

Permit Fact Sheet

General Information

Permit Number	WI-0061832-04-0
Permitted Facility Name and Address	Maple Ridge Dairy Business, LLC. 213922 March Rapids Road Stratford
Permit Term	May 01, 2025 to April 30, 2030
Discharge Location	Same as address above
Receiving Water	Noisy Creek
Discharge Type	Existing

Animal Units					
	Current AU		Proposed AU (Note: If all zeroes, expansions are not expected during permit term)		
	Mixed	Individual	Mixed	Individual	Date of Proposed Expansion
Animal Type					
Dairy Calves (under 400 lbs.)	48	0	0	0	
Milking and Dry Cows	2695	2753	0	0	
Heifers (400 lbs. to 800 lbs.)	72	120	0	0	
Total	2815	2753	0	0	

Facility Description

Maple Ridge Dairy Business, LLC. is an existing CAFO located in Marathon County, Wisconsin. Maple Ridge Dairy has a current herd size of 2,815 animal units (1,925 milking and dry cows, 120 heifers and 240 calves). No expansions are planned for the next permit term. Maple Ridge Dairy currently has 5,247.7 acres (2,970 owned and 2,304.7 controlled through contracts, rental agreements or leases, or under manure agreements) of which 5,147.5 are spreadable acres. Maple Ridge Dairy is operating under an approved nutrient management plan.

Substantial Compliance Determination

After a desk top review of all facilities, land app reports, compliance schedule items, and a site visit, this facility has been found to be in substantial compliance with their current permit.

Compliance determination made by Mark Kaczorowski on 3/11/2025.

Sample Point Designation For Animal Waste

Sample Point Number	Sample Point Location, Waste Type/Sample Contents and Treatment Description (as applicable)
001	HQ WSF 001- Sample point (001) is for liquid waste storage facility WSF 001 located at the HQ Farm. WSF 001 is an in-place earthen storage with a concrete bottom located directly south of the freestall barns. The facility has a capacity of 1,081,077 gallons and was constructed in 1998 and modified in 2013. WSF 001 was last evaluated in 2024.
002	HQ PWSF 001 - Sample point (002) is for Process Wastewater Storage Facility 001 (PWSF 001) located at the HQ Farm. PWSF 001 is a liquid-tight concrete storage located north east of the feed storage area. The facility has a capacity of 3,319,134 gallons and was constructed in 2024. This storage accepts process wastewater from the feed storage area.
004	HQ WSF 004- Sample point (004) is for Waste Storage Facility 004 (WSF 004) located at the HQ Farm. WSF 004 is an in-place earthen storage located directly south of WSF 001. The facility has a capacity of 5,670,223 gallons and was constructed in 1998 and modified in 2013. WSF 004 was last evaluated in 2024.
005	Solids 001 - Sample point (005) is for any manure solids removed from bottom of liquid waste storage facilities. This includes manure-laden sand solids, manure fiber solids, etc. Representative samples shall be taken from each waste storage facility.
006	Solids 002 - Sample point (006) is for solid manure stacked in approved headland stacking locations. Representative samples shall be taken of this manure prior to land application. Note: Headland stacking sites are subject to production site discharge limitations; weekly visual monitoring is required during use of stacking sites to ensure discharges meet permit requirements.
008	Solids 003 - Sample point (008) is for solid manure sources that are directly land applied and not stored in a waste storage facility. This includes solid sources such as calf hutch manure, maternity pen bedpack, heifer bedpack, steer manure, etc. Representative samples shall be taken for each manure source type.
011	Feed Storage Area & Runoff Control System: Sample point (011) is for visual monitoring and inspection of the feed storage area and associated runoff control system located at the Headquarters Farm. Proper operation and maintenance is required to ensure discharges meet permit requirements. Weekly inspections are required and shall be recorded according to monitoring program.
012	Hein Farm WSF 012 - Sample point (012) is for Waste Storage Facility 012 (WSF 012) located at the Hein Farm. WSF 012 is an in-place earthen storage located north of the barn. The facility has a capacity of 3,902,692 gallons and was constructed in 1997 and modified in 2014. WSF 012 was last evaluated in 2024 and met permit requirements.
013	Hein Farm WSF 013 - Sample point (013) is for Waste Storage Facility 013 (WSF 013) located at the Hein Farm. WSF 013 is an in-place earthen storage located south east of WSF 012. The facility has a capacity of 1,280,492 gallons and was constructed in 1989. WSF 013 was last evaluated in 2024 and met permit requirements.
014	Hein Farm WSF 014 - Sample point (014) is for Waste Storage Facility 014 (WSF 014) located at the Hein Farm. WSF 014 is a liquid-tight concrete Pipping storage located east of WSF 012. The facility has a capacity of 5,835,123 gallons and was constructed in 2022.
015	Forrest Farm WSF 015 - Sample point (015) is for Waste Storage Facility 015 (WSF 015) located at the Forrest Farm. WSF 015 is an in-place earthen storage located east of WSF 016. The facility has a capacity of 195,802 gallons. WSF 015 was least evaluated in 2024 and met permit requirements.

Sample Point Designation For Animal Waste	
Sample Point Number	Sample Point Location, Waste Type/Sample Contents and Treatment Description (as applicable)
016	Forrest Farm WSF 016 - Sample point (016) is for Waste Storage Facility 016 (WSF 016) located at the Forrest Farm. WSF 016 is an in-place earthen storage located west of WSF 015. The facility has a capacity of 2,791,168 gallons and was constructed in 2005. WSF 016 was least evaluated in 2024 and met permit requirements
019	Martin Farm WSF 019 - Sample point (019) is for Waste Storage Facility 019 (WSF 019) located at the Martin Farm. WSF 019 is an in-place earthen storage. The facility has a capacity of 1,144,440 gallons and was constructed in 1999. WSF 019 was least evaluated in 2024 and met permit requirements.
020	Storm Water Runoff Control System: Sample point (020) is for visual monitoring and inspection of all production site storm water conveyance systems. This includes roof gutter and downspout structures, drainage tile systems, grassed waterways and other diversion systems that transport uncontaminated storm water. Proper operation and maintenance is required to keep uncontaminated runoff diverted away from manure and process wastewater handling systems. Weekly inspections are required and shall be recorded according to monitoring program.
021	Calf Lot & Runoff Control System - Sample point (021) is for visual monitoring and inspection of the calf lot and associated runoff control system located at headquarters farm. Proper operation and maintenance is required to ensure discharges meet permit requirements. Weekly inspections are required and shall be recorded according to monitoring program.

1 Livestock Operations - Proposed Operation and Management

Production Area Discharge Limitations

Beginning on the effective date of the permit, the permittee may not discharge pollutants from the operation’s production area (e.g., manure storage areas, outdoor animal lots, composting and leachate containment systems, milking center wastewater treatment/containment systems, raw material storage areas) to navigable waters, except in the event a 25-year, 24-hour rainfall event (or greater) causes the discharge from a structure which is properly designed and maintained to contain a 25-year, 24-hour rainfall event for this location as determined under s. NR 243.04. If an allowable discharge occurs from the production area, state water quality standards may not be exceeded.

Runoff Control

The permit requires control of contaminated runoff from all elements of the production area to prevent a discharge of pollutants to navigable waters in accordance with the Production Area Discharge Limitations and to comply with surface water quality standards and groundwater standards. Beginning on the effective date of this permit, (if needed) interim measures shall be implemented to prevent discharges of pollutants to navigable waters. In addition, permanent runoff control system(s) shall be designed, operated and maintained in accordance with the requirements found in USDA Natural Resources Conservation Service standards and ch. NR 243, Wis. Adm. Code. If any upgrading or modifications to runoff controls are necessary, formal engineering plans and specifications must submitted to the Department for approval.

Manure and Process Wastewater Storage

The permit requires the operation to have adequate storage for manure and process wastewater and that storage or containment facilities are designed, operated and maintained to prevent overflows and discharges to waters of the state. In order to prevent overflows, the permittee must maintain levels of materials in liquid storage or containment facilities at or below certain levels including a one foot margin of safety that can never be exceeded. If any upgrading or modifications

to the storage facilities are necessary, formal engineering plans and specifications must be submitted to the Department for approval.

The permittee currently has approximately 291 days of storage for liquid manure. The permittee must maintain 180 days of storage, unless temporary reductions in required storage are approved by the Department.

Solid Manure Stacking

The operation has proposed to stack solid manure. All stacking of solid manure shall be done in accordance with ch. NR 243, Wis. Adm. Code, which includes restrictions from NRCS Standard 313. Stacking of manure is considered to be part of the production area and is subject to the Production Area Discharge Limitations.

Ancillary Service and Storage Areas

The permittee shall take preventative maintenance actions and conduct visual inspections to minimize pollutant discharges from areas of the operation that are not part of the production area or land application areas. These areas are called ancillary service and storage areas and include access roads, shipping and receiving areas, maintenance areas, refuse piles and CAFO outdoor vegetated areas.

Nutrient Management

With 2,815 animal units, it is estimated that approximately 31,770,350 gallons and 1243 tons of manure and process wastewater will be produced per year. The permittee owns *approximately* 2970 acres of cropland and rents about 2,304.7 acres. Given the rotation commonly used by the permittee, 5,147.5 acres are available (or open) to receive manure and process wastewater on an annual basis. The permit requires all landspreading of manure and process wastewater be completed in accordance with an approved nutrient management plan. The permit will require sampling and analysis of manure and process wastewater that will be landspread. Landspreading rates must be adjusted based on sample analysis. The permit requires the permittee to maintain a daily log that documents landspreading activities. The permit also requires the submittal of an annual report that summarizes all landspreading activities. Plans must be updated annually to reflect cropping plans and other operational changes. Among the requirements, the plans must include detailed landspreading information including field by field nutrient budgets.

The permittee is required to implement a number of practices to address potential water quality impacts associated with the land application of manure and process wastewater. Among the permit conditions are restrictions on manure ponding, restrictions on runoff of manure and process wastewater from cropped fields, and setbacks from wells and direct conduits to groundwater (e.g., sinkholes, fractured bedrock at the surface). In addition, the permittee must implement a phosphorus based nutrient management plan that addresses phosphorus delivery to surface waters by basing manure and process wastewater applications on soil test phosphorus levels or the Wisconsin Phosphorus index. Additional phosphorus application restrictions apply to fields that are high in soil test phosphorus (>100 ppm).

The permittee must also implement conservation practices when applying manure near navigable waters and their conduits, referred to as the Surface Water Quality Management Area (SWQMA). These practices include a 100-foot setback from navigable waters and their conduits, a 35-foot vegetated buffer adjacent to the navigable water or conduit, or a practice that provides equivalent pollutant reductions equivalent to or better than the 100-foot setback.

In addition, the permittee must comply with restrictions on land application of manure and process wastewater on frozen or snow-covered ground. Included in these restrictions is a prohibition on surface applications of solid manure ($\geq 12\%$ solids) on frozen or snow-covered ground during February and March. Non-emergency surface applications of liquid manure (<12%) on frozen or snow-covered ground are prohibited.

Monitoring and Sampling Requirements

The permittee must submit a monitoring and inspection program that outlines how the permittee will conduct self-inspections to determine compliance with permit conditions. These self-inspections include visual inspections of water lines, diversion devices, storage and containment structures and other parts of the production area. The permit requires periodic inspections and calibrations of landspreading equipment. The permittee must take corrective actions to problems identified inspections or otherwise notify the Department. Samples of manure, process wastewater and soils receiving land applied materials from the operation must also be collected and analyzed.

Sampling Points

The permit identifies the different sources of land applied materials (e.g., manure storage facilities, milking centers, egg-washing facilities) as “Sampling Points.” For these Sampling Points, the permittee is required to sample and analyze the different sources for nutrients and other parameters which serve as the basis for determining rates of application for these materials. Other areas are also identified as Sampling Points as a means of identifying them as areas requiring action by the permittee, such as an upgrade or evaluation of a certain system or structure (e.g., runoff control systems), even though sampling is not actually required.

1.1 Sample Point Number: 001- HQ WSF 001; 002- HQ PWSF 001 ; 004- HQ WSF 004; 012- Hein Farm WSF 012 ; 013- Hein Farm WSF 013; 014- Hein Farm WSF 014; 015- Forrest Farm WSF 015; 016- Forrest Farm WSF 016; 019- Martin Farm WSF 019

Monitoring Requirements and Limitations					
Parameter	Limit Type	Limit and Units	Sample Frequency	Sample Type	Notes
Nitrogen, Total		lb/1000gal	2/Month	Grab	
Nitrogen, Available		lb/1000gal	2/Month	Calculated	
Phosphorus, Total		lb/1000gal	2/Month	Grab	
Phosphorus, Available		lb/1000gal	2/Month	Calculated	
Solids, Total		Percent	2/Month	Grab	

1.2 Sample Point Number: 005- Solids 001; 006- Solids 002; 008- Solids 003

Monitoring Requirements and Limitations					
Parameter	Limit Type	Limit and Units	Sample Frequency	Sample Type	Notes
Nitrogen, Total		lbs/ton	Quarterly	Grab	
Nitrogen, Available		lbs/ton	Quarterly	Calculated	
Phosphorus, Total		lbs/ton	Quarterly	Grab	
Phosphorus,		lbs/ton	Quarterly	Calculated	

Monitoring Requirements and Limitations					
Parameter	Limit Type	Limit and Units	Sample Frequency	Sample Type	Notes
Available					
Solids, Total		Percent	Quarterly	Grab	

1.3 Sample Point Number: 011- Feed Storage Area ; 020- Stormwater, and 021- Calf Lot

1.4 Emergency Response Plan

Required Action	Due Date
Develop Emergency Response Plan: Develop a written Emergency Response Plan within 30 days of permit coverage, available to the Department upon request.	05/31/2025

1.5 Monitoring & Inspection Program

Required Action	Due Date
Proposed Monitoring and Inspection Program: Consistent with the Monitoring and Sampling Requirements subsection, the permittee shall submit a proposed monitoring and inspection program within 90 days of the effective date of this permit.	07/31/2025

1.6 Annual Reports

Submit Annual Reports by January 31st of each year in accordance with the Annual Reports subsection in Standard Requirements.

Required Action	Due Date
Submit Annual Report #1:	01/31/2026
Submit Annual Report #2:	01/31/2027
Submit Annual Report #3:	01/31/2028
Submit Annual Report #4:	01/31/2029
Submit Annual Report #5:	01/31/2030
Ongoing Annual Reports: Continue to submit Annual Reports until permit reissuance has been completed.	

1.7 Nutrient Management Plan

Required Action	Due Date
Management Plan Annual Update #1: Submit an Annual Update to the Nutrient Management Plan by March 31st of each year. Note: In addition to Annual Updates, submit Management Plan Amendments to the Department for written approval prior to implementation of any changes to nutrient management practices, in accordance with the Nutrient Management requirements in the Livestock Operational and Sampling Requirements section.	03/31/2026
Management Plan Annual Update #2: Submit an Annual Update to the Nutrient Management Plan.	03/31/2027
Management Plan Annual Update #3: Submit an Annual Update to the Nutrient Management Plan.	03/31/2028
Management Plan Annual Update #4: Submit an Annual Update to the Nutrient Management Plan.	03/31/2029
Management Plan Annual Update #5: Submit an Annual Update to the Nutrient Management Plan.	03/31/2030
Ongoing Management Plan Annual Updates: Continue to submit Annual Updates to the Nutrient Management Plan until permit reissuance has been completed.	

1.8 Manure Storage Facility - Engineering Evaluation

Required Action	Due Date
Written Report: Complete a soil investigation at the bottom of the east edge of WSF 001 and WSF 004 to verify that bedrock separation meets NRCS 313 (12/05) requirements. The Department shall be notified once the WSF is emptied and how much separation from bedrock is present.	01/31/2026
Plans and Specifications: Should bedrock separation be less than NRCS 313 (12/05) requirements, Plans and Specifications shall be developed and submitted in accordance with Chapter 281.41, Wis. Stats., and Chapter NR 243, Wis. Adm. Code, to the Department for review detailing how WSF 001 and WSF 004 shall be modified to meet separation requirements.	01/31/2027
Corrections and Post Construction Documentation: Complete construction on the manure storage facility upgrades that permanently corrects any adverse conditions in concurrence with and approval by the Department, by the specified Date Due. Submit post construction documentation within 60 days of completion of the project.	11/30/2028

1.9 Submit Permit Reissuance Application

Required Action	Due Date
Reissuance Application: Submit a complete permit reissuance application 180 days prior to permit expiration.	10/31/2029

Prepared By: Mark Kaczorowski

Agricultural Runoff Management Specialist

Date: 3/12/2025