



Janice K. Brewer
Governor

ARIZONA DEPARTMENT OF ENVIRONMENTAL QUALITY

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Henry R. Darwin
Director

Notice of Proprietary Treatment Product Listing Pursuant to Arizona Administrative Code R18-9-A309(E) ADEQ File No. 20110014

1. Proprietary Treatment Product Name, Model, and Description

Product Name: Singulair Green®
 Model: Singulair Green® 960-500 and Singulair Green® 960-600
 Description: The Singulair Green is a combination of primary treatment, flow equalization, and secondary treatment by extended aeration activated sludge process and filtration processes. The system consists of a HDPE compact pre-engineered tank with three chambers. The first chamber is for pretreatment, the second chamber is the aeration chamber with mechanical aerator, and the third chamber is the clarification chamber where a Bio-Kinetic® system provides flow equalization, final filtration, and settling prior to discharge. A Bio-Static sludge return will be located into the cast-in-place openings in the bottom of the aeration/clarification chamber wall to provide positive return of settled solids from the clarification chamber to the aeration chamber for additional treatment.

2. Manufacturer Information

Name: Norweco, Inc.
 Address: 220 Republic St.
 City/State/Zip: Norwalk, OH 44857
 Phone: 419-668-4471
 Fax: 419-663-5440
 Website: www.norweco.com

3. Recognized Treatment Performance

Parameter	Averaging Time	Maximum Value for Parameter & Averaging Time
5-Day Biochemical Oxygen Demand (BOD ₅), mg/l	30-day arithmetic mean	30
Total Suspended Solids (TSS), mg/l	30-day arithmetic mean	30
Total nitrogen (as nitrogen), mg/l	five-month arithmetic mean	53*
Total coliform, colony forming units/100ml	95th percentile	300,000

* Default value due to the lack of submitting 3rd party test data per R18-9-E315(C).

4. Product Applicability and Limitations for Use for a Recognized General Permit Technology

<p>Applicability: This listing is for the treatment technology specified in A.A.C. R18-9-E315.</p> <p>Limitations:</p> <ul style="list-style-type: none"> A. This product is only approved for wastewater design flow, per A.A.C. R18-9-A309 (B)(3) up to 600 gpd, from homes and small business. B. Anti-flotation systems must be installed where high water is a concern. C. This listing is only for technology approved in accordance with A.A.C. R18-9-E315 and does not include any other technology/product including disinfection devices. D. This listing EXCLUDES appurtenances which are considered to be “other manufactured materials and components” such as an alarm, control panel, control, switch, timer, wiring, other electrical devices, and installation components; which are subject to both the manufacturer specifications and any more restrictive requirement in 18 A.A.C. 9, Article 3. E. The tank MUST be located in an area where “NO VEHICLES” of any size will operate over the tank per Manufacturer’s requirement.
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5. Alternative Criteria and Exceptions for Use Under the Recognized General Permit Technology

Alternative Criteria and exception:	None
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6. Documents Used as the Basis for this Proprietary Treatment Product Listing Notice

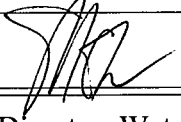
Application for Treatment Product Listing:	1/27/11 (NOTE 1)
Test data:	NSF Final Report, dated April 1996 & November 2007.
Structural Analysis:	08/3/2010, O’Donnell Consulting Engineers, Inc.
Parts List:	Page 4, SINGULAIR GREEN by Norweco for Arizona Applications 6/1/12.
Installation Instructions:	NORWECO Tank Delivery and Setting, dated 6/1/12.
Manufacturer’s Warrantee:	SINGULAIR [®] Three year limited warranty SINGULAIR [®] Lifetime warranty and exchange program
Manufacturer’s Specifications:	SINGULAIR GREEN by Norweco for Arizona Applications 6/1/12 & letter with an attachment of Specification signed and sealed by a P.E. on September 25.
Manufacturer’s Design Drawings:	Detail Design Drawings of the Tanks for design flow of 500 gpd and 600 gpd considering 24 hour power and pump outage, 1/21/2013.
Owner’s Manual	SINGULAIR GREEN [®] by Norweco [®] for Arizona Applications 6/1/12.

NOTE 1 – This document is an integral part of this Proprietary Treatment Product Listing Notice and is included in the Arizona Department of Environmental Quality website at:

<http://www.azdeq.gov/environ/water/engineering/product.html>

7. Terms and Conditions for this Proprietary Treatment Product Listing Notice

- A. This Notice of Proprietary Treatment Product Listing shall remain in effect until any of the following occurs:
- i. Applicable provisions of the Arizona Administrative Code, Title 18, Chapter 9, Article 3 are revised;
 - ii. Documents used for the basis of this listing are altered or modified;
 - iii. Manufacturer claims which are relied upon for this listing are later determined to contain an error or omission;
 - iv. The manufacturer requests termination of this listing;
 - v. A listing error or omission is identified; or
 - vi. The manufacturer and ADEQ mutually agree to reissue this notification to incorporate correction or update for any reason.
- B. This Notice of Proprietary Treatment Product Listing does not apply when the:
- i. Listed proprietary treatment product is modified or operated in a manner that conflicts with Arizona law or the documents used for the basis of this listing action in Section 6.
 - ii. Listed proprietary treatment products is used in a manner that cannot be achieved the performance in Section 3 above.
- C. This Notice of Proprietary Treatment Product Listing applies solely to the product specified in Section 1 above.
- D. The manufacturer is responsible for notifying the ADEQ of changes to contact information at the following address:
 Attention: Product Listing Supervisor
 Engineering Review Desk,
 1110 West Washington Street
 Phoenix, AZ 85007.
- E. The listing by ADEQ of any proprietary product or service is not an endorsement by ADEQ or the State of Arizona. ADEQ does not endorse, represent, guarantee, warranty or defend the use of any product which is authorized for use pursuant to A.A.C. R18-9-A309(E). Product providers are a direct source unrelated to ADEQ or the State of Arizona. Use of any listed product is at the user's risk and the State assumes no liability.

Signature:		Date Signed:	9/5/2013
Title:	Director, Water Quality Division		

ERP: 12-173
 ADEQ File #:20110014
 Reviewer: Tanveer Faiz