3.49%	
2011	13	119	132	9.85%	
ST0001371 Total		465	3994	4459	10.43%
ST0001401	1990	9	17	26	34.62%
	1991	13	21	34	38.24%
	1992	12	46	58	20.69%
	1993	24	53	77	31.17%
	1994	15	91	106	14.15%
	1995	25	124	149	16.78%
	1996	30	142	172	17.44%
	1997	69	181	250	27.60%
	1998	77	210	287	26.83%
	1999	81	257	338	23.96%
	2000	113	326	439	25.74%
	2001	125	308	433	28.87%
	2002	118	426	544	21.69%
	2003	93	374	467	19.91%
	2004	84	455	539	15.58%
	2005	49	291	340	14.41%
	2006	41	338	379	10.82%
	2007	22	179	201	10.95%
	2008	17	213	230	7.39%
2009	8	89	97	8.25%	
2010	7	138	145	4.83%	
2011	1	37	38	2.63%	
ST0001401 Total		1033	4316	5349	19.31%

Table (a) (3 & 4). # of Tests by Station, % Fail by Station

Station ID	Model Year	Fail	Pass	Total	% Fail
ST0001423	1990	2	11	13	15.38%
	1991	7	13	20	35.00%
	1992	9	21	30	30.00%
	1993	10	25	35	28.57%
	1994	12	51	63	19.05%
	1995	14	70	84	16.67%
	1996	14	76	90	15.56%
	1997	35	90	125	28.00%
	1998	49	127	176	27.84%
	1999	58	128	186	31.18%
	2000	69	182	251	27.49%
	2001	71	186	257	27.63%
	2002	71	333	404	17.57%
	2003	50	228	278	17.99%
	2004	50	360	410	12.20%
	2005	37	210	247	14.98%
	2006	33	362	395	8.35%
	2007	18	234	252	7.14%
	2008	25	370	395	6.33%
2009	15	172	187	8.02%	
2010	27	395	422	6.40%	
2011	98	706	804	12.19%	
ST0001423 Total		774	4350	5124	15.11%
ST0001511	1990	6	27	33	18.18%
	1991	2	10	12	16.67%
	1992	5	26	31	16.13%
	1993	8	33	41	19.51%
	1994	4	63	67	5.97%
	1995	13	56	69	18.84%
	1996	14	80	94	14.89%
	1997	16	104	120	13.33%
	1998	18	139	157	11.46%
	1999	26	157	183	14.21%
	2000	30	148	178	16.85%
	2001	28	177	205	13.66%
	2002	39	333	372	10.48%
	2003	26	194	220	11.82%
	2004	33	477	510	6.47%
	2005	25	232	257	9.73%
	2006	17	459	476	3.57%
	2007	11	191	202	5.45%
	2008	15	483	498	3.01%
2009	8	151	159	5.03%	
2010	10	436	446	2.24%	
2011	5	104	109	4.59%	
ST0001511 Total		359	4080	4439	8.09%

Table (a) (3 & 4). # of Tests by Station, % Fail by Station

Station ID	Model Year	Fail	Pass	Total	% Fail
ST0001519	1990	4	33	37	10.81%
	1991	10	41	51	19.61%
	1992	13	35	48	27.08%
	1993	6	62	68	8.82%
	1994	8	92	100	8.00%
	1995	17	129	146	11.64%
	1996	21	107	128	16.41%
	1997	20	146	166	12.05%
	1998	33	181	214	15.42%
	1999	28	206	234	11.97%
	2000	35	188	223	15.70%
	2001	41	215	256	16.02%
	2002	56	425	481	11.64%
	2003	27	197	224	12.05%
	2004	47	446	493	9.53%
	2005	17	189	206	8.25%
	2006	22	474	496	4.44%
	2007	8	145	153	5.23%
	2008	21	434	455	4.62%
2009	6	73	79	7.59%	
2010	12	335	347	3.46%	
2011	5	176	181	2.76%	
ST0001519 Total		457	4329	4786	9.55%
ST0001594	1990	6	13	19	31.58%
	1991	6	26	32	18.75%
	1992	4	26	30	13.33%
	1993	11	47	58	18.97%
	1994	14	70	84	16.67%
	1995	13	93	106	12.26%
	1996	22	106	128	17.19%
	1997	39	154	193	20.21%
	1998	48	177	225	21.33%
	1999	53	190	243	21.81%
	2000	54	231	285	18.95%
	2001	73	232	305	23.93%
	2002	80	383	463	17.28%
	2003	43	269	312	13.78%
	2004	72	457	529	13.61%
	2005	35	273	308	11.36%
	2006	33	391	424	7.78%
	2007	28	251	279	10.04%
	2008	23	348	371	6.20%
2009	10	94	104	9.62%	
2010	9	294	303	2.97%	
2011	3	76	79	3.80%	
ST0001594 Total		679	4201	4880	13.91%

Table (a) (3 & 4). # of Tests by Station, % Fail by Station

Station ID	Model Year	Fail	Pass	Total	% Fail
ST0001615	1990		8	8	0.00%
	1991	2	4	6	33.33%
	1992	4	7	11	36.36%
	1993	6	22	28	21.43%
	1994	5	32	37	13.51%
	1995	1	36	37	2.70%
	1996	13	40	53	24.53%
	1997	11	56	67	16.42%
	1998	23	75	98	23.47%
	1999	18	95	113	15.93%
	2000	43	93	136	31.62%
	2001	38	103	141	26.95%
	2002	23	162	185	12.43%
	2003	26	124	150	17.33%
	2004	23	215	238	9.66%
	2005	15	118	133	11.28%
	2006	11	197	208	5.29%
	2007	14	107	121	11.57%
	2008	3	189	192	1.56%
2009	2	44	46	4.35%	
2010	4	167	171	2.34%	
2011		18	18	0.00%	
ST0001615 Total		285	1912	2197	12.97%
ST0001646	1990	3	9	12	25.00%
	1991	3	12	15	20.00%
	1992	6	21	27	22.22%
	1993	7	40	47	14.89%
	1994	6	61	67	8.96%
	1995	15	67	82	18.29%
	1996	13	63	76	17.11%
	1997	17	122	139	12.23%
	1998	28	113	141	19.86%
	1999	27	130	157	17.20%
	2000	26	146	172	15.12%
	2001	33	155	188	17.55%
	2002	43	325	368	11.68%
	2003	28	211	239	11.72%
	2004	52	387	439	11.85%
	2005	28	187	215	13.02%
	2006	21	333	354	5.93%
	2007	10	172	182	5.49%
	2008	11	366	377	2.92%
2009	8	103	111	7.21%	
2010	6	337	343	1.75%	
2011	20	175	195	10.26%	
ST0001646 Total		411	3535	3946	10.42%

Table (a) (3 & 4). # of Tests by Station, % Fail by Station

Station ID	Model Year	Fail	Pass	Total	% Fail
ST0001660	1990	3	9	12	25.00%
	1991	1	13	14	7.14%
	1992	5	13	18	27.78%
	1993	4	22	26	15.38%
	1994	3	29	32	9.38%
	1995	10	49	59	16.95%
	1996	16	48	64	25.00%
	1997	21	71	92	22.83%
	1998	27	101	128	21.09%
	1999	24	115	139	17.27%
	2000	29	137	166	17.47%
	2001	40	156	196	20.41%
	2002	57	304	361	15.79%
	2003	41	188	229	17.90%
	2004	40	367	407	9.83%
	2005	22	196	218	10.09%
	2006	39	410	449	8.69%
	2007	17	225	242	7.02%
2008	22	410	432	5.09%	
2009	6	141	147	4.08%	
2010	11	367	378	2.91%	
2011	7	102	109	6.42%	
ST0001660 Total		445	3473	3918	11.36%
ST0001662	1990	5	11	16	31.25%
	1991	4	17	21	19.05%
	1992	4	22	26	15.38%
	1993	7	26	33	21.21%
	1994	4	46	50	8.00%
	1995	9	45	54	16.67%
	1996	23	68	91	25.27%
	1997	14	91	105	13.33%
	1998	27	134	161	16.77%
	1999	14	144	158	8.86%
	2000	27	149	176	15.34%
	2001	37	144	181	20.44%
	2002	50	327	377	13.26%
	2003	24	203	227	10.57%
	2004	35	399	434	8.06%
	2005	22	232	254	8.66%
	2006	32	441	473	6.77%
	2007	19	214	233	8.15%
2008	13	465	478	2.72%	
2009	6	143	149	4.03%	
2010	8	407	415	1.93%	
2011	3	77	80	3.75%	
ST0001662 Total		387	3805	4192	9.23%

Table (a) (3 & 4). # of Tests by Station, % Fail by Station

Station ID	Model Year	Fail	Pass	Total	% Fail
ST0001692	1990	2	7	9	22.22%
	1991	1	10	11	9.09%
	1992		11	11	0.00%
	1993	2	7	9	22.22%
	1994	4	17	21	19.05%
	1995	2	24	26	7.69%
	1996	5	24	29	17.24%
	1997	8	36	44	18.18%
	1998	5	49	54	9.26%
	1999	7	40	47	14.89%
	2000	5	45	50	10.00%
	2001	18	50	68	26.47%
	2002	14	118	132	10.61%
	2003	15	45	60	25.00%
	2004	11	117	128	8.59%
	2005	11	71	82	13.41%
	2006	14	137	151	9.27%
	2007	4	59	63	6.35%
	2008	4	150	154	2.60%
2009	4	40	44	9.09%	
2010	3	128	131	2.29%	
2011	4	67	71	5.63%	
ST0001692 Total		143	1252	1395	10.25%
ST0001704	1990	3	23	26	11.54%
	1991	2	19	21	9.52%
	1992	6	30	36	16.67%
	1993	6	45	51	11.76%
	1994	10	54	64	15.63%
	1995	10	84	94	10.64%
	1996	16	80	96	16.67%
	1997	15	113	128	11.72%
	1998	21	132	153	13.73%
	1999	29	166	195	14.87%
	2000	22	150	172	12.79%
	2001	43	136	179	24.02%
	2002	50	333	383	13.05%
	2003	25	191	216	11.57%
	2004	36	403	439	8.20%
	2005	14	167	181	7.73%
	2006	25	418	443	5.64%
	2007	6	147	153	3.92%
	2008	13	388	401	3.24%
2009	4	100	104	3.85%	
2010	8	404	412	1.94%	
2011	1	36	37	2.70%	
ST0001704 Total		365	3619	3984	9.16%

Table (a) (3 & 4). # of Tests by Station, % Fail by Station

Station ID	Model Year	Fail	Pass	Total	% Fail
ST0001725	1990		8	8	0.00%
	1991	2	9	11	18.18%
	1992	1	7	8	12.50%
	1993	2	11	13	15.38%
	1994	1	23	24	4.17%
	1995	2	25	27	7.41%
	1996	8	60	68	11.76%
	1997	16	92	108	14.81%
	1998	11	108	119	9.24%
	1999	21	138	159	13.21%
	2000	25	117	142	17.61%
	2001	24	136	160	15.00%
	2002	46	365	411	11.19%
	2003	31	152	183	16.94%
	2004	37	398	435	8.51%
	2005	22	182	204	10.78%
	2006	31	372	403	7.69%
	2007	9	136	145	6.21%
2008	8	407	415	1.93%	
2009	2	75	77	2.60%	
2010	6	312	318	1.89%	
2011		20	20	0.00%	
ST0001725 Total		305	3153	3458	8.82%
ST0001730	1990		5	5	0.00%
	1991		4	4	0.00%
	1992		10	10	0.00%
	1993		7	7	0.00%
	1994	2	8	10	20.00%
	1995	1	18	19	5.26%
	1996	4	17	21	19.05%
	1997	6	23	29	20.69%
	1998	7	33	40	17.50%
	1999	9	44	53	16.98%
	2000	12	33	45	26.67%
	2001	11	43	54	20.37%
	2002	18	88	106	16.98%
	2003	10	48	58	17.24%
	2004	13	115	128	10.16%
	2005	3	48	51	5.88%
	2006	12	131	143	8.39%
	2007	2	50	52	3.85%
2008	4	113	117	3.42%	
2009	1	33	34	2.94%	
2010	1	96	97	1.03%	
2011		5	5	0.00%	
ST0001730 Total		116	972	1088	10.66%

Table (a) (3 & 4). # of Tests by Station, % Fail by Station

Station ID	Model Year	Fail	Pass	Total	% Fail
ST0001767	1990	3	16	19	15.79%
	1991	10	19	29	34.48%
	1992	6	24	30	20.00%
	1993	9	36	45	20.00%
	1994	11	67	78	14.10%
	1995	24	95	119	20.17%
	1996	26	115	141	18.44%
	1997	33	165	198	16.67%
	1998	46	239	285	16.14%
	1999	70	260	330	21.21%
	2000	72	297	369	19.51%
	2001	82	279	361	22.71%
	2002	88	533	621	14.17%
	2003	75	389	464	16.16%
	2004	70	690	760	9.21%
	2005	34	362	396	8.59%
	2006	59	675	734	8.04%
	2007	24	321	345	6.96%
2008	35	668	703	4.98%	
2009	5	175	180	2.78%	
2010	14	630	644	2.17%	
2011	2	92	94	2.13%	
ST0001767 Total		798	6147	6945	11.49%
ST0001790	1990		1	1	0.00%
	1991	1	4	5	20.00%
	1992		12	12	0.00%
	1993	3	6	9	33.33%
	1994	3	18	21	14.29%
	1995	1	26	27	3.70%
	1996	14	37	51	27.45%
	1997	16	78	94	17.02%
	1998	12	88	100	12.00%
	1999	21	107	128	16.41%
	2000	26	115	141	18.44%
	2001	29	141	170	17.06%
	2002	38	252	290	13.10%
	2003	17	146	163	10.43%
	2004	29	361	390	7.44%
	2005	25	186	211	11.85%
	2006	22	356	378	5.82%
	2007	6	182	188	3.19%
2008	11	358	369	2.98%	
2009	3	89	92	3.26%	
2010	7	345	352	1.99%	
2011	1	35	36	2.78%	
ST0001790 Total		285	2943	3228	8.83%

Table (a) (3 & 4). # of Tests by Station, % Fail by Station

Station ID	Model Year	Fail	Pass	Total	% Fail
ST0001799	1990	1	18	19	5.26%
	1991	9	25	34	26.47%
	1992	10	25	35	28.57%
	1993	6	40	46	13.04%
	1994	18	57	75	24.00%
	1995	16	93	109	14.68%
	1996	13	78	91	14.29%
	1997	16	122	138	11.59%
	1998	25	171	196	12.76%
	1999	19	165	184	10.33%
	2000	28	202	230	12.17%
	2001	34	189	223	15.25%
	2002	78	473	551	14.16%
	2003	25	228	253	9.88%
	2004	46	566	612	7.52%
	2005	17	234	251	6.77%
	2006	30	602	632	4.75%
2007	12	220	232	5.17%	
2008	17	576	593	2.87%	
2009	4	112	116	3.45%	
2010	12	519	531	2.26%	
2011	3	73	76	3.95%	
ST0001799 Total		439	4788	5227	8.40%
ST0001805	1990	4	36	40	10.00%
	1991	12	42	54	22.22%
	1992	14	44	58	24.14%
	1993	21	73	94	22.34%
	1994	26	98	124	20.97%
	1995	30	135	165	18.18%
	1996	36	156	192	18.75%
	1997	57	227	284	20.07%
	1998	81	311	392	20.66%
	1999	61	308	369	16.53%
	2000	86	357	443	19.41%
	2001	93	360	453	20.53%
	2002	110	643	753	14.61%
	2003	56	426	482	11.62%
	2004	77	784	861	8.94%
	2005	40	358	398	10.05%
	2006	56	706	762	7.35%
2007	15	269	284	5.28%	
2008	35	677	712	4.92%	
2009	6	152	158	3.80%	
2010	16	558	574	2.79%	
2011		72	72	0.00%	
ST0001805 Total		932	6792	7724	12.07%

Table (a) (3 & 4). # of Tests by Station, % Fail by Station

Station ID	Model Year	Fail	Pass	Total	% Fail
ST0001825	1990	3	21	24	12.50%
	1991	4	26	30	13.33%
	1992	12	41	53	22.64%
	1993	13	55	68	19.12%
	1994	18	73	91	19.78%
	1995	14	120	134	10.45%
	1996	19	124	143	13.29%
	1997	30	158	188	15.96%
	1998	56	212	268	20.90%
	1999	46	210	256	17.97%
	2000	47	231	278	16.91%
	2001	54	206	260	20.77%
	2002	62	525	587	10.56%
	2003	41	265	306	13.40%
	2004	55	653	708	7.77%
	2005	36	248	284	12.68%
	2006	43	619	662	6.50%
	2007	19	270	289	6.57%
	2008	19	598	617	3.08%
2009	4	117	121	3.31%	
2010	10	513	523	1.91%	
2011	2	68	70	2.86%	
ST0001825 Total		607	5353	5960	10.18%
ST0001845	1990		1	1	0.00%
	1991		6	6	0.00%
	1992	2	5	7	28.57%
	1993	2	10	12	16.67%
	1994	2	15	17	11.76%
	1995	3	18	21	14.29%
	1996	2	25	27	7.41%
	1997	12	29	41	29.27%
	1998	7	31	38	18.42%
	1999	9	29	38	23.68%
	2000	10	43	53	18.87%
	2001	13	44	57	22.81%
	2002	16	106	122	13.11%
	2003	15	84	99	15.15%
	2004	12	156	168	7.14%
	2005	14	83	97	14.43%
	2006	19	164	183	10.38%
	2007	8	95	103	7.77%
	2008	3	181	184	1.63%
2009	5	51	56	8.93%	
2010	6	168	174	3.45%	
2011	6	74	80	7.50%	
ST0001845 Total		166	1418	1584	10.48%

Table (a) (3 & 4). # of Tests by Station, % Fail by Station

Station ID	Model Year	Fail	Pass	Total	% Fail
ST0001876	1990	5	29	34	14.71%
	1991	7	37	44	15.91%
	1992	12	52	64	18.75%
	1993	8	86	94	8.51%
	1994	16	125	141	11.35%
	1995	14	158	172	8.14%
	1996	45	177	222	20.27%
	1997	47	268	315	14.92%
	1998	75	347	422	17.77%
	1999	92	414	506	18.18%
	2000	70	342	412	16.99%
	2001	104	415	519	20.04%
	2002	141	908	1049	13.44%
	2003	93	467	560	16.61%
	2004	107	1014	1121	9.55%
	2005	55	437	492	11.18%
	2006	68	899	967	7.03%
	2007	24	341	365	6.58%
2008	32	888	920	3.48%	
2009	10	204	214	4.67%	
2010	12	769	781	1.54%	
2011	3	58	61	4.92%	
ST0001876 Total		1040	8435	9475	10.98%
ST0001889	1990	7	19	26	26.92%
	1991	6	26	32	18.75%
	1992	4	27	31	12.90%
	1993	9	32	41	21.95%
	1994	8	57	65	12.31%
	1995	5	89	94	5.32%
	1996	18	89	107	16.82%
	1997	25	130	155	16.13%
	1998	24	166	190	12.63%
	1999	27	203	230	11.74%
	2000	34	218	252	13.49%
	2001	50	232	282	17.73%
	2002	43	477	520	8.27%
	2003	38	460	498	7.63%
	2004	68	923	991	6.86%
	2005	52	735	787	6.61%
	2006	60	1191	1251	4.80%
	2007	27	1026	1053	2.56%
2008	21	1270	1291	1.63%	
2009	15	602	617	2.43%	
2010	11	852	863	1.27%	
2011	7	538	545	1.28%	
ST0001889 Total		559	9362	9921	5.63%

Table (a) (3 & 4). # of Tests by Station, % Fail by Station					
Station ID	Model Year	Fail	Pass	Total	% Fail
ST0001896	1990	1	9	10	10.00%
	1991	2	13	15	13.33%
	1992	2	14	16	12.50%
	1993	3	30	33	9.09%
	1994	4	34	38	10.53%
	1995	11	55	66	16.67%
	1996	7	50	57	12.28%
	1997	9	73	82	10.98%
	1998	16	122	138	11.59%
	1999	19	123	142	13.38%
	2000	21	138	159	13.21%
	2001	30	170	200	15.00%
	2002	37	333	370	10.00%
	2003	21	220	241	8.71%
	2004	40	467	507	7.89%
	2005	22	223	245	8.98%
	2006	28	409	437	6.41%
	2007	11	197	208	5.29%
	2008	19	367	386	4.92%
2009	5	92	97	5.15%	
2010	11	359	370	2.97%	
2011	20	140	160	12.50%	
ST0001896 Total		339	3638	3977	8.52%
ST0001944	1990	11	33	44	25.00%
	1991	4	25	29	13.79%
	1992	7	47	54	12.96%
	1993	7	54	61	11.48%
	1994	8	73	81	9.88%
	1995	11	117	128	8.59%
	1996	23	105	128	17.97%
	1997	26	159	185	14.05%
	1998	35	206	241	14.52%
	1999	38	231	269	14.13%
	2000	44	190	234	18.80%
	2001	61	280	341	17.89%
	2002	91	597	688	13.23%
	2003	40	339	379	10.55%
	2004	60	774	834	7.19%
	2005	24	353	377	6.37%
	2006	55	860	915	6.01%
	2007	17	338	355	4.79%
	2008	38	843	881	4.31%
2009	16	205	221	7.24%	
2010	20	762	782	2.56%	
2011	13	162	175	7.43%	
ST0001944 Total		649	6753	7402	8.77%

Table (a) (3 & 4). # of Tests by Station, % Fail by Station

Station ID	Model Year	Fail	Pass	Total	% Fail
ST0001970	1990	2	14	16	12.50%
	1991	2	15	17	11.76%
	1992	4	25	29	13.79%
	1993	1	21	22	4.55%
	1994	7	35	42	16.67%
	1995	10	57	67	14.93%
	1996	7	52	59	11.86%
	1997	9	61	70	12.86%
	1998	18	91	109	16.51%
	1999	21	141	162	12.96%
	2000	23	104	127	18.11%
	2001	23	137	160	14.38%
	2002	33	405	438	7.53%
	2003	21	173	194	10.82%
	2004	33	547	580	5.69%
	2005	22	211	233	9.44%
	2006	24	527	551	4.36%
2007	10	226	236	4.24%	
2008	25	637	662	3.78%	
2009	4	161	165	2.42%	
2010	11	616	627	1.75%	
2011	1	75	76	1.32%	
ST0001970 Total		311	4331	4642	6.70%
ST0002018	1990	3	7	10	30.00%
	1991		11	11	0.00%
	1992	1	7	8	12.50%
	1993	4	15	19	21.05%
	1994	4	21	25	16.00%
	1995	5	38	43	11.63%
	1996	4	37	41	9.76%
	1997	10	65	75	13.33%
	1998	7	79	86	8.14%
	1999	22	112	134	16.42%
	2000	11	69	80	13.75%
	2001	13	90	103	12.62%
	2002	17	231	248	6.85%
	2003	11	92	103	10.68%
	2004	13	230	243	5.35%
	2005	13	100	113	11.50%
	2006	8	236	244	3.28%
2007	1	90	91	1.10%	
2008	10	241	251	3.98%	
2009	2	59	61	3.28%	
2010	1	187	188	0.53%	
2011	1	22	23	4.35%	
ST0002018 Total		161	2039	2200	7.32%

Table (a) (3 & 4). # of Tests by Station, % Fail by Station

Station ID	Model Year	Fail	Pass	Total	% Fail
ST0002020	1990	2	3	5	40.00%
	1991	1	5	6	16.67%
	1992	2	6	8	25.00%
	1993		9	9	0.00%
	1994		11	11	0.00%
	1995	4	21	25	16.00%
	1996	1	25	26	3.85%
	1997	5	38	43	11.63%
	1998	6	45	51	11.76%
	1999	9	62	71	12.68%
	2000	4	52	56	7.14%
	2001	22	77	99	22.22%
	2002	24	192	216	11.11%
	2003	11	99	110	10.00%
	2004	15	282	297	5.05%
	2005	6	105	111	5.41%
	2006	14	307	321	4.36%
2007	5	149	154	3.25%	
2008	9	352	361	2.49%	
2009	6	73	79	7.59%	
2010	9	332	341	2.64%	
2011	2	51	53	3.77%	
ST0002020 Total		157	2296	2453	6.40%
ST0002026	1990	1	10	11	9.09%
	1991	1	5	6	16.67%
	1992	2	17	19	10.53%
	1993	3	19	22	13.64%
	1994	4	32	36	11.11%
	1995	4	37	41	9.76%
	1996	8	50	58	13.79%
	1997	8	67	75	10.67%
	1998	21	89	110	19.09%
	1999	15	80	95	15.79%
	2000	21	96	117	17.95%
	2001	26	104	130	20.00%
	2002	25	213	238	10.50%
	2003	19	121	140	13.57%
	2004	19	280	299	6.35%
	2005	13	126	139	9.35%
	2006	13	267	280	4.64%
2007	9	122	131	6.87%	
2008	14	263	277	5.05%	
2009	4	69	73	5.48%	
2010	4	263	267	1.50%	
2011	4	46	50	8.00%	
ST0002026 Total		238	2376	2614	9.10%

Table (a) (3 & 4). # of Tests by Station, % Fail by Station

Station ID	Model Year	Fail	Pass	Total	% Fail
ST0002060	1990	5	10	15	33.33%
	1991	3	16	19	15.79%
	1992	2	12	14	14.29%
	1993	3	23	26	11.54%
	1994	9	40	49	18.37%
	1995	1	43	44	2.27%
	1996	14	75	89	15.73%
	1997	13	96	109	11.93%
	1998	29	138	167	17.37%
	1999	20	141	161	12.42%
	2000	30	133	163	18.40%
	2001	32	148	180	17.78%
	2002	47	387	434	10.83%
	2003	25	197	222	11.26%
	2004	41	453	494	8.30%
	2005	24	192	216	11.11%
	2006	37	462	499	7.41%
	2007	19	196	215	8.84%
	2008	26	478	504	5.16%
2009	10	119	129	7.75%	
2010	13	430	443	2.93%	
2011	3	114	117	2.56%	
ST0002060 Total		406	3903	4309	9.42%
ST0002070	1990	3	4	7	42.86%
	1991		7	7	0.00%
	1992	1	6	7	14.29%
	1993	4	13	17	23.53%
	1994	5	17	22	22.73%
	1995		24	24	0.00%
	1996		21	21	0.00%
	1997	6	22	28	21.43%
	1998	12	76	88	13.64%
	1999	17	55	72	23.61%
	2000	13	62	75	17.33%
	2001	19	84	103	18.45%
	2002	32	147	179	17.88%
	2003	13	106	119	10.92%
	2004	22	214	236	9.32%
	2005	9	105	114	7.89%
	2006	14	263	277	5.05%
	2007	6	128	134	4.48%
	2008	12	300	312	3.85%
2009	9	89	98	9.18%	
2010	5	265	270	1.85%	
2011	1	19	20	5.00%	
ST0002070 Total		203	2027	2230	9.10%

Table (a) (3 & 4). # of Tests by Station, % Fail by Station

Station ID	Model Year	Fail	Pass	Total	% Fail
ST0002120	1990	6	16	22	27.27%
	1991	9	20	29	31.03%
	1992	2	16	18	11.11%
	1993	5	24	29	17.24%
	1994	8	27	35	22.86%
	1995	6	46	52	11.54%
	1996	15	54	69	21.74%
	1997	8	74	82	9.76%
	1998	12	88	100	12.00%
	1999	14	113	127	11.02%
	2000	13	116	129	10.08%
	2001	21	114	135	15.56%
	2002	27	279	306	8.82%
	2003	22	151	173	12.72%
	2004	32	386	418	7.66%
	2005	20	177	197	10.15%
	2006	22	415	437	5.03%
	2007	10	172	182	5.49%
2008	14	519	533	2.63%	
2009	4	127	131	3.05%	
2010	11	427	438	2.51%	
2011	11	103	114	9.65%	
ST0002120 Total		292	3464	3756	7.77%
ST0002133	1990	2	17	19	10.53%
	1991	9	23	32	28.13%
	1992	8	15	23	34.78%
	1993	11	25	36	30.56%
	1994	5	29	34	14.71%
	1995	17	57	74	22.97%
	1996	9	69	78	11.54%
	1997	24	92	116	20.69%
	1998	33	107	140	23.57%
	1999	45	166	211	21.33%
	2000	36	132	168	21.43%
	2001	52	179	231	22.51%
	2002	73	365	438	16.67%
	2003	33	211	244	13.52%
	2004	50	518	568	8.80%
	2005	20	241	261	7.66%
	2006	51	542	593	8.60%
	2007	22	227	249	8.84%
2008	28	576	604	4.64%	
2009	9	163	172	5.23%	
2010	30	514	544	5.51%	
2011	13	197	210	6.19%	
ST0002133 Total		580	4465	5045	11.50%

Table (a) (3 & 4). # of Tests by Station, % Fail by Station

Station ID	Model Year	Fail	Pass	Total	% Fail
ST0002141	1990	1	9	10	10.00%
	1991	3	16	19	15.79%
	1992	3	12	15	20.00%
	1993	1	17	18	5.56%
	1994	6	22	28	21.43%
	1995	7	47	54	12.96%
	1996	8	47	55	14.55%
	1997	11	55	66	16.67%
	1998	8	106	114	7.02%
	1999	19	97	116	16.38%
	2000	17	98	115	14.78%
	2001	32	123	155	20.65%
	2002	42	276	318	13.21%
	2003	18	175	193	9.33%
	2004	34	398	432	7.87%
	2005	17	159	176	9.66%
	2006	25	401	426	5.87%
	2007	7	187	194	3.61%
	2008	17	482	499	3.41%
2009	6	98	104	5.77%	
2010	7	435	442	1.58%	
2011	1	30	31	3.23%	
ST0002141 Total		290	3290	3580	8.10%
ST0002149	1990	2	8	10	20.00%
	1991		17	17	0.00%
	1992	5	21	26	19.23%
	1993	5	20	25	20.00%
	1994	4	26	30	13.33%
	1995	4	43	47	8.51%
	1996	13	40	53	24.53%
	1997	20	69	89	22.47%
	1998	22	100	122	18.03%
	1999	21	91	112	18.75%
	2000	24	100	124	19.35%
	2001	33	119	152	21.71%
	2002	36	218	254	14.17%
	2003	36	115	151	23.84%
	2004	38	268	306	12.42%
	2005	27	131	158	17.09%
	2006	15	263	278	5.40%
	2007	15	156	171	8.77%
	2008	13	277	290	4.48%
2009	8	105	113	7.08%	
2010	7	286	293	2.39%	
2011	3	59	62	4.84%	
ST0002149 Total		351	2532	2883	12.17%

Table (a) (3 & 4). # of Tests by Station, % Fail by Station

Station ID	Model Year	Fail	Pass	Total	% Fail
ST0002153	1990	2	11	13	15.38%
	1991	5	19	24	20.83%
	1992	1	23	24	4.17%
	1993	6	45	51	11.76%
	1994	4	50	54	7.41%
	1995	4	60	64	6.25%
	1996	12	85	97	12.37%
	1997	8	107	115	6.96%
	1998	24	157	181	13.26%
	1999	23	183	206	11.17%
	2000	21	142	163	12.88%
	2001	37	148	185	20.00%
	2002	53	474	527	10.06%
	2003	14	179	193	7.25%
	2004	36	509	545	6.61%
	2005	13	180	193	6.74%
	2006	31	522	553	5.61%
	2007	8	206	214	3.74%
	2008	12	611	623	1.93%
2009	2	112	114	1.75%	
2010	9	540	549	1.64%	
2011		53	53	0.00%	
ST0002153 Total		325	4416	4741	6.86%
ST0002181	1990	8	29	37	21.62%
	1991	4	28	32	12.50%
	1992	3	25	28	10.71%
	1993	10	66	76	13.16%
	1994	7	60	67	10.45%
	1995	20	104	124	16.13%
	1996	16	99	115	13.91%
	1997	24	178	202	11.88%
	1998	28	204	232	12.07%
	1999	55	260	315	17.46%
	2000	36	212	248	14.52%
	2001	51	279	330	15.45%
	2002	83	637	720	11.53%
	2003	41	338	379	10.82%
	2004	83	816	899	9.23%
	2005	34	345	379	8.97%
	2006	41	888	929	4.41%
	2007	15	356	371	4.04%
	2008	22	894	916	2.40%
2009	8	200	208	3.85%	
2010	14	811	825	1.70%	
2011	1	78	79	1.27%	
ST0002181 Total		604	6907	7511	8.04%

Table (a) (3 & 4). # of Tests by Station, % Fail by Station

Station ID	Model Year	Fail	Pass	Total	% Fail
ST0002233	1990	4	23	27	14.81%
	1991	13	35	48	27.08%
	1992	8	32	40	20.00%
	1993	18	57	75	24.00%
	1994	14	76	90	15.56%
	1995	20	99	119	16.81%
	1996	30	120	150	20.00%
	1997	46	196	242	19.01%
	1998	53	228	281	18.86%
	1999	61	280	341	17.89%
	2000	98	278	376	26.06%
	2001	89	294	383	23.24%
	2002	92	565	657	14.00%
	2003	71	386	457	15.54%
	2004	75	641	716	10.47%
	2005	57	450	507	11.24%
	2006	42	598	640	6.56%
	2007	26	367	393	6.62%
2008	38	548	586	6.48%	
2009	7	187	194	3.61%	
2010	11	397	408	2.70%	
2011	5	134	139	3.60%	
ST0002233 Total		878	5991	6869	12.78%
ST0002267	1990		6	6	0.00%
	1991	1	9	10	10.00%
	1992	3	11	14	21.43%
	1993	1	11	12	8.33%
	1994	5	29	34	14.71%
	1995		26	26	0.00%
	1996	8	23	31	25.81%
	1997	10	46	56	17.86%
	1998	13	63	76	17.11%
	1999	17	69	86	19.77%
	2000	16	69	85	18.82%
	2001	20	66	86	23.26%
	2002	36	162	198	18.18%
	2003	16	89	105	15.24%
	2004	25	261	286	8.74%
	2005	14	91	105	13.33%
	2006	18	239	257	7.00%
	2007	7	96	103	6.80%
2008	17	295	312	5.45%	
2009	3	64	67	4.48%	
2010	7	288	295	2.37%	
2011	15	204	219	6.85%	
ST0002267 Total		252	2217	2469	10.21%

Table (a) (3 & 4). # of Tests by Station, % Fail by Station

Station ID	Model Year	Fail	Pass	Total	% Fail
ST0002330	1990	3	10	13	23.08%
	1991	3	11	14	21.43%
	1992	2	11	13	15.38%
	1993	3	32	35	8.57%
	1994	6	37	43	13.95%
	1995	8	61	69	11.59%
	1996	18	72	90	20.00%
	1997	22	98	120	18.33%
	1998	14	132	146	9.59%
	1999	20	140	160	12.50%
	2000	30	138	168	17.86%
	2001	41	158	199	20.60%
	2002	51	353	404	12.62%
	2003	30	197	227	13.22%
	2004	47	480	527	8.92%
	2005	16	204	220	7.27%
	2006	25	473	498	5.02%
	2007	10	187	197	5.08%
	2008	19	491	510	3.73%
2009	4	101	105	3.81%	
2010	5	374	379	1.32%	
2011	1	24	25	4.00%	
ST0002330 Total		378	3784	4162	9.08%
ST0002358	1990	2	8	10	20.00%
	1991	1	7	8	12.50%
	1992	1	7	8	12.50%
	1993	2	5	7	28.57%
	1994	3	21	24	12.50%
	1995	4	27	31	12.90%
	1996	6	26	32	18.75%
	1997	7	29	36	19.44%
	1998	12	45	57	21.05%
	1999	13	39	52	25.00%
	2000	15	59	74	20.27%
	2001	21	68	89	23.60%
	2002	17	116	133	12.78%
	2003	11	70	81	13.58%
	2004	13	160	173	7.51%
	2005	9	81	90	10.00%
	2006	12	161	173	6.94%
	2007	8	90	98	8.16%
	2008	14	171	185	7.57%
2009	1	53	54	1.85%	
2010	4	181	185	2.16%	
2011		15	15	0.00%	
ST0002358 Total		176	1439	1615	10.90%

Table (a) (3 & 4). # of Tests by Station, % Fail by Station

Station ID	Model Year	Fail	Pass	Total	% Fail
ST0002365	1990	4	13	17	23.53%
	1991	5	18	23	21.74%
	1992	5	16	21	23.81%
	1993	3	22	25	12.00%
	1994	6	37	43	13.95%
	1995	8	50	58	13.79%
	1996	12	56	68	17.65%
	1997	20	90	110	18.18%
	1998	17	100	117	14.53%
	1999	23	99	122	18.85%
	2000	24	112	136	17.65%
	2001	32	120	152	21.05%
	2002	37	281	318	11.64%
	2003	25	161	186	13.44%
	2004	25	386	411	6.08%
	2005	21	185	206	10.19%
	2006	26	351	377	6.90%
	2007	7	161	168	4.17%
2008	20	351	371	5.39%	
2009	1	105	106	0.94%	
2010	2	309	311	0.64%	
2011	1	26	27	3.70%	
ST0002365 Total		324	3049	3373	9.61%
ST0002373	1990	5	24	29	17.24%
	1991	6	28	34	17.65%
	1992	10	45	55	18.18%
	1993	8	46	54	14.81%
	1994	12	89	101	11.88%
	1995	20	116	136	14.71%
	1996	20	112	132	15.15%
	1997	18	172	190	9.47%
	1998	29	176	205	14.15%
	1999	39	217	256	15.23%
	2000	46	196	242	19.01%
	2001	40	213	253	15.81%
	2002	69	569	638	10.82%
	2003	53	269	322	16.46%
	2004	61	684	745	8.19%
	2005	22	260	282	7.80%
	2006	44	670	714	6.16%
	2007	15	266	281	5.34%
2008	11	688	699	1.57%	
2009	7	151	158	4.43%	
2010	14	600	614	2.28%	
2011	5	81	86	5.81%	
ST0002373 Total		554	5672	6226	8.90%

Table (a) (3 & 4). # of Tests by Station, % Fail by Station

Station ID	Model Year	Fail	Pass	Total	% Fail
ST0002380	1990	1	13	14	7.14%
	1991	5	10	15	33.33%
	1992	3	22	25	12.00%
	1993	3	28	31	9.68%
	1994	7	40	47	14.89%
	1995	3	36	39	7.69%
	1996	9	51	60	15.00%
	1997	19	71	90	21.11%
	1998	16	92	108	14.81%
	1999	11	89	100	11.00%
	2000	14	89	103	13.59%
	2001	14	97	111	12.61%
	2002	28	248	276	10.14%
	2003	16	110	126	12.70%
	2004	16	327	343	4.66%
	2005	12	132	144	8.33%
	2006	16	299	315	5.08%
	2007	4	104	108	3.70%
	2008	8	300	308	2.60%
2009	1	60	61	1.64%	
2010	1	270	271	0.37%	
2011		21	21	0.00%	
ST0002380 Total		207	2509	2716	7.62%
ST0002419	1990	3	12	15	20.00%
	1991	5	22	27	18.52%
	1992	8	23	31	25.81%
	1993	2	33	35	5.71%
	1994	7	58	65	10.77%
	1995	9	64	73	12.33%
	1996	16	87	103	15.53%
	1997	24	98	122	19.67%
	1998	29	159	188	15.43%
	1999	30	185	215	13.95%
	2000	30	147	177	16.95%
	2001	33	190	223	14.80%
	2002	41	435	476	8.61%
	2003	25	205	230	10.87%
	2004	47	544	591	7.95%
	2005	32	250	282	11.35%
	2006	57	590	647	8.81%
	2007	28	315	343	8.16%
	2008	54	701	755	7.15%
2009	24	243	267	8.99%	
2010	70	680	750	9.33%	
2011	91	626	717	12.69%	
ST0002419 Total		665	5667	6332	10.50%

Table (a) (3 & 4). # of Tests by Station, % Fail by Station

Station ID	Model Year	Fail	Pass	Total	% Fail
ST0002467	1990	2	9	11	18.18%
	1991	2	5	7	28.57%
	1992	2	10	12	16.67%
	1993	3	19	22	13.64%
	1994	3	12	15	20.00%
	1995	2	37	39	5.13%
	1996	8	49	57	14.04%
	1997	26	84	110	23.64%
	1998	10	81	91	10.99%
	1999	13	98	111	11.71%
	2000	21	89	110	19.09%
	2001	37	119	156	23.72%
	2002	31	258	289	10.73%
	2003	14	122	136	10.29%
	2004	26	295	321	8.10%
	2005	17	130	147	11.56%
	2006	21	301	322	6.52%
	2007	7	121	128	5.47%
2008	10	281	291	3.44%	
2009	7	108	115	6.09%	
2010	2	332	334	0.60%	
2011	7	78	85	8.24%	
ST0002467 Total		271	2638	2909	9.32%
ST0002493	1990		22	22	0.00%
	1991	5	28	33	15.15%
	1992	12	31	43	27.91%
	1993	6	39	45	13.33%
	1994	17	66	83	20.48%
	1995	8	89	97	8.25%
	1996	11	109	120	9.17%
	1997	20	149	169	11.83%
	1998	34	196	230	14.78%
	1999	30	256	286	10.49%
	2000	28	194	222	12.61%
	2001	47	234	281	16.73%
	2002	68	625	693	9.81%
	2003	36	321	357	10.08%
	2004	48	817	865	5.55%
	2005	30	356	386	7.77%
	2006	35	899	934	3.75%
	2007	18	330	348	5.17%
2008	31	990	1021	3.04%	
2009	6	193	199	3.02%	
2010	6	766	772	0.78%	
2011		88	88	0.00%	
ST0002493 Total		496	6798	7294	6.80%

Table (a) (3 & 4). # of Tests by Station, % Fail by Station					
Station ID	Model Year	Fail	Pass	Total	% Fail
ST0002540	1990	4	17	21	19.05%
	1991	1	12	13	7.69%
	1992	4	17	21	19.05%
	1993	4	32	36	11.11%
	1994	4	32	36	11.11%
	1995	6	51	57	10.53%
	1996	10	52	62	16.13%
	1997	8	72	80	10.00%
	1998	31	93	124	25.00%
	1999	17	95	112	15.18%
	2000	12	91	103	11.65%
	2001	26	110	136	19.12%
	2002	29	299	328	8.84%
	2003	15	134	149	10.07%
	2004	27	331	358	7.54%
	2005	24	184	208	11.54%
	2006	26	419	445	5.84%
	2007	11	169	180	6.11%
	2008	14	460	474	2.95%
2009	4	90	94	4.26%	
2010	8	347	355	2.25%	
2011	4	73	77	5.19%	
ST0002540 Total		289	3180	3469	8.33%
ST0002560	1990		13	13	0.00%
	1991	4	21	25	16.00%
	1992	4	26	30	13.33%
	1993	1	34	35	2.86%
	1994	7	50	57	12.28%
	1995	5	82	87	5.75%
	1996	20	81	101	19.80%
	1997	18	104	122	14.75%
	1998	29	143	172	16.86%
	1999	25	192	217	11.52%
	2000	34	156	190	17.89%
	2001	34	183	217	15.67%
	2002	55	494	549	10.02%
	2003	28	254	282	9.93%
	2004	53	687	740	7.16%
	2005	30	256	286	10.49%
	2006	30	670	700	4.29%
	2007	29	294	323	8.98%
	2008	27	765	792	3.41%
2009	11	176	187	5.88%	
2010	19	711	730	2.60%	
2011	34	254	288	11.81%	
ST0002560 Total		497	5646	6143	8.09%

Table (a) (3 & 4). # of Tests by Station, % Fail by Station

Station ID	Model Year	Fail	Pass	Total	% Fail
ST0002573	1990	4	21	25	16.00%
	1991	5	21	26	19.23%
	1992	7	34	41	17.07%
	1993	5	34	39	12.82%
	1994	10	61	71	14.08%
	1995	14	86	100	14.00%
	1996	9	63	72	12.50%
	1997	27	114	141	19.15%
	1998	37	144	181	20.44%
	1999	38	195	233	16.31%
	2000	31	171	202	15.35%
	2001	40	179	219	18.26%
	2002	47	459	506	9.29%
	2003	36	225	261	13.79%
	2004	42	580	622	6.75%
	2005	29	270	299	9.70%
	2006	49	529	578	8.48%
	2007	10	225	235	4.26%
2008	16	517	533	3.00%	
2009	5	115	120	4.17%	
2010	4	483	487	0.82%	
2011	5	86	91	5.49%	
ST0002573 Total		470	4612	5082	9.25%
ST0002578	1990	1	4	5	20.00%
	1991	1	1	2	50.00%
	1992	1	8	9	11.11%
	1993	6	13	19	31.58%
	1994	6	23	29	20.69%
	1995	3	33	36	8.33%
	1996	6	31	37	16.22%
	1997	3	48	51	5.88%
	1998	13	53	66	19.70%
	1999	17	87	104	16.35%
	2000	10	79	89	11.24%
	2001	24	100	124	19.35%
	2002	25	219	244	10.25%
	2003	14	123	137	10.22%
	2004	32	311	343	9.33%
	2005	15	147	162	9.26%
	2006	26	309	335	7.76%
	2007	12	149	161	7.45%
2008	19	425	444	4.28%	
2009	6	114	120	5.00%	
2010	19	397	416	4.57%	
2011	22	188	210	10.48%	
ST0002578 Total		281	2862	3143	8.94%

Table (a) (3 & 4). # of Tests by Station, % Fail by Station

Station ID	Model Year	Fail	Pass	Total	% Fail
ST0002593	1990	2	11	13	15.38%
	1991	10	23	33	30.30%
	1992	9	21	30	30.00%
	1993	7	36	43	16.28%
	1994	10	41	51	19.61%
	1995	24	77	101	23.76%
	1996	25	84	109	22.94%
	1997	28	135	163	17.18%
	1998	41	176	217	18.89%
	1999	45	207	252	17.86%
	2000	67	230	297	22.56%
	2001	83	234	317	26.18%
	2002	87	480	567	15.34%
	2003	56	263	319	17.55%
	2004	60	539	599	10.02%
	2005	35	252	287	12.20%
	2006	42	541	583	7.20%
	2007	16	293	309	5.18%
	2008	20	571	591	3.38%
2009	5	140	145	3.45%	
2010	12	429	441	2.72%	
2011	2	84	86	2.33%	
ST0002593 Total		686	4867	5553	12.35%
ST0002631	1990	1	4	5	20.00%
	1991	1	5	6	16.67%
	1992	1	4	5	20.00%
	1993	2	8	10	20.00%
	1994	2	16	18	11.11%
	1995	4	23	27	14.81%
	1996	5	22	27	18.52%
	1997	2	30	32	6.25%
	1998	8	46	54	14.81%
	1999	3	45	48	6.25%
	2000	11	45	56	19.64%
	2001	16	60	76	21.05%
	2002	15	161	176	8.52%
	2003	11	70	81	13.58%
	2004	22	185	207	10.63%
	2005	14	84	98	14.29%
	2006	7	204	211	3.32%
	2007	5	79	84	5.95%
	2008	3	190	193	1.55%
2009	3	42	45	6.67%	
2010	3	190	193	1.55%	
2011		4	4	0.00%	
ST0002631 Total		139	1517	1656	8.39%

Table (a) (3 & 4). # of Tests by Station, % Fail by Station

Station ID	Model Year	Fail	Pass	Total	% Fail
ST0002651	1990		4	4	0.00%
	1991		11	11	0.00%
	1992	1	7	8	12.50%
	1993	1	11	12	8.33%
	1994	2	16	18	11.11%
	1995	2	15	17	11.76%
	1996	1	13	14	7.14%
	1997	5	25	30	16.67%
	1998	3	30	33	9.09%
	1999	7	41	48	14.58%
	2000	11	27	38	28.95%
	2001	8	39	47	17.02%
	2002	11	98	109	10.09%
	2003	5	45	50	10.00%
	2004	22	122	144	15.28%
	2005	7	41	48	14.58%
	2006	9	120	129	6.98%
	2007	3	53	56	5.36%
2008	6	126	132	4.55%	
2009		23	23	0.00%	
2010	2	123	125	1.60%	
2011		6	6	0.00%	
ST0002651 Total		106	996	1102	9.62%
ST0002652	1990	1	17	18	5.56%
	1991	3	20	23	13.04%
	1992	8	22	30	26.67%
	1993		36	36	0.00%
	1994	3	66	69	4.35%
	1995	4	62	66	6.06%
	1996	13	83	96	13.54%
	1997	23	136	159	14.47%
	1998	25	164	189	13.23%
	1999	47	198	245	19.18%
	2000	36	176	212	16.98%
	2001	52	206	258	20.16%
	2002	72	536	608	11.84%
	2003	30	227	257	11.67%
	2004	76	676	752	10.11%
	2005	25	246	271	9.23%
	2006	32	618	650	4.92%
	2007	14	229	243	5.76%
2008	19	716	735	2.59%	
2009	8	137	145	5.52%	
2010	10	514	524	1.91%	
2011		35	35	0.00%	
ST0002652 Total		501	5120	5621	8.91%

Table (a) (3 & 4). # of Tests by Station, % Fail by Station

Station ID	Model Year	Fail	Pass	Total	% Fail
ST0002672	1990	1	29	30	3.33%
	1991	8	32	40	20.00%
	1992	8	39	47	17.02%
	1993	12	57	69	17.39%
	1994	8	69	77	10.39%
	1995	9	106	115	7.83%
	1996	13	122	135	9.63%
	1997	29	190	219	13.24%
	1998	43	243	286	15.03%
	1999	37	268	305	12.13%
	2000	43	264	307	14.01%
	2001	51	267	318	16.04%
	2002	82	797	879	9.33%
	2003	49	336	385	12.73%
	2004	84	977	1061	7.92%
	2005	37	343	380	9.74%
	2006	60	1028	1088	5.51%
2007	17	353	370	4.59%	
2008	43	1083	1126	3.82%	
2009	9	239	248	3.63%	
2010	20	988	1008	1.98%	
2011	4	100	104	3.85%	
ST0002672 Total		667	7930	8597	7.76%
ST0002740	1990	2	13	15	13.33%
	1991	3	7	10	30.00%
	1992	3	27	30	10.00%
	1993	3	26	29	10.34%
	1994	3	50	53	5.66%
	1995	10	59	69	14.49%
	1996	15	94	109	13.76%
	1997	15	121	136	11.03%
	1998	22	156	178	12.36%
	1999	29	183	212	13.68%
	2000	27	185	212	12.74%
	2001	38	193	231	16.45%
	2002	65	504	569	11.42%
	2003	37	260	297	12.46%
	2004	57	662	719	7.93%
	2005	23	271	294	7.82%
	2006	33	656	689	4.79%
2007	19	256	275	6.91%	
2008	29	735	764	3.80%	
2009	8	132	140	5.71%	
2010	6	682	688	0.87%	
2011		60	60	0.00%	
ST0002740 Total		447	5332	5779	7.73%

Table (a) (3 & 4). # of Tests by Station, % Fail by Station

Station ID	Model Year	Fail	Pass	Total	% Fail
ST0002744	1990	7	13	20	35.00%
	1991	1	15	16	6.25%
	1992	4	23	27	14.81%
	1993	6	33	39	15.38%
	1994	4	49	53	7.55%
	1995	12	77	89	13.48%
	1996	4	52	56	7.14%
	1997	6	94	100	6.00%
	1998	20	125	145	13.79%
	1999	23	139	162	14.20%
	2000	20	145	165	12.12%
	2001	28	165	193	14.51%
	2002	35	436	471	7.43%
	2003	29	200	229	12.66%
	2004	46	517	563	8.17%
	2005	11	175	186	5.91%
	2006	31	505	536	5.78%
	2007	9	176	185	4.86%
2008	16	515	531	3.01%	
2009		90	90	0.00%	
2010	6	465	471	1.27%	
2011		8	8	0.00%	
ST0002744 Total		318	4017	4335	7.34%
ST0002822	1990	8	29	37	21.62%
	1991	15	36	51	29.41%
	1992	6	41	47	12.77%
	1993	17	51	68	25.00%
	1994	20	83	103	19.42%
	1995	16	115	131	12.21%
	1996	29	128	157	18.47%
	1997	40	192	232	17.24%
	1998	41	211	252	16.27%
	1999	42	244	286	14.69%
	2000	74	246	320	23.13%
	2001	76	230	306	24.84%
	2002	88	482	570	15.44%
	2003	48	255	303	15.84%
	2004	68	640	708	9.60%
	2005	36	240	276	13.04%
	2006	45	579	624	7.21%
	2007	20	235	255	7.84%
2008	33	606	639	5.16%	
2009	13	162	175	7.43%	
2010	35	618	653	5.36%	
2011	52	318	370	14.05%	
ST0002822 Total		822	5741	6563	12.52%

Table (a) (3 & 4). # of Tests by Station, % Fail by Station

Station ID	Model Year	Fail	Pass	Total	% Fail
ST0002830	1990	3	7	10	30.00%
	1991	6	16	22	27.27%
	1992	5	12	17	29.41%
	1993	2	14	16	12.50%
	1994	4	34	38	10.53%
	1995	8	60	68	11.76%
	1996	6	37	43	13.95%
	1997	19	67	86	22.09%
	1998	22	82	104	21.15%
	1999	21	125	146	14.38%
	2000	21	126	147	14.29%
	2001	25	137	162	15.43%
	2002	37	289	326	11.35%
	2003	36	178	214	16.82%
	2004	39	376	415	9.40%
	2005	30	182	212	14.15%
	2006	30	413	443	6.77%
	2007	20	213	233	8.58%
2008	17	542	559	3.04%	
2009	10	173	183	5.46%	
2010	15	429	444	3.38%	
2011	23	381	404	5.69%	
ST0002830 Total		399	3893	4292	9.30%
ST0002880	1990	5	32	37	13.51%
	1991	7	34	41	17.07%
	1992	12	53	65	18.46%
	1993	10	68	78	12.82%
	1994	16	106	122	13.11%
	1995	29	145	174	16.67%
	1996	17	113	130	13.08%
	1997	28	193	221	12.67%
	1998	44	237	281	15.66%
	1999	35	253	288	12.15%
	2000	58	259	317	18.30%
	2001	69	290	359	19.22%
	2002	97	682	779	12.45%
	2003	55	360	415	13.25%
	2004	85	777	862	9.86%
	2005	38	328	366	10.38%
	2006	51	727	778	6.56%
	2007	17	290	307	5.54%
2008	31	764	795	3.90%	
2009	1	167	168	0.60%	
2010	12	586	598	2.01%	
2011	5	58	63	7.94%	
ST0002880 Total		722	6522	7244	9.97%

Table (a) (3 & 4). # of Tests by Station, % Fail by Station

Station ID	Model Year	Fail	Pass	Total	% Fail
ST0002884	1990	1	11	12	8.33%
	1991	2	10	12	16.67%
	1992	2	12	14	14.29%
	1993	1	19	20	5.00%
	1994	5	33	38	13.16%
	1995	1	50	51	1.96%
	1996	5	42	47	10.64%
	1997	10	64	74	13.51%
	1998	7	98	105	6.67%
	1999	12	102	114	10.53%
	2000	4	85	89	4.49%
	2001	22	89	111	19.82%
	2002	20	267	287	6.97%
	2003	18	135	153	11.76%
	2004	19	368	387	4.91%
	2005	13	107	120	10.83%
	2006	24	336	360	6.67%
2007	5	141	146	3.42%	
2008	12	409	421	2.85%	
2009	3	79	82	3.66%	
2010	4	327	331	1.21%	
2011	2	30	32	6.25%	
ST0002884 Total		192	2814	3006	6.39%
ST0002915	1990	5	19	24	20.83%
	1991	3	18	21	14.29%
	1992	13	37	50	26.00%
	1993	3	47	50	6.00%
	1994	12	65	77	15.58%
	1995	10	102	112	8.93%
	1996	25	115	140	17.86%
	1997	33	178	211	15.64%
	1998	35	198	233	15.02%
	1999	45	246	291	15.46%
	2000	37	244	281	13.17%
	2001	69	257	326	21.17%
	2002	80	580	660	12.12%
	2003	53	314	367	14.44%
	2004	71	629	700	10.14%
	2005	45	281	326	13.80%
	2006	43	627	670	6.42%
2007	9	265	274	3.28%	
2008	21	691	712	2.95%	
2009	3	143	146	2.05%	
2010	7	610	617	1.13%	
2011	4	119	123	3.25%	
ST0002915 Total		626	5785	6411	9.76%

Table (a) (3 & 4). # of Tests by Station, % Fail by Station					
Station ID	Model Year	Fail	Pass	Total	% Fail
ST0002919	1990	4	5	9	44.44%
	1991	1	7	8	12.50%
	1992	5	12	17	29.41%
	1993	7	18	25	28.00%
	1994	4	30	34	11.76%
	1995	5	27	32	15.63%
	1996	12	39	51	23.53%
	1997	21	59	80	26.25%
	1998	24	74	98	24.49%
	1999	24	86	110	21.82%
	2000	31	100	131	23.66%
	2001	33	125	158	20.89%
	2002	51	229	280	18.21%
	2003	37	127	164	22.56%
	2004	37	255	292	12.67%
	2005	27	134	161	16.77%
	2006	20	247	267	7.49%
	2007	12	113	125	9.60%
2008	11	246	257	4.28%	
2009	3	87	90	3.33%	
2010	13	250	263	4.94%	
2011	4	81	85	4.71%	
ST0002919 Total		386	2351	2737	14.10%
ST0002955	1990		3	3	0.00%
	1991		5	5	0.00%
	1992	2	10	12	16.67%
	1993	5	15	20	25.00%
	1994	2	22	24	8.33%
	1995	8	29	37	21.62%
	1996	13	32	45	28.89%
	1997	32	49	81	39.51%
	1998	19	62	81	23.46%
	1999	38	67	105	36.19%
	2000	44	88	132	33.33%
	2001	46	73	119	38.66%
	2002	44	106	150	29.33%
	2003	33	67	100	33.00%
	2004	25	113	138	18.12%
	2005	29	85	114	25.44%
	2006	12	86	98	12.24%
	2007	3	70	73	4.11%
2008	6	81	87	6.90%	
2009	1	33	34	2.94%	
2010	4	75	79	5.06%	
2011		16	16	0.00%	
ST0002955 Total		366	1187	1553	23.57%

Table (a) (3 & 4). # of Tests by Station, % Fail by Station

Station ID	Model Year	Fail	Pass	Total	% Fail
ST0002964	1990	7	22	29	24.14%
	1991	5	34	39	12.82%
	1992	14	43	57	24.56%
	1993	21	59	80	26.25%
	1994	16	98	114	14.04%
	1995	19	117	136	13.97%
	1996	42	166	208	20.19%
	1997	64	225	289	22.15%
	1998	62	291	353	17.56%
	1999	81	312	393	20.61%
	2000	76	353	429	17.72%
	2001	126	362	488	25.82%
	2002	121	697	818	14.79%
	2003	77	439	516	14.92%
	2004	103	763	866	11.89%
	2005	43	411	454	9.47%
	2006	50	706	756	6.61%
	2007	47	425	472	9.96%
2008	47	796	843	5.58%	
2009	23	237	260	8.85%	
2010	25	674	699	3.58%	
2011	39	496	535	7.29%	
ST0002964 Total		1108	7726	8834	12.54%
ST0002975	1990	3	4	7	42.86%
	1991	2	9	11	18.18%
	1992	1	9	10	10.00%
	1993	4	13	17	23.53%
	1994	1	20	21	4.76%
	1995	5	26	31	16.13%
	1996	6	25	31	19.35%
	1997	5	26	31	16.13%
	1998	9	52	61	14.75%
	1999	24	66	90	26.67%
	2000	11	55	66	16.67%
	2001	8	82	90	8.89%
	2002	25	167	192	13.02%
	2003	10	105	115	8.70%
	2004	19	151	170	11.18%
	2005	8	98	106	7.55%
	2006	11	181	192	5.73%
	2007	8	104	112	7.14%
2008	10	248	258	3.88%	
2009	4	60	64	6.25%	
2010	6	189	195	3.08%	
2011	7	63	70	10.00%	
ST0002975 Total		187	1753	1940	9.64%

Table (a) (3 & 4). # of Tests by Station, % Fail by Station

Station ID	Model Year	Fail	Pass	Total	% Fail
ST0003102	1990	1	10	11	9.09%
	1991	2	9	11	18.18%
	1992	6	15	21	28.57%
	1993	4	27	31	12.90%
	1994	17	41	58	29.31%
	1995	14	66	80	17.50%
	1996	18	49	67	26.87%
	1997	20	78	98	20.41%
	1998	28	98	126	22.22%
	1999	40	124	164	24.39%
	2000	39	131	170	22.94%
	2001	48	117	165	29.09%
	2002	69	271	340	20.29%
	2003	24	164	188	12.77%
	2004	49	309	358	13.69%
	2005	25	165	190	13.16%
	2006	29	285	314	9.24%
	2007	8	137	145	5.52%
	2008	18	271	289	6.23%
2009	3	77	80	3.75%	
2010	1	215	216	0.46%	
2011		30	30	0.00%	
ST0003102 Total		463	2689	3152	14.69%
ST0003106	1990	1	8	9	11.11%
	1991		8	8	0.00%
	1992	2	13	15	13.33%
	1993	4	20	24	16.67%
	1994	5	23	28	17.86%
	1995	6	31	37	16.22%
	1996	2	30	32	6.25%
	1997	12	35	47	25.53%
	1998	12	45	57	21.05%
	1999	18	62	80	22.50%
	2000	22	77	99	22.22%
	2001	16	71	87	18.39%
	2002	18	136	154	11.69%
	2003	17	79	96	17.71%
	2004	12	155	167	7.19%
	2005	8	74	82	9.76%
	2006	4	108	112	3.57%
	2007	4	48	52	7.69%
	2008	3	102	105	2.86%
2009		27	27	0.00%	
2010	1	74	75	1.33%	
2011	1	9	10	10.00%	
ST0003106 Total		168	1235	1403	11.97%

Table (a) (3 & 4). # of Tests by Station, % Fail by Station

Station ID	Model Year	Fail	Pass	Total	% Fail
ST0003107	1990	10	31	41	24.39%
	1991	10	25	35	28.57%
	1992	10	46	56	17.86%
	1993	12	41	53	22.64%
	1994	17	106	123	13.82%
	1995	17	128	145	11.72%
	1996	18	123	141	12.77%
	1997	45	198	243	18.52%
	1998	60	264	324	18.52%
	1999	64	298	362	17.68%
	2000	63	282	345	18.26%
	2001	91	349	440	20.68%
	2002	101	578	679	14.87%
	2003	58	331	389	14.91%
	2004	64	651	715	8.95%
	2005	46	339	385	11.95%
	2006	42	537	579	7.25%
	2007	24	299	323	7.43%
2008	25	536	561	4.46%	
2009	9	144	153	5.88%	
2010	7	391	398	1.76%	
2011	1	45	46	2.17%	
ST0003107 Total		794	5742	6536	12.15%
ST0003190	1990	5	15	20	25.00%
	1991	3	15	18	16.67%
	1992	4	15	19	21.05%
	1993	3	24	27	11.11%
	1994	6	41	47	12.77%
	1995	4	49	53	7.55%
	1996	6	52	58	10.34%
	1997	8	81	89	8.99%
	1998	23	114	137	16.79%
	1999	15	124	139	10.79%
	2000	22	120	142	15.49%
	2001	35	156	191	18.32%
	2002	46	419	465	9.89%
	2003	31	207	238	13.03%
	2004	53	626	679	7.81%
	2005	18	216	234	7.69%
	2006	36	651	687	5.24%
	2007	6	269	275	2.18%
2008	16	632	648	2.47%	
2009	6	177	183	3.28%	
2010	6	698	704	0.85%	
2011		71	71	0.00%	
ST0003190 Total		352	4772	5124	6.87%

Table (a) (3 & 4). # of Tests by Station, % Fail by Station

Station ID	Model Year	Fail	Pass	Total	% Fail
ST0003192	1990	15	44	59	25.42%
	1991	22	62	84	26.19%
	1992	21	76	97	21.65%
	1993	20	112	132	15.15%
	1994	63	197	260	24.23%
	1995	53	304	357	14.85%
	1996	79	307	386	20.47%
	1997	142	435	577	24.61%
	1998	144	544	688	20.93%
	1999	130	664	794	16.37%
	2000	194	660	854	22.72%
	2001	228	701	929	24.54%
	2002	254	1220	1474	17.23%
	2003	182	840	1022	17.81%
	2004	210	1308	1518	13.83%
	2005	118	775	893	13.21%
	2006	112	1368	1480	7.57%
	2007	75	756	831	9.03%
	2008	59	1194	1253	4.71%
2009	20	439	459	4.36%	
2010	32	978	1010	3.17%	
2011	26	318	344	7.56%	
ST0003192 Total		2199	13302	15501	14.19%
ST0003225	1990	5	6	11	45.45%
	1991	5	5	10	50.00%
	1992	9	13	22	40.91%
	1993	8	24	32	25.00%
	1994	9	36	45	20.00%
	1995	12	47	59	20.34%
	1996	29	51	80	36.25%
	1997	34	85	119	28.57%
	1998	60	119	179	33.52%
	1999	52	128	180	28.89%
	2000	79	154	233	33.91%
	2001	68	166	234	29.06%
	2002	61	218	279	21.86%
	2003	48	180	228	21.05%
	2004	40	226	266	15.04%
	2005	35	145	180	19.44%
	2006	21	189	210	10.00%
	2007	12	102	114	10.53%
	2008	5	139	144	3.47%
2009	6	45	51	11.76%	
2010	4	79	83	4.82%	
2011		24	24	0.00%	
ST0003225 Total		602	2181	2783	21.63%

Table (a) (3 & 4). # of Tests by Station, % Fail by Station

Station ID	Model Year	Fail	Pass	Total	% Fail
ST0003253	1990	4	11	15	26.67%
	1991		4	4	0.00%
	1992	3	5	8	37.50%
	1993	2	13	15	13.33%
	1994	4	15	19	21.05%
	1995		16	16	0.00%
	1996	6	37	43	13.95%
	1997	9	54	63	14.29%
	1998	6	54	60	10.00%
	1999	14	93	107	13.08%
	2000	10	67	77	12.99%
	2001	15	69	84	17.86%
	2002	26	214	240	10.83%
	2003	11	98	109	10.09%
	2004	34	319	353	9.63%
	2005	15	113	128	11.72%
	2006	19	338	357	5.32%
2007	6	121	127	4.72%	
2008	14	367	381	3.67%	
2009	5	76	81	6.17%	
2010	8	361	369	2.17%	
2011	5	50	55	9.09%	
ST0003253 Total		216	2495	2711	7.97%
ST0003292	1990		12	12	0.00%
	1991	5	17	22	22.73%
	1992	8	31	39	20.51%
	1993	12	56	68	17.65%
	1994	19	67	86	22.09%
	1995	15	99	114	13.16%
	1996	30	80	110	27.27%
	1997	54	130	184	29.35%
	1998	50	169	219	22.83%
	1999	55	173	228	24.12%
	2000	50	194	244	20.49%
	2001	52	178	230	22.61%
	2002	74	389	463	15.98%
	2003	36	208	244	14.75%
	2004	50	348	398	12.56%
	2005	32	198	230	13.91%
	2006	43	363	406	10.59%
2007	13	177	190	6.84%	
2008	16	369	385	4.16%	
2009	5	102	107	4.67%	
2010	4	281	285	1.40%	
2011		24	24	0.00%	
ST0003292 Total		623	3665	4288	14.53%

Table (a) (3 & 4). # of Tests by Station, % Fail by Station

Station ID	Model Year	Fail	Pass	Total	% Fail
ST0003432	1990	15	35	50	30.00%
	1991	16	41	57	28.07%
	1992	27	70	97	27.84%
	1993	36	92	128	28.13%
	1994	46	191	237	19.41%
	1995	53	215	268	19.78%
	1996	122	307	429	28.44%
	1997	205	449	654	31.35%
	1998	243	524	767	31.68%
	1999	270	625	895	30.17%
	2000	313	747	1060	29.53%
	2001	359	794	1153	31.14%
	2002	389	1105	1494	26.04%
	2003	229	873	1102	20.78%
	2004	252	1107	1359	18.54%
	2005	145	792	937	15.47%
	2006	133	916	1049	12.68%
	2007	61	554	615	9.92%
	2008	51	788	839	6.08%
2009	13	293	306	4.25%	
2010	17	497	514	3.31%	
2011	14	160	174	8.05%	
ST0003432 Total		3009	11175	14184	21.21%
ST0003437	1990	1	17	18	5.56%
	1991	3	10	13	23.08%
	1992	1	24	25	4.00%
	1993	2	30	32	6.25%
	1994	6	41	47	12.77%
	1995	6	71	77	7.79%
	1996	10	74	84	11.90%
	1997	18	108	126	14.29%
	1998	27	143	170	15.88%
	1999	22	177	199	11.06%
	2000	31	165	196	15.82%
	2001	34	179	213	15.96%
	2002	69	512	581	11.88%
	2003	44	259	303	14.52%
	2004	66	661	727	9.08%
	2005	21	282	303	6.93%
	2006	39	668	707	5.52%
	2007	19	274	293	6.48%
	2008	27	761	788	3.43%
2009	5	152	157	3.18%	
2010	12	643	655	1.83%	
2011	3	56	59	5.08%	
ST0003437 Total		466	5307	5773	8.07%

Table (a) (3 & 4). # of Tests by Station, % Fail by Station

Station ID	Model Year	Fail	Pass	Total	% Fail
ST0003449	1990	20	41	61	32.79%
	1991	26	68	94	27.66%
	1992	27	107	134	20.15%
	1993	52	170	222	23.42%
	1994	43	218	261	16.48%
	1995	70	322	392	17.86%
	1996	121	296	417	29.02%
	1997	179	421	600	29.83%
	1998	204	579	783	26.05%
	1999	256	671	927	27.62%
	2000	318	773	1091	29.15%
	2001	335	726	1061	31.57%
	2002	385	1146	1531	25.15%
	2003	251	899	1150	21.83%
	2004	251	1200	1451	17.30%
	2005	194	880	1074	18.06%
	2006	140	1075	1215	11.52%
	2007	83	646	729	11.39%
2008	79	881	960	8.23%	
2009	24	357	381	6.30%	
2010	30	616	646	4.64%	
2011	8	183	191	4.19%	
ST0003449 Total		3096	12275	15371	20.14%
ST0003458	1990	5	27	32	15.63%
	1991	7	19	26	26.92%
	1992	5	41	46	10.87%
	1993	6	44	50	12.00%
	1994	8	53	61	13.11%
	1995	11	91	102	10.78%
	1996	21	96	117	17.95%
	1997	15	146	161	9.32%
	1998	15	165	180	8.33%
	1999	25	210	235	10.64%
	2000	27	193	220	12.27%
	2001	34	233	267	12.73%
	2002	73	671	744	9.81%
	2003	44	291	335	13.13%
	2004	55	964	1019	5.40%
	2005	27	318	345	7.83%
	2006	45	886	931	4.83%
	2007	17	307	324	5.25%
2008	26	1036	1062	2.45%	
2009	4	209	213	1.88%	
2010	14	924	938	1.49%	
2011	2	57	59	3.39%	
ST0003458 Total		486	6981	7467	6.51%

Table (a) (3 & 4). # of Tests by Station, % Fail by Station

Station ID	Model Year	Fail	Pass	Total	% Fail
ST0003475	1990	1	3	4	25.00%
	1991	2	9	11	18.18%
	1992	3	13	16	18.75%
	1993	5	12	17	29.41%
	1994	5	19	24	20.83%
	1995	4	18	22	18.18%
	1996	17	31	48	35.42%
	1997	16	45	61	26.23%
	1998	15	59	74	20.27%
	1999	26	69	95	27.37%
	2000	23	68	91	25.27%
	2001	25	75	100	25.00%
	2002	33	153	186	17.74%
	2003	23	82	105	21.90%
	2004	25	171	196	12.76%
	2005	20	99	119	16.81%
	2006	13	211	224	5.80%
	2007	8	122	130	6.15%
2008	5	202	207	2.42%	
2009	5	68	73	6.85%	
2010	9	209	218	4.13%	
2011	1	31	32	3.13%	
ST0003475 Total		284	1769	2053	13.83%
ST0003483	1990	1	8	9	11.11%
	1991	3	14	17	17.65%
	1992	2	19	21	9.52%
	1993		14	14	0.00%
	1994	6	28	34	17.65%
	1995	2	29	31	6.45%
	1996	10	45	55	18.18%
	1997	13	66	79	16.46%
	1998	14	94	108	12.96%
	1999	9	86	95	9.47%
	2000	10	78	88	11.36%
	2001	18	96	114	15.79%
	2002	31	277	308	10.06%
	2003	16	125	141	11.35%
	2004	34	353	387	8.79%
	2005	11	108	119	9.24%
	2006	24	334	358	6.70%
	2007	7	126	133	5.26%
2008	13	371	384	3.39%	
2009	2	78	80	2.50%	
2010	5	282	287	1.74%	
2011		24	24	0.00%	
ST0003483 Total		231	2655	2886	8.00%

Table (a) (3 & 4). # of Tests by Station, % Fail by Station

Station ID	Model Year	Fail	Pass	Total	% Fail
ST0003498	1990	2	24	26	7.69%
	1991	8	33	41	19.51%
	1992	13	55	68	19.12%
	1993	17	75	92	18.48%
	1994	15	96	111	13.51%
	1995	30	151	181	16.57%
	1996	40	181	221	18.10%
	1997	62	265	327	18.96%
	1998	58	315	373	15.55%
	1999	83	408	491	16.90%
	2000	99	450	549	18.03%
	2001	106	431	537	19.74%
	2002	122	690	812	15.02%
	2003	105	492	597	17.59%
	2004	87	778	865	10.06%
	2005	61	461	522	11.69%
	2006	55	730	785	7.01%
	2007	23	381	404	5.69%
2008	30	575	605	4.96%	
2009	11	200	211	5.21%	
2010	11	416	427	2.58%	
2011	1	106	107	0.93%	
ST0003498 Total		1039	7313	8352	12.44%
ST0003548	1990	10	37	47	21.28%
	1991	6	50	56	10.71%
	1992	25	61	86	29.07%
	1993	23	73	96	23.96%
	1994	22	119	141	15.60%
	1995	38	200	238	15.97%
	1996	49	193	242	20.25%
	1997	78	264	342	22.81%
	1998	92	320	412	22.33%
	1999	94	440	534	17.60%
	2000	110	440	550	20.00%
	2001	147	541	688	21.37%
	2002	156	800	956	16.32%
	2003	117	519	636	18.40%
	2004	112	910	1022	10.96%
	2005	91	558	649	14.02%
	2006	72	866	938	7.68%
	2007	45	463	508	8.86%
2008	34	830	864	3.94%	
2009	10	285	295	3.39%	
2010	11	569	580	1.90%	
2011	4	209	213	1.88%	
ST0003548 Total		1346	8747	10093	13.34%

Table (a) (3 & 4). # of Tests by Station, % Fail by Station

Station ID	Model Year	Fail	Pass	Total	% Fail
ST0003587	1990	2	4	6	33.33%
	1991	2	3	5	40.00%
	1992	2	3	5	40.00%
	1993	5	16	21	23.81%
	1994	6	13	19	31.58%
	1995	7	15	22	31.82%
	1996	7	24	31	22.58%
	1997	9	40	49	18.37%
	1998	8	56	64	12.50%
	1999	18	65	83	21.69%
	2000	21	71	92	22.83%
	2001	24	83	107	22.43%
	2002	40	145	185	21.62%
	2003	21	99	120	17.50%
	2004	38	169	207	18.36%
	2005	13	104	117	11.11%
	2006	17	186	203	8.37%
2007	10	95	105	9.52%	
2008	11	209	220	5.00%	
2009	6	68	74	8.11%	
2010	5	182	187	2.67%	
2011		13	13	0.00%	
ST0003587 Total		272	1663	1935	14.06%
ST0003592	1990		18	18	0.00%
	1991	2	18	20	10.00%
	1992	6	30	36	16.67%
	1993	10	43	53	18.87%
	1994	10	70	80	12.50%
	1995	25	90	115	21.74%
	1996	22	127	149	14.77%
	1997	40	188	228	17.54%
	1998	49	241	290	16.90%
	1999	54	300	354	15.25%
	2000	50	270	320	15.63%
	2001	72	291	363	19.83%
	2002	97	653	750	12.93%
	2003	57	369	426	13.38%
	2004	75	717	792	9.47%
	2005	45	418	463	9.72%
	2006	44	744	788	5.58%
2007	33	296	329	10.03%	
2008	31	677	708	4.38%	
2009	11	162	173	6.36%	
2010	7	492	499	1.40%	
2011	1	56	57	1.75%	
ST0003592 Total		741	6270	7011	10.57%

Table (a) (3 & 4). # of Tests by Station, % Fail by Station

Station ID	Model Year	Fail	Pass	Total	% Fail
ST0003662	1990	7	15	22	31.82%
	1991	5	14	19	26.32%
	1992	12	25	37	32.43%
	1993	12	37	49	24.49%
	1994	12	57	69	17.39%
	1995	11	63	74	14.86%
	1996	19	71	90	21.11%
	1997	19	113	132	14.39%
	1998	43	153	196	21.94%
	1999	37	166	203	18.23%
	2000	41	181	222	18.47%
	2001	61	216	277	22.02%
	2002	64	364	428	14.95%
	2003	34	241	275	12.36%
	2004	53	438	491	10.79%
	2005	32	246	278	11.51%
	2006	40	391	431	9.28%
	2007	12	217	229	5.24%
	2008	13	409	422	3.08%
2009	13	164	177	7.34%	
2010	26	423	449	5.79%	
2011	65	633	698	9.31%	
ST0003662 Total		631	4637	5268	11.98%
ST0003732	1990		1	1	0.00%
	1993		2	2	0.00%
	1994		2	2	0.00%
	1995		2	2	0.00%
	1996		1	1	0.00%
	1997	1	8	9	11.11%
	1998	6	10	16	37.50%
	1999	1	12	13	7.69%
	2000	2	14	16	12.50%
	2001	1	12	13	7.69%
	2002	1	32	33	3.03%
	2003	1	18	19	5.26%
	2004	2	32	34	5.88%
	2005	2	12	14	14.29%
	2006		38	38	0.00%
	2007		14	14	0.00%
	2008		54	54	0.00%
2009		9	9	0.00%	
2010		45	45	0.00%	
2011		2	2	0.00%	
ST0003732 Total		17	320	337	5.04%

Table (a) (3 & 4). # of Tests by Station, % Fail by Station

Station ID	Model Year	Fail	Pass	Total	% Fail
ST0003739	1990	2	5	7	28.57%
	1991	1	6	7	14.29%
	1992		3	3	0.00%
	1993	4	10	14	28.57%
	1994		13	13	0.00%
	1995	2	17	19	10.53%
	1996	3	23	26	11.54%
	1997	6	28	34	17.65%
	1998	6	41	47	12.77%
	1999	13	47	60	21.67%
	2000	8	42	50	16.00%
	2001	10	46	56	17.86%
	2002	9	97	106	8.49%
	2003	10	60	70	14.29%
	2004	14	108	122	11.48%
	2005	4	52	56	7.14%
	2006	9	110	119	7.56%
2007	3	45	48	6.25%	
2008	7	104	111	6.31%	
2009		22	22	0.00%	
2010	5	82	87	5.75%	
2011		18	18	0.00%	
ST0003739 Total		116	979	1095	10.59%
ST0003746	1990		5	5	0.00%
	1991	1	4	5	20.00%
	1992		5	5	0.00%
	1993		6	6	0.00%
	1994		6	6	0.00%
	1995	1	15	16	6.25%
	1996	1	9	10	10.00%
	1997	3	15	18	16.67%
	1998	6	24	30	20.00%
	1999	5	22	27	18.52%
	2000	5	27	32	15.63%
	2001	4	23	27	14.81%
	2002	13	77	90	14.44%
	2003	4	37	41	9.76%
	2004	7	105	112	6.25%
	2005	5	49	54	9.26%
	2006	7	108	115	6.09%
2007	2	50	52	3.85%	
2008	4	119	123	3.25%	
2009	2	21	23	8.70%	
2010	1	116	117	0.85%	
2011	3	36	39	7.69%	
ST0003746 Total		74	879	953	7.76%

Table (a) (3 & 4). # of Tests by Station, % Fail by Station

Station ID	Model Year	Fail	Pass	Total	% Fail
ST0003759	1990	2	6	8	25.00%
	1991	4	3	7	57.14%
	1992	2	4	6	33.33%
	1993	2	10	12	16.67%
	1994	1	16	17	5.88%
	1995	6	17	23	26.09%
	1996	2	18	20	10.00%
	1997	7	29	36	19.44%
	1998	3	36	39	7.69%
	1999	9	30	39	23.08%
	2000	5	29	34	14.71%
	2001	10	59	69	14.49%
	2002	12	98	110	10.91%
	2003	5	36	41	12.20%
	2004	6	120	126	4.76%
	2005	3	50	53	5.66%
	2006	7	111	118	5.93%
2007	1	30	31	3.23%	
2008	4	73	77	5.19%	
2009	1	24	25	4.00%	
2010	4	76	80	5.00%	
2011		6	6	0.00%	
ST0003759 Total		96	881	977	9.83%
ST0003767	1990	3	14	17	17.65%
	1991	3	18	21	14.29%
	1992	3	30	33	9.09%
	1993	10	33	43	23.26%
	1994	5	60	65	7.69%
	1995	9	78	87	10.34%
	1996	15	90	105	14.29%
	1997	16	128	144	11.11%
	1998	40	199	239	16.74%
	1999	55	191	246	22.36%
	2000	39	176	215	18.14%
	2001	58	218	276	21.01%
	2002	81	539	620	13.06%
	2003	65	306	371	17.52%
	2004	59	748	807	7.31%
	2005	44	364	408	10.78%
	2006	56	802	858	6.53%
2007	19	400	419	4.53%	
2008	22	826	848	2.59%	
2009	8	223	231	3.46%	
2010	15	678	693	2.16%	
2011	1	88	89	1.12%	
ST0003767 Total		626	6209	6835	9.16%

Table (a) (3 & 4). # of Tests by Station, % Fail by Station

Station ID	Model Year	Fail	Pass	Total	% Fail
ST0003876	1990	4	16	20	20.00%
	1991	10	18	28	35.71%
	1992	4	27	31	12.90%
	1993	2	30	32	6.25%
	1994	9	61	70	12.86%
	1995	25	83	108	23.15%
	1996	9	91	100	9.00%
	1997	21	102	123	17.07%
	1998	32	141	173	18.50%
	1999	34	168	202	16.83%
	2000	33	163	196	16.84%
	2001	44	190	234	18.80%
	2002	83	437	520	15.96%
	2003	32	219	251	12.75%
	2004	62	549	611	10.15%
	2005	32	235	267	11.99%
	2006	53	505	558	9.50%
	2007	14	238	252	5.56%
	2008	16	542	558	2.87%
2009	5	131	136	3.68%	
2010	21	483	504	4.17%	
2011	14	122	136	10.29%	
ST0003876 Total		559	4551	5110	10.94%
ST0003939	1990	6	10	16	37.50%
	1991	4	4	8	50.00%
	1992	1	10	11	9.09%
	1993	1	11	12	8.33%
	1994	10	21	31	32.26%
	1995	6	33	39	15.38%
	1996	7	32	39	17.95%
	1997	17	53	70	24.29%
	1998	12	55	67	17.91%
	1999	11	65	76	14.47%
	2000	12	71	83	14.46%
	2001	24	84	108	22.22%
	2002	23	151	174	13.22%
	2003	17	75	92	18.48%
	2004	23	152	175	13.14%
	2005	7	67	74	9.46%
	2006	17	141	158	10.76%
	2007	9	63	72	12.50%
	2008	7	137	144	4.86%
2009	1	22	23	4.35%	
2010	2	91	93	2.15%	
2011	1	13	14	7.14%	
ST0003939 Total		218	1361	1579	13.81%

Table (a) (3 & 4). # of Tests by Station, % Fail by Station					
Station ID	Model Year	Fail	Pass	Total	% Fail
ST0003943	1990	5	18	23	21.74%
	1991	10	22	32	31.25%
	1992	6	35	41	14.63%
	1993	10	39	49	20.41%
	1994	15	80	95	15.79%
	1995	23	104	127	18.11%
	1996	29	124	153	18.95%
	1997	32	167	199	16.08%
	1998	50	215	265	18.87%
	1999	38	201	239	15.90%
	2000	48	224	272	17.65%
	2001	52	280	332	15.66%
	2002	62	483	545	11.38%
	2003	30	247	277	10.83%
	2004	81	618	699	11.59%
	2005	39	281	320	12.19%
	2006	38	559	597	6.37%
	2007	15	207	222	6.76%
	2008	18	482	500	3.60%
2009	7	108	115	6.09%	
2010	9	427	436	2.06%	
2011	9	102	111	8.11%	
ST0003943 Total		626	5023	5649	11.08%
ST0003976	1990	4	13	17	23.53%
	1991		12	12	0.00%
	1992	2	15	17	11.76%
	1993	6	28	34	17.65%
	1994	4	41	45	8.89%
	1995	18	54	72	25.00%
	1996	20	67	87	22.99%
	1997	17	84	101	16.83%
	1998	15	116	131	11.45%
	1999	23	118	141	16.31%
	2000	21	149	170	12.35%
	2001	48	161	209	22.97%
	2002	63	326	389	16.20%
	2003	27	224	251	10.76%
	2004	57	458	515	11.07%
	2005	27	246	273	9.89%
	2006	47	538	585	8.03%
	2007	28	248	276	10.14%
	2008	27	543	570	4.74%
2009	8	135	143	5.59%	
2010	15	477	492	3.05%	
2011	44	253	297	14.81%	
ST0003976 Total		521	4306	4827	10.79%

Table (a) (3 & 4). # of Tests by Station, % Fail by Station

Station ID	Model Year	Fail	Pass	Total	% Fail
ST0003988	1990	2	6	8	25.00%
	1991		5	5	0.00%
	1992	3	5	8	37.50%
	1993	1	8	9	11.11%
	1994	3	24	27	11.11%
	1995	3	22	25	12.00%
	1996	5	39	44	11.36%
	1997	3	37	40	7.50%
	1998	10	65	75	13.33%
	1999	8	77	85	9.41%
	2000	5	58	63	7.94%
	2001	15	82	97	15.46%
	2002	25	233	258	9.69%
	2003	12	113	125	9.60%
	2004	27	311	338	7.99%
	2005	17	116	133	12.78%
	2006	22	322	344	6.40%
2007	12	131	143	8.39%	
2008	16	380	396	4.04%	
2009	9	103	112	8.04%	
2010	21	404	425	4.94%	
2011	45	317	362	12.43%	
ST0003988 Total		264	2858	3122	8.46%
ST0003997	1990	4	15	19	21.05%
	1991	5	22	27	18.52%
	1992		34	34	0.00%
	1993	2	34	36	5.56%
	1994	5	62	67	7.46%
	1995	8	87	95	8.42%
	1996	13	106	119	10.92%
	1997	24	139	163	14.72%
	1998	14	158	172	8.14%
	1999	29	209	238	12.18%
	2000	25	206	231	10.82%
	2001	38	219	257	14.79%
	2002	56	539	595	9.41%
	2003	28	289	317	8.83%
	2004	54	751	805	6.71%
	2005	17	308	325	5.23%
	2006	42	751	793	5.30%
2007	14	272	286	4.90%	
2008	19	761	780	2.44%	
2009	4	139	143	2.80%	
2010	7	634	641	1.09%	
2011	2	78	80	2.50%	
ST0003997 Total		410	5813	6223	6.59%

Table (a) (3 & 4). # of Tests by Station, % Fail by Station

Station ID	Model Year	Fail	Pass	Total	% Fail
ST0004004	1990	2	23	25	8.00%
	1991	5	37	42	11.90%
	1992	10	33	43	23.26%
	1993	7	38	45	15.56%
	1994	9	54	63	14.29%
	1995	13	70	83	15.66%
	1996	16	89	105	15.24%
	1997	29	144	173	16.76%
	1998	43	179	222	19.37%
	1999	33	225	258	12.79%
	2000	39	220	259	15.06%
	2001	56	253	309	18.12%
	2002	59	671	730	8.08%
	2003	60	315	375	16.00%
	2004	77	771	848	9.08%
	2005	31	335	366	8.47%
	2006	29	809	838	3.46%
	2007	19	309	328	5.79%
2008	27	836	863	3.13%	
2009	7	189	196	3.57%	
2010	14	753	767	1.83%	
2011	1	70	71	1.41%	
ST0004004 Total		586	6423	7009	8.36%
ST0004016	1990	3	9	12	25.00%
	1991	1	12	13	7.69%
	1992	6	24	30	20.00%
	1993	5	24	29	17.24%
	1994	5	40	45	11.11%
	1995	6	61	67	8.96%
	1996	4	50	54	7.41%
	1997	17	91	108	15.74%
	1998	13	124	137	9.49%
	1999	28	161	189	14.81%
	2000	36	171	207	17.39%
	2001	35	175	210	16.67%
	2002	78	485	563	13.85%
	2003	42	260	302	13.91%
	2004	55	705	760	7.24%
	2005	22	307	329	6.69%
	2006	73	740	813	8.98%
	2007	18	355	373	4.83%
2008	27	892	919	2.94%	
2009	11	231	242	4.55%	
2010	28	848	876	3.20%	
2011	4	137	141	2.84%	
ST0004016 Total		517	5902	6419	8.05%

Table (a) (3 & 4). # of Tests by Station, % Fail by Station

Station ID	Model Year	Fail	Pass	Total	% Fail
ST0004034	1990	1	3	4	25.00%
	1991	2	1	3	66.67%
	1993	2	5	7	28.57%
	1994	3	7	10	30.00%
	1995		5	5	0.00%
	1996	2	15	17	11.76%
	1997	5	18	23	21.74%
	1998	7	23	30	23.33%
	1999	5	27	32	15.63%
	2000	4	29	33	12.12%
	2001	8	19	27	29.63%
	2002	7	21	28	25.00%
	2003	9	29	38	23.68%
	2004	3	39	42	7.14%
	2005	4	30	34	11.76%
	2006	1	33	34	2.94%
	2007		19	19	0.00%
	2008	1	47	48	2.08%
2009		19	19	0.00%	
2010	1	33	34	2.94%	
2011	4	9	13	30.77%	
ST0004034 Total		69	431	500	13.80%
ST0004065	1990	2	6	8	25.00%
	1991	2	7	9	22.22%
	1992	5	9	14	35.71%
	1993	4	13	17	23.53%
	1994	5	22	27	18.52%
	1995	9	36	45	20.00%
	1996	8	28	36	22.22%
	1997	5	45	50	10.00%
	1998	18	85	103	17.48%
	1999	12	86	98	12.24%
	2000	15	88	103	14.56%
	2001	26	122	148	17.57%
	2002	37	245	282	13.12%
	2003	26	150	176	14.77%
	2004	34	418	452	7.52%
	2005	23	228	251	9.16%
	2006	22	466	488	4.51%
	2007	16	277	293	5.46%
2008	19	592	611	3.11%	
2009	10	185	195	5.13%	
2010	17	567	584	2.91%	
2011	11	206	217	5.07%	
ST0004065 Total		326	3881	4207	7.75%

Table (a) (3 & 4). # of Tests by Station, % Fail by Station

Station ID	Model Year	Fail	Pass	Total	% Fail
ST0004105	1990	9	15	24	37.50%
	1991	7	24	31	22.58%
	1992	17	31	48	35.42%
	1993	21	45	66	31.82%
	1994	30	71	101	29.70%
	1995	28	97	125	22.40%
	1996	43	139	182	23.63%
	1997	83	224	307	27.04%
	1998	75	261	336	22.32%
	1999	96	312	408	23.53%
	2000	96	368	464	20.69%
	2001	139	395	534	26.03%
	2002	110	541	651	16.90%
	2003	96	458	554	17.33%
	2004	90	489	579	15.54%
	2005	62	372	434	14.29%
	2006	47	399	446	10.54%
	2007	35	265	300	11.67%
2008	17	307	324	5.25%	
2009	13	117	130	10.00%	
2010	11	206	217	5.07%	
2011	11	113	124	8.87%	
ST0004105 Total		1136	5249	6385	17.79%
ST0004107	1990	17	42	59	28.81%
	1991	11	43	54	20.37%
	1992	21	49	70	30.00%
	1993	8	83	91	8.79%
	1994	30	118	148	20.27%
	1995	45	196	241	18.67%
	1996	59	228	287	20.56%
	1997	76	308	384	19.79%
	1998	78	399	477	16.35%
	1999	113	499	612	18.46%
	2000	123	523	646	19.04%
	2001	133	554	687	19.36%
	2002	194	1080	1274	15.23%
	2003	129	706	835	15.45%
	2004	159	1311	1470	10.82%
	2005	128	745	873	14.66%
	2006	113	1409	1522	7.42%
	2007	51	721	772	6.61%
2008	69	1408	1477	4.67%	
2009	38	476	514	7.39%	
2010	57	1214	1271	4.48%	
2011	105	961	1066	9.85%	
ST0004107 Total		1757	13073	14830	11.85%

Table (a) (3 & 4). # of Tests by Station, % Fail by Station

Station ID	Model Year	Fail	Pass	Total	% Fail
ST0004111	1990	3	11	14	21.43%
	1991	3	18	21	14.29%
	1992	9	22	31	29.03%
	1993	6	34	40	15.00%
	1994	5	31	36	13.89%
	1995	8	63	71	11.27%
	1996	34	89	123	27.64%
	1997	23	108	131	17.56%
	1998	28	150	178	15.73%
	1999	41	215	256	16.02%
	2000	58	219	277	20.94%
	2001	75	269	344	21.80%
	2002	79	530	609	12.97%
	2003	65	372	437	14.87%
	2004	73	753	826	8.84%
	2005	53	427	480	11.04%
	2006	52	879	931	5.59%
2007	40	534	574	6.97%	
2008	34	1060	1094	3.11%	
2009	18	369	387	4.65%	
2010	26	855	881	2.95%	
2011	5	257	262	1.91%	
ST0004111 Total		738	7265	8003	9.22%
ST0004170	1990	7	9	16	43.75%
	1991		8	8	0.00%
	1992	2	9	11	18.18%
	1993	1	12	13	7.69%
	1994	2	25	27	7.41%
	1995	5	30	35	14.29%
	1996	8	46	54	14.81%
	1997	11	70	81	13.58%
	1998	14	87	101	13.86%
	1999	29	119	148	19.59%
	2000	23	119	142	16.20%
	2001	30	112	142	21.13%
	2002	49	330	379	12.93%
	2003	24	178	202	11.88%
	2004	35	431	466	7.51%
	2005	12	164	176	6.82%
	2006	23	439	462	4.98%
2007	10	169	179	5.59%	
2008	14	490	504	2.78%	
2009	3	95	98	3.06%	
2010	10	410	420	2.38%	
2011	3	51	54	5.56%	
ST0004170 Total		315	3403	3718	8.47%

Table (a) (3 & 4). # of Tests by Station, % Fail by Station

Station ID	Model Year	Fail	Pass	Total	% Fail
ST0004191	1990	3	14	17	17.65%
	1991	5	18	23	21.74%
	1992	2	18	20	10.00%
	1993	3	18	21	14.29%
	1994	2	23	25	8.00%
	1995	6	43	49	12.24%
	1996	6	42	48	12.50%
	1997	5	69	74	6.76%
	1998	14	81	95	14.74%
	1999	13	120	133	9.77%
	2000	5	92	97	5.15%
	2001	17	128	145	11.72%
	2002	26	310	336	7.74%
	2003	16	180	196	8.16%
	2004	36	503	539	6.68%
	2005	19	231	250	7.60%
	2006	36	561	597	6.03%
	2007	11	290	301	3.65%
2008	20	744	764	2.62%	
2009	6	165	171	3.51%	
2010	21	728	749	2.80%	
2011	22	163	185	11.89%	
ST0004191 Total		294	4541	4835	6.08%
ST0004230	1990	2	19	21	9.52%
	1991	5	18	23	21.74%
	1992	7	18	25	28.00%
	1993	4	25	29	13.79%
	1994	4	41	45	8.89%
	1995	13	55	68	19.12%
	1996	17	88	105	16.19%
	1997	17	104	121	14.05%
	1998	28	168	196	14.29%
	1999	34	191	225	15.11%
	2000	36	223	259	13.90%
	2001	59	240	299	19.73%
	2002	68	455	523	13.00%
	2003	62	311	373	16.62%
	2004	56	648	704	7.95%
	2005	39	398	437	8.92%
	2006	54	828	882	6.12%
	2007	42	498	540	7.78%
2008	41	1016	1057	3.88%	
2009	9	345	354	2.54%	
2010	41	940	981	4.18%	
2011	67	565	632	10.60%	
ST0004230 Total		705	7194	7899	8.93%

Table (a) (3 & 4). # of Tests by Station, % Fail by Station

Station ID	Model Year	Fail	Pass	Total	% Fail
ST0004243	1990	1	7	8	12.50%
	1991		7	7	0.00%
	1992	2	11	13	15.38%
	1993	3	11	14	21.43%
	1994	2	17	19	10.53%
	1995	4	28	32	12.50%
	1996	5	27	32	15.63%
	1997	6	30	36	16.67%
	1998	5	59	64	7.81%
	1999	14	74	88	15.91%
	2000	16	64	80	20.00%
	2001	21	106	127	16.54%
	2002	20	207	227	8.81%
	2003	17	138	155	10.97%
	2004	25	359	384	6.51%
	2005	17	191	208	8.17%
	2006	25	442	467	5.35%
	2007	16	230	246	6.50%
	2008	16	610	626	2.56%
2009	3	140	143	2.10%	
2010	7	524	531	1.32%	
2011	2	87	89	2.25%	
ST0004243 Total		227	3369	3596	6.31%
ST0004257	1990	14	42	56	25.00%
	1991	13	48	61	21.31%
	1992	21	69	90	23.33%
	1993	16	88	104	15.38%
	1994	29	133	162	17.90%
	1995	48	200	248	19.35%
	1996	40	197	237	16.88%
	1997	80	281	361	22.16%
	1998	79	332	411	19.22%
	1999	105	379	484	21.69%
	2000	106	411	517	20.50%
	2001	134	406	540	24.81%
	2002	164	814	978	16.77%
	2003	98	507	605	16.20%
	2004	118	828	946	12.47%
	2005	76	450	526	14.45%
	2006	74	828	902	8.20%
	2007	40	474	514	7.78%
	2008	34	914	948	3.59%
2009	12	250	262	4.58%	
2010	16	722	738	2.17%	
2011	13	182	195	6.67%	
ST0004257 Total		1330	8555	9885	13.45%

Table (a) (3 & 4). # of Tests by Station, % Fail by Station

Station ID	Model Year	Fail	Pass	Total	% Fail
ST0004262	1990	7	16	23	30.43%
	1991	10	33	43	23.26%
	1992	7	36	43	16.28%
	1993	7	42	49	14.29%
	1994	13	63	76	17.11%
	1995	18	94	112	16.07%
	1996	16	100	116	13.79%
	1997	34	151	185	18.38%
	1998	53	208	261	20.31%
	1999	60	238	298	20.13%
	2000	62	221	283	21.91%
	2001	64	242	306	20.92%
	2002	89	514	603	14.76%
	2003	63	304	367	17.17%
	2004	63	570	633	9.95%
	2005	48	274	322	14.91%
	2006	44	527	571	7.71%
	2007	15	260	275	5.45%
	2008	20	528	548	3.65%
2009	5	133	138	3.62%	
2010	10	496	506	1.98%	
2011	8	89	97	8.25%	
ST0004262 Total		716	5139	5855	12.23%
ST0004298	1990	5	23	28	17.86%
	1991	4	29	33	12.12%
	1992	8	32	40	20.00%
	1993	11	70	81	13.58%
	1994	12	67	79	15.19%
	1995	21	120	141	14.89%
	1996	32	118	150	21.33%
	1997	21	162	183	11.48%
	1998	41	186	227	18.06%
	1999	34	247	281	12.10%
	2000	65	229	294	22.11%
	2001	73	267	340	21.47%
	2002	91	639	730	12.47%
	2003	51	377	428	11.92%
	2004	81	929	1010	8.02%
	2005	39	403	442	8.82%
	2006	55	1065	1120	4.91%
	2007	28	499	527	5.31%
	2008	31	1159	1190	2.61%
2009	10	296	306	3.27%	
2010	23	1007	1030	2.23%	
2011	2	139	141	1.42%	
ST0004298 Total		738	8063	8801	8.39%

Table (a) (3 & 4). # of Tests by Station, % Fail by Station

Station ID	Model Year	Fail	Pass	Total	% Fail
ST0004375	1990	1	5	6	16.67%
	1991		3	3	0.00%
	1992		12	12	0.00%
	1993	3	10	13	23.08%
	1994	8	20	28	28.57%
	1995	3	21	24	12.50%
	1996	11	24	35	31.43%
	1997	13	70	83	15.66%
	1998	10	71	81	12.35%
	1999	13	77	90	14.44%
	2000	12	72	84	14.29%
	2001	25	97	122	20.49%
	2002	33	249	282	11.70%
	2003	18	181	199	9.05%
	2004	39	416	455	8.57%
	2005	23	190	213	10.80%
	2006	21	487	508	4.13%
2007	11	248	259	4.25%	
2008	15	622	637	2.35%	
2009	3	160	163	1.84%	
2010	11	582	593	1.85%	
2011	3	106	109	2.75%	
ST0004375 Total		276	3723	3999	6.90%
ST0004377	1990	4	16	20	20.00%
	1991	1	9	10	10.00%
	1992		10	10	0.00%
	1993	2	16	18	11.11%
	1994	2	29	31	6.45%
	1995	4	41	45	8.89%
	1996	6	40	46	13.04%
	1997	4	52	56	7.14%
	1998	5	76	81	6.17%
	1999	9	85	94	9.57%
	2000	14	88	102	13.73%
	2001	20	120	140	14.29%
	2002	27	252	279	9.68%
	2003	16	139	155	10.32%
	2004	27	382	409	6.60%
	2005	18	153	171	10.53%
	2006	20	325	345	5.80%
2007	11	177	188	5.85%	
2008	19	448	467	4.07%	
2009	7	146	153	4.58%	
2010	9	405	414	2.17%	
2011	43	213	256	16.80%	
ST0004377 Total		268	3222	3490	7.68%

Table (a) (3 & 4). # of Tests by Station, % Fail by Station

Station ID	Model Year	Fail	Pass	Total	% Fail
ST0004390	1990	5	18	23	21.74%
	1991	3	19	22	13.64%
	1992	3	11	14	21.43%
	1993		28	28	0.00%
	1994	2	31	33	6.06%
	1995	13	53	66	19.70%
	1996	10	58	68	14.71%
	1997	13	69	82	15.85%
	1998	14	96	110	12.73%
	1999	25	139	164	15.24%
	2000	23	128	151	15.23%
	2001	29	150	179	16.20%
	2002	41	340	381	10.76%
	2003	17	209	226	7.52%
	2004	32	496	528	6.06%
	2005	10	237	247	4.05%
	2006	26	520	546	4.76%
	2007	26	332	358	7.26%
2008	21	796	817	2.57%	
2009	6	169	175	3.43%	
2010	33	715	748	4.41%	
2011	12	149	161	7.45%	
ST0004390 Total		364	4763	5127	7.10%
ST0004405	1990		3	3	0.00%
	1991		13	13	0.00%
	1992	5	10	15	33.33%
	1993	1	4	5	20.00%
	1994	4	16	20	20.00%
	1995	6	30	36	16.67%
	1996		22	22	0.00%
	1997	7	38	45	15.56%
	1998	11	63	74	14.86%
	1999	9	65	74	12.16%
	2000	8	66	74	10.81%
	2001	13	97	110	11.82%
	2002	24	210	234	10.26%
	2003	13	110	123	10.57%
	2004	26	322	348	7.47%
	2005	12	127	139	8.63%
	2006	18	350	368	4.89%
	2007	11	145	156	7.05%
2008	15	431	446	3.36%	
2009	2	109	111	1.80%	
2010	8	334	342	2.34%	
2011	1	44	45	2.22%	
ST0004405 Total		194	2609	2803	6.92%

Table (a) (3 & 4). # of Tests by Station, % Fail by Station

Station ID	Model Year	Fail	Pass	Total	% Fail
ST0004480	1990	1	13	14	7.14%
	1991	8	37	45	17.78%
	1992	7	22	29	24.14%
	1993	6	41	47	12.77%
	1994	21	62	83	25.30%
	1995	18	75	93	19.35%
	1996	30	85	115	26.09%
	1997	47	147	194	24.23%
	1998	69	209	278	24.82%
	1999	73	228	301	24.25%
	2000	82	271	353	23.23%
	2001	95	301	396	23.99%
	2002	100	505	605	16.53%
	2003	65	352	417	15.59%
	2004	103	612	715	14.41%
	2005	42	364	406	10.34%
	2006	57	625	682	8.36%
	2007	27	371	398	6.78%
2008	51	654	705	7.23%	
2009	10	243	253	3.95%	
2010	11	596	607	1.81%	
2011	6	173	179	3.35%	
ST0004480 Total		929	5986	6915	13.43%
ST0004541	1990	3	8	11	27.27%
	1991	6	19	25	24.00%
	1992	5	26	31	16.13%
	1993	6	27	33	18.18%
	1994	5	51	56	8.93%
	1995	5	61	66	7.58%
	1996	8	78	86	9.30%
	1997	14	106	120	11.67%
	1998	24	143	167	14.37%
	1999	21	172	193	10.88%
	2000	20	176	196	10.20%
	2001	38	157	195	19.49%
	2002	52	490	542	9.59%
	2003	20	219	239	8.37%
	2004	44	574	618	7.12%
	2005	16	241	257	6.23%
	2006	24	604	628	3.82%
	2007	8	240	248	3.23%
2008	21	676	697	3.01%	
2009	5	153	158	3.16%	
2010	10	608	618	1.62%	
2011	3	74	77	3.90%	
ST0004541 Total		358	4903	5261	6.80%

Table (a) (3 & 4). # of Tests by Station, % Fail by Station

Station ID	Model Year	Fail	Pass	Total	% Fail
ST0004592	1990	12	21	33	36.36%
	1991	6	31	37	16.22%
	1992	18	37	55	32.73%
	1993	6	61	67	8.96%
	1994	15	82	97	15.46%
	1995	16	120	136	11.76%
	1996	14	117	131	10.69%
	1997	30	188	218	13.76%
	1998	36	220	256	14.06%
	1999	30	247	277	10.83%
	2000	55	278	333	16.52%
	2001	44	318	362	12.15%
	2002	60	642	702	8.55%
	2003	42	357	399	10.53%
	2004	55	678	733	7.50%
	2005	42	351	393	10.69%
	2006	39	661	700	5.57%
	2007	17	319	336	5.06%
2008	33	648	681	4.85%	
2009	7	201	208	3.37%	
2010	16	626	642	2.49%	
2011	32	616	648	4.94%	
ST0004592 Total		625	6819	7444	8.40%
ST0004615	1990	2	2	4	50.00%
	1991	1	3	4	25.00%
	1992	3	9	12	25.00%
	1993	2	15	17	11.76%
	1994	3	19	22	13.64%
	1995	3	27	30	10.00%
	1996	3	23	26	11.54%
	1997	15	43	58	25.86%
	1998	12	59	71	16.90%
	1999	15	67	82	18.29%
	2000	14	65	79	17.72%
	2001	22	72	94	23.40%
	2002	28	212	240	11.67%
	2003	14	99	113	12.39%
	2004	24	256	280	8.57%
	2005	9	111	120	7.50%
	2006	18	319	337	5.34%
	2007	6	132	138	4.35%
2008	13	352	365	3.56%	
2009	2	93	95	2.11%	
2010	8	320	328	2.44%	
2011	2	19	21	9.52%	
ST0004615 Total		219	2317	2536	8.64%

Table (a) (3 & 4). # of Tests by Station, % Fail by Station

Station ID	Model Year	Fail	Pass	Total	% Fail
ST0004628	1990	2	9	11	18.18%
	1991	5	10	15	33.33%
	1992	6	18	24	25.00%
	1993		24	24	0.00%
	1994	10	32	42	23.81%
	1995	3	43	46	6.52%
	1996	10	50	60	16.67%
	1997	21	84	105	20.00%
	1998	16	122	138	11.59%
	1999	16	144	160	10.00%
	2000	29	141	170	17.06%
	2001	37	165	202	18.32%
	2002	50	364	414	12.08%
	2003	28	220	248	11.29%
	2004	68	545	613	11.09%
	2005	24	230	254	9.45%
	2006	40	620	660	6.06%
2007	12	286	298	4.03%	
2008	25	684	709	3.53%	
2009	5	177	182	2.75%	
2010	14	668	682	2.05%	
2011	21	256	277	7.58%	
ST0004628 Total		442	4892	5334	8.29%
ST0004696	1990	10	22	32	31.25%
	1991	4	15	19	21.05%
	1992	9	31	40	22.50%
	1993	5	30	35	14.29%
	1994	9	48	57	15.79%
	1995	13	60	73	17.81%
	1996	13	68	81	16.05%
	1997	30	113	143	20.98%
	1998	32	138	170	18.82%
	1999	44	198	242	18.18%
	2000	35	194	229	15.28%
	2001	45	191	236	19.07%
	2002	72	432	504	14.29%
	2003	43	266	309	13.92%
	2004	68	612	680	10.00%
	2005	29	303	332	8.73%
	2006	40	646	686	5.83%
2007	14	299	313	4.47%	
2008	15	752	767	1.96%	
2009	4	224	228	1.75%	
2010	20	696	716	2.79%	
2011	4	128	132	3.03%	
ST0004696 Total		558	5466	6024	9.26%

Table (a) (3 & 4). # of Tests by Station, % Fail by Station

Station ID	Model Year	Fail	Pass	Total	% Fail
ST0004710	1990		12	12	0.00%
	1991		9	9	0.00%
	1992	8	22	30	26.67%
	1993	4	24	28	14.29%
	1994	6	37	43	13.95%
	1995	10	52	62	16.13%
	1996	5	43	48	10.42%
	1997	6	64	70	8.57%
	1998	14	81	95	14.74%
	1999	9	87	96	9.38%
	2000	9	86	95	9.47%
	2001	14	105	119	11.76%
	2002	22	194	216	10.19%
	2003	9	77	86	10.47%
	2004	12	191	203	5.91%
	2005	8	96	104	7.69%
	2006	6	151	157	3.82%
2007	4	54	58	6.90%	
2008	7	135	142	4.93%	
2009		39	39	0.00%	
2010	3	106	109	2.75%	
2011		12	12	0.00%	
ST0004710 Total		156	1677	1833	8.51%
ST0004713	1990	8	21	29	27.59%
	1991	5	24	29	17.24%
	1992	13	30	43	30.23%
	1993	14	35	49	28.57%
	1994	14	54	68	20.59%
	1995	30	101	131	22.90%
	1996	29	93	122	23.77%
	1997	32	121	153	20.92%
	1998	34	162	196	17.35%
	1999	41	173	214	19.16%
	2000	61	199	260	23.46%
	2001	58	238	296	19.59%
	2002	56	327	383	14.62%
	2003	42	245	287	14.63%
	2004	60	406	466	12.88%
	2005	27	232	259	10.42%
	2006	36	386	422	8.53%
2007	16	242	258	6.20%	
2008	15	334	349	4.30%	
2009	4	118	122	3.28%	
2010	8	242	250	3.20%	
2011	2	74	76	2.63%	
ST0004713 Total		605	3857	4462	13.56%

Table (a) (3 & 4). # of Tests by Station, % Fail by Station					
Station ID	Model Year	Fail	Pass	Total	% Fail
ST0004722	1990	7	35	42	16.67%
	1991	19	51	70	27.14%
	1992	13	52	65	20.00%
	1993	15	77	92	16.30%
	1994	14	103	117	11.97%
	1995	33	153	186	17.74%
	1996	47	174	221	21.27%
	1997	47	233	280	16.79%
	1998	84	336	420	20.00%
	1999	65	387	452	14.38%
	2000	97	406	503	19.28%
	2001	103	409	512	20.12%
	2002	135	986	1121	12.04%
	2003	86	644	730	11.78%
	2004	132	1437	1569	8.41%
	2005	87	713	800	10.88%
	2006	100	1498	1598	6.26%
	2007	58	824	882	6.58%
2008	52	1920	1972	2.64%	
2009	14	522	536	2.61%	
2010	51	1723	1774	2.87%	
2011	63	672	735	8.57%	
ST0004722 Total		1322	13355	14677	9.01%
ST0004739	1990	6	19	25	24.00%
	1991	2	10	12	16.67%
	1992	6	23	29	20.69%
	1993	6	25	31	19.35%
	1994	9	45	54	16.67%
	1995	10	62	72	13.89%
	1996	9	86	95	9.47%
	1997	25	117	142	17.61%
	1998	30	157	187	16.04%
	1999	28	233	261	10.73%
	2000	19	214	233	8.15%
	2001	58	255	313	18.53%
	2002	64	537	601	10.65%
	2003	36	378	414	8.70%
	2004	63	750	813	7.75%
	2005	35	392	427	8.20%
	2006	41	698	739	5.55%
	2007	24	418	442	5.43%
2008	30	728	758	3.96%	
2009	12	195	207	5.80%	
2010	10	536	546	1.83%	
2011	9	211	220	4.09%	
ST0004739 Total		532	6089	6621	8.04%

Table (a) (3 & 4). # of Tests by Station, % Fail by Station

Station ID	Model Year	Fail	Pass	Total	% Fail
ST0004745	1990	5	8	13	38.46%
	1991	3	14	17	17.65%
	1992	4	20	24	16.67%
	1993	1	35	36	2.78%
	1994	2	56	58	3.45%
	1995	6	66	72	8.33%
	1996	10	59	69	14.49%
	1997	22	94	116	18.97%
	1998	15	117	132	11.36%
	1999	20	132	152	13.16%
	2000	37	124	161	22.98%
	2001	16	134	150	10.67%
	2002	39	363	402	9.70%
	2003	22	191	213	10.33%
	2004	36	381	417	8.63%
	2005	17	134	151	11.26%
	2006	25	351	376	6.65%
	2007	11	171	182	6.04%
	2008	19	372	391	4.86%
2009	4	73	77	5.19%	
2010	12	323	335	3.58%	
2011	9	71	80	11.25%	
ST0004745 Total		335	3289	3624	9.24%
ST0004750	1990	1	15	16	6.25%
	1991	5	13	18	27.78%
	1992	6	19	25	24.00%
	1993	9	30	39	23.08%
	1994	4	55	59	6.78%
	1995	8	68	76	10.53%
	1996	16	73	89	17.98%
	1997	22	86	108	20.37%
	1998	29	116	145	20.00%
	1999	45	153	198	22.73%
	2000	33	145	178	18.54%
	2001	34	193	227	14.98%
	2002	55	340	395	13.92%
	2003	34	210	244	13.93%
	2004	61	444	505	12.08%
	2005	24	212	236	10.17%
	2006	25	477	502	4.98%
	2007	15	219	234	6.41%
	2008	17	430	447	3.80%
2009	5	118	123	4.07%	
2010	11	411	422	2.61%	
2011		75	75	0.00%	
ST0004750 Total		459	3902	4361	10.53%

Table (a) (3 & 4). # of Tests by Station, % Fail by Station

Station ID	Model Year	Fail	Pass	Total	% Fail
ST0004764	1990	1	2	3	33.33%
	1991		3	3	0.00%
	1992		8	8	0.00%
	1993	3	6	9	33.33%
	1994		7	7	0.00%
	1995	1	13	14	7.14%
	1996	2	16	18	11.11%
	1997	3	31	34	8.82%
	1998	6	38	44	13.64%
	1999	5	43	48	10.42%
	2000	6	34	40	15.00%
	2001	10	46	56	17.86%
	2002	22	169	191	11.52%
	2003	5	61	66	7.58%
	2004	23	234	257	8.95%
	2005	11	82	93	11.83%
	2006	18	314	332	5.42%
2007	4	96	100	4.00%	
2008	11	312	323	3.41%	
2009	6	83	89	6.74%	
2010	15	418	433	3.46%	
2011	11	204	215	5.12%	
ST0004764 Total		163	2220	2383	6.84%
ST0004765	1990		7	7	0.00%
	1991	5	8	13	38.46%
	1992	1	9	10	10.00%
	1993	6	12	18	33.33%
	1994	3	18	21	14.29%
	1995	4	26	30	13.33%
	1996	14	54	68	20.59%
	1997	21	101	122	17.21%
	1998	27	96	123	21.95%
	1999	26	119	145	17.93%
	2000	35	108	143	24.48%
	2001	31	126	157	19.75%
	2002	46	256	302	15.23%
	2003	27	149	176	15.34%
	2004	40	317	357	11.20%
	2005	20	180	200	10.00%
	2006	23	309	332	6.93%
2007	17	204	221	7.69%	
2008	18	324	342	5.26%	
2009	11	103	114	9.65%	
2010	12	277	289	4.15%	
2011	4	48	52	7.69%	
ST0004765 Total		391	2851	3242	12.06%

Table (a) (3 & 4). # of Tests by Station, % Fail by Station

Station ID	Model Year	Fail	Pass	Total	% Fail
ST0004769	1990	3	16	19	15.79%
	1991	2	17	19	10.53%
	1992	4	24	28	14.29%
	1993	2	20	22	9.09%
	1994	4	47	51	7.84%
	1995	11	44	55	20.00%
	1996	2	42	44	4.55%
	1997	11	83	94	11.70%
	1998	16	86	102	15.69%
	1999	23	99	122	18.85%
	2000	17	85	102	16.67%
	2001	29	101	130	22.31%
	2002	34	240	274	12.41%
	2003	17	142	159	10.69%
	2004	39	325	364	10.71%
	2005	14	129	143	9.79%
	2006	13	333	346	3.76%
	2007	11	132	143	7.69%
2008	12	364	376	3.19%	
2009	5	72	77	6.49%	
2010	7	352	359	1.95%	
2011	3	59	62	4.84%	
ST0004769 Total		279	2812	3091	9.03%
ST0004788	1990	11	24	35	31.43%
	1991	11	30	41	26.83%
	1992	20	44	64	31.25%
	1993	15	56	71	21.13%
	1994	25	104	129	19.38%
	1995	35	132	167	20.96%
	1996	39	143	182	21.43%
	1997	78	222	300	26.00%
	1998	82	249	331	24.77%
	1999	107	266	373	28.69%
	2000	116	306	422	27.49%
	2001	135	366	501	26.95%
	2002	156	485	641	24.34%
	2003	109	441	550	19.82%
	2004	100	514	614	16.29%
	2005	70	384	454	15.42%
	2006	46	451	497	9.26%
	2007	32	256	288	11.11%
2008	30	391	421	7.13%	
2009	8	138	146	5.48%	
2010	6	241	247	2.43%	
2011	5	101	106	4.72%	
ST0004788 Total		1236	5344	6580	18.78%

Table (a) (3 & 4). # of Tests by Station, % Fail by Station

Station ID	Model Year	Fail	Pass	Total	% Fail
ST0004817	1990	1	10	11	9.09%
	1991	3	15	18	16.67%
	1992	4	10	14	28.57%
	1993	5	16	21	23.81%
	1994	4	33	37	10.81%
	1995	3	31	34	8.82%
	1996	5	39	44	11.36%
	1997	13	77	90	14.44%
	1998	16	90	106	15.09%
	1999	17	95	112	15.18%
	2000	23	88	111	20.72%
	2001	39	119	158	24.68%
	2002	39	257	296	13.18%
	2003	25	141	166	15.06%
	2004	33	303	336	9.82%
	2005	15	127	142	10.56%
	2006	21	315	336	6.25%
	2007	9	111	120	7.50%
2008	7	289	296	2.36%	
2009	3	69	72	4.17%	
2010	2	285	287	0.70%	
2011	1	20	21	4.76%	
ST0004817 Total		288	2540	2828	10.18%
ST0004828	1990	4	12	16	25.00%
	1991	13	29	42	30.95%
	1992	14	38	52	26.92%
	1993	12	50	62	19.35%
	1994	16	80	96	16.67%
	1995	34	116	150	22.67%
	1996	30	131	161	18.63%
	1997	70	176	246	28.46%
	1998	75	227	302	24.83%
	1999	96	300	396	24.24%
	2000	112	308	420	26.67%
	2001	124	292	416	29.81%
	2002	141	554	695	20.29%
	2003	108	367	475	22.74%
	2004	116	639	755	15.36%
	2005	64	356	420	15.24%
	2006	55	556	611	9.00%
	2007	26	336	362	7.18%
2008	31	560	591	5.25%	
2009	6	174	180	3.33%	
2010	9	446	455	1.98%	
2011		47	47	0.00%	
ST0004828 Total		1156	5794	6950	16.63%

Table (a) (3 & 4). # of Tests by Station, % Fail by Station

Station ID	Model Year	Fail	Pass	Total	% Fail
ST0004837	1990	4	14	18	22.22%
	1991	7	18	25	28.00%
	1992	2	13	15	13.33%
	1993	9	25	34	26.47%
	1994	8	35	43	18.60%
	1995	10	46	56	17.86%
	1996	13	55	68	19.12%
	1997	16	85	101	15.84%
	1998	18	117	135	13.33%
	1999	22	120	142	15.49%
	2000	37	104	141	26.24%
	2001	33	113	146	22.60%
	2002	36	252	288	12.50%
	2003	20	143	163	12.27%
	2004	32	275	307	10.42%
	2005	17	126	143	11.89%
	2006	12	226	238	5.04%
2007	3	125	128	2.34%	
2008	9	230	239	3.77%	
2009	4	78	82	4.88%	
2010	2	192	194	1.03%	
2011	2	33	35	5.71%	
ST0004837 Total		316	2425	2741	11.53%
ST0004839	1990	2	18	20	10.00%
	1991	8	25	33	24.24%
	1992	5	26	31	16.13%
	1993	9	32	41	21.95%
	1994	27	59	86	31.40%
	1995	18	91	109	16.51%
	1996	22	84	106	20.75%
	1997	23	137	160	14.38%
	1998	30	153	183	16.39%
	1999	37	199	236	15.68%
	2000	31	209	240	12.92%
	2001	48	210	258	18.60%
	2002	55	425	480	11.46%
	2003	40	293	333	12.01%
	2004	60	594	654	9.17%
	2005	43	331	374	11.50%
	2006	53	655	708	7.49%
2007	34	348	382	8.90%	
2008	35	737	772	4.53%	
2009	14	257	271	5.17%	
2010	52	741	793	6.56%	
2011	36	285	321	11.21%	
ST0004839 Total		682	5909	6591	10.35%

Table (a) (3 & 4). # of Tests by Station, % Fail by Station

Station ID	Model Year	Fail	Pass	Total	% Fail
ST0004843	1990	1	9	10	10.00%
	1991	1	12	13	7.69%
	1992	3	14	17	17.65%
	1993	4	39	43	9.30%
	1994	7	30	37	18.92%
	1995	13	78	91	14.29%
	1996	8	63	71	11.27%
	1997	25	107	132	18.94%
	1998	23	127	150	15.33%
	1999	36	163	199	18.09%
	2000	35	134	169	20.71%
	2001	33	165	198	16.67%
	2002	56	391	447	12.53%
	2003	41	251	292	14.04%
	2004	72	563	635	11.34%
	2005	28	272	300	9.33%
	2006	38	618	656	5.79%
	2007	18	283	301	5.98%
2008	31	647	678	4.57%	
2009	10	135	145	6.90%	
2010	14	635	649	2.16%	
2011	5	120	125	4.00%	
ST0004843 Total		502	4856	5358	9.37%
ST0004847	1990	2	11	13	15.38%
	1991	1	11	12	8.33%
	1992	1	18	19	5.26%
	1993	5	30	35	14.29%
	1994	3	47	50	6.00%
	1995	9	56	65	13.85%
	1996	11	52	63	17.46%
	1997	11	102	113	9.73%
	1998	25	125	150	16.67%
	1999	20	150	170	11.76%
	2000	25	140	165	15.15%
	2001	29	171	200	14.50%
	2002	69	408	477	14.47%
	2003	31	208	239	12.97%
	2004	60	534	594	10.10%
	2005	23	197	220	10.45%
	2006	34	546	580	5.86%
	2007	10	213	223	4.48%
2008	13	553	566	2.30%	
2009	5	114	119	4.20%	
2010	9	434	443	2.03%	
2011	3	59	62	4.84%	
ST0004847 Total		399	4179	4578	8.72%

Table (a) (3 & 4). # of Tests by Station, % Fail by Station

Station ID	Model Year	Fail	Pass	Total	% Fail
ST0004854	1990	15	29	44	34.09%
	1991	7	39	46	15.22%
	1992	8	41	49	16.33%
	1993	14	69	83	16.87%
	1994	13	99	112	11.61%
	1995	23	129	152	15.13%
	1996	32	164	196	16.33%
	1997	67	250	317	21.14%
	1998	63	334	397	15.87%
	1999	75	359	434	17.28%
	2000	79	346	425	18.59%
	2001	111	363	474	23.42%
	2002	144	830	974	14.78%
	2003	97	460	557	17.41%
	2004	122	1106	1228	9.93%
	2005	62	561	623	9.95%
	2006	76	1166	1242	6.12%
	2007	34	470	504	6.75%
	2008	49	1187	1236	3.96%
2009	13	273	286	4.55%	
2010	18	1062	1080	1.67%	
2011	1	113	114	0.88%	
ST0004854 Total		1123	9450	10573	10.62%
ST0004866	1990	6	12	18	33.33%
	1991	7	19	26	26.92%
	1992	6	26	32	18.75%
	1993	11	34	45	24.44%
	1994	6	62	68	8.82%
	1995	22	67	89	24.72%
	1996	31	78	109	28.44%
	1997	42	96	138	30.43%
	1998	47	126	173	27.17%
	1999	57	149	206	27.67%
	2000	74	191	265	27.92%
	2001	71	173	244	29.10%
	2002	92	299	391	23.53%
	2003	58	233	291	19.93%
	2004	48	311	359	13.37%
	2005	41	183	224	18.30%
	2006	32	264	296	10.81%
	2007	19	172	191	9.95%
	2008	16	298	314	5.10%
2009	10	86	96	10.42%	
2010	7	217	224	3.13%	
2011		35	35	0.00%	
ST0004866 Total		703	3131	3834	18.34%

Table (a) (3 & 4). # of Tests by Station, % Fail by Station					
Station ID	Model Year	Fail	Pass	Total	% Fail
ST0004867	1990	17	40	57	29.82%
	1991	20	43	63	31.75%
	1992	20	60	80	25.00%
	1993	25	93	118	21.19%
	1994	44	127	171	25.73%
	1995	46	158	204	22.55%
	1996	63	199	262	24.05%
	1997	84	309	393	21.37%
	1998	110	360	470	23.40%
	1999	113	426	539	20.96%
	2000	122	452	574	21.25%
	2001	143	463	606	23.60%
	2002	162	817	979	16.55%
	2003	104	508	612	16.99%
	2004	138	1015	1153	11.97%
	2005	61	508	569	10.72%
	2006	82	944	1026	7.99%
	2007	37	481	518	7.14%
	2008	39	1015	1054	3.70%
2009	10	281	291	3.44%	
2010	16	814	830	1.93%	
2011	9	173	182	4.95%	
ST0004867 Total		1465	9286	10751	13.63%
ST0004870	1990	7	5	12	58.33%
	1991	3	10	13	23.08%
	1992		6	6	0.00%
	1993	2	12	14	14.29%
	1994	4	22	26	15.38%
	1995	3	23	26	11.54%
	1996	9	16	25	36.00%
	1997	4	37	41	9.76%
	1998	3	41	44	6.82%
	1999	11	60	71	15.49%
	2000	10	49	59	16.95%
	2001	10	61	71	14.08%
	2002	23	173	196	11.73%
	2003	7	87	94	7.45%
	2004	18	236	254	7.09%
	2005	11	113	124	8.87%
	2006	14	282	296	4.73%
	2007	3	114	117	2.56%
	2008	11	341	352	3.13%
2009	3	57	60	5.00%	
2010	5	304	309	1.62%	
2011	1	31	32	3.13%	
ST0004870 Total		162	2080	2242	7.23%

Table (a) (3 & 4). # of Tests by Station, % Fail by Station

Station ID	Model Year	Fail	Pass	Total	% Fail
ST0004875	1990		10	10	0.00%
	1991	4	16	20	20.00%
	1992	1	12	13	7.69%
	1993	1	16	17	5.88%
	1994	4	24	28	14.29%
	1995	6	31	37	16.22%
	1996	4	35	39	10.26%
	1997	8	51	59	13.56%
	1998	17	57	74	22.97%
	1999	9	54	63	14.29%
	2000	11	69	80	13.75%
	2001	18	64	82	21.95%
	2002	28	112	140	20.00%
	2003	5	62	67	7.46%
	2004	14	162	176	7.95%
	2005	15	73	88	17.05%
	2006	11	139	150	7.33%
	2007	6	89	95	6.32%
2008	8	188	196	4.08%	
2009	2	59	61	3.28%	
2010	7	134	141	4.96%	
2011	6	79	85	7.06%	
ST0004875 Total		185	1536	1721	10.75%
ST0004888	1990	1	7	8	12.50%
	1991	5	9	14	35.71%
	1992	8	16	24	33.33%
	1993	3	23	26	11.54%
	1994	12	40	52	23.08%
	1995	11	44	55	20.00%
	1996	8	50	58	13.79%
	1997	24	81	105	22.86%
	1998	26	90	116	22.41%
	1999	29	108	137	21.17%
	2000	27	112	139	19.42%
	2001	42	129	171	24.56%
	2002	40	255	295	13.56%
	2003	33	160	193	17.10%
	2004	39	285	324	12.04%
	2005	22	138	160	13.75%
	2006	29	253	282	10.28%
	2007	11	97	108	10.19%
2008	15	234	249	6.02%	
2009	3	49	52	5.77%	
2010	4	222	226	1.77%	
2011		26	26	0.00%	
ST0004888 Total		392	2428	2820	13.90%

Table (a) (3 & 4). # of Tests by Station, % Fail by Station

Station ID	Model Year	Fail	Pass	Total	% Fail
ST0005000	1990	1	1	2	50.00%
	1991	1	6	7	14.29%
	1992		4	4	0.00%
	1993	1	4	5	20.00%
	1994	1	14	15	6.67%
	1995	4	15	19	21.05%
	1996	4	13	17	23.53%
	1997	8	26	34	23.53%
	1998	9	42	51	17.65%
	1999	13	59	72	18.06%
	2000	15	63	78	19.23%
	2001	17	88	105	16.19%
	2002	24	110	134	17.91%
	2003	18	81	99	18.18%
	2004	9	142	151	5.96%
	2005	9	108	117	7.69%
	2006	11	184	195	5.64%
2007	5	126	131	3.82%	
2008	9	209	218	4.13%	
2009	2	95	97	2.06%	
2010	2	184	186	1.08%	
2011	1	44	45	2.22%	
ST0005000 Total		164	1618	1782	9.20%
ST0005001	1990	3	11	14	21.43%
	1991	5	10	15	33.33%
	1992	2	7	9	22.22%
	1993	2	25	27	7.41%
	1994	1	30	31	3.23%
	1995	2	29	31	6.45%
	1996	2	29	31	6.45%
	1997	10	49	59	16.95%
	1998	7	43	50	14.00%
	1999	5	44	49	10.20%
	2000	7	65	72	9.72%
	2001	16	67	83	19.28%
	2002	21	149	170	12.35%
	2003	11	88	99	11.11%
	2004	18	171	189	9.52%
	2005	4	81	85	4.71%
	2006	10	163	173	5.78%
2007	2	83	85	2.35%	
2008	9	186	195	4.62%	
2009	1	44	45	2.22%	
2010	4	141	145	2.76%	
2011	1	35	36	2.78%	
ST0005001 Total		143	1550	1693	8.45%

Table (a) (3 & 4). # of Tests by Station, % Fail by Station

Station ID	Model Year	Fail	Pass	Total	% Fail
ST0005002	1990	2	1	3	66.67%
	1991	3	12	15	20.00%
	1992	10	14	24	41.67%
	1993	3	13	16	18.75%
	1994	5	32	37	13.51%
	1995	12	32	44	27.27%
	1996	7	6	13	53.85%
	1997	8	16	24	33.33%
	1998	10	23	33	30.30%
	1999	6	18	24	25.00%
	2000	4	24	28	14.29%
	2001	12	33	45	26.67%
	2002	15	47	62	24.19%
	2003	9	31	40	22.50%
	2004	5	52	57	8.77%
	2005	4	40	44	9.09%
	2006		47	47	0.00%
	2007	1	26	27	3.70%
	2008	5	56	61	8.20%
2009	1	23	24	4.17%	
2010	5	55	60	8.33%	
2011		1	1	0.00%	
ST0005002 Total		127	602	729	17.42%
ST0005003	1990		1	1	0.00%
	1991	1	3	4	25.00%
	1992	1	3	4	25.00%
	1993	2	4	6	33.33%
	1994		4	4	0.00%
	1995	2	9	11	18.18%
	1996	3	11	14	21.43%
	1997	1	8	9	11.11%
	1998	4	12	16	25.00%
	1999	3	21	24	12.50%
	2000	7	22	29	24.14%
	2001	5	32	37	13.51%
	2002	3	60	63	4.76%
	2003	7	63	70	10.00%
	2004	9	138	147	6.12%
	2005	15	160	175	8.57%
	2006	21	296	317	6.62%
	2007	17	370	387	4.39%
	2008	43	559	602	7.14%
2009	30	439	469	6.40%	
2010	45	869	914	4.92%	
2011	108	2158	2266	4.77%	
ST0005003 Total		327	5242	5569	5.87%

Table (a) (3 & 4). # of Tests by Station, % Fail by Station

Station ID	Model Year	Fail	Pass	Total	% Fail
ST0005004	1990	1	5	6	16.67%
	1991		3	3	0.00%
	1992		10	10	0.00%
	1993	1	10	11	9.09%
	1994	2	19	21	9.52%
	1995	6	24	30	20.00%
	1996	7	37	44	15.91%
	1997	15	50	65	23.08%
	1998	11	74	85	12.94%
	1999	13	85	98	13.27%
	2000	18	84	102	17.65%
	2001	19	103	122	15.57%
	2002	31	230	261	11.88%
	2003	13	121	134	9.70%
	2004	18	390	408	4.41%
	2005	15	150	165	9.09%
	2006	28	430	458	6.11%
	2007	6	195	201	2.99%
	2008	19	575	594	3.20%
2009	9	146	155	5.81%	
2010	8	495	503	1.59%	
2011	1	28	29	3.45%	
ST0005004 Total		241	3264	3505	6.88%
ST0005005	1990		1	1	0.00%
	1992	1		1	100.00%
	1995	2	6	8	25.00%
	1996		3	3	0.00%
	1997		5	5	0.00%
	1998	1	5	6	16.67%
	1999	1	6	7	14.29%
	2000	2	7	9	22.22%
	2001	1	7	8	12.50%
	2002	1	6	7	14.29%
	2003	4	12	16	25.00%
	2004	2	11	13	15.38%
	2005	1	10	11	9.09%
	2006	3	15	18	16.67%
	2007	3	6	9	33.33%
	2008	1	15	16	6.25%
	2009		4	4	0.00%
2010		17	17	0.00%	
2011	1	9	10	10.00%	
ST0005005 Total		24	145	169	14.20%

Table (a) (3 & 4). # of Tests by Station, % Fail by Station

Station ID	Model Year	Fail	Pass	Total	% Fail
ST0005006	1990	7	15	22	31.82%
	1991	3	8	11	27.27%
	1992	4	14	18	22.22%
	1993	10	43	53	18.87%
	1994	9	60	69	13.04%
	1995	3	62	65	4.62%
	1996	13	82	95	13.68%
	1997	19	128	147	12.93%
	1998	27	172	199	13.57%
	1999	36	247	283	12.72%
	2000	38	208	246	15.45%
	2001	60	254	314	19.11%
	2002	85	665	750	11.33%
	2003	55	388	443	12.42%
	2004	62	863	925	6.70%
	2005	44	444	488	9.02%
	2006	52	1019	1071	4.86%
	2007	29	445	474	6.12%
2008	30	1176	1206	2.49%	
2009	6	275	281	2.14%	
2010	15	959	974	1.54%	
2011	8	122	130	6.15%	
ST0005006 Total		615	7649	8264	7.44%
ST0005007	1990		6	6	0.00%
	1991		4	4	0.00%
	1992		3	3	0.00%
	1993		10	10	0.00%
	1994		20	20	0.00%
	1995	3	25	28	10.71%
	1996	6	25	31	19.35%
	1997	1	41	42	2.38%
	1998	6	54	60	10.00%
	1999	10	87	97	10.31%
	2000	13	85	98	13.27%
	2001	10	84	94	10.64%
	2002	16	139	155	10.32%
	2003	7	100	107	6.54%
	2004	14	145	159	8.81%
	2005	6	72	78	7.69%
	2006	12	156	168	7.14%
	2007	1	87	88	1.14%
2008	5	177	182	2.75%	
2009	2	44	46	4.35%	
2010	5	162	167	2.99%	
2011		13	13	0.00%	
ST0005007 Total		117	1539	1656	7.07%

Table (a) (3 & 4). # of Tests by Station, % Fail by Station

Station ID	Model Year	Fail	Pass	Total	% Fail
ST0005008	1990	4	13	17	23.53%
	1991	3	11	14	21.43%
	1992	1	10	11	9.09%
	1993	3	17	20	15.00%
	1994	3	28	31	9.68%
	1995	7	27	34	20.59%
	1996	5	25	30	16.67%
	1997	9	37	46	19.57%
	1998	9	86	95	9.47%
	1999	15	64	79	18.99%
	2000	6	64	70	8.57%
	2001	17	92	109	15.60%
	2002	32	241	273	11.72%
	2003	10	89	99	10.10%
	2004	23	283	306	7.52%
	2005	9	104	113	7.96%
	2006	13	290	303	4.29%
	2007	12	124	136	8.82%
2008	13	362	375	3.47%	
2009	7	81	88	7.95%	
2010	23	412	435	5.29%	
2011	18	182	200	9.00%	
ST0005008 Total		242	2642	2884	8.39%
ST0005009	1990	1	7	8	12.50%
	1991	1	9	10	10.00%
	1992		8	8	0.00%
	1993		12	12	0.00%
	1994	2	22	24	8.33%
	1995	5	39	44	11.36%
	1996	4	39	43	9.30%
	1997	6	66	72	8.33%
	1998	5	68	73	6.85%
	1999	9	82	91	9.89%
	2000	7	76	83	8.43%
	2001	21	62	83	25.30%
	2002	25	133	158	15.82%
	2003	6	83	89	6.74%
	2004	22	218	240	9.17%
	2005	11	69	80	13.75%
	2006	5	171	176	2.84%
	2007	4	86	90	4.44%
2008	4	186	190	2.11%	
2009		33	33	0.00%	
2010	2	153	155	1.29%	
2011		16	16	0.00%	
ST0005009 Total		140	1638	1778	7.87%

Table (a) (3 & 4). # of Tests by Station, % Fail by Station					
Station ID	Model Year	Fail	Pass	Total	% Fail
ST0005010	1990		8	8	0.00%
	1991		4	4	0.00%
	1992	1	10	11	9.09%
	1993		15	15	0.00%
	1994	2	23	25	8.00%
	1995	1	27	28	3.57%
	1996	5	24	29	17.24%
	1997	5	51	56	8.93%
	1998	4	68	72	5.56%
	1999	11	82	93	11.83%
	2000	11	64	75	14.67%
	2001	18	82	100	18.00%
	2002	31	195	226	13.72%
	2003	16	97	113	14.16%
	2004	20	208	228	8.77%
	2005	11	104	115	9.57%
	2006	20	207	227	8.81%
	2007	5	91	96	5.21%
	2008	7	230	237	2.95%
2009	1	41	42	2.38%	
2010	4	231	235	1.70%	
2011		11	11	0.00%	
ST0005010 Total		173	1873	2046	8.46%
ST0005011	1990	7	2	9	77.78%
	1991	1	6	7	14.29%
	1992	2	8	10	20.00%
	1993	3	9	12	25.00%
	1994	3	15	18	16.67%
	1995	11	22	33	33.33%
	1996	6	9	15	40.00%
	1997	9	35	44	20.45%
	1998	7	32	39	17.95%
	1999	7	33	40	17.50%
	2000	15	59	74	20.27%
	2001	16	70	86	18.60%
	2002	21	70	91	23.08%
	2003	6	53	59	10.17%
	2004	7	107	114	6.14%
	2005	5	47	52	9.62%
	2006	7	58	65	10.77%
	2007	8	44	52	15.38%
	2008	5	99	104	4.81%
2009	2	20	22	9.09%	
2010	1	76	77	1.30%	
2011		15	15	0.00%	
ST0005011 Total		149	889	1038	14.35%

Table (a) (3 & 4). # of Tests by Station, % Fail by Station					
Station ID	Model Year	Fail	Pass	Total	% Fail
ST0005012	1990	2	4	6	33.33%
	1991		4	4	0.00%
	1992	4	6	10	40.00%
	1993	2	12	14	14.29%
	1994		12	12	0.00%
	1995	1	15	16	6.25%
	1996	6	31	37	16.22%
	1997	9	29	38	23.68%
	1998	8	37	45	17.78%
	1999	7	38	45	15.56%
	2000	8	49	57	14.04%
	2001	13	49	62	20.97%
	2002	13	93	106	12.26%
	2003	11	59	70	15.71%
	2004	16	128	144	11.11%
	2005	10	65	75	13.33%
	2006	7	111	118	5.93%
	2007	2	45	47	4.26%
	2008	4	117	121	3.31%
2009		25	25	0.00%	
2010	8	110	118	6.78%	
2011		10	10	0.00%	
ST0005012 Total		131	1049	1180	11.10%
ST0005013	1990	2	8	10	20.00%
	1991	7	14	21	33.33%
	1992	3	16	19	15.79%
	1993	4	21	25	16.00%
	1994	11	25	36	30.56%
	1995	9	48	57	15.79%
	1996	15	44	59	25.42%
	1997	21	61	82	25.61%
	1998	22	97	119	18.49%
	1999	20	98	118	16.95%
	2000	30	119	149	20.13%
	2001	45	154	199	22.61%
	2002	54	283	337	16.02%
	2003	34	185	219	15.53%
	2004	46	399	445	10.34%
	2005	32	216	248	12.90%
	2006	26	411	437	5.95%
	2007	13	196	209	6.22%
	2008	16	422	438	3.65%
2009	6	120	126	4.76%	
2010	7	396	403	1.74%	
2011	2	43	45	4.44%	
ST0005013 Total		425	3376	3801	11.18%

Table (a) (3 & 4). # of Tests by Station, % Fail by Station

Station ID	Model Year	Fail	Pass	Total	% Fail
ST0005014	1990	2	14	16	12.50%
	1991	3	10	13	23.08%
	1992	3	10	13	23.08%
	1993	6	23	29	20.69%
	1994	4	25	29	13.79%
	1995	5	48	53	9.43%
	1996	7	51	58	12.07%
	1997	17	71	88	19.32%
	1998	16	71	87	18.39%
	1999	13	100	113	11.50%
	2000	13	102	115	11.30%
	2001	26	124	150	17.33%
	2002	34	271	305	11.15%
	2003	26	177	203	12.81%
	2004	39	400	439	8.88%
	2005	13	205	218	5.96%
	2006	16	359	375	4.27%
	2007	11	187	198	5.56%
	2008	14	460	474	2.95%
2009	9	158	167	5.39%	
2010	25	502	527	4.74%	
2011	18	183	201	8.96%	
ST0005014 Total		320	3551	3871	8.27%
ST0005015	1990		7	7	0.00%
	1991		6	6	0.00%
	1992		7	7	0.00%
	1993		10	10	0.00%
	1994	4	22	26	15.38%
	1995	2	25	27	7.41%
	1996	7	22	29	24.14%
	1997	7	33	40	17.50%
	1998	8	51	59	13.56%
	1999	10	78	88	11.36%
	2000	11	62	73	15.07%
	2001	13	72	85	15.29%
	2002	23	203	226	10.18%
	2003	11	95	106	10.38%
	2004	16	295	311	5.14%
	2005	9	116	125	7.20%
	2006	21	287	308	6.82%
	2007	8	112	120	6.67%
	2008	10	335	345	2.90%
2009	2	77	79	2.53%	
2010	6	431	437	1.37%	
2011		37	37	0.00%	
ST0005015 Total		168	2383	2551	6.59%

Table (a) (3 & 4). # of Tests by Station, % Fail by Station

Station ID	Model Year	Fail	Pass	Total	% Fail
ST0005016	1990	10	34	44	22.73%
	1991	5	36	41	12.20%
	1992	7	39	46	15.22%
	1993	15	73	88	17.05%
	1994	13	98	111	11.71%
	1995	23	134	157	14.65%
	1996	25	146	171	14.62%
	1997	38	217	255	14.90%
	1998	40	273	313	12.78%
	1999	39	337	376	10.37%
	2000	44	353	397	11.08%
	2001	70	446	516	13.57%
	2002	109	798	907	12.02%
	2003	56	471	527	10.63%
	2004	77	899	976	7.89%
	2005	32	378	410	7.80%
	2006	49	740	789	6.21%
	2007	10	258	268	3.73%
	2008	25	635	660	3.79%
2009	4	153	157	2.55%	
2010	7	581	588	1.19%	
2011		43	43	0.00%	
ST0005016 Total		698	7142	7840	8.90%
ST0005017	1990		5	5	0.00%
	1991	4	6	10	40.00%
	1992		8	8	0.00%
	1993	1	7	8	12.50%
	1994	1	19	20	5.00%
	1995	2	18	20	10.00%
	1996	1	26	27	3.70%
	1997	8	46	54	14.81%
	1998	11	69	80	13.75%
	1999	14	105	119	11.76%
	2000	10	72	82	12.20%
	2001	15	82	97	15.46%
	2002	28	288	316	8.86%
	2003	12	127	139	8.63%
	2004	28	395	423	6.62%
	2005	12	160	172	6.98%
	2006	24	437	461	5.21%
	2007	7	180	187	3.74%
	2008	11	480	491	2.24%
2009	5	125	130	3.85%	
2010	11	481	492	2.24%	
2011	4	87	91	4.40%	
ST0005017 Total		209	3223	3432	6.09%

Table (a) (3 & 4). # of Tests by Station, % Fail by Station

Station ID	Model Year	Fail	Pass	Total	% Fail
ST0005018	1990	2	9	11	18.18%
	1991	2	6	8	25.00%
	1992	1	14	15	6.67%
	1993	2	13	15	13.33%
	1994	4	18	22	18.18%
	1995	7	38	45	15.56%
	1996	5	40	45	11.11%
	1997	10	46	56	17.86%
	1998	12	73	85	14.12%
	1999	9	66	75	12.00%
	2000	20	68	88	22.73%
	2001	22	93	115	19.13%
	2002	31	232	263	11.79%
	2003	12	128	140	8.57%
	2004	21	271	292	7.19%
	2005	15	157	172	8.72%
	2006	20	323	343	5.83%
	2007	13	164	177	7.34%
2008	10	365	375	2.67%	
2009	8	107	115	6.96%	
2010	16	416	432	3.70%	
2011	5	56	61	8.20%	
ST0005018 Total		247	2703	2950	8.37%
ST0005019	1990	2	6	8	25.00%
	1991	1	3	4	25.00%
	1992		5	5	0.00%
	1993	2	8	10	20.00%
	1994	3	22	25	12.00%
	1995	3	23	26	11.54%
	1996	4	22	26	15.38%
	1997	10	45	55	18.18%
	1998	6	54	60	10.00%
	1999	11	75	86	12.79%
	2000	25	76	101	24.75%
	2001	26	73	99	26.26%
	2002	30	185	215	13.95%
	2003	17	114	131	12.98%
	2004	17	265	282	6.03%
	2005	12	131	143	8.39%
	2006	21	263	284	7.39%
	2007	11	142	153	7.19%
2008	12	297	309	3.88%	
2009	3	93	96	3.13%	
2010	3	301	304	0.99%	
2011	1	26	27	3.70%	
ST0005019 Total		220	2229	2449	8.98%

Table (a) (3 & 4). # of Tests by Station, % Fail by Station					
Station ID	Model Year	Fail	Pass	Total	% Fail
ST0005020	1990	1	1	2	50.00%
	1991		4	4	0.00%
	1992		1	1	0.00%
	1993	2	4	6	33.33%
	1994	2	14	16	12.50%
	1995	3	10	13	23.08%
	1996	2	13	15	13.33%
	1997	5	25	30	16.67%
	1998	8	28	36	22.22%
	1999	8	46	54	14.81%
	2000	3	36	39	7.69%
	2001	5	29	34	14.71%
	2002	15	105	120	12.50%
	2003	7	44	51	13.73%
	2004	14	113	127	11.02%
	2005	3	59	62	4.84%
	2006	3	123	126	2.38%
	2007	3	49	52	5.77%
	2008	7	145	152	4.61%
2009		34	34	0.00%	
2010	3	163	166	1.81%	
2011		7	7	0.00%	
ST0005020 Total		94	1053	1147	8.20%
ST0005021	1990	2	9	11	18.18%
	1991	3	6	9	33.33%
	1992	3	9	12	25.00%
	1993	2	18	20	10.00%
	1994	5	30	35	14.29%
	1995	6	31	37	16.22%
	1996	11	36	47	23.40%
	1997	14	48	62	22.58%
	1998	8	79	87	9.20%
	1999	15	79	94	15.96%
	2000	11	76	87	12.64%
	2001	18	85	103	17.48%
	2002	35	209	244	14.34%
	2003	15	97	112	13.39%
	2004	21	287	308	6.82%
	2005	13	132	145	8.97%
	2006	23	308	331	6.95%
	2007	16	132	148	10.81%
	2008	8	291	299	2.68%
2009	3	61	64	4.69%	
2010	1	282	283	0.35%	
2011		20	20	0.00%	
ST0005021 Total		233	2325	2558	9.11%

Table (a) (3 & 4). # of Tests by Station, % Fail by Station

Station ID	Model Year	Fail	Pass	Total	% Fail
ST0005022	1990	8	28	36	22.22%
	1991	10	20	30	33.33%
	1992	18	26	44	40.91%
	1993	8	49	57	14.04%
	1994	17	73	90	18.89%
	1995	22	99	121	18.18%
	1996	31	116	147	21.09%
	1997	50	142	192	26.04%
	1998	63	189	252	25.00%
	1999	59	214	273	21.61%
	2000	72	244	316	22.78%
	2001	104	308	412	25.24%
	2002	103	523	626	16.45%
	2003	81	310	391	20.72%
	2004	87	580	667	13.04%
	2005	58	327	385	15.06%
	2006	53	487	540	9.81%
	2007	33	281	314	10.51%
	2008	24	476	500	4.80%
2009	9	173	182	4.95%	
2010	15	392	407	3.69%	
2011	11	166	177	6.21%	
ST0005022 Total		936	5223	6159	15.20%
ST0005023	1990		4	4	0.00%
	1991	1	4	5	20.00%
	1992	2	8	10	20.00%
	1993	3	18	21	14.29%
	1994	3	21	24	12.50%
	1995	2	21	23	8.70%
	1996	6	24	30	20.00%
	1997	8	32	40	20.00%
	1998	5	52	57	8.77%
	1999	4	46	50	8.00%
	2000	7	50	57	12.28%
	2001	12	61	73	16.44%
	2002	15	210	225	6.67%
	2003	5	73	78	6.41%
	2004	20	239	259	7.72%
	2005	6	73	79	7.59%
	2006	10	237	247	4.05%
	2007	2	90	92	2.17%
	2008	10	260	270	3.70%
2009	1	45	46	2.17%	
2010	10	277	287	3.48%	
2011	12	89	101	11.88%	
ST0005023 Total		144	1934	2078	6.93%

Table (a) (3 & 4). # of Tests by Station, % Fail by Station

Station ID	Model Year	Fail	Pass	Total	% Fail
ST0005024	1990		1	1	0.00%
	1991		1	1	0.00%
	1992	1	1	2	50.00%
	1993		4	4	0.00%
	1994		4	4	0.00%
	1995	1	6	7	14.29%
	1996		6	6	0.00%
	1997	1	4	5	20.00%
	1998	3	12	15	20.00%
	1999		20	20	0.00%
	2000	1	6	7	14.29%
	2001	4	19	23	17.39%
	2002	7	29	36	19.44%
	2003	1	18	19	5.26%
	2004	1	50	51	1.96%
	2005	1	18	19	5.26%
	2006	5	41	46	10.87%
	2007		22	22	0.00%
2008	2	42	44	4.55%	
2009	1	10	11	9.09%	
2010		39	39	0.00%	
2011		3	3	0.00%	
ST0005024 Total		29	356	385	7.53%
Grand Total		112006	954732	1066738	10.50%

Table (b) (1) & (2)(i,ii, & v). Quality Assurance 2014			
	Beginning of Year	Left Program	Added to Program
No. of Inspection stations/lanes operating throughout 2014	225	7	4
Receiving overt performance audits in 2014	225		
Not Receiving overt performance audits in 2014	0		
That have been shut down as a result of overt performance audits	0		

Table (b) (2) (v). Results of Equipment Audits*	
Parameter	2014 Result
Total Equipment Audits**	447
Total Stations that Failed Equipment Audit ***	130
Percentage of stations that failed an equipment (gas) audit	29.08%
Number of stations totally shut down as a result of a failed equipment (gas) audit	0
Percentage of stations shut down as a result of failed equipment (gas) audit	0.00%

* Every time an analyzer gas bench is changed, it is audited and is counted as an initial audit

** Initial gas audits only, not reinspections of failed audits

*** Failures of initial gas audits only

Table (b)(2)(iii, iv) & (3,8,9). Quality Assurance						
No of Inspection stations/lanes operating throughout 2014	All Test Types (OBD, ASM, TSI)	OBD Tests	ASM Tests	TSI Tests	LMD	MSA
Receiving Covert Audits	775	269	231	218	54	3
Not Receiving Covert Audits	8	3	6	7	171	222
Conducted with vehicle set to fail		60	0	0		
Conducted with vehicle set to fail any combination of two or more types	0	0	0	0		
Resulting in a False Pass	n/a	0	n/a	n/a		
Resulting in a False Pass for any combination of two or more test types	0	0	0	0		
Total number of Covert vehicles available for undercover audits in 2014	6					
Total number of Covert auditors available for undercover audits in 2014	3					
Total # of Video Surveillance Audits	1,529	Not Available	Not Available	Not Available		

Table (b) (4)(i & ii). Quality Assurance		
	Stations	Inspectors
Suspended as a result of covert audits	7	1
Suspended for other reasons	140	42

Table (b) (5). Quality Assurance	
Certified Testing Inspectors as of 03/13/2015	1,449
The number of inspectors that were certified and eligible to test from Jan 1, 2014 to March 13, 2015	

Table (d) (1)(v). # of time extensions and exemptions granted to motorists	
Time Extension and Other Exemptions	1,992

Table (d) (3)(i). # and % of subject vehicles that were tested by the initial deadline*		
Deadline	# of Vehicles	% of Vehicles
On Due date	27,034	3.17%
Tested Early	493,045	57.89%
1-30 days late	90,830	10.67%
31-60 days late	29,585	3.47%
61-90 days late	17,457	2.05%
91-120 days late	13,607	1.60%
> 120 days late	180,642	21.21%

* Figures based on 'Noticed' vehicles/tested volume of 851,662

Table (c) (1,2,3 & 4). Quality Control

Station #	Station Name	Lane number	Initial Gas Audits	Initial Gas Audit Fails	Comments
FL0001001	City of Bristol DPW	1	0	0	
FL0001002	Aquarion Water Company	1	0	0	
FL0001003	Regional Water Authority	1	0	0	
FL0001004	at-t	1	0	0	
FL0001005	Stamford Police Garage	1	0	0	
FL0001006	Hunter Ambulance Service	1	0	0	
FL0001007	New Haven Police	1	0	0	
FL0001008	Cablevision Systems Corp	1	0	0	
FL0001009	Cablevision Systems Corp	1	0	0	
FL0001010	Town of Trumbull	1	0	0	
FL0001011	University of Hartford	1	0	0	
FL0001012	Town of Guilford	1	0	0	
FL0001013	Southern CT Gas Company	1	0	0	
FL0001014	State of Connecticut	1	0	0	
FL0001015	State of Connecticut	1	0	0	
FL0001016	State of Connecticut	1	0	0	
FL0001017	City of Waterbury	1	0	0	
FL0001018	CNG Corp	1	0	0	
FL0001019	SBC SNET	1	0	0	
FL0001020	SBC SNET	1	0	0	
FL0001021	SNET	1	0	0	
FL0001022	SBC SNET	1	0	0	
FL0001023	SBC SNET	1	0	0	
FL0001024	SBC SNET	1	0	0	
FL0001025	SBC SNET	1	0	0	
FL0001026	SBC SNET	1	0	0	
FL0001027	SBC SNET	1	0	0	
FL0001028	SBC SNET	1	0	0	
FL0001029	SBC SNET	1	0	0	
FL0001030	SBC SNET	1	0	0	
FL0001031	SBC SNET	1	0	0	
FL0001032	SBC SNET	1	0	0	
ST0000014	Gary Rome Kia	1	2	0	
ST0000020	Cargill Chevrolet Co Inc	1	2	1	
ST0000023	Roberts Chrysler-Dodge	1	2	1	
ST0000034	Bob Valenti Chevrolet - Olds	1	2	0	
ST0000036	Hoffman Auto Group	1	2	0	
ST0000065	Stevens Ford Linc-Merc Inc	1	2	0	
ST0000107	King Olds-Cadillac-GMC	1	2	1	
ST0000112	Brustolon Buick-Pont-GMC	1	2	0	
ST0000120	Girard Ford	1	2	0	
ST0000125	Candlewood Valley Motors	1	2	0	
ST0000132	Middletown Toyota Inc	1	2	0	
ST0000171	Oneills Chevrolet Buick Inc	1	2	0	
ST0000193	M J Sullivan Automotive Corne	1	2	1	
ST0000229	Hartford Toyota Superstore	1	2	1	

Table (c) (1,2,3 & 4). Quality Control

Station #	Station Name	Lane number	Initial Gas Audits	Initial Gas Audit Fails	Comments
ST0000326	Midas of Bloomfield	1	2	1	
ST0000328	Automotive Plus	1	2	0	
ST0000329	Firestone Complete Auto Care	1	2	1	
ST0000359	Laurel Automotive	1	2	0	
ST0000373	Tire King LLC	1	3	2	
ST0000375	Advanced Auto Body	1	2	1	
ST0000386	Hamelin and Sons Inc	1	2	1	
ST0000412	Arnolds Garage	1	2	1	
ST0000434	Midas Muffler Inc	1	2	0	
ST0000469	Lees Auto Center Inc	1	2	1	
ST0000493	Midas of Farmington	1	2	0	
ST0000516	Hallmark Tire Co Inc	1	2	0	
ST0000520	Farmington Motor Sports Inc	1	2	1	
ST0000525	Firestone Complete Auto Care	1	2	0	
ST0000549	Morande Ford Inc	1	1	0	Name change 01/29/2014 became Tasca Ford, See station ST0005023
ST0000557	Kensington Auto Service LTD	1	2	1	
ST0000581	J and M Motor Sports	1	2	1	
ST0000616	Firestone Complete Auto Care	1	2	0	
ST0000648	Bolton Motors Inc	1	2	1	
ST0000697	Firestone Complete Auto Care	1	2	2	
ST0000725	Story Bros Inc	1	2	1	
ST0000776	Anthony's Service Station Inc	1	2	1	
ST0000790	Farm Car Care Center Inc	1	2	0	
ST0000809	Moore's Automotive	1	2	0	
ST0000963	Firestone Complete Auto Care	1	2	2	
ST0000969	Meineke Car Center	1	2	0	
ST0000972	Mad Hatter Auto Repair	1	2	1	
ST0000986	Suburban Tire and Auto Service	1	3	3	
ST0000994	Tolland Citgo	1	2	0	
ST0001010	Small Town Auto Repair	1	2	1	
ST0001056	Scatas Auto and Truck Repair	1	2	1	
ST0001095	Prospect Foreign Car Center I	1	2	0	
ST0001193	Herbs Auto Electric Inc	1	2	0	
ST0001216	Wethersfield Automotive LLC	1	2	0	
ST0001235	Valvoline Instant Oil Change	1	2	2	
ST0001253	Midas of West Hartford	1	2	0	
ST0001264	Mikes Auto Service	1	2	1	
ST0001267	Mirabelli Automotive LLC	1	2	0	

Table (c) (1,2,3 & 4). Quality Control

Station #	Station Name	Lane number	Initial Gas Audits	Initial Gas Audit Fails	Comments
ST0001270	R and M Auto Service LLC	1	1	0	Left program 5/30/2014
ST0001284	Modern Tire and Auto Service	1	2	1	
ST0001294	Modern Tire and Auto Service	1	2	1	
ST0001297	Aguas Buenas Auto SLS and	1	2	0	
ST0001299	B and S Automotive Inc	1	2	1	
ST0001363	Midas	1	2	0	
ST0001371	Coxs Service Station	1	2	0	
ST0001401	Nutmeg Auto Service Inc	1	2	2	
ST0001423	Midas of Hartford	1	2	1	
ST0001511	T and B Motor Sales and Serv	1	2	0	
ST0001519	Raymonds Auto Repair	1	2	0	
ST0001594	Town Hill Auto	1	2	0	
ST0001615	Firestone Expert Tire Center	1	2	1	
ST0001646	Bobs Auto Inc	1	2	2	
ST0001660	Midas Auto Service	1	2	1	
ST0001662	Meineke Car Care Center	1	2	0	
ST0001692	Ledyard Auto LLC	1	1	0	An auditor was on leave, which resulted in confusion regarding whether ST0001692 was actually audited the second time. Since this time, we have made changes to our system which will be evidenced in our new EDBMS audit tracking system. Thus, this should not present a
ST0001704	Precision Motors Inc	1	2	1	
ST0001725	Nicks Service Center	1	2	0	
ST0001730	Hometown Auto LLC	1	2	1	
ST0001767	Firestone Complete Auto Care	1	2	0	
ST0001790	Corys Auto Care	1	2	0	
ST0001799	All Pro Automotive	1	2	0	
ST0001805	Plainfield Shell	1	2	0	
ST0001825	Pennells Auto Center LLC	1	2	1	
ST0001845	Courtesy Ford Mercury	1	2	0	
ST0001876	General Muffler Automotive S	1	2	2	
ST0001889	Gabes Service Station	1	2	1	
ST0001896	A and M Service Station	1	2	0	
ST0001944	Branford Auto Center	1	2	0	
ST0001970	Anderson Tire and Auto Serv	1	2	2	
ST0002018	D and R Automotive LLC	1	2	1	
ST0002020	Hammonasset Ford	1	2	0	
ST0002026	Desmonds Auto Sales	1	2	0	
ST0002060	Cromwell Automotive	1	2	1	

Table (c) (1,2,3 & 4). Quality Control

Station #	Station Name	Lane number	Initial Gas Audits	Initial Gas Audit Fails	Comments
ST0002070	Firestone Complete Auto Care	1	2	0	
ST0002120	Greenfield Hill Serv	1	2	0	
ST0002133	Firestone Complete Auto Care	1	2	1	
ST0002141	Fairfield Tire and Auto Center	1	2	0	
ST0002149	Meineke	1	2	1	
ST0002153	Sport Hill Service Station Inc	1	2	0	
ST0002181	Auto Associates Inc	1	2	2	
ST0002233	Cos Central Auto	1	2	2	
ST0002267	Harte Family Motors Inc	1	2	1	
ST0002330	Belltown Motors	1	2	0	
ST0002358	Computer Tune and Lube Inc	1	2	0	
ST0002365	Midas Auto Service of Middlet	1	2	0	
ST0002373	Personal Auto Care Service C	1	2	0	
ST0002380	New Image Automotive	1	3	0	
ST0002419	Roberts Service Center Inc	1	2	1	
ST0002467	Meineke Discount Muffler	1	2	2	
ST0002493	Amaral Motors Inc	1	2	0	
ST0002540	J P Automotive LLC	1	2	0	
ST0002560	Tech 1 Automotive LLC	1	2	2	
ST0002573	Oceanside Auto LLC	1	2	0	
ST0002578	Grossman Chevrolet	1	2	1	
ST0002593	Bens Service Center	1	2	0	
ST0002631	Portland Automotive Inc	1	2	1	
ST0002651	East Coast Car Care	1	2	0	
ST0002652	Falbos Tire and Auto Center In	1	2	0	
ST0002672	AJs Center Service Inc	1	2	0	
ST0002740	Mad Hatter Muffler	1	2	0	
ST0002744	Tire Depot Plus Inc	1	1	0	Left program 9/30/2014
ST0002822	Frenchys Auto Repair Inc	1	2	0	
ST0002830	Nelsons Automotive Service C	1	2	0	
ST0002880	Broadbridge Auto Service Inc	1	2	0	
ST0002884	Don Schiffers Auto Service Inc	1	2	0	
ST0002915	Midas Auto Service of Westbr	1	2	0	
ST0002919	Meineke Discount Mufflers	1	2	1	
ST0002955	Nova Automotive	1	2	2	
ST0002964	Swanson Automotive	1	2	0	
ST0002975	Torello Tire Company Inc	1	2	2	
ST0003102	Auto Specialist Inc	1	2	0	
ST0003106	Campbell Motor Sales Inc	1	2	0	

Table (c) (1,2,3 & 4). Quality Control

Station #	Station Name	Lane number	Initial Gas Audits	Initial Gas Audit Fails	Comments
ST0003107	Chucks Garage	1	2	1	
ST0003190	Partyka Chevrolet Inc	1	2	0	
ST0003192	Dougan Automotive LLC	1	2	2	
ST0003225	Tire Doctor	1	2	2	
ST0003253	Quick Lane Tire and Auto Cen	1	3	3	
ST0003292	Joeys Capitol-Wood Service C	1	2	1	
ST0003432	E and S Automotive Operatio	1	3	3	
ST0003437	Monro Muffler Brake	1	2	0	
ST0003449	Boston Ave Auto Getty	1	2	2	
ST0003458	Knechts Garage Inc	1	2	1	
ST0003475	Firestone Tire and Service Ce	1	2	0	
ST0003483	Breezy Point Auto Repairs Inc	1	2	0	
ST0003498	Model Garage Inc	1	2	0	
ST0003548	Montambaults Inc	1	2	1	
ST0003587	Pep Boys	1	2	0	
ST0003592	Superior Transmissions Inc	1	2	0	
ST0003662	United Auto Sales and Service	1	2	0	
ST0003732	Litchfield Hills Motorsports LLC	1	2	1	
ST0003739	Bennett Motor Werks	1	2	2	
ST0003746	Sunshine Car Repair	1	2	0	
ST0003759	Litchfield County Marine Auto	1	2	1	
ST0003767	Mezzio Auto Body Repair	1	2	1	
ST0003876	The Quiet Zone	1	2	0	
ST0003939	Abate Auto Body and Collisior	1	2	2	
ST0003943	Bahr Auto Repair	1	2	1	
ST0003976	The Quiet Zone	1	4	1	
ST0003988	Valenti Motors Inc	1	2	0	
ST0003997	Murray Bros Garage Inc	1	2	0	
ST0004004	Belardinelli Tire Comp	1	2	1	
ST0004016	Firestone Tire and Service Ce	1	2	1	
ST0004034	A 1 Service Center Inc	1	0	0	Left the program on 1/30/14
ST0004065	Mohawk West Tire And Auto C	1	2	1	
ST0004105	E M Auto Repair LLC	1	2	0	
ST0004107	Federal Towing and Car Cente	1	2	1	
ST0004111	Wilton Mobil	1	2	0	
ST0004170	New Fairfield Automotive Inc	1	2	2	
ST0004191	Darien Auto Center	1	2	0	

Table (c) (1,2,3 & 4). Quality Control

Station #	Station Name	Lane number	Initial Gas Audits	Initial Gas Audit Fails	Comments
ST0004230	Greenwich Shell	1	2	0	
ST0004243	A C Auto Body and Mechanical	1	2	0	
ST0004257	New Canaan Ave Service	1	2	0	
ST0004262	The Briggs Tire Co Inc	1	2	1	
ST0004298	Hank Mays Goodyear	1	2	0	
ST0004375	Copps Hill Shell Inc	1	2	0	
ST0004377	Limestone Service Station Inc	1	2	0	
ST0004390	Westport Auto Repair LLC	1	2	1	
ST0004405	Weston Service Center	1	2	1	
ST0004480	Firestone Tire and Service Ce	1	2	0	
ST0004541	Sotires Auto Diagnostic Cente	1	2	0	
ST0004592	Avery Brothers Inc	1	2	0	
ST0004615	Firestone Tire Service Center	1	2	0	
ST0004628	Firestone Tire and Service Ce	1	2	0	
ST0004696	Long Ridge Service	1	2	1	
ST0004710	Middlesex Auto Center	1	2	0	
ST0004713	Milex Auto Repair	1	2	0	
ST0004722	Lube Express	1	2	0	
ST0004739	Precision Motor Coach LLC	1	2	0	
ST0004745	R K Rogers LTD Inc	1	2	1	
ST0004750	Sam Wibberley Tire and Auto	1	2	1	
ST0004764	Suburban Subaru	1	2	1	
ST0004765	Main Street Muffler and Brake	1	2	1	
ST0004769	The Quiet Zone Your complete	1	2	1	
ST0004788	West High Service Station Inc	1	2	1	
ST0004817	High Tech Auto	1	2	0	
ST0004828	Waterbury Tire and Auto	1	2	0	
ST0004837	Car Tune	1	2	0	
ST0004839	Hank Mays Goodyear	1	2	0	
ST0004843	Toyota of Colchester	1	2	0	
ST0004847	Hebron Quick Lube LLC	1	2	0	
ST0004854	Valvoline Instant Oil Change	1	2	1	
ST0004866	Lee Myles Transmission	1	2	0	
ST0004867	Foxy Fast Lube LLC	1	2	0	
ST0004870	Middlebury Garage	1	2	0	
ST0004875	Showroom Auto Center	1	2	1	
ST0004888	K Town Automotive LLC	1	2	0	

Table (c) (1,2,3 & 4). Quality Control

Station #	Station Name	Lane number	Initial Gas Audits	Initial Gas Audit Fails	Comments
ST0005000	Firestone Complete Auto Care	1	2	1	
ST0005001	Bundy Motors	1	2	1	
ST0005002	Pep Boys Auto	1	2	1	
ST0005003	CarMax Auto Superstore Inc	1	2	0	
ST0005004	Modern Tire And Auto Service	1	2	0	
ST0005005	Capuano Automotive	1	0	0	Left the program on 2/08/14
ST0005006	Economy Oil Change	1	2	2	
ST0005007	Tunxis Street Garage	1	2	0	Left the program on 9/26/14
ST0005008	Alfano Nissan	1	2	2	
ST0005009	Essex Service Center	1	1	0	Left the program on 6/2/14
ST0005010	Jims Auto Sales and Service	1	2	0	
ST0005011	Thompson Auto Care LLC	1	2	0	
ST0005012	Beatty Automotive LLC	1	2	0	
ST0005013	Valvoline Instant Oil	1	2	1	
ST0005014	Tires International	1	2	1	
ST0005015	Lyons Service Corp Inc	1	2	1	
ST0005016	Stillys Automotive LLC	1	2	0	
ST0005017	Brickel Automotive	1	2	1	
ST0005018	Firestone Complete Auto	1	2	0	
ST0005019	Meineke Car Care	1	2	1	
ST0005020	Keating Automotive	1	2	0	
ST0005021	P N Auto	1	2	2	
ST0005022	Danbury Auto	1	2	1	
ST0005023	Tasca Ford	1	2	1	
ST0005024	Central Connecticut Tire Servi	1	1	0	Entered Program on 10/20/14
Totals			447	130	

Table (d) (1), (2), & (3). Enforcement Report

Enforcement Report: (d) (1), (2), & (3) – 2014

(d) Enforcement Report –

(1) All varieties of enforcement programs shall, at a minimum, submit to EPA by July of each year a report providing basic statistics on the enforcement program for January through December of the previous year, including:

(i) An estimate of the number of vehicles subject to the inspection program, including the results of analysis of the registration database:

Connecticut's estimated emission eligible population is 2.4 million vehicles per testing cycle.

(ii) The percentage of motorist compliance based upon a comparison of the number of valid final passing tests and the number of subject vehicles:

Connecticut's compliance rate was greater than 99% for 2014.

The overall compliance rate is based on an audit of vehicles being registered. Connecticut committed to a 96% compliance rate for the vehicles subject to I/M requirements in the SIP. In 2014, 960,366 registration renewals were audited, resulting in 52,987 denials, of which 93.5% later complied. This works out to a 99.6% compliance rate, so the overall compliance rate exceeds the SIP compliance rate.

(2) Registration denial bases enforcement programs shall provide the following information:

(i) A report of the program's efforts and actions to prevent motorists from falsely registering vehicles in the program area of falsely changing fuel type or weight class on the vehicle registration and the results of special studies to investigate the frequency of such activity:

Connecticut does not perform an analysis of its emission eligible database to detect vehicles that are registered out of state to avoid being emission tested in the state. The majority of vehicles registered with an incorrect GVWR are those in which the vehicle owner registers the vehicle at a lower weight to avoid added expense and are consequently not emission eligible (>10,000 lbs. GVWR). Connecticut tests all fuel types, including hybrids.

(ii) The number of registration file audits, number of registration reviewed and compliance rates from such audits:

In 2014, 162,311 emission late fees were assessed. All of these vehicles ultimately complied or were not re-registered in Connecticut.

Table (d) (1), (2), & (3). Enforcement Report

(3) Computer matching based enforcement programs shall provide the following additional information:

(i) The number and percentage of subject vehicles that were tested by the initial deadline, and by other milestones in the cycle:

Addressed in (d) (1) (ii)

(ii) A report on the program's efforts to detect and enforce against motorists falsely changing vehicle classifications to circumvent program requirements and the frequency of test activity:

Historically, 99% of emission eligible vehicles in Connecticut are in the Passenger, Combination or Commercial classifications. Due to the added expense, documentation and inspection requirements needed to change a vehicle's registration classification to a non-emission eligible class, incidents of such modification are minimal.

(iii) The number of enforcement system audits and the error rate found during those audits:

Connecticut's program uses both registration denial and late fee assessment to enforce emission inspection compliance. In 2014, 960,366 registration renewals were audited, resulting in 52,987 denials, of which 93.5% later complied. This works out to a 99.6% compliance rate.