# NON-CONFIDENTIAL



Docket Ho. OPHO-0184-Item Ho. 19 N-96-01 TL-A-972

Donald R. Buist Director Automotive Emissions and Fuel Economy Office Environmental and Safety Engineering Staff Ford Motor Company The American Read Deerborn, Michigan 48121 May 25, 1984

Mr. Kenneth E. Feith, Director of Review Docket OPMO-0184 Office of Air and Radiation U.S. Environmental Protection Agency Washington, D.C. 20460

Dear Mr. Feith:

Ford Motor Company has reviewed the questions contained in your April 12, 1984 letter to the petitioners. We have also reviewed our December 15, 1983 petition and have concluded that we have no additional information responsive to Questions 1 or 2.

Question 3 regarding the costs/savings associated with various deferral scenarios was essentially answered in our petition, at pages 8 and 9. However, we wish again to point out that the greatest savings to Ford from an investment standpoint, and to the purchaser from a vehicle cost standpoint, would occur if the effective date of the 80 dB(A) noise emission standard was deferred to be coincident with that of the  $NO_X/particulates$  standard. Our need is to have engines available for noise development work that are at the lower exhaust emission level. This would permit a unified program which would result in more efficient use of engineering resources and the most cost effective vehicle for the customer. Any other scenario requires us to do the noise development task twice and incur an additional engineering expense of about \$1.4 million which does not include the additional expense incurred by our suppliers.

Question 4 requested sales information for model years 1980 through 1983 and these are provided below:

	Class #3	Class #4-8	
Model	10-12,000#	Heavy	
Year	Light Trucks	Truck	Total
1980	23,700	68,000	92,500
1981	21,900	46,600	68,500
1982	23,400	47,900	71,300
1983	30,800	38,100	68,900

The Ford forecasts for model years 1985 through 1988 are confidential and are provided in Attachment I.



File: Noise

Question 5 requested the percentage of over 10,000 pounds GVWR truck production primarily designed for "over-the-road" long haul operation. Ford does not design vehicles "primarily" for over-the-road operations. The CL, CLT, LTL and LNT models, however, are most commonly used for this purpose as tractors. These models represent represented 4.1% of our 1983 production over 10,000# GWWR. In contrast, in 1983, our Class #3 trucks (primarily R.V. Cutaways and Chassis Cabs used for conversion to recreational vehicles) comprised 45% of our production of trucks over 10,000# GWWR. For the most part, these vehicles are heavy derivatives of light trucks designed to comply with the 80 dB(A) state and local standards, and they are relatively quiet vehicles.

Question 6 requested the most recent noise emission test data for our trucks required to meet the 83 dB(A) standard. Attachment II contains the requested data. In each instance, the data are for the loudest configuration within the category which includes that configuration.

Question 7 requested quantitative data concerning our existing surplus of new trucks, i.e. our field stocks. Our response is contained in CONFIDENTIAL Attachment I.

Question 8 requested our assessment of the possible impact of used truck sales on new truck production that would not otherwise occur in the absence of a deferral.

Ford does not believe that, in the absence of a deferral, used truck sales will have any long-lasting effect on Ford new truck sales (or production). To the degree that used truck owners retain their vehicles for a longer period (to forestall incurring the price increase occasioned, for example, by the additional cost of noise suppression equipment needed to comply with the 80 dB(A) standard), they create a shortage of used trucks in the market. This shortage drives used truck values up. This increase in used truck values tends to offset the increase in new vehicle price. The most probable effect will be some small reduction in new-truck sales, because the purchasers' relatively fixed capital budgets can buy fewer units due to the higher price. The lower volume of sales may result in a small loss of truck manufacturing jobs.

If you have any questions or require further information, please do not hesitate to call us. Thank you for this opportunity to respond.

Sincerely,

D. R. Buist

Attachments

428.j

## NOISE TEST RESULTS

# FORD PRODUCTION MEDIUM AND HEAVY TRUCKS

# DIESEL POWERED

Series	Engine_		Sound
(Cab Design)	Manufacturer	Series	<u> Level - dB(A)</u>
		2.122	** *
F	Detroit Diesel	8. 2L-N	79.5
C	Detroit Diesel	8.2L-N	81.1
LN-Med	Detroit Diesel	8.2L-N	80.51/81.12/
F	Detroit Diesel	8.2L-T	78.3
C	Detroit Diesel	8.2L-T	79.1
LN-Med	Detroit Diesel	8.2L-T	79.5
L-Rvy	Detroit Diesel	6-71N	$81.7\frac{1}{1}$ $83.0\frac{2}{1}$
L-llvy	Detroit Diesel	6-71T	$80.9\frac{1}{1}$ $81.2\frac{2}{1}$
Lllvy	Detroit Diesel	8V-71N	$80.8\frac{1}{2}$ $81.4\frac{2}{2}$
L-llvy	Detroit Diesel	8V-7 l T	78.5
CL	Detroit Diesel	8V-71T	78.3
L-livy	Detroit Diesel	6V-92T	80.7
CL,	Detroit Diesel	6V-92T	79.9
LTL	Detroit Diesel	6V-92T	79.0
CL	Detroit Diesel	8V-92T	78.8
LTL	Detroit Diesel	8V-92T	79.2
F	Caterpillar	3208N	7,8.8
Ċ	Caterpillar	3208N	81.31/ 82.02/
LN-Med	Caterpillar	3208N	79.9
L-llvy	Caterpillar	3208N	80.3
F	Caterpillar	32081	78.1
Ċ	Caterpillar	3208T	79.1
L-livy	Caterpillar	3208T	79.9
L-llvy	Caterpillar	3406T	81.81/82.92/
CL.	Caterpillar	3406T	.80.7
LTL	Caterpillar	3406T	$82.0\frac{1}{82.12}$
L-llvy	Cummins	NTC	80.8
CL	Cummins	NTC	.81.0
LTL	Cummins	NTC	$80.7\frac{1}{}$ $81.2\frac{2}{}$
F-Ned	IN	6.9L-N	80.0
E	TH.	6.9L-N	78.4

<sup>1/</sup> Multi-sample average

<sup>2/</sup> Highest single sample

#### NOISE TEST RESULTS

#### FORD PRODUCTION MEDIUM AND HEAVY TRUCKS

### GAS OLINE POWERED

Series (Cab Design)	Engine Displacement3/	Sound Level - dB(A)
F	. 6.1L	78.6
C	6.1L	76.2
LN-Med	6.1L	80.3½/ 82.3½/
L-llvy	6.1L	78.6
F	6.1L-LPG	80.1
C	6.1L-LPG	77.0
LN-Med	6.1L-LPG	79.4
L-livy	6.1L-LPG	79.7
F	7.0L	77.9
C	7.0L	76.0
LN-Med	7.0L	80.0
L-llvy	7.0L	81.51/ 82.12/
F	7.OL-LPG	78,4
C	7.0L-LPG	80.5
I.N-Med	7.0L-LPG	81.1
L-livy	7.0L-Ll'G	79,5
F-Med	5.8L	75,6
E	5.8L	76.9
F-Med	6.6L	76.2
E	6.6L	79.2
F-Med	7.5L	79,2
E	7.5L	79.9

<sup>1/</sup> Multi-sample average

<sup>2/</sup> Highest single sample

<sup>3/</sup> Ford manufactured