

CHARLES COUNTY DEPARTMENT OF HEALTH
DIVISION OF ENVIRONMENTAL HEALTH
4545 CRAIN HIGHWAY, PO BOX 1050
WHITE PLAINS, MARYLAND 20695

BAY RESTORATION GRANT APPLICATION
NITROGEN-REDUCING PRETREATMENT UNIT

This application is designed to aid in determining your eligibility. Submit completed applications to the address above.

BUILDING

- Residential
- Commercial
- Industrial
- Other _____

TYPE

- Repair Septic System
- Upgrade Septic System
- For New Construction
- Other _____

WATER SUPPLY

- Existing Well Tag # _____
- Public Water

1. OWNER _____ ADDRESS _____
CITY _____ STATE _____ ZIP CODE _____
PHONE NUMBER (HOME) _____ WORK _____

SOCIAL SECURITY NUMBER # (Required For Payment Purposes) _____

2. BUILDING ADDRESS _____
(House Number, Street, City)

3. PROPERTY TAX ACCOUNT NUMBER _____

4. SUBDIVISION _____ LOT NUMBER _____
TAX MAP _____ PARCEL _____

**** DESCRIBE ANY PROBLEMS WITH YOUR EXISTING SYSTEM**

5. LOT LOCATED WITHIN CHESAPEAKE BAY CRITICAL AREA: YES ___ NO ___ UNKNOWN ___

6. NUMBER OF BEDROOMS: _____

NAME, MAILING ADDRESS AND PHONE NUMBER OF APPLICANT:

ATTACH A SITE PLAN SHOWING THE SIZE AND SHAPE OF THE PROPERTY, HOUSE LOCATION, WELL AND SEPTIC SYSTEM ON THE PROPERTY.

The applicant hereby certifies and agrees that:

(1) the applicant is authorized to make the application; (2) the information is correct; (3) the applicant will comply with all regulations of Charles County which are applicable hereto; (4) the applicant will perform no work on the above property not specifically described in this application; (5) the applicant grants County officials and approved contractors the right to enter onto the property for the purpose of inspecting the work permitted, posting notices, and performing 5-year maintenance and sampling.

SIGNED _____ DATE _____

Instructions for Completing the Bay Restoration Grant Application for a Nitrogen-Reducing Pretreatment Unit

The following are instructions for completing an application to upgrade existing septic systems with nitrogen reducing pretreatment units. The information listed below corresponds to the items listed on the Bay Restoration Grant Application.

- Building:** Indicate the type of building on the property.
- Type:** Indicate the type of septic system project for the property.
- Water Supply:** Indicate the type of water supply on the property.

- Item 1:** List the property owner's name and mailing address including the street address, city, state, and zip code. Also include the home and work telephone numbers for the property owner.
- Item 2:** List the building address of the property, including the house number, street name, and city.
- Item 3:** Transfer the 12-digit tax account number from the corresponding County property tax bill.

Applicant Information:

Applicant must sign the application and agree to the terms of the application. Provide name, mailing address and phone number of the applicant in the box provided.

Site Plan:

Submit a site plan showing the size and shape of the property, house location, well and septic system on the property, property lines, rights of way, easements, and existing improvements such as decks, garages, sheds and swimming pools.

Mail Application To:

Charles County Department of Health
Environmental Health Division
4545 Crain Highway
PO Box 1050
White Plains, Maryland 20695

For More Information Contact:

Susan Morris
(301) 609-6766

BAY RESTORATION (SEPTIC) FUND (BRF)
DRAFT - PROGRAM IMPLEMENTATION GUIDANCE FOR FY 2015
(Annotated Code of MD §9-1605.2 & COMAR 26.03.13)
FOR ON-SITE SEWAGE DISPOSAL SYSTEM (OSDS) UPGRADES USING BEST AVAILABLE TECHNOLOGY (BAT) FOR NITROGEN REMOVAL

I. Prioritization

The “grant recipients” (local government, health department, others, who are awarded BRF septic funds by the Board of Public Works) should prioritize applications for financial assistance as follows:

1. Failing OSDS in the Critical Areas
2. Failing OSDS outside the Critical Areas
3. Non-Conforming OSDS in the Critical Areas
4. Non-conforming OSDS outside the Critical Areas
5. Other OSDS in the Critical Areas, including new construction
6. Other OSDS outside the Critical Areas, including new construction

II. Income Based Grant Eligibility

Grant assistance should be based on the following Income Criteria:

	<u>% Eligibility</u>
Homeowners (may include homes under a housing cooperative)	
1. Household income less than or equal to \$300,000/year	100%
2. Household income more than \$300,000/year	50%
Non-profit Entities (including governmental entities)	100%
For-profit Businesses	50%

III. Eligible Projects for Bay Restoration (Septic) Fund Grant Funding

Based on the above prioritization, the BRF grant funding may be used for any one of the following eligible project options:

1. The cost attributable to upgrading an existing OSDS to BAT for nitrogen removal (*most funding requests will fall under this category*).
2. The cost differential* between a conventional OSDS and one that utilizes BAT for Nitrogen Removal for new construction.

** For “cost differential” purposes on new construction, use a statewide average cost of \$1,200 as the cost of a traditional septic tank. Maximum BRF grant = (BAT Cost - \$1,200) x % eligibility (based on income in Section II)*

3. The cost, up to the sum of the cost of each “individual BAT system”, of replacing multiple OSDS located in the same community with a new community system that is owned by a local government and meets Enhanced Nutrient Removal Standards (*MDE prior approval required*).
4. The cost, up to the sum of the cost of each “individual OSDS system using BAT”, to connect properties to an existing municipal ~~biological~~ enhanced nutrient removal wastewater treatment plant (*MDE prior approval required*.) Use the Tables below to see if a project meets the statutory requirements.

Connecting OSDS (located outside Priority Funding Areas) to a Wastewater Treatment Plant

Q1. Are BRF grant funds available to connect OSDS to sewers based on "prioritization" criteria (Item 1 above)? (For a community of several OSDS, the at least 50% OSDS must fall within the qualifying priority criteria)

No – STOP. *BRF Septic grant funds are not available for sewer connection.*

Yes

Q2. Is the proposed sewer connection to a BNR or ENR Wastewater Treatment Plant?

No – STOP. *BRF Septic Funds cannot be used for the sewer connection.*

Yes

Q3. Is the Environmental Impact of the OSDS documented by the local government?

No – STOP. *BRF Septic Funds cannot be used for the sewer connection.*

Yes (Submit to MDE with proposal)

Q4. Is the sewer connection more cost-effective than the cost of repairing or replacing the OSDS with BAT? Example: For an OSDS community with say 50 homes, is the sewer connection cost less than \$1 million? (50 x \$20,000 average cost repairing or replacing an OSDS with BAT). **Yes, go to Q6 (skip Q5); No, go to Q5.**

Q5. Is individual replacement of the OSDS not feasible? Example: For an OSDS community with say 50 homes, can Environmental Health Director certify that the individual replacement on more than 50% of existing OSDS is not feasible OR County rules do not allow replacements due to availability of public sewerage?

No - STOP. *BRF Septic Funds cannot be used for the sewer connection.*

Yes.

Q6. Is the proposed sewer connection consistent with the County Comprehensive Plan and Water/Sewer Plan?

No – STOP. *BRF Septic Funds cannot be used for the sewer connection.*

Yes

Q7. Are the OSDS proposed for sewer connection located outside County Priority Funding Areas?

No – STOP. *[Use other checklist for connecting OSDS (located inside Priority Funding Areas) to a Wastewater Treatment Plant]*

Yes

Q8. Is the OSDS proposed for sewer connections specifically identified in the County W/S plan as an area of "public health concern" or has the County environmental health director "certified" this as an area of public health concern with the intent to incorporate this in the W/S plan at a later date?

No - STOP. *BRF Septic Funds cannot be used for the sewer connection.*

Yes

Addition information must be provided to MDE to determine if a PFA exception is warranted, which should include: public health issues; potential future in-fill development; mitigation measures proposed to limit growth; net nitrogen reduction after accounting for maximum future in-fill development. **If a PFA exception is approved by the "smart growth coordinating committee", the sewer connection project can be funded with BRF Septic grant funds. Special grant conditions regarding denied access to sewer main, limits on maximum new in-fill development etc. will apply. Details on how to determine maximum eligible BRF grant amount is shown below (bottom of next page).**

Connecting OSDS ~~(located inside Priority Funding Areas)~~ to a Wastewater Treatment Plant

Q1. Are BRF grant funds available to connect OSDS to sewers based on "prioritization" criteria (Item I above)? (For a community of several OSDS, the at least 50% OSDS must fall within the qualifying priority criteria)

No – STOP. *BRF Septic grant funds are not available for sewer connection.*

Yes

Q2. Is the proposed sewer connection to ~~a BNR~~ or ENR Wastewater Treatment Plant?

No – STOP. *BRF Septic Funds cannot be used for the sewer connection.*

Yes

Q3. Is the Environmental Impact of the OSDS documented by the local government?

No – STOP. *BRF Septic Funds cannot be used for the sewer connection.*

Yes (Submit to MDE with proposal)

Q4. Is the sewer connection more cost-effective than the cost of repairing or replacing the OSDS with BAT? Example: For an OSDS community with say 50 homes, is the sewer connection cost less than \$1 million? (50 x \$20,000 average cost repairing or replacing an OSDS with BAT). **Yes, go to Q6; No, go to Q5.**

Q5. Is individual replacement of the OSDS not feasible? Example: For an OSDS community with say 50 homes, can Environmental Health Director certify that the individual replacement on more than 50% of existing OSDS is not feasible OR County rules do not allow replacements due to availability of public sewerage?

No - STOP. *BRF Septic Funds cannot be used for the sewer connection.*

Yes.

Q6. Is the proposed sewer connection consistent with the County Comprehensive Plan and Water/Sewer Plan?

No – STOP. *BRF Septic Funds cannot be used for the sewer connection.*

Yes

Q7. Are the OSDS proposed for sewer connection located ~~inside~~ the County Priority Funding Areas?

No – STOP. *[Use other checklist for connecting OSDS (located outside Priority Funding Areas) to a Wastewater Treatment Plant]*

Yes

The sewer connection project can be funded with BRF Septic grant funds. Details on how to determine maximum eligible BRF grant amount is shown below.

The maximum BRF grant amount is the **lesser of** the ~~prorated~~ sewer connection Project Cost² or the amount calculated in (A) or (B) below:

A. # of OSDS units (existing as of 10/1/2008) x \$20,000 (cost of a complete OSDS with BAT) x 50% (Minimum Income Based % eligibility); or

B. Added together... for each OSDS unit (existing as of 10/1/2008) x \$20,000 (cost of a complete OSDS with BAT) x % eligibility for each OSDS owner based on the Income criteria under Section II above

1. Prorated Cost (Max) =
$$\frac{\text{Project Cost} \times \# \text{ OSDS (existing as of 10/1/08)} \times \text{Wt. \% eligibility (income based)}}{\text{Total \# OSDS (including future in-fill that may share the sewer system)}}$$

or

Prorated Cost (Min) =
$$\frac{\text{Project Cost} \times \# \text{ OSDS (existing as of 10/1/08)} \times 50\% \text{ eligibility (minimum)}}{\text{Total \# OSDS (including future in-fill that may share the sewer system)}}$$

2. Project Cost includes cost of sewerage system design & construction, including connection fees for the purchase of capacity at the existing BNR/ENR wastewater treatment plant.

5. If BRF funds are available after allocating funds for "BAT" upgrades under Section III - 1 & 2, to all applicants (irrespective of income), the grant funds may also be provided for the repair or replacement of Non-BAT components (e.g., drainfields) for a "low income" household applicant with a "failing" OSDS (this option is not available to businesses or non-profit entities). At least three bids are required for the non-BAT components and one bid can be from the vendor providing the BAT system. The current low-income (DHR energy assistance program) eligibility criteria* is:

Income Eligibility Limits		
Effective July 1, 2011 - June 30, 2012 to be updated		
	Maximum Gross Monthly	Maximum Gross Yearly
Household Size	Income Standards	Income Standards
1	\$1,675.62	\$20,107.50
2	\$2,261.87	\$27,142.50
3	\$2,848.12	\$34,177.50
4	\$3,434.37	\$41,212.50
5	\$4,020.62	\$48,247.50
6	\$4,606.87	\$55,282.50
For each additional, person add	\$586.25	\$7,035.00

* See web link for updates: http://www.dhr.state.md.us/blog/?page_id=4334

Grant allowable BAT Cost: Includes the capital cost of BAT plus the cost of 5-years of operations and maintenance (O&M), performed by a certified service provider at a minimum of once per year or the minimum frequency recommended by the manufacturer (**This O&M funding is not applicable to BRF grant funded projects under categories "3" and "4" above.**)

IV. MDE Approved BAT for Nitrogen Removal

1. Ranking of BAT Systems: Consistent with HB 347 (2011 Session), effective June 1, 2011, and every 2-years thereafter, MDE is required to provide on its website an Evaluation and Ranking of all best available nitrogen removal technologies for on-site sewage disposal systems. The evaluation will include for each BAT technology:

- Total Nitrogen Reduction
- Total cost including Operation, Maintenance and Electricity
- Cost per pound of Nitrogen Reduction

As the BRF grant recipient, you MUST provide a copy of this MDE evaluation/ranking (Enclosed: HB347 Ranking Aug-12.pdf) to all BAT grant applicants (i.e., homeowners, businesses that apply for BAT grant funding), so that they can make an informed decision in selecting a BAT system.

For updates, the MDE web link is:

<http://www.mde.state.md.us/programs/Water/BayRestorationFund/OnsiteDisposalSystems/Documents/HB347%20Ranking%20data%20Aug-12.pdf>

2. Lowest Cost per Pound of Nitrogen Removal BAT: To simplify the procurement process MDE undertook an Invitation for Bids in 2013, from the field-verified BAT technology vendors/manufacturers: Bio-Microbics, Hoot, Norweco, Orenco, and Septitech. For Bay Restoration Fund BAT procurement purposes, MDE selected the following fixed unit price BAT by Region based on the lowest cost per pound of nitrogen removal, adjusted for 12-month inflation (Feb 2013 – Feb 2014) @ 3% increase over FY 2014:

Vendor (in ranking order based on Cost/Lbs Nitrogen Reduction) CENTRAL Region Counties: Anne Arundel, Baltimore, Carroll, Cecil, Harford, Howard & Montgomery	Cost/Lbs Nitrogen Reduction Comparison Ranking	BAT System	FY 2014 Unit Price/BAT	Contact	Phone
Freemire & Associates, Inc.	1	Bio-Microbic (RetroFast) *	\$10,219	Jeffrey Freemire	410-768-8500
Atlantic Solutions, Ltd. (a)	2	Orenco (Advantex AX20)	\$12,844	Robert Johnson	877-214-9283
Mayer Brothers, Inc.	3	Hoot (BNR)	\$12,559	Nancy Mayer	410-796-1434
Price to Match by other field-verified vendors (cost/lb equivalent)			Match Price		
Back River Pre-Cast, LLC (b)	4	Norweco (Singular TNT)	\$10,794	Matt Geckle	410-833-3394
Maryland Concrete, Inc.	5	Septitech (M400)	\$13,148	Rodney Glace	443-491-3598

(a). Orenco (Advantex AX20RT), if necessary – Match Price: \$14,915

(b). Norweco (Singular Green), if necessary - Match Price: \$10,919

* RetroFast BAT unit suitable for up to 3-bedroom home and less than 4 occupants.

Vendor (in ranking order based on Cost/Lbs Nitrogen Reduction) EASTERN Region Counties: Caroline, Dorchester, Kent, Queen Anne's, Somerset, Talbot, Wicomico & Worcester.	Cost/Lbs Nitrogen Reduction Comparison Ranking	BAT System	FY 2014 Unit Price/BAT	Contact	Phone
Freemire & Associates, Inc.	1	Bio-Microbic (RetroFast) *	\$ 9,714	Jeffrey Freemire	410-768-8500
Atlantic Solutions, Ltd. (c)	2	Orenco (Advantex AX20)	\$13,197	Robert Johnson	877-214-9283
Towers Concrete Products (d)	3	Norweco (Singular TNT)	\$10,738	John Short	443-786-0594
Price to Match by other field-verified vendors (cost/lb equivalent)			Match Price		
Mayer Brothers, Inc.	4	Hoot (BNR)	\$12,495	Nancy Mayer	410-796-1434
Gillespie and Son, Inc.	5	Septitech (M400)	\$13,081	James Gillespie	410-778-0900

(c). Orenco (Advantex AX20RT), if necessary – Match Price: \$14,838

(d). Norweco (Singular Green), if necessary - Match Price: Same as Singular TNT above

* RetroFast BAT unit suitable for up to 3-bedroom home and less than 4 occupants.

Vendor (in ranking order based on Cost/Lbs Nitrogen Reduction) SOUTHERN Region Counties: Calvert, Charles, Prince George's & St. Mary's	Cost/Lbs Nitrogen Reduction Comparison Ranking	BAT System	FY 2014 Unit Price/BAT	Contact	Phone
Freemire & Associates, Inc.	1	Bio-Microbic (RetroFast) *	\$10,219	Jeffrey Freemire	410-768-8500
Atlantic Solutions, Ltd. (e)	2	Orenco (Advantex AX20)	\$12,945	Robert Johnson	877-214-9283
Superior Tank, Inc. (f)	3	Norweco (Singular TNT)	\$10,821	Jeffrey Earnshaw	301-274-3772
Price to Match by other field-verified vendors (cost/lb equivalent)			Match Price		
Mayer Brothers, Inc.	4	Hoot (BNR)	\$12,592	Nancy Mayer	410-796-1434
Maryland Concrete, Inc.	5	Septitech (M400)	\$13,182	Rodney Glace	443-491-3598

(e). Orenco (Advantex AX20RT), if necessary – Match Price: \$14,952

(f). Norweco (Singular Green), if necessary - Match Price: Same as Singular TNT above

* RetroFast BAT unit suitable for up to 3-bedroom home and less than 4 occupants.

Vendor (in ranking order based on Cost/Lbs Nitrogen Reduction) WESTERN Region Counties: Allegany, Frederick, Garrett & Washington	Cost/Lbs Nitrogen Reduction Comparison Ranking	BAT System	FY 2014 Unit Price/BAT	Contact	Phone
Freemire & Associates, Inc.	1	Bio-Microbic (RetroFast) *	\$10,219	Jeffrey Freemire	410-768-8500
Atlantic Solutions, Ltd. (g)	2	Orenco (Advantex AX20)	\$13,956	Robert Johnson	877-214-9283
Mayer Brothers, Inc.	3	Hoot (BNR)	\$13,065	Nancy Mayer	410-796-1434
Price to Match by other field-verified vendors (cost/lb equivalent)			Match Price		
Maryland Concrete, Inc.	4	Septitech (M400)	\$13,678	Rodney Glace	443-491-3598
C.R. Semler (h)	5	Norweco (Singular TNT)	\$11,227	Charles Semler	301-416-0414

(g). Orenco (Advantex AX20RT), if necessary – Match Price: \$15,514

(h). Norweco (Singular Green), if necessary - Match Price: Same as Singular TNT above

* RetroFast BAT unit suitable for up to 3-bedroom home and less than 4 occupants.

Unit Price/BAT includes 5-year O&M and MD sales tax (which must be paid, unless BAT unit owner is a sales tax exempt public entity). The price does not include the cost of permits. Future year prices will be adjusted based on 12-month CPI published by the US-DOL, Bureau of Labor Statistics and any MD sales tax changes.

V. Grant Recipient BAT Selection, Procurement and Price

To allow flexibility, the grant recipients (local government, health department etc.) who were awarded the BRF funds by the Board of Public Works) may use the following procurement options for homeowners/businesses to select a BAT technology:

1. Homeowner/business chooses one of the higher ranking (Cost/Lb nitrogen reduction) MDE selected/procured BAT system identified by Region in Section IV-(2) above. The maximum grant allowable cost will be the fixed BAT unit price. No further local procurement action is needed.
2. Homeowner/business chooses a lower ranking (Cost/Lb nitrogen reduction) BAT, the maximum BRF grant allowable amount is the "Match Price" based on an equivalent cost per pound of nitrogen reduction calculated using the cost per pound conversion factor of the lowest ranking MDE selected fixed price vendor by Region, as the benchmark. This "Match Price" for the low ranking (non-selected) field verified vendors is also shown in Section IV-(2) above. The vendor can either offer the BAT for the Match Price or the homeowner/business can pay for the price difference. Similar Match Prices may be extrapolated for any new field verified vendors that are approved over time (contact MDE for assistance.)
3. The grant recipient undertakes a local procurement for the unit cost of the BAT installed, including 5-year O&M based on selection factors such as price, nitrogen reduction efficiency, electrical cost etc. The maximum BRF grant allowable cost will be the fixed unit price provided by the selected BAT vendor for that County.

If BRF grant is funding low income drainfields, at least three bids/price proposals should be sought from installers and the grant eligibility will be limited to the lowest price. This supporting documentation should be included with the payment request to MDE.

In cases, where a "composite" tank in lieu of a concrete tank is necessary, the recipient may negotiate a reasonable cost change order with the selected BAT vendor. This supporting documentation, along with the justification of composite tank, should be included with the payment request to MDE.

Note: BRF grant payment should be made directly to the BAT vendor/installer and not to the homeowner/business applicant.