

# AIR QUALITY CONFORMITY ASSESSMENT

VIRGINIA DEPARTMENT OF TRANSPORTATION  
2010 CLRP  
AMENDMENTS

TPB Technical Committee  
June 3, 2011

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## MAP OF MAJOR CHANGES

The map displays several road segments with color-coded changes:

- Transit Reductions:** Indicated by a red line on I-95 between Dumfries Rd. (VA 234) and Prince William Pkwy (VA 3000).
- Capacity Increase:** Indicated by a green line on US 15 and US 29 (Gainesville).
- Capacity Reduction:** Indicated by a red line on I-395 between Turkeycock Run and Eads St.
- Capacity Increase:** Indicated by a green line on I-395 between Turkeycock Run and Seminary Rd. Ramp.

**Transit Reductions**

- Removal of HOT lanes
- bus improvements and
- four direct access BRT
- stations

**Capacity Reduction**

**Capacity Increase**

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## PROJECTS

### I-66

- ❖ Extension of the existing HOV/LOV lanes for 2.6 miles on I-66 between US 29 in Gainesville and Route 15 in Haymarket to provide 8 lanes including HOV.

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## PROJECTS

### I-95/I-395

- ❖ Removal of HOV to HOT lane conversion and construction of 3<sup>rd</sup> lane from Turkeycock Run (n. of Edsall Rd.) to Eads St. (7.5 miles)
- ❖ Removal of construction of 3<sup>rd</sup> HOT lane from VA 234 (Dumfries Rd.) to VA 3000 (Prince William Pkwy.) (6 miles)
- ❖ Removal of I-95/I-395 HOT lanes bus improvements, including 4 direct access BRT stations along the facility
- ❖ Addition of a reversible ramp from the HOV lanes of I-395 to/from Seminary Rd.

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## TECHNICAL APPROACH (same as for original 2010 CLRP)

- ❖ Round 8.0 Cooperative Forecasts
- ❖ 2191 TAZ Area System
- ❖ Version 2.2 Travel Demand Model
- ❖ Mobile 6.2 Emissions Model
- ❖ 2020, 2030, 2040 Analysis Years

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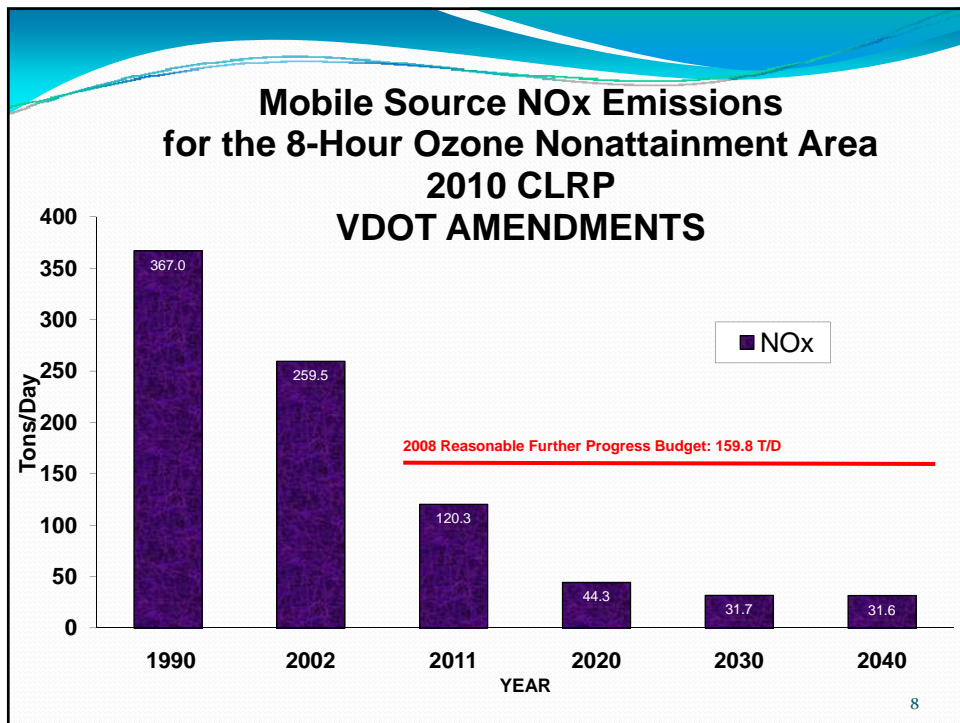
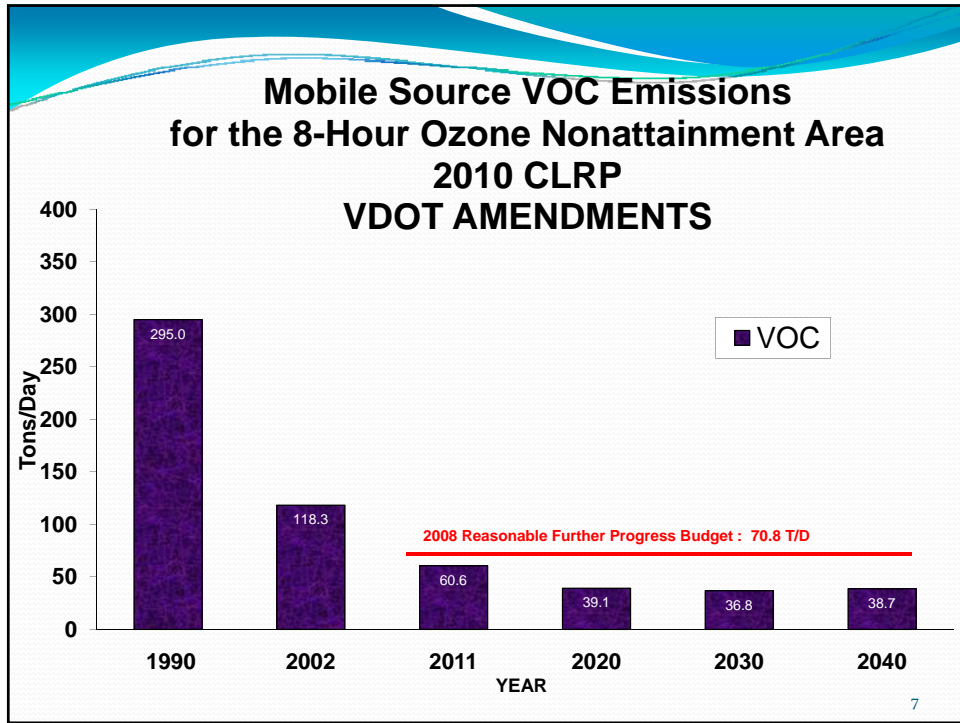
## RESULTS

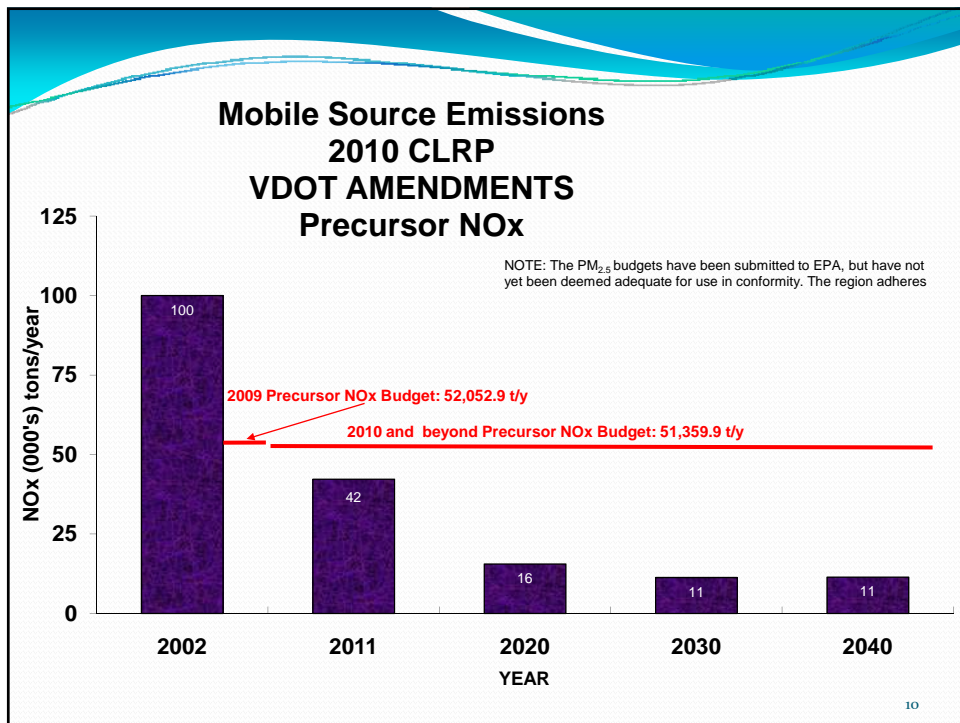
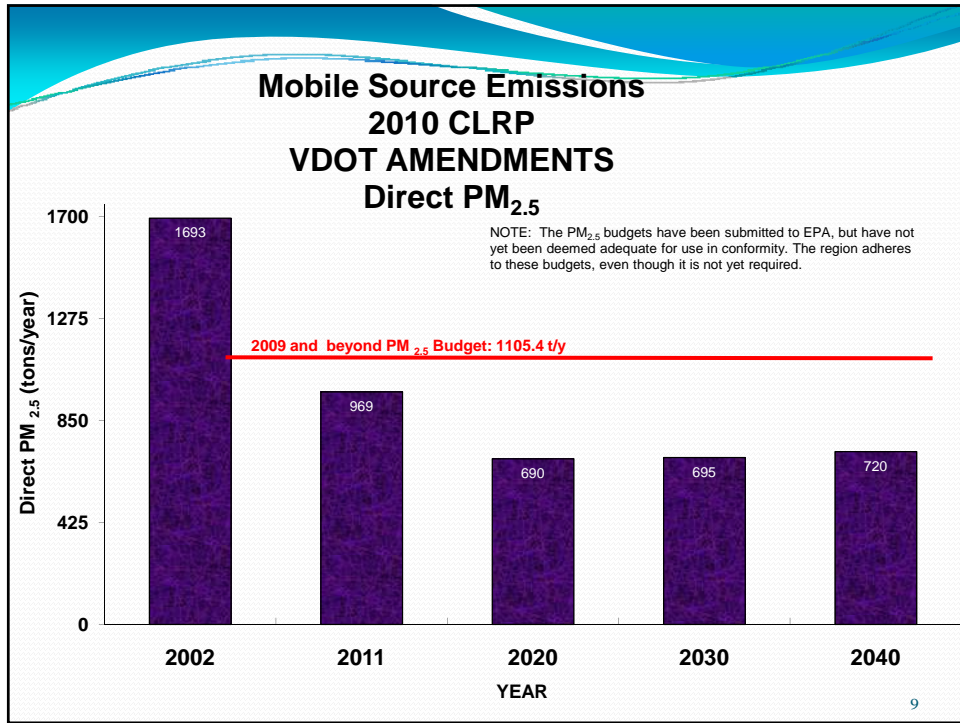
(Original 2010 CLRP vs. Amended 2010 CLRP)

### EMISSIONS

- ❖ Decrease slightly for all pollutants due to VMT reduction

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## RESULTS

(Original 2010 CLRP vs. Amended 2010 CLRP)

### Vehicle Miles Traveled (VMT)

| YEAR | VMT         |             |            |              |
|------|-------------|-------------|------------|--------------|
|      | original    | amendment   | difference | % difference |
| 2020 | 177,817,000 | 177,530,000 | -287,000   | -0.2%        |
| 2030 | 190,672,000 | 190,422,000 | -250,000   | -0.1%        |
| 2040 | 199,814,000 | 199,464,000 | -350,000   | -0.2%        |

❖ Some VMT diversion from freeway to non-freeway in Arlington, Alexandria, Fairfax, and Prince William

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## RESULTS

(Original 2010 CLRP vs. Amended 2010 CLRP)

### Vehicle Hours of Delay (VHD)

| YEAR | VHD       |           |            |              |
|------|-----------|-----------|------------|--------------|
|      | original  | amendment | difference | % difference |
| 2020 | 4,215,000 | 4,257,000 | 42,000     | 1.0%         |
| 2030 | 5,088,000 | 5,113,000 | 25,000     | 0.5%         |
| 2040 | 5,960,000 | 5,974,000 | 14,000     | 0.2%         |

❖ More congestion on freeways and non-freeways in Alexandria and Arlington, and less congestion in the District of Columbia

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## RESULTS

(Original 2010 CLRP vs. Amended 2010 CLRP)

### Vehicle Trips

| YEAR | Total Vehicle Trips |            |            |              |
|------|---------------------|------------|------------|--------------|
|      | original            | amendment  | difference | % difference |
| 2020 | 24,560,000          | 24,574,000 | 14,000     | 0.1%         |
| 2030 | 26,887,000          | 26,906,000 | 19,000     | 0.1%         |
| 2040 | 28,777,000          | 28,793,000 | 16,000     | 0.1%         |

- ❖ Some HOV trips become LOV trips, and some trips shorten in length due to reduced accessibility to Arlington, Alexandria, and the District of Columbia

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## RESULTS

(Original 2010 CLRP vs. Amended 2010 CLRP)

### Transit Trips

| YEAR | Transit Trips |           |            |              |
|------|---------------|-----------|------------|--------------|
|      | original      | amendment | difference | % difference |
| 2020 | 1,378,000     | 1,373,000 | -5,000     | -0.4%        |
| 2030 | 1,517,000     | 1,509,000 | -8,000     | -0.5%        |
| 2040 | 1,625,000     | 1,616,000 | -9,000     | -0.6%        |

- ❖ Decrease slightly due to decrease in transit service and changes in trip distribution

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## SCHEDULE

- |         |   |
|---------|---|
| June 9  | Public Comment Begins                           |
| June 15 | TPB Briefed on Conformity Results               |
| July 9  | Public Comment Ends                             |
| July 20 | TPB Reviews Comments, Asked to Adopt Amendments |