



STATE OF NEW HAMPSHIRE

2016

Annual Motor Vehicle Inspection Program Report

Appendix A

Anti-tampering and OBD II Inspection Data

(June) 2017

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4.1.1 - 51.366(a) Test Data Report

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:

(a)(1) The number of vehicles tested by model year and vehicle type.

| Table 1 Calendar Year 2016 – Number and Type of Vehicles Tested | | | | |
|--|--------------|------------------|-----------|------------------|
| Model Year | Vehicle Type | OBD | Visual | Grand Total |
| 2018 | L | 43 | 0 | 43 |
| 2017 | L | 18,601 | 0 | 18,601 |
| 2016 | L | 109,196 | 2 | 109,198 |
| 2015 | L | 104,349 | 4 | 104,353 |
| 2014 | L | 103,989 | 2 | 103,991 |
| 2013 | L | 101,450 | 8 | 101,458 |
| 2012 | L | 83,601 | 2 | 83,603 |
| 2011 | L | 74,401 | 0 | 74,401 |
| 2010 | L | 67,365 | 4 | 67,369 |
| 2009 | L | 54,565 | 1 | 54,566 |
| 2008 | L | 71,626 | 1 | 71,627 |
| 2007 | L | 69,110 | 3 | 69,113 |
| 2006 | L | 64,371 | 1 | 64,372 |
| 2005 | L | 63,989 | 4 | 63,993 |
| 2004 | L | 57,573 | 1 | 57,574 |
| 2003 | L | 47,924 | 2 | 47,926 |
| 2002 | L | 38,491 | 5 | 38,496 |
| 2001 | L | 29,677 | 1 | 29,678 |
| 2000 | L | 24,445 | 0 | 24,445 |
| 1999 | L | 18,665 | 1 | 18,666 |
| 1998 | L | 14,091 | 1 | 14,092 |
| 1997 | L | 10,352 | 3 | 10,355 |
| Grand Total | | 1,227,874 | 46 | 1,227,920 |

(a)(2) By model year and vehicle type, the number and percentage of vehicles:

- (i) Failing initially, per test type;
- (ii) Failing the first retest per test type;
- (iii) Passing the first retest per test type;
- (iv) Initially failed vehicles passing the second or subsequent retest per test type;
- (v) The number and percentage of vehicles receiving a waiver that initially failed - The NH I/M Program does not allow for waivers.

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| Table 2 Calendar Year 2016 – OBD Emissions Test Results | | | | | | |
|--|------|-----------------------|---------|-------|---------|--------|
| Year | Type | TEST SEQUENCE | PASS | FAIL | Total | % Fail |
| 2018 | L | 1. INITIAL TEST | 43 | 0 | 43 | 0% |
| | L | 2. FIRST RE-TEST | 0 | 0 | 0 | 0% |
| | L | 3. SUBSEQUENT RE-TEST | 0 | 0 | 0 | 0% |
| | | | | | | |
| 2017 | L | 1. INITIAL TEST | 18,494 | 107 | 18,601 | 0.58% |
| | L | 2. FIRST RE-TEST | 101 | 1 | 102 | 0.98% |
| | L | 3. SUBSEQUENT RE-TEST | 1 | 0 | 1 | 0% |
| | | | | | | |
| 2016 | L | 1. INITIAL TEST | 108,643 | 553 | 109,196 | 0.51% |
| | L | 2. FIRST RE-TEST | 538 | 10 | 548 | 1.82% |
| | L | 3. SUBSEQUENT RE-TEST | 10 | 0 | 10 | 0% |
| | | | | | | |
| 2015 | L | 1. INITIAL TEST | 103,785 | 564 | 104,349 | 0.54% |
| | L | 2. FIRST RE-TEST | 643 | 4 | 647 | 0.62% |
| | L | 3. SUBSEQUENT RE-TEST | 7 | 2 | 9 | 22.22% |
| | | | | | | |
| 2014 | L | 1. INITIAL TEST | 101,321 | 2,668 | 103,989 | 2.57% |
| | L | 2. FIRST RE-TEST | 2,069 | 440 | 2,509 | 17.54% |
| | L | 3. SUBSEQUENT RE-TEST | 379 | 169 | 548 | 30.84% |
| | | | | | | |
| 2013 | L | 1. INITIAL TEST | 98,303 | 3,147 | 101,450 | 3.10% |
| | L | 2. FIRST RE-TEST | 2,557 | 600 | 3,157 | 19.01% |
| | L | 3. SUBSEQUENT RE-TEST | 564 | 216 | 780 | 27.69% |
| | | | | | | |
| 2012 | L | 1. INITIAL TEST | 80,706 | 2,895 | 83,601 | 3.46% |
| | L | 2. FIRST RE-TEST | 2,453 | 486 | 2,939 | 16.54% |
| | L | 3. SUBSEQUENT RE-TEST | 437 | 169 | 606 | 27.89% |
| | | | | | | |
| 2011 | L | 1. INITIAL TEST | 71,279 | 3,122 | 74,401 | 4.20% |
| | L | 2. FIRST RE-TEST | 2,585 | 502 | 3,087 | 16.26% |
| | L | 3. SUBSEQUENT RE-TEST | 452 | 183 | 635 | 28.82% |
| | | | | | | |
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| Table 2 Calendar Year 2016 – OBD Emissions Test Results (cont.) | | | | | | |
|--|------|-----------------------|--------|-------|--------|--------|
| Year | Type | TEST SEQUENCE | PASS | FAIL | Total | % Fail |
| 2010 | L | 1. INITIAL TEST | 64,068 | 3,297 | 67,365 | 4.89% |
| | L | 2. FIRST RE-TEST | 2,647 | 591 | 3,238 | 18.25% |
| | L | 3. SUBSEQUENT RE-TEST | 537 | 292 | 829 | 35.22% |
| | | | | | | |
| 2009 | L | 1. INITIAL TEST | 51,354 | 3,211 | 54,565 | 5.88% |
| | L | 2. FIRST RE-TEST | 2,585 | 534 | 3,119 | 17.12% |
| | L | 3. SUBSEQUENT RE-TEST | 469 | 192 | 661 | 29.05% |
| | | | | | | |
| 2008 | L | 1. INITIAL TEST | 66,457 | 5,169 | 71,626 | 7.22% |
| | L | 2. FIRST RE-TEST | 4,139 | 826 | 4,965 | 16.64% |
| | L | 3. SUBSEQUENT RE-TEST | 740 | 301 | 1,041 | 28.91% |
| | | | | | | |
| 2007 | L | 1. INITIAL TEST | 63,314 | 5,796 | 69,110 | 8.39% |
| | L | 2. FIRST RE-TEST | 4,504 | 1,040 | 5,544 | 18.76% |
| | L | 3. SUBSEQUENT RE-TEST | 872 | 410 | 1,282 | 31.98% |
| | | | | | | |
| 2006 | L | 1. INITIAL TEST | 57,511 | 6,860 | 64,371 | 10.66% |
| | L | 2. FIRST RE-TEST | 5,180 | 1,212 | 6,392 | 18.96% |
| | L | 3. SUBSEQUENT RE-TEST | 1,031 | 569 | 1,600 | 35.56% |
| | | | | | | |
| 2005 | L | 1. INITIAL TEST | 56,092 | 7,897 | 63,989 | 12.34% |
| | L | 2. FIRST RE-TEST | 5,784 | 1,443 | 7,227 | 19.97% |
| | L | 3. SUBSEQUENT RE-TEST | 1,190 | 621 | 1,811 | 34.29% |
| | | | | | | |
| 2004 | L | 1. INITIAL TEST | 49,246 | 8,326 | 57,572 | 14.46% |
| | L | 2. FIRST RE-TEST | 5,941 | 1,608 | 7,549 | 21.30% |
| | L | 3. SUBSEQUENT RE-TEST | 1,310 | 744 | 2,054 | 36.22% |
| | | | | | | |
| 2003 | L | 1. INITIAL TEST | 39,914 | 8,010 | 47,924 | 16.71% |
| | L | 2. FIRST RE-TEST | 5,525 | 1,672 | 7,197 | 23.23% |
| | L | 3. SUBSEQUENT RE-TEST | 1,328 | 791 | 2,119 | 37.33% |
| | | | | | | |
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| Table 2 Calendar Year 2016 – OBD Emissions Test Results (cont.) | | | | | | |
|--|------|-----------------------------|------------------|----------------|------------------|--------------|
| Year | Type | TEST SEQUENCE | PASS | FAIL | Total | % Fail |
| 2002 | L | 1. INITIAL TEST | 31,228 | 7,263 | 38,491 | 18.87% |
| | L | 2. FIRST RE-TEST | 4,842 | 1,600 | 6,442 | 24.84% |
| | L | 3. SUBSEQUENT RE-TEST | 1,257 | 809 | 2,066 | 39.16% |
| | | | | | | |
| 2001 | L | 1. INITIAL TEST | 23,110 | 6,567 | 29,677 | 22.13% |
| | L | 2. FIRST RE-TEST | 4,088 | 1,560 | 5,648 | 27.62% |
| | L | 3. SUBSEQUENT RE-TEST | 1,209 | 1,015 | 2,224 | 45.64% |
| | | | | | | |
| 2000 | L | 1. INITIAL TEST | 19,973 | 4,472 | 24,445 | 18.29% |
| | L | 2. FIRST RE-TEST | 3,021 | 791 | 3,812 | 20.75% |
| | L | 3. SUBSEQUENT RE-TEST | 608 | 365 | 973 | 37.51% |
| | | | | | | |
| 1999 | L | 1. INITIAL TEST | 15,243 | 3,421 | 18,664 | 18.33% |
| | L | 2. FIRST RE-TEST | 2,292 | 601 | 2,893 | 20.77% |
| | L | 3. SUBSEQUENT RE-TEST | 454 | 212 | 666 | 31.83% |
| | | | | | | |
| 1998 | L | 1. INITIAL TEST | 11,443 | 2,648 | 14,091 | 18.79% |
| | L | 2. FIRST RE-TEST | 1,764 | 491 | 2,255 | 21.77% |
| | L | 3. SUBSEQUENT RE-TEST | 357 | 192 | 549 | 34.97% |
| | | | | | | |
| 1997 | L | 1. INITIAL TEST | 8,419 | 1,933 | 10,352 | 18.67% |
| | L | 2. FIRST RE-TEST | 1,230 | 374 | 1,604 | 23.32% |
| | L | 3. SUBSEQUENT RE-TEST | 234 | 231 | 465 | 49.68% |
| | | | | | | |
| | | Initial Tests Totals | 1,139,946 | 87,926 | 1,227,872 | 7.16% |
| | | Overall Test Totals | 1,217,880 | 111,795 | 1,329,675 | 8.41% |

NOTE: Due to the timing of OBD tests/re-tests, there is no direct relationship between Initial Test failures and Re-test counts (i.e. Initial Tests and Re-tests may have occurred for a particular vehicle during different calendar years).

(a)(2) By model year and vehicle type, the number and percentage of vehicles:

(vi) Vehicles with no known final outcome (regardless of reason).

| Table 3 Calendar Year 2016 - No Final Outcome Vehicles | | | | |
|---|------|---------------|------------------|--------------|
| Model Year | Type | NFO Total | Total tested | Total % |
| 2018 | L | 0 | 43 | 0.00% |
| 2017 | L | 5 | 18,601 | 0.03% |
| 2016 | L | 11 | 109,198 | 0.01% |
| 2015 | L | 10 | 104,353 | 0.01% |
| 2014 | L | 267 | 103,991 | 0.26% |
| 2013 | L | 319 | 101,458 | 0.31% |
| 2012 | L | 329 | 83,603 | 0.39% |
| 2011 | L | 395 | 74,401 | 0.53% |
| 2010 | L | 459 | 67,369 | 0.68% |
| 2009 | L | 448 | 54,566 | 0.82% |
| 2008 | L | 730 | 71,627 | 1.02% |
| 2007 | L | 954 | 69,113 | 1.38% |
| 2006 | L | 1169 | 64,372 | 1.82% |
| 2005 | L | 1472 | 63,993 | 2.30% |
| 2004 | L | 1660 | 57,574 | 2.88% |
| 2003 | L | 1705 | 47,926 | 3.56% |
| 2002 | L | 1703 | 38,496 | 4.42% |
| 2001 | L | 1689 | 29,678 | 5.69% |
| 2000 | L | 1189 | 24,445 | 4.86% |
| 1999 | L | 950 | 18,666 | 5.09% |
| 1998 | L | 769 | 14,092 | 5.46% |
| 1997 | L | 603 | 10,355 | 5.82% |
| Totals | | 16,836 | 1,227,920 | 1.37% |

NOTE: NFO totals above include: 1) Vehicles that were initially tested, but not re-tested; and 2) Vehicles failing Initial Tests & all Re-tests. This data reflects any re-tests within 5-months of initial failure even if the re-test occurred in the subsequent calendar year.

(a)(2) By model year and vehicle type, the number and percentage of vehicles:

- (xi) Passing the on-board diagnostic check;
- (xii) Failing the on-board diagnostic check;
- (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

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Table 4
2016 OBD Test Results – Light Duty Vehicles - All Test Sequences (Initial Tests & Retests)

| Year | OBD Test Results | | | | MIL Commanded On | | | | MIL Not Commanded On | | | | Vehicles Not Ready | | | |
|--------------|------------------|--------------|------------------|---------------|------------------|--------------|---------------|--------------|----------------------|---------------|---------------|--------------|--------------------|--------------|--------------|--------------|
| | Fail | % | Pass OBD | % | No DTCs stored | % | DTCs stored | % | No DTCs stored | % | DTCs stored | % | No DTCs stored | % | DTCs stored | % |
| 2018 | 0 | 0.00% | 43 | 100.00% | 0 | 0.00% | 0 | 0.00% | 27 | 62.79% | 0 | 0.00% | 0 | 0.00% | 0 | 0.00% |
| 2017 | 108 | 0.58% | 18,596 | 99.42% | 0 | 0.00% | 8 | 0.04% | 9,812 | 52.46% | 62 | 0.33% | 0 | 0.00% | 0 | 0.00% |
| 2016 | 563 | 0.51% | 109,191 | 99.49% | 0 | 0.00% | 80 | 0.07% | 75,618 | 68.90% | 412 | 0.38% | 0 | 0.00% | 0 | 0.00% |
| 2015 | 570 | 0.54% | 104,435 | 99.46% | 1 | 0.00% | 114 | 0.11% | 99,908 | 95.15% | 730 | 0.70% | 0 | 0.00% | 0 | 0.00% |
| 2014 | 3,277 | 3.06% | 103,769 | 96.94% | 3 | 0.00% | 268 | 0.25% | 102,583 | 95.83% | 1,204 | 1.12% | 2,448 | 2.29% | 33 | 0.03% |
| 2013 | 3,963 | 3.76% | 101,424 | 96.24% | 6 | 0.01% | 395 | 0.37% | 99,608 | 94.52% | 1,869 | 1.77% | 3,023 | 2.87% | 53 | 0.05% |
| 2012 | 3,550 | 4.07% | 83,596 | 95.93% | 2 | 0.00% | 540 | 0.62% | 81,764 | 93.82% | 1,881 | 2.16% | 2,524 | 2.90% | 61 | 0.07% |
| 2011 | 3,807 | 4.87% | 74,316 | 95.13% | 1 | 0.00% | 653 | 0.84% | 72,350 | 92.61% | 2,011 | 2.57% | 2,723 | 3.49% | 37 | 0.05% |
| 2010 | 4,180 | 5.85% | 67,252 | 94.15% | 0 | 0.00% | 815 | 1.14% | 65,071 | 91.10% | 2,239 | 3.13% | 2,975 | 4.16% | 48 | 0.07% |
| 2009 | 3,937 | 6.75% | 54,408 | 93.25% | 4 | 0.01% | 998 | 1.71% | 52,093 | 89.28% | 2,359 | 4.04% | 2,642 | 4.53% | 36 | 0.06% |
| 2008 | 6,296 | 8.11% | 71,336 | 91.89% | 2 | 0.00% | 1,612 | 2.08% | 67,411 | 86.83% | 3,984 | 5.13% | 4,203 | 5.41% | 63 | 0.08% |
| 2007 | 7,246 | 9.54% | 68,690 | 90.46% | 3 | 0.00% | 2,037 | 2.68% | 63,937 | 84.20% | 4,804 | 6.33% | 4,647 | 6.12% | 108 | 0.14% |
| 2006 | 8,641 | 11.94% | 63,722 | 88.06% | 17 | 0.02% | 2,489 | 3.44% | 58,246 | 80.49% | 5,523 | 7.63% | 5,504 | 7.61% | 131 | 0.18% |
| 2005 | 9,961 | 13.64% | 63,066 | 86.36% | 6 | 0.01% | 3,012 | 4.12% | 57,687 | 78.99% | 5,432 | 7.44% | 6,365 | 8.72% | 131 | 0.18% |
| 2004 | 10,678 | 15.90% | 56,497 | 84.10% | 5 | 0.01% | 3,333 | 4.96% | 50,798 | 75.62% | 5,746 | 8.55% | 6,679 | 9.94% | 184 | 0.27% |
| 2003 | 10,473 | 18.30% | 46,767 | 81.70% | 2 | 0.00% | 3,274 | 5.72% | 42,116 | 73.58% | 4,691 | 8.20% | 6,578 | 11.49% | 223 | 0.39% |
| 2002 | 9,672 | 20.58% | 37,327 | 79.42% | 0 | 0.00% | 3,058 | 6.51% | 32,991 | 70.20% | 4,314 | 9.18% | 6,023 | 12.82% | 221 | 0.47% |
| 2001 | 9,142 | 24.35% | 28,407 | 75.65% | 0 | 0.00% | 2,830 | 7.54% | 25,090 | 66.82% | 3,259 | 8.68% | 5,827 | 15.52% | 202 | 0.54% |
| 2000 | 5,628 | 19.25% | 23,602 | 80.75% | 1 | 0.00% | 2,266 | 7.75% | 20,955 | 71.69% | 2,644 | 9.05% | 2,995 | 10.25% | 99 | 0.34% |
| 1999 | 4,234 | 19.05% | 17,989 | 80.95% | 1 | 0.00% | 1,698 | 7.64% | 16,056 | 72.25% | 1,937 | 8.72% | 2,247 | 10.11% | 73 | 0.33% |
| 1998 | 3,331 | 19.72% | 13,564 | 80.28% | 0 | 0.00% | 1,379 | 8.16% | 11,503 | 68.09% | 1,662 | 9.84% | 1,755 | 10.39% | 70 | 0.41% |
| 1997 | 2,538 | 20.43% | 9,883 | 79.57% | 2 | 0.02% | 1,108 | 8.92% | 8,746 | 70.41% | 1,001 | 8.06% | 1,251 | 10.07% | 48 | 0.39% |
| Total | 111,795 | 8.41% | 1,217,880 | 91.59% | 56 | 0.00% | 31,967 | 2.40% | 1,114,370 | 83.81% | 57,764 | 4.34% | 70,409 | 5.30% | 1,821 | 0.14% |

Appendix A

(a)(3) The initial test volume rate by model year and test station.

Documentation provided electronically in Excel file.

(a)(4) The initial test failure rate by model year and test station.

Documentation provided electronically in Excel file.