
PROPOSED AMENDED RULE 1111

NOX EMISSIONS FROM NATURAL-GAS-FIRED, FAN-TYPE CENTRAL FURNACES

TASK FORCE MEETING
JULY 27, 2017
SCAQMD HEADQUARTERS
DIAMOND BAR, CALIFORNIA

1

AGENDA

- Rule 1111 background and implementation status
- Recent meeting activities
- Initial recommendations provided to Stationary Source Committee (SSC) on June 16, 2017 and discussion highlights
- Cost information for rebate and mitigation fee increase assessment
- Future activities and schedules at rulemaking
- Rule 1111 Compliance Plan Audit

2

RULE 1111 BACKGROUND

- Applies to residential and commercial natural gas-fired fan-type central furnaces
- Regulates manufacturers, distributors, sellers and installers of these units
- Amended in 2009 to lower NO_x emission limit to 14 ng/J
- Amended in 2014 to delay compliance date and add mitigation fee option
- In April 2016, industry organization and some manufacturers met with SCAQMD staff stating issues with development of a compliant unit and there was not a compliant unit available for commercialization

3

IMPLEMENTATION STATUS

- Based on most recent conversations with manufacturers, three original equipment manufacturers (OEMs) have demonstrated compliance with Rule 1111 NO_x limits with field tests underway, applications for certifications expected
- Compliant furnaces have not yet been introduced into the market to meet rule limit; however, commercialization schedules have been proposed by some OEMs
- Compliant burners available for licensing
- Outside United States –compliant units available but not marketed or tested for U.S. safety and reliability standards

4

RULE 1111 KEY COMPLIANCE DATES

- Alternative compliance option (paying mitigation fee for up to 3 years post compliance date) is utilized, but will end before:
 - April, 2018 for condensing;
 - October, 2018 for non-condensing;
 - October, 2019 for weatherized; and
 - October, 2021 for mobile home unit

5

RECENT MEETING ACTIVITIES

- Meetings with individual stakeholders (8 OEMs, 2 burner manufactures, and others) in March, April, and May 2017 to discuss product development status, mitigation fee, & NOx limit
- Two Task Force meetings (April 27, 2017 and May 25, 2017)
- Air Conditioning, Heating and Refrigeration Institute (AHRI) recommendations provided on June 14, 2017
 - Extend mitigation fee option to January 1, 2022 for all types
- Updates and staff's initial recommendations presented to SSC (January 20, 2017 and June 16, 2017)

6

INITIAL STAFF RECOMMENDATIONS – STATIONARY SOURCE COMMITTEE ON 6/16/17

Category	Stakeholders	Staff
Mitigation Fee Extension:		
Condensing (High Efficiency)	1 to 2 years	2 years (April 2020)
Non-condensing	No extension to 2 years	1 year (October 2019)
Weatherized	1 to 3 years	2 years (October 2021)
Mobile Home	1 year	1 year (October 2022)
With no product distinction	Some recommended 2 to 5 years	Additional input on product status needed to fully assess timing of mitigation fee
Mitigation Fee Amount	Same amount for all products (\$150); Eliminate if in active commercialization	Increase in amount; further analysis needed to assess the amount; and whether to eliminate or lower fee if certified units are being commercialized

7

INITIAL RECOMMENDATIONS – SSC 6/16/17 - continued

Category	Stakeholders	Staff
NOx Limit	<ul style="list-style-type: none"> Ranges from no change to 30 ng/j OEMs with compliant products want to hold the line at 14 ng/j 	Maintain the 14 ng/j limit; Multiple units from 3 OEMS expected to be certified by end of summer and in commercialization phase
Rebate	Provide rebate/incentive	Agree with stakeholders in considering rebate for compliant product; staff is exploring various options
Other compliance	Prevent illegal sales (i.e., internet) and circumvention of the rule (e.g., propane furnaces not regulated)	Agree with stakeholders

8

DISCUSSION HIGHLIGHTS – SSC 6/16/17

- Mitigation fee should be increased to:
 - Account for the additional cost in purchasing a compliant unit
 - Place cleaner technologies at a competitive advantage
- Incentive/Rebate program
 - Labeling such as “this unit complies with SCAQMD air emission standard”
 - Refund mitigation fee paid for the period after the product has been certified to help incentivize the commercialization of compliant products
 - Rebate to customers should be high enough to partially or fully offset cost increase of the compliant product
 - An awareness program needs to be implemented in order to help customers understand and apply for the product rebates. This can be accomplished in such forums as the advertising and social media, and SCAQMD website.

9

WHY A REBATE AND AN INCREASE IN THE MITIGATION FEE INCREASE

- Current mitigation fee is used to achieve delayed NO_x reduction
- Mitigation fee has been passed on to the customers
- Based on information provided by some OEMs the compliant products will be more expensive than non-compliant products
- The resulting cost differential for customers can be alleviated with an increase to the mitigation fee for non-compliant products and a rebate to customers for compliant products
- Staff will utilize an economic model to determine the increase in mitigation and the amount of rebate

10

COST INFORMATION PROVIDED BY OEMS

- Manufacturing cost increase for compliant standard unit (Δ COST mfg.)
 - One OEM suggested \$135 – \$250 (standard units in the lower end)
 - Another OEM suggested \$150 to meet low NO_x
- Price change (overall markup cost) for consumers
 - One OEM suggested rule of thumb is 3 times for overall markup:
 - ✓ For example: Price change for consumers = Δ COST mfg. x 3 = \$405 - \$750
 - OEMs suggest staff refer to markups in DOE's rulemaking
 - ✓ DOE technical support document (Feb. 10, 2015): Price change for consumers due to technology change = \$252 - \$505 (overall markup 2.02 for Non-weatherized gas furnace and 1.87 for mobile home gas furnace)
- Rebate
 - OEMs suggested \$400 - \$500 rebate value to customers purchasing compliant product

11

FUTURE ACTIVITIES AND SCHEDULES

- Continue individual stakeholder meetings
- Task Force meetings – September & November, 2017; January, 2018
- Public workshop and CEQA scoping meeting – Late September, 2017
- Stationary Source Committee meeting - November 17, 2017
- Public Hearing (propose amendments to Rule 1111) – February 2, 2018
- Continue to work with manufacturers on compliance plan

12

RULE 1111 COMPLIANCE PLAN AUDIT

- Checks submitted to SCAQMD for mitigation fees must include manufacturer reports
 - When submitting payments and reports, packages should be addressed directly to Area Sources
- Manufacturer report and mitigation fee payment submittal deadlines must be followed
- Manufacturer reports must have the following information for the alternate compliance plan year to be considered complete:
 - Furnace model numbers sold into District not certified in accordance with current limits;
 - Quantities of units for each model sold into District; and
 - Distributors used
- Audits will be conducted to verify manufacturer reports
 - All alternate compliance plans are subject to audits
 - Detailed manufacturer reports containing more information than is required for the alternate compliance plan reporting will be requested (e.g. serial number, installation address)
 - Reports requested shall be in electronic (Excel) format

13

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14