STATE OF MARYLAND
DEPARTMENT OF THE ENVIRONMENT
1800 Washington Boulevard
Baltimore, Maryland 21230

BEFORE THE MARYLAND DEPARTMENT OF THE ENVIRONMENT

IN THE MATTER OF NEW NGC, INC. D/B/A NATIONAL GYPSUM COMPANY 2301 SOUTH NEWKIRK ROAD BALTIMORE, MARYLAND 21224 ORDER NO .: 510-0233-6-0646 and 6-1569

ORDER

The Maryland Department of the Environment ("MDE"), pursuant to the powers, duties and responsibilities vested in the Department by Sections 2-103 and 2-301 of the Environment Article of the Annotated Code of Maryland, acts through the Air and Radiation Management Administration to regulate emissions of air pollutants, including volatile organic compounds ("VOCs"), and has jurisdiction over emissions into the air and ambient air quality in the State of Maryland ("State"), and issues this Order authorizing an alternative VOC emissions standard in connection with the construction permit modification application submitted by New NGC, Inc. d/b/a National Gypsum Company ("NGC") for the following reasons.

APPLICABLE LAW

1. Under the Code of Maryland Regulations ("COMAR") 26.11.06.06E, a person who proposes to construct an installation that is not subject to New Source Review Source requirements in COMAR 26.11.17 and who is unable to comply with the requirements of §B(1)(b) or B(2)(c) of this regulation, may request an exception from the Department.

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2. Upon a proper finding, as enumerated in COMAR 26.11.06.06E(3), the Department is authorized to grant the exception through a departmental order and permit to construct setting forth the alternative VOC emission standard, including any conditions determined by the Department to be necessary.

FINDINGS

- 3. NGC is the owner and operator of a wallboard manufacturing facility ("Facility") located at 2301 South Newkirk Road, Baltimore, Maryland, which emits, among other pollutants, VOCs pursuant to State Air Quality Control Permit No. 510-0233-6-0646 and -1569 ("PTC") and Part 70 Operating Permit (# 24-510-00233) ("Operating Permit").
- 4. The Facility includes two major manufacturing lines, Board Kiln No. 1 and Board Kiln No. 2 (the "Production Lines"). NGC submitted a permit to construct application dated March 30, 2015 to modify its Board Kiln No. 1 such that it could be used to manufacture new silicone XP and eXP wallboard products. Since silicone based additives used in either silicone XP water resistant or eXP water resistant wallboard production contain higher VOC ingredients, Board Kiln No. 1 would cause more VOC emissions when it manufactures silicone XP water resistant or eXP water resistant wallboard products. NGC is also proposing to install a Regenerative Thermal Oxidizer ("RTO") to control VOC emissions from Board Kiln No. 1 when it is producing silicone XP water resistant and eXP water resistant wallboard products. The existing Board Kiln No. 2 will continuously be used to manufacture regular wallboard products only.
- 5. The VOC regulation applicable to Board Kiln No.1 is COMAR 26.11.06.06B(1)(a) which requires a person may not cause or permit the discharge of

VOCs from any installation constructed before May 12, 1972 in excess of 200 pounds per day unless the discharge is reduced by 85 percent or more overall.

- 6. The VOC regulation applicable to Board Kiln No.2 is COMAR 26.11.06.06B(1)(b) which requires a person may not cause or permit the discharge of VOCs from any installation constructed on or after May 12, 1972 in excess of 20 pounds per day unless the discharge is reduced by 85 percent or more overall.
- In conjunction with the application to manufacture silicone XP and eXP, NGC submitted an original exception request dated March 30, 2015 and revised its exception request in May 2015 for an alternative VOC emission standard for COMAR 26.11.06.06B(1)(b).
- 8. The Facility is a major source of nitrogen oxides (NOx), but is not a major source of any other criteria pollutants. The Facility also holds a variety of Department air quality control construction permits and equipment registrations for individual sources that are included in the Operating Permit. Board Kilns No. 1 and No. 2 have been designated as U23 and U30 in the Part 70 Operating Permit, respectively.
- 9. The Production Lines and RTO will be operated such that the facility-wide VOC emissions will remain below the 25 tons per year so that it is not a major VOC emission source. The only other source of VOC emissions at the facility are the impact mills. As such, in order to remain below 25 tpy facility wide, VOC emissions from Board Kilns No. 1 and No. 2 will be totaled with the impact mill emissions and tracked together. As long as NGC remains as a minor VOC emission source, the net VOC emission increase from the proposed modification would be below the threshold of 25 tons per year for a Non-attainment New Source Review in COMAR 26.11.17.

<u>ORDER</u>

It is hereby ORDERED that the request for an exception to the VOC emissions standard is hereby granted. It is FURTHER ORDERED that NGC shall comply with the following alternative VOC standards and other conditions:

- (1) NGC shall install an RTO on Board Kiln No. 1, which is designed to achieve at least a 99% overall VOC control efficiency, or not greater than 0.5 ppmv of VOC in the flue gases exiting the RTO.
- (2) Total VOC emissions from Board Kiln No. 1 and Board Kiln No. 2, combined, shall not exceed 195 pounds per operating day.
- (3) Total premises wide VOC emissions shall be less 25 tons in any rolling 12-month period to ensure that the total net VOC emissions increase resulting from the modification of Board Kiln No. 1 and Board Kiln No. 2, combined, is less than the non-attainment new source review threshold, 25 tons in any rolling 12-month period.
- (4) NGC shall vent the flue gases from Board Kiln No. 1 through the RTO prior to discharging to the atmosphere when manufacturing silicone XP water resistant wallboard and eXP water resistant wallboard.
- (5) The temperature of the combustion zone of the RTO shall be maintained to at least the minimum temperature established during the most recent stack emissions tests demonstrating compliance with the daily VOC emission limit of 195 pounds per operating day.
- (6) The Permittee shall manufacture regular wallboard only in Board Kiln No. 2.
 Regular wallboard means any wallboard, that is not silicone XP water resistant wallboard or eXP water resistant wallboard, and that is not prohibited for production by the Department.

	(7)	NGC shall monitor daily production for each type of wallboard and shall
calcul	ate total	daily VOC emissions from Board Kiln # 1 and Board Kiln #2 to demonstrate
compl	liance w	ith the alternative VOC emission standard, 195 pounds per operating day.

March 11, 2016

Benjamin Grumbles, Secretary

Maryland Department of the Environment

Approved as to form and legal sufficiency this

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Assistant Attorney General

day of March , 2018.6 RP