MEMORANDUM

To: Joint Fiscal Committee members

From: Daniel Dickerson, Fiscal Analyst

Date: February 19, 2019

Subject: Position and Grant Requests – JFO #2951 - 2954

Enclosed please find four (4) items, including three (3) limited-service positions, which the Joint Fiscal Office has received from the Administration.

JFO #2951 – One (1) limited-service position within the VT Agency of Agriculture, Food and Markets. The position would be titled Agricultural Water Quality Specialist II and would provide additional capacity for the Agency to perform its commitments to the U.S. Environmental Protection Agency (EPA) under the Lake Champlain Total Maximum Daily Load (TMDL). Specifically, this position would support the Conservation Reserve Enhancement Program, which is a program that compensates agricultural landowners for taking land out of production for a period of time and also provides cost-share for the establishment of vegetative buffers between agricultural land and waterways. The position would be funded from two sources: 1) a sub-grant from the Agency of Natural Resources that will leverage 2) grant funding from the U.S. Dept. of Agriculture. [JFO received 2/15/19]

JFO #2952 – One (1) limited-service position within the VT Agency of Agriculture, Food and Markets. The position would be titled Agricultural Engineer I and would provide additional capacity for the Agency to perform its commitments to the U.S. Environmental Protection Agency (EPA) under the Lake Champlain Total Maximum Daily Load (TMDL). Specifically, this position would support the agricultural best management practices (BMP) program and the environmental quality incentives program. The position would provide engineering and hydrogeology assistance with agricultural waste management systems, environmental monitoring and other projects aimed at reducing environmental contamination from agricultural operations. The position would be funded by a sub-grant of federal funds from the Agency of Natural Resources.

[JFO received 2/15/19]

JFO #2953 – \$199,160 from the U.S. Dept. of Justice to the VT Dept. of Corrections. The funds would be used to develop a strategic plan for a system-wide approach to enhance employment outcomes of offenders who are re-entering the workforce. The effort would be focused on student assessments and increasing capacity within the culinary program in the corrections kitchen. Funds would be distributed between two personal service contracts, a workforce skills certification system, a prostart culinary trainer certification, and other supplies/packages. The planning effort would be completed through the remainder of State FY2019 and part of FY2020.

[JFO received 2/16/19]

PHONE: (802) 828-2295

FAX: (802) 828-2483

JFO #2954 - \$2,295,876 from the U.S. Dept. of Labor to the VT Dept. of Labor (Department). The funding is being provided through Phase I of the Retaining Employment and Talent After Injury/Illness Network (RETAIN) demonstration project. The overall project would be focused on developing early intervention strategies to improve stay-at-work/return-to-work (SAW/RTW) outcomes for individuals who experience a work disability while employed. *One* (1) limited-service position, titled Grant Manager, is associated with this request. Phase I, which is estimated to last for 18 months, would be focused on project development, while phase II would focus on broader implementation and funding for phase II would be awarded based on the outcomes of phase I. The Department intends for the project to lead to the following outcomes: 1) a program that benefits injured workers, 2) reduced costs for worker's compensation claims, and 3) encourage suitable employment instead of reliance on programs like social security disability. The project would be 100% federally funded.

[JFO received 2/16/19]

Please review the enclosed materials and notify the Joint Fiscal Office (Daniel Dickerson at (802) 828-2472; ddickerson@leg.state.vt.us) if you have questions or would like an item held for legislative review. Unless we hear from you to the contrary by March 15, 2019 we will assume that you agree to consider as final the Governor's acceptance of these requests.



STATE OF VERMONT Joint Fiscal Committee Review Limited Service - Grant Funded Position Request Form

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FEB 1 5 2019

JOINT FISCAL OFFICE

09/21/2018

Date:

This form is to be used by agencies and departments when additional grant funded positions are being requested. Review and approval by the Department of Human Resources <u>must</u> be obtained <u>prior to</u> review by the Department of Finance and Management. The Department of Finance will forward requests to the Joint Fiscal Office for JFC review. A Request for Classification Review Form (RFR) and an updated organizational chart showing to whom the new position(s) would report <u>must</u> be attached to this form. Please attach additional pages as necessary to provide enough detail.

Agency/Department: Agriculture

Name and Phone (of the person con	npleting this rec	quest): Laura DiPietro	•	*
Request is for: Positions funded and attached positions funded and attached	d to a new gran d to an existing	t. grant approved by J	FO# <u>254/</u>	mgy 2-11-19
Name of Granting Agency, Title of Department of Environmental Course USDA Natural Resource Consen	nservation via I	New England Interst	ate Water Pollution Co	entrol Commission and the
List below titles, number of positions based on grant award and should m final approval:				
Title* of Position(s) Requested	# of Positions	Division/Program	Grant Funding Perio	d/Anticipated End Date
Agricitural Engineer I	1 Position	Water Quality	11/30/18-12/1/20	
		3.5	*	
*Final determination of title and pay grade to Request for Classification Review.	be made by the De	partment of Human Reso	urces Classification Division	upon submission and review of
 Justification for this request as an This position will support the Bes Program which are programs the Champlain TMDL. 	t Management	Practices Program a		
I certify that this information is correct available (required by 32 VSA Sec. 5	ct and that nece 5(b).	ssary funding, space	e and equipment for th দি	e above position(s) are
Signature of Agency or Department	Head		Date	10/12/8
Approved/Denied by Department of	Human Resourc	ces	Date \	Feb 19
Approved/Denied by Finance and Ma	8		Date	112/19
Approved/Denjed by Secretary of Ad	Iministration		Date	,
Comments:				DHR - 11/7/05
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JOINTH'SOAL DETICE



Vermont Department of Environmental Conservation

Agency of Natural Resources

MEMORANDUM OF AGREEMENT BETWEEN THE VERMONT DEPARTMENT OF ENVIRONMENTAL CONSERVATION AND THE VERMONT AGENCY OF AGRICULTURE, FOOD AND MARKETS FOR ADDITIONAL SERVICES FOR THE CONSERVATION RESERVE ENHANCEMENT PROGRAM, FARM AGRONOMIC PRACTICES, AND ENGINEERING SERVICES

This Memorandum of Agreement sets forth the agreement between the parties, Vermont Department of Environmental Conservation (DEC) and the Vermont Agency of Agriculture, Food and Markets (AAFM) (collectively referred to as "the Parties"), for the purpose of providing support for additional services in the Conservation Reserve Enhancement Program (CREP), implementation of Farm Agronomic Practices (FAP) and additional engineering services.

I. PROJECT PURPOSE:

The purpose of this project is to increase the successful implementation of the 2016 Lake Champlain Phosphorus Total Maximum Daily Load (TMDL) with accepted best management practices that will reduce the potential for nutrient impacts to surface waters in Vermont. Agriculture accounts for approximately 40% of the phosphorus load to Lake Champlain, therefore changes in this sector have the potential for significant water quality improvements. Addressing the high subwatershed load reduction goals will require extensive education and practice implementation above and beyond regulatory compliance. This workplan addresses the Vermont Lake Champlain Phosphorus TMDL Phase 1 Implementation Plan Chapter 6, Vermont commitments to further reduce nonpoint source pollution, Section A, Agricultural programs, "Agricultural Management."

The Agency of Natural Resources (ANR) is sub-awarding these funds to the Vermont Agency of Agriculture, Food and Markets (AAFM) to achieve these TMDL goals.

AAFM will use three methods to achieve this goal:

- Fund additional services for expanded program opportunities and implementation of the Conservation Reserve Enhancement Program (CREP) on critical agricultural lands.
- 2. Fund increased implementation of farm agronomic practices such as cover crops, reduced tillage, alternative manure incorporation, and crop rotations.
- Fund additional engineering services to increase installation of production area practices such as manure storage facilities, heavy use areas, barnyards and silage leachate treatment.

The funding for this project totals \$722,000 and is as follows:

CFDA Title: Lake Champlain Basin Program

CFDA Number: 66.481

Award Name: Lake Champlain Basin Program

Award Number: LC-00A00481

Award Year: 2018

Federal Granting Agency: U.S. Environmental Protection Agency

Research and Development Grant? ☐ Yes ☐ No

II. AGREEMENT:

The parties agree to the following:

DEC, through this agreement, will provide AAFM with funding to support Increased Implementation of Water Quality Improvement Projects in the Lake Champlain Basin of Vermont. This agreement will fund two years of additional services for expanded program opportunities and implementation of the Conservation Reserve Enhancement Program (CREP) on critical agricultural lands; increased implementation of farm agronomic practices such as cover crops, reduced tillage, alternative manure incorporation, and crop rotations and additional engineering services to increase installation of production area practices such as manure storage facilities, heavy use areas, barnyards and silage leachate treatment.

DEC will reimburse AAFM quarterly through interdepartmental transfer upon receipt and approval of quarterly reports indicating progress toward achieving outputs and outcomes described in the EPA-approved workplan, and receipt of an invoice for that quarter's activities.

The final payment will be made upon approval of the final report and receipt of the final invoice. See *Section V. Deliverables* for more details on the content of these reports.

AAFM agrees to abide by the Federal funding terms and conditions as found in Attachment A, as well as all State requirements.

III. PROJECT CONTACTS

VAAFM ContactDEC ContactNina GageDavid Pasco

Agricultural Water Quality Specialist Admin. and Innovation Division

802-622-4098 802-490-6112

nina.gage@vermont.gov david.pasco@vermont.gov

IV. EFFECTIVE DATE; MODIFICATION

This Memorandum of Agreement shall be effective from the date of execution and shall terminate on September 30, 2020. This Memorandum of Agreement may be amended or modified at any time by mutual written agreement of both parties.

V. DELIVERABLES

AAFM will provide DEC with the following:

- Quarterly reports using the template provided by DEC outlining major activities conducted and progress achieving outputs, outcomes, and deliverables shall be submitted by January 8, April 8, July 8 and October 8, 2019, and January 8, April 8, and July 8, 2020.
- A final report summarizing the activities completed, outputs and outcomes achieved, and an estimation of phosphorus load reduction achieved from the activities shall be submitted by September 1, 2020.
- Quarterly and final reports should indicate progress achieved, including:
 - Individual outputs and outcomes including numbers and types of all best management practices that have been implemented and verified (it is assumed that these practices will be quantified annually to DEC through AAFM's regular phosphorus reduction tracking and accountability);
 - Acres of CREP installed;
 - Changes to CREP policy to incentivize additional acreage and implementation;
 - o CREP FTE level committed and tasks assigned;
 - o FTE of engineering committed; and
 - o Individual practices implemented as a result of engineering FTE.

STATE OF VERMONT	STATE OF VERMONT
Dept of Environmental Conservation	Agency of Agriculture, Food and Markets
By: E-SIGNED by Emily Boedecker on 2018-11-30 18:29:52 UTC	By: E-SIGNED by Diane Bothfeld on 2018-11-27 12:54:15 UTC
Commissioner	Secretary
Dept of Environmental Conservation	Agency of Agriculture, Food and Markets
Date:	Date:

ATTACHMENT A: STANDARD TERMS AND CONDITIONS FOR FEDERAL SUBRECIPIENTS

(ENVIRONMENTAL PROTECTION AGENCY)

- 1. Introduction. The recipient and any sub-recipient must comply with the applicable EPA general terms and conditions outlined below. These terms and conditions are in addition to the assurances and certifications made as part of the award and terms, conditions or restrictions reflected on the official assistance award document. Recipients must review their official award document for additional administrative and programmatic requirements. Failure to comply with the general terms and conditions outlined below and those directly reflected on the official assistance award document may result in enforcement actions as outlined in 2 CFR 200.338 and 200.339.
- 2. Uniform Administrative Requirements, Cost Principles and Audit Requirements for Federal Awards. This award is subject to the requirements of the Uniform Administrative Requirements, Cost Principles and Audit Requirements for Federal Awards; Title 2 CFR, Parts 200 and 1500. 2 CFR 1500.1, Adoption of 2 CFR 200, states that the Environmental Protection Agency adopts the Office of Management and Budget (OMB) guidance Uniform Administrative Requirements, Cost Principles, and Audit Requirements for Federal Awards to Non-Federal Entities (subparts A through F of 2 CFR 200), as supplemented by this part, as the Environmental Protection Agency (EPA) policies and procedures for financial assistance administration. This part satisfies the requirements of 2 CFR 200.110(a) and gives regulatory effect to the OMB guidance as supplemented by this part. EPA also has programmatic regulations located in 40 CFR Chapter 1 Subchapter B.
 - 2.1. Implementing Procurement Standards. There is a one-year grace period available to non-Federal entities for implementation of the procurement standards in 2 CFR 200.317 through 200.326. As will be detailed in the 2015 OMB Compliance Supplement, non-Federal entities choosing to delay implementation will need to specify in their documented policies and procedures that they continue to comply with 40 CFR Part 30 or 31 as applicable for one additional fiscal year which begins after December 26, 2014.
 - 2.2. Effective Date and Incremental or Supplemental Funding. Consistent with the OMB Frequently Asked Questions at https://cfo.gov/cofar on Effective Date and Incremental Funding, any new funding through an amendment (supplemental or incremental) on or after December 26, 2014, and any unobligated balances (defined at 200.98) remaining on the award at the time of the amendment, will be subject to the requirements of the Uniform Administrative Requirements, Cost Principles and Audit Requirements (2 CFR 200 and 1500).
- 3. Automated Clearing House (ACH) Payments. Under this payment mechanism, the Vermont Department of Finance and Management will obtain the recipient's banking information from the ACH Vendor Authorization Form. Recipients can also sign up for the Vendor Portal a secure online system that gives vendors direct access to payment information. Additional information concerning ACH can be obtained by contacting the Vermont Department of Finance and Management at 802-828-0676, or by visiting: http://finance.vermont.gov/forms

- 4. Consultant Cap. EPA participation in the salary rate (excluding overhead) paid to individual consultants retained by recipients or by a recipient's contractors or subcontractors shall be limited to the maximum daily rate for a Level IV of the Executive Schedule, available at: https://www.opm.gov/policy-data-oversight/pay-leave/salaries-wages/, to be adjusted annually. This limit applies to consultation services of designated individuals with specialized skills who are paid at a daily or hourly rate. This rate does not include transportation and subsistence costs for travel performed (the recipient will pay these in accordance with their normal travel reimbursement practices). Subagreements with firms for services which are awarded using the procurement requirements in Subpart D of 2 CFR 200, are not affected by this limitation unless the terms of the contract provide the recipient with responsibility for the selection, direction and control of the individuals who will be providing services under the contract at an hourly or daily rate of compensation. See 2 CFR 1500.9.
- 5. Electronic and Information Technology Accessibility. Recipients are subject to the program accessibility provisions of Section 504 of the Rehabilitation Act, codified in 40 CFR Part 7, which includes an obligation to provide individuals with disabilities reasonable accommodations and an equal and effective opportunity to benefit from or participate in a program, including those offered through electronic and information technology ("EIT"). In compliance with Section 504, EIT systems or products funded by this award must be designed to meet the diverse needs of users (e.g., U.S. public, recipient personnel) without barriers or diminished function or quality. Systems shall include usability features or functions that accommodate the needs of persons with disabilities, including those who use assistive technology. At this time, the EPA will consider a recipient's websites, interactive tools, and other EIT as being in compliance with Section 504 if such technologies meet standards established under Section 508 of the Rehabilitation Act, codified at 36 CFR Part 1194. While Section 508 does not apply directly to grant recipients, we encourage recipients to follow either the 508 guidelines or other comparable guidelines that concern accessibility to EIT for individuals with disabilities. Recipients may wish to consult the latest Section 508 guidelines issued by the U.S. Access Board or W3C's Web Content Accessibility Guidelines (WCAG) 2.0 (see http://www.access-board.gov/sec508/guide/index.htm).
- 6. Civil Rights Obligations. This term and condition incorporates by reference the signed assurance provided by the recipient's authorized representative on: 1) EPA Form 4700-4, "Preaward Compliance Review Report for All Applicants and Recipients Requesting EPA Financial Assistance"; and 2) Standard Form 424B or Standard Form 424D, as applicable. These assurances and this term and condition obligate the recipient to comply fully with applicable civil rights statutes and implementing EPA regulations.

7.1 Statutory Requirements

- 7.1.1 In carrying out this agreement, the recipient must comply with:
 - **7.1.1.1** Title VI of the Civil Rights Act of 1964, which prohibits discrimination based on race, color, and national origin, including limited English proficiency (LEP), by entities receiving Federal financial assistance.
 - **7.1.1.2** Section 504 of the Rehabilitation Act of 1973, which prohibits discrimination against persons with disabilities by entities receiving Federal financial assistance; and

- **7.1.1.3** The Age Discrimination Act of 1975, which prohibits age discrimination by entities receiving Federal financial assistance.
- 7.1.2 If the recipient is conducting an education program under this agreement, it must also comply with:
 - **7.1.2.1** Title IX of the Education Amendments of 1972, which prohibits discrimination on the basis of sex in education programs and activities operated by entities receiving Federal financial assistance.
- 7.1.3 If this agreement is funded with financial assistance under the Clean Water Act (CWA), the recipient must also comply with:
 - 7.1.3.1 Section 13 of the Federal Water Pollution Control Act Amendments of 1972, which prohibits discrimination on the basis of sex in CWA-funded programs or activities.

7.2 Regulatory Requirements

- 7.2.1 The recipient agrees to comply with all applicable EPA civil rights regulations, including: 7.2.1.1 For Title IX obligations, 40 C.F.R. Part 5; and
 - **7.2.1.2** For Title VI, Section 504, Age Discrimination Act, and Section 13 obligations, 40 CFR Part 7.
 - 7.2.1.3 As noted on the EPA Form 4700-4 signed by the recipient's authorized representative, these regulations establish specific requirements including maintaining compliance information, establishing grievance procedures, designating a Civil Rights Coordinator and providing notices of non-discrimination.

7.3 TITLE VI – LEP, Public Participation and Affirmative Compliance Obligation

- 7.3.1 As a recipient of EPA financial assistance, you are required by Title VI of the Civil Rights Act to provide meaningful access to LEP individuals. In implementing that requirement, the recipient agrees to use as a guide the Office of Civil Rights (OCR) document entitled "Guidance to Environmental Protection Agency Financial Assistance Recipients Regarding Title VI Prohibition Against National Origin Discrimination Affecting Limited English Proficient Persons." The guidance can be found at http://frwebgate.access.gpo.gov/cgibin/getdoc.cgi?dbname=2004_register&docid=fr25jn04-79.pd.
- 7.3.2 If the recipient is administering permitting programs under this agreement, the recipient agrees to use as a guide OCR's Title VI Public Involvement Guidance for EPA Assistance Recipients Administering Environmental Permitting Programs. The Guidance can be found at http://edocket.access.gpo.gov/2006/pdf/06-2691.pdf.
- 7.3.3 In accepting this assistance agreement, the recipient acknowledges it has an affirmative obligation to implement effective Title VI compliance programs and ensure that its actions do not involve discriminatory treatment and do not have discriminatory effects even when facially neutral. The recipient must be prepared to demonstrate to EPA that such compliance programs exist and are being implemented or to otherwise demonstrate how it is meeting its Title VI obligations.
- 8. Drug-Free Workplace. The recipient organization of this EPA assistance agreement must make an ongoing, good faith effort to maintain a drug-free workplace pursuant to the specific

requirements set forth in Title 2 CFR Part 1536 Subpart B. Additionally, in accordance with these regulations, the recipient organization must identify all known workplaces under its federal awards, and keep this information on file during the performance of the award.

Those recipients who are individuals must comply with the drug-free provisions set forth in Title 2 CFR Part 1536 Subpart C.

The consequences for violating this condition are detailed under Title 2 CFR Part 1536 Subpart E. Recipients can access the Code of Federal Regulations (CFR) Title 2 Part 1536 at http://ecfr.gpoaccess.gov/.

- 9. Hotel-Motel Fire Safety. Pursuant to 15 USC 2225a, the recipient agrees to ensure that all space for conferences, meetings, conventions or training seminars funded in whole or in part with federal funds complies with the protection and control guidelines of the Hotel and Motel Fire Safety Act (PL 101-391, as amended). Recipients may search the Hotel- Motel National Master List at http://www.usfa.dhs.gov/applications/hotel/ to see if a property is in compliance, or to find other information about the Act.
- 10. Recycled Paper. When directed to provide paper documents, the recipient agrees to use recycled paper and double sided printing for all reports which are prepared as a part of this agreement and delivered to EPA. This requirement does not apply to reports prepared on forms supplied by EPA.
- 11. Resource Conservation and Recovery Act. Consistent with goals of section 6002 of RCRA (42 U.S.C. 6962), State and local institutions of higher education, hospitals and non-profit organization recipients agree to give preference in procurement programs to the purchase of specific products containing recycled materials, as identified in 40 CFR Part 247.

Consistent with section 6002 of RCRA (42 U.S.C. 6962) and 2 CFR 200.322, State agencies or agencies of a political subdivision of a State and its contractors are required to purchase certain items made from recycled materials, as identified in 40 CFR Part 247, when the purchase price exceeds \$10,000 during the course of a fiscal year or where the quantity of such items acquired in the course of the preceding fiscal year was \$10,000 or more. Pursuant to 40 CFR 247.2 (d), the recipient may decide not to procure such items if they are not reasonably available in a reasonable period of time; fail to meet reasonable performance standards; or are only available at an unreasonable price.

12. Trafficking in Persons

- 12.1 Provisions applicable to a recipient that is a private entity.
- 12.1.1 The recipient, the recipient's employees, subrecipients under this award, and subrecipients' employees may not—
 - 12.1.1.1 Engage in severe forms of trafficking in persons during the period of time that the award is in effect;
 - 12.1.1.2 Procure a commercial sex act during the period of time that the award is in effect; or
 - 12.1.1.3 Use forced labor in the performance of the award or subawards under the award.

- 12.1.2 We as the Federal awarding agency may unilaterally terminate this award, without penalty, if the recipient or a subrecipient that is a private entity
 - **12.1.2.1** Is determined to have violated a prohibition in paragraph 26.1 of this award term; or
 - 12.1.2.2 Has an employee who is determined by the agency official authorized to terminate the award to have violated a prohibition in paragraph 26.1 of this award term through conduct that is either—
 - 12.1.2.2.1 Associated with performance under this award; or
 - 12.1.2.2.2 Imputed to the recipient or subrecipient using the standards and due process for imputing the conduct of an individual to an organization that are provided in 2 CFR part 180, "OMB Guidelines to Agencies on Governmentwide Debarment and Suspension (Nonprocurement)," as implemented by our Agency at 2 CFR 1532.
- 12.2 Provision applicable to a recipient other than a private entity. EPA may unilaterally terminate this award, without penalty, if a subrecipient that is a private entity—
 - 12.2.1 Is determined to have violated an applicable prohibition in paragraph 26.1. of this award term; or
 - 12.2.2 Has an employee who is determined by the agency official authorized to terminate the award to have violated an applicable prohibition in paragraph 26.1 of this award term through conduct that is either—
 - 12.2.2.1 Associated with performance under this award; or
 - 12.2.2.2 Imputed to the subrecipient using the standards and due process for imputing the conduct of an individual to an organization that are provided in 2 CFR part 180, "OMB Guidelines to Agencies on Governmentwide Debarment and Suspension (Nonprocurement)," as implemented by EPA at 2 CFR 1532.
- 12.3 Provisions applicable to any recipient.
 - 12.3.1 The recipient must inform the EPA immediately of any information received from any source alleging a violation of a prohibition in paragraph 26.1 of this award term.
 - 12.3.2 Our right to terminate unilaterally that is described in paragraph 26.1.2 and 26.2:
 - 12.3.2.1 Implements section 106(g) of the Trafficking Victims Protection Act of 2000 (TVPA), as amended (22 U.S.C. 7104(g)), and
 - 12.3.2.2 Is in addition to all other remedies for noncompliance that are available to us under this award.
 - 12.3.3 The recipient must include the requirements of paragraph 26.1 of this award term in any subaward made to a private entity.
- **12.4 Definitions.** For purposes of this award term:
 - 12.4.1 "Employee" means either:
 - 12.4.1.1 An individual employed by you or a subrecipient who is engaged in the performance of the project or program under this award; or
 - 12.4.1.2 Another person engaged in the performance of the project or program under this award and not compensated by you including, but not limited to, a volunteer or individual whose services are contributed by a third party as an inkind contribution toward cost sharing or matching requirements.

- 12.4.2 "Forced labor" means labor obtained by any of the following methods: the recruitment, harboring, transportation, provision, or obtaining of a person for labor or services, through the use of force, fraud, or coercion for the purpose of subjection to involuntary servitude, peonage, debt bondage, or slavery.
- 12.4.3 "Private entity":
 - 12.4.3.1 Means any entity other than a State, local government, Indian tribe, or foreign public entity, as those terms are defined in 2 CFR 175.25.
 - 12.4.3.2 Includes:
 - **12.4.3.2.1** A nonprofit organization, including any nonprofit institution of higher education, hospital, or tribal organization other than one included in the definition of Indian tribe at 2 CFR 175.25(b).
 - 12.4.3.2.2 A for-profit organization.
- 12.4.4 "Severe forms of trafficking in persons," "commercial sex act," and "coercion" have the meanings given at section 103 of the TVPA, as amended (22 U.S.C. 7102).
- 13. Utilization of Small, Minority and Women's Business Enterprises
- 13.1 General Compliance, 40 CFR, Part 33. The recipient agrees to comply with the requirements of EPA's Disadvantaged Business Enterprise (DBE) Program for procurement activities under assistance agreements, contained in 40 CFR, Part 33.
- 13.2 Fair Share Objectives, 40 CFR, Part 33, Subpart D. A recipient must negotiate with the appropriate EPA award official, or his/her designee, fair share objectives for MBE and WBE participation in procurement under the financial assistance agreements.
 - In accordance with 40 CFR, Section 33.411 some recipients may be exempt from the fair share objectives requirements described in 40 CFR, Part 33, Subpart D. Recipients should work with their DBE coordinator, if they think their organization may qualify for an exemption.
- 13.3 Current Fair Share Objective/Goal. The dollar amount of this assistance agreement or the total dollar amount of all of the recipient's financial assistance agreements in the current federal fiscal year from EPA is \$250,000, or more. The Vermont Department of Environamental Conservation has negotiated MBE/WBE fair share objectives/goals with EPA.
- 13.4 Negotiating Fair Share Objectives/Goals. In accordance with 40 CFR, Part 33, Subpart D, established goals/objectives remain in effect for three fiscal years unless there are significant changes to the data supporting the fair share objectives. The recipient is required to follow requirements as outlined in 40 CFR Part 33, Subpart D when renegotiating the fair share objectives/goals.
- 13.5 Six Good Faith Efforts, 40 CFR, Part 33, Subpart C. Pursuant to 40 CFR, Section 33.301, the recipient agrees to make the following good faith efforts whenever procuring construction, equipment, services and supplies under an EPA financial assistance agreement, and to require that sub-recipients, loan recipients, and prime contractors also comply. Records documenting compliance with the six good faith efforts shall be retained:

- a. Ensure DBEs are made aware of contracting opportunities to the fullest extent practicable through outreach and recruitment activities. For Indian Tribal, State and Local and Government recipients, this will include placing DBEs on solicitation lists and soliciting them whenever they are potential sources.
- b. Make information on forthcoming opportunities available to DBEs and arrange time frames for contracts and establish delivery schedules, where the requirements permit, in a way that encourages and facilitates participation by DBEs in the competitive process. This includes, whenever possible, posting solicitations for bids or proposals for a minimum of 30 calendar days before the bid or proposal closing date.
- c. Consider in the contracting process whether firms competing for large contracts could subcontract with DBEs. For Indian Tribal, State and local Government recipients, this will include dividing total requirements when economically feasible into smaller tasks or quantities to permit maximum participation by DBEs in the competitive process.
- d. Encourage contracting with a consortium of DBEs when a contract is too large for one of these firms to handle individually.
- e. Use the services and assistance of the SBA and the Minority Business Development Agency of the Department of Commerce.
- f. If the prime contractor awards subcontracts, require the prime contractor to take the steps in paragraphs (a) through (e) of this section.
- 13.6 MBE/WBE Reporting, 40 CFR, Part 33, Subpart E. MBE/WBE reporting is limited to annual reports and only required for assistance agreements where one or more the following conditions are met:
 - a. there are any funds budgeted in the contractual, equipment or construction lines of the award;
 - **b.** \$3,000 or more is included for supplies; or
 - there are funds budgeted for subawards or loans in which the expected budget(s) meet the conditions as described in items (a) and (b).

This award meets one or more of the conditions as described above, therefore, the recipient agrees to complete and submit a "MBE/WBE Utilization Under Federal Grants, Cooperative Agreements and Interagency Agreements" report (EPA Form 5700-52A) on an annual basis.

When completing the annual report, recipients are instructed to check the box titled "annual" in section 1B of the form. For the final report, recipients are instructed to check the box indicated for the "last report" of the project in section 1B of the form. Annual reports are due by October 30th of each year. Final reports are due within 90 days after the end of the project period.

The reporting requirement is based on planned procurements. Recipients with funds budgeted for non-supply procurement and/or \$3,000 or more in supplies are required to report annually whether the planned procurements take place during the reporting period or not. If no procurements take place during the reporting period, the recipient should check the box in section 5B when completing the form.

MBE/WBE reports should be sent to:

U.S. Environmental Protection Agency – Region I 5 Post Office Square – Suite 100 (OARM16-2) Boston, MA 02109-3912

Attn: Mr. Larry Wells, Disadvantaged Business Utilization Program Manager

The current EPA Form 5700-52A can be found at the EPA Office of Small Business Program's Home Page at http://www.epa.gov/osbp/dbe reporting.htm

This provision represents an approved deviation from the MBE/WBE reporting requirements as described in 40 CFR, Part 33, Section 33.502; however, the other requirements outlined in 40 CFR Part 33 remain in effect, including the Fair Share Objectives negotiation as described in 40 CFR Part 33 Subpart D.

- 13.7 Contract Administration Provisions, 40 CFR, Section 33.302. The recipient agrees to comply with the contract administration provisions of 40 CFR, Section 33.302.
- 13.8 Bidders List, 40 CFR, Section 33.501(b) and (c). Recipients of a Continuing Environmental Program Grant or other annual reporting grant, agree to create and maintain a bidders list. Recipients of an EPA financial assistance agreement to capitalize a revolving loan fund also agree to require entities receiving identified loans to create and maintain a bidders list if the recipient of the loan is subject to, or chooses to follow, competitive bidding requirements. Please see 40 CFR, Section 33.501 (b) and (c) for specific requirements and exemptions.
 - 14. Unpaid Federal Tax Liabilities and Federal Felony Convictions. Per Public Law 113-6 (Consolidated and Further Continuing Appropriations Act, 2013) and Public Law 112-175 (Continuing Appropriations Resolution, 2013) this award is subject to the provisions contained in the Department of Interior, Environment, and Related Agencies Appropriations Act, 2012, Public Law 112-74, Division E, Title IV, Sections 433 and 434 (sections 433 and 434) regarding unpaid federal tax liabilities and federal felony convictions. Accordingly, by accepting this award the recipient acknowledges that it: (1) is not subject to any unpaid Federal tax liability that has been assessed, for which all judicial and administrative remedies have been exhausted or have lapsed, and that is not being paid in a timely manner pursuant to an agreement with the authority responsible for collecting the tax liability, and (2) has not been convicted (or had an officer or agent acting on its behalf convicted) of a felony criminal conviction under any Federal law within 24 months preceding the award, unless EPA has considered suspension or debarment of the corporation, or such officer or agent, based on these tax liabilities or convictions and determined that such action is not necessary to protect the Government's interests. If the recipient fails to comply with these provisions, EPA will annul this agreement and may recover any funds the recipient has expended in violation of sections 433 and 434.



VERMONT DEPARTMENT OF PERSONNEL Request for Classification Review Position Description Form A

- ➤ This form is to be used by managers and supervisors to request classification of a position (filled or vacant) when the duties have changed, and by managers and supervisors to request the creation of a new job class/title (for a filled, vacant, or new position), and by employees to request classification of their position.
- This form was designed in Microsoft Word to download and complete on your computer. This is a form-protected document, so information can only be entered in the shaded areas of the form.
- If you prefer to fill out a hard copy of the form, contact your Personnel Officer.
- > To move from field to field use your mouse, the arrow keys or press Tab. Each form field has a limited number of characters. Use your mouse or the spacebar to mark and unmark a checkbox.
- Where additional space is needed to respond to a question, you might need to attach a separate page, and number the responses to correspond with the numbers of the questions on the form. Please contact your Personnel Officer if you have difficulty completing the form.
- The form <u>must be complete</u>, including required attachments and signatures or it will be returned to the department's personnel office. All sections of this form are required to be completed unless otherwise stated.

INSTRUCTIONS: Tell us about the job. The information you provide will be used to evaluate the position. It will not be used in any way to evaluate an employee's performance or qualifications.

Answer the questions carefully. The information you give will help ensure that the position is fairly evaluated. Here are some suggestions to consider in completing this questionnaire:

- > Tell the facts about what an employee in this position is actually expected to do.
- > Give specific examples to make it clear.
- > Write in a way so a person unfamiliar with the job will be able to understand it.
- > Describe the job as it is now; not the way it was or will become.
- Before answering each question, read it carefully.

To Submit this Request for Classification Review: If this is a filled position, the employee must sign the original* and forward to the supervisor for the supervisor's review and signature. The Personnel Officer and the Appointing Authority must also review and sign this request before it is considered complete. The effective date of review is the beginning of the first pay period following the date the complete Request for Classification Review is date stamped by the Classification Division of the Department of Personnel.

*An employee may choose to sign the form, make a copy, submit original to supervisor as noted above, while concurrently sending the copy to the Classification Division, 144 State Street, Montpelier, with a cover note indicating that the employee has submitted the original to the supervisor and is submitting the copy as a **Concurrent** filing.

If this is a request (initiated by employees, VSEA, or management) for review of all positions in a class/title please contact the appropriate Classification Analyst or the Classification Manager to discuss the request prior to submitting.

Request for Classification Review Position Description Form A

For Department of Personnel Use Only

Notice of Action #		Date Received (Stamp)
Action Taken:		
New Job Title		
Current Class Gode	New Class Code	
Current Pay Grade	New Pay Grade	
Current Mgt Level B/U OT Ca	itEEO CatFLSA	
New Mgt Level B/UOT Ca	atEEO CatFLSA	
Classification Analyst	Date	Effective Date:
Comments:		Date Processed:
	e & Skills: Mental Demand conditions: Total:	
Incumbent Information:		
Employee Name: Employee Nu	mber:	30 30
Position Number: Current Job/C	class Title:	
Agency/Department/Unit: Wo	rk Station: Zip Code:	
Supervisor's Name, Title, and Phone No	umber:	
How should the notification to the emploaddress, please provide mailing addres		location or _ other
New Position/Vacant Position Informa	tion:	,
New Position Authorization: Rec	quest Job/Class Title:	
Position Type: ☐ Permanent or ☒ Lim	ited / Funding Source: Core,	Partnership, or Sponsored
Vacant Position Number: Curre	nt Job/Class Title: Agricultural Eng	neer I
Agency/Department/Unit: AAFM-WQ	Work Station: Williston Zip Co	de: 05495
Supervisor's Name, Title and Phone Nu	ımber: Rob Achilles, 802-917-139	7
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Type of Request:		
Management: A management requirement requirement job class.	est to review the classification of a	n existing position, class, or create
☐ Employee: An employee's request	to review the classification of his/he	er current position.

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1. Job Duties

This is the *most critical* part of the form. Describe the activities and duties required in your job, **noting changes (new duties, duties no longer required, etc.) since the last review**. Place them in order of importance, beginning with the single most important activity or responsibility required in your job. The importance of the duties and expected end results should be clear, including the tolerance that may be permitted for error. Describe each job duty or activity as follows:

- > What it is: The nature of the activity.
- > How you do it: The steps you go through to perform the activity. Be specific so the reader can understand the steps.
- > Why it is done: What you are attempting to accomplish and the end result of the activity.

For example a Tax Examiner might respond as follows: (What) Audits tax returns and/or taxpayer records. (How) By developing investigation strategy; reviewing materials submitted; when appropriate interviewing people, other than the taxpayer, who have information about the taxpayer's business or residency. (Why) To determine actual tax liabilities.

Planning and engineering at a journeyman to advanced professional level for the Agency of Agriculture, Food & Markets involving the development, design, construction and management of agricultural waste storage and management systems, review and development of nutrient management planning, environmental monitoring systems/programs and other infrastructures to prevent and remediate environmental contamination. This position will provide expertise in specialized planning and engineering projects, planning and engineering advice and guidance to Farmers, Agency and sister Agencies staff, Partners Organizations, and private sector engineers, consultants, or contractors.

The Agricultural Engineer I position assists in the planning and the preparation of engineering designs for collection, transfer, storage and treatment of agricultural wastes and the review and development of field based conservation practices in according to USDA Natural Resources Conservation Service (NRCS) technical standards and specifications or equivalent standards. Provides planning, technical and regulatory assistance to Vermont farmers in the viability, sustainability, and economical feasibility regarding how construction and management practices will impact their farm.

Under the guidance of a VAAFM or NRCS professional engineer prepares design documents for practices and structures to include material standards and quantities, construction standards and acceptable site modifications. Conducts field investigations and soil and water sampling to obtain planning and design data for engineering practices or environmental monitoring systems commonly installed on farms. Generate construction layouts and as-builds with support as needed from Agricultural Engineer/Planner II. Performs field inspections and provide regulatory compliance recommendations during construction to document that conservation practices and structures will meet construction standards. Record the installation of groundwater monitoring wells by farm operators and well drillers. Implement procedures and protocols for surface and groundwater sampling projects.

Under the guidance of a VAAFM or NRCS planner or under a certified nutrient manager planner review and develop manure and wastewater handing plans and nutrient management plans. Perform field inspections and regulatory compliance recommendation for cropping, cultivation, rotation, yields and nutrient applications timing and rates. Evaluation and the implantation of field based conservation practices. Implement procedures and protocols for the importation and handling of wastes and nutrients.

Conduct environmental sampling to ensure compliance with construction standards, waste management system operation practices, farm operation permit conditions and other agricultural practices regulations.

Performs related duties as required.

2. Key Contacts

This question deals with the personal contacts and interactions that occur in this job. Provide brief typical examples indicating your primary contacts (**not** an exhaustive or all-inclusive list of contacts) other than those persons to whom you report or who report to you. If you work as part of a team, or if your primary contacts are with other agencies or groups outside State government describe those interactions, and what your role is. For example: you may collaborate, monitor, guide, or facilitate change.

Work is performed under the general supervision of the Agriculture Engineering Section Chief and as applicable under an Agricultural Engineer II.

Position will coordinate with federal agencies such as the NRCS engineering and planning staff; USDA Farm Serice Agency (FSA) planning staff; and may work with the Environmental Protection Agency (EPA); and the Army Corp of Engineers.

Position will coordinate with state agencies such as the the Vermont Agency of Natural Resources, engineering and scientific staff in the Concentrated Animal Feeding Operation, Stream Alternations, Waste and Wastewater Permitting, Dam Permitting, and the Geological Survey Sections; Vermont Agency of Transportation; partners such as UVM Extension, Vemont Land Trust, Farmer Groups, and Watershed Groups; and private sector engineers and environmental consultants.

Postion will work with agriculture equipment dealers, material suppliers and contractors to determine feasibility and practically of installation of waste management installations.

The Agricultural Engineer I position mostly communicates at the planner and engineering technician level in peer to peer communications.

3. Are there licensing, registration, or certification requirements; or special or unusual skills necessary to perform this job?

Include any special licenses, registrations, certifications, skills; (such as counseling, engineering, computer programming, graphic design, strategic planning, keyboarding) including skills with specific equipment, tools, technology, etc. (such as mainframe computers, power tools, trucks, road equipment, specific software packages). Be specific, if you must be able to drive a commercial vehicle, or must know Visual Basic, indicate so.

Education and Experience: Bachelor's degree in agricultural, civil, environmental or structural engineering or a bachelor's degree in natural resources, plant or soil science AND two (2) or more years of professional level engineering experience that is fundamental to the planning, design, construction, and management of agricultural waste systems.

OR

Education and Experience: Associate's degree in agricultural, civil, environmental, or structural engineering or a associate's degree in natural resources, plant or soil science AND four (4) or more years of professional level engineering experience that is fundamental to the planning, design, construction, and management of agricultural waste systems.

OR

Education and Experience: Master's degree in agricultural, civil, environmental, or structural engineering or master's degree in natural resources, plant or soil science AND one (1) or more or professional level engineering experience that is fundamental to the design, construction, and management of agricultural waste systems.

Recommended to have passed the Fundamentals of Engineering (FE) exam and achieving an Engineer Intern or Engineer-in-Training status or certification in NRCS's Manure and Wastewater Handling and Storage or Land Treatment Practices.

Knowledge of engineering principles and practices used in the planning, design and construction of earthen impoundments, reinforced concrete structures, storm and wastewater handling and treatment, hydrogeology modeling, and water quality and pollution prevention efforts. Knowledge of the materials, methods and equipment including the preparation of cost estimates and specifications.

Knowledge of plant and soil science principles and practices used to develop site specific conservation practices to be implemented, including appropriate production and field practices to reduce or control runoff of nutrients to waters. Knowledge of the nitrogen or phosphorus cycle and nutrient application rates and timing

Ability to inspect work under construction and evaluation its conformity with specifications. Ability to review plans, cost estimates, and specification prepared by others. Ability to maintain and establish working relationships. Ability to communicate effectively orally and in writing.

Develop working knowledge of state and federal laws, regulations affecting agricultural water quality and Best Management Practices to prevent discharges. Gain working knowledge of NRCS technical references, especially the National Engineering Manual, the Engineering Field Handbook, the Agricultural Waste Management Field Handbook, and other technical releases and guidance. Gain working knowledge of UVM Nutrient Recommendations for Field Crops in Vermont or other university recommendations that are appropriate for Vermont's geographic conditions.

Ability to use a total station, robotic or GPS enabled survey equipment to create spatial maps for planning, design, layout and as-built documentation of projects.

Ability to prepares, design, and reviews plans generated by Computer Assisted Design (CAD) or CAD type programs.

Ability to use ArcGIS and the Agency of Natural Resources Atlas to create spatial maps for planning and design of projects.

Proficiently use of Microsoft Suite programs.

4. Do you supervise?

In this question "supervise" means if you direct the work of others where you are held **directly** responsible for assigning work; performance ratings; training; reward and discipline or effectively recommend such action; and other personnel matters. List the names, titles, and position numbers of the classified employees reporting to you:

No. However, as part of the work and protecting state investments the Agricultural Engineer I is responsible to supervise the work of equipment dealers, material suppliers, and contractors during the installation of conservation practices on farms to ensure that the practices meet or exceed standards.

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5. In what way does your supervisor provide you with work assignments and review your work?

This question deals with how you are supervised. Explain how you receive work assignments, how priorities are determined, and how your work is reviewed. There are a wide variety of ways a job can be supervised, so there may not be just one answer to this question. For example, some aspects of your work may be reviewed on a regular basis and in others you may operate within general guidelines with much independence in determining how you accomplish tasks.

Request for engineering and technical assistance are though multiple channels ranging from farmers, other VAAFM and DEC staff, our Partners, and through the Agricultural Engineering Section Chief. Position will require establishing priorities that are reviewed by the Agricultural Engineering Section Chief.

This position requires level of of independence and the ability to anticipate project needs in order to complete the essential and supplementary tasks. The underlying responsibilities are mostly created by the projects that are assigned in this position and hence any changes in the project require preparedness in understanding how the workload on the project changes.

Communication with Agricultural Engineering Section Chief may lapse for a couple of days while field work is being completed.

6. Mental Effort

This section addresses the mental demands associated with this job. Describe the most mentally challenging part of your job or the most difficult typical problems you are expected to solve. Be sure to give a specific response and describe the situation(s) by example.

- For example, a purchasing clerk might respond: In pricing purchase orders, I frequently must find the cost of materials not listed in the pricing guides. This involves locating vendors or other sources of pricing information for a great variety of materials.
- Or, a systems developer might say: Understanding the ways in which a database or program will be used, and what the users must accomplish and then developing a system to meet their needs, often with limited time and resources.

Plan, developed and implement \$5,000 to \$100,000 infrastructural changes on farms that will be adopted by the farmer so that the farm can meet regulatory requirements. Typically the process will require the coordination of federal, other state agencies, our partners, architect and engineering firms, equipment dealers, suppliers and contractors.

Assist in the develop of new techniques and technologies that will intergrate the waste management activities on the farm and addressing the environmental issues while providing an economically and managable solution for the farm.

7. Accountability

This section evaluates the job's expected results. In weighing the importance of results, consideration should be given to responsibility for the safety and well-being of people, protection of confidential information and protection of resources.

What is needed here is information not already presented about the job's scope of responsibility. What is the job's most significant influence upon the organization, or in what way does the job contribute to the organization's mission?

Provide annualized dollar figures if it makes sense to do so, explaining what the amount(s) represent.



For example:

- A social worker might respond: To promote permanence for children through coordination and delivery of services;
- A financial officer might state: Overseeing preparation and ongoing management of division budget: \$2M Operating/Personal Services, \$1.5M Federal Grants.

The goal of position is to assist farms so that they can manage their operations more economically while protecting water resources and meeting state water quality requirements.

The Agricultural Engineer I has the ability to implement a project from planning and design through construction and implementation.

Accountablity to provide a recommendation to the Agricultural Engineer II or the Agricultural Engineering Section Chief for the release of state cost share funds to farms. Six to 12 project annual with aggregate total of \$300,000 to \$500,000.

8. Working Conditions

The intent of this question is to describe any adverse conditions that are routine and expected in your job. It is not to identify special situations such as overcrowded conditions or understaffing.

a) What significant mental stress are you exposed to? All jobs contain some amount of stress. If your job stands out as having a significant degree of mental or emotional pressure or tension associated with it, this should be described.

Туре	How Much of the Time?
Assist and/or design of water quality projects	60%
Assist in the design compentents for projects that require require individual designs and solutions that are adapted from previous designs, imagination, and initaltive.	20%
Reguatory and enforcement discussion with farms	10%

b) What hazards, special conditions or discomfort are you exposed to? (Clarification of terms: hazards include such things as potential accidents, illness, chronic health conditions or other harm. Typical examples might involve exposure to dangerous persons, including potentially violent customers and clients, fumes, toxic waste, contaminated materials, vehicle accident, disease, cuts, falls, etc.; and discomfort includes exposure to such things as cold, dirt, dust, rain or snow, heat, etc.)

Туре	How Much of the Time?
Working around animals, agricultural equipment and heavy equipment during planning and installation of concervation practices.	10%
Working around and with pumps, tanks, boilers, and engines	5%
Entering confined spaces and possible oxygen deficient environments or falls while climbing or working around silios or walls.	2%

c) What weights do you lift; how much do they weigh and how much time per day/week do you spend lifting?

Туре	How Heavy?	How Much of the Time?
Survey and soil sampling equipment	20 to 70 lbs	10%
Hand tool	5 to 20 lbs	5%

d) What working positions (sitting, standing, bending, reaching) or types of effort (hiking, walking, driving) are required?

Туре	How Much of the Time?
Office (sitting at desk)	70%
Field (planning, surveying, oversight of construction)	30%

Additional Information:

understanding your job that you ha has some unique aspects or chara questions. In this space, add any	even't clearly descr acteristics that were	r. If there is anything that you feel is important in ribed, use this space for that purpose. Perhaps your en't brought out by your answers to the previous its that you feel will add to a clear understanding of the	•
requirements of your job.	8		
*			
Employee's Signature (required):_		Date:	+

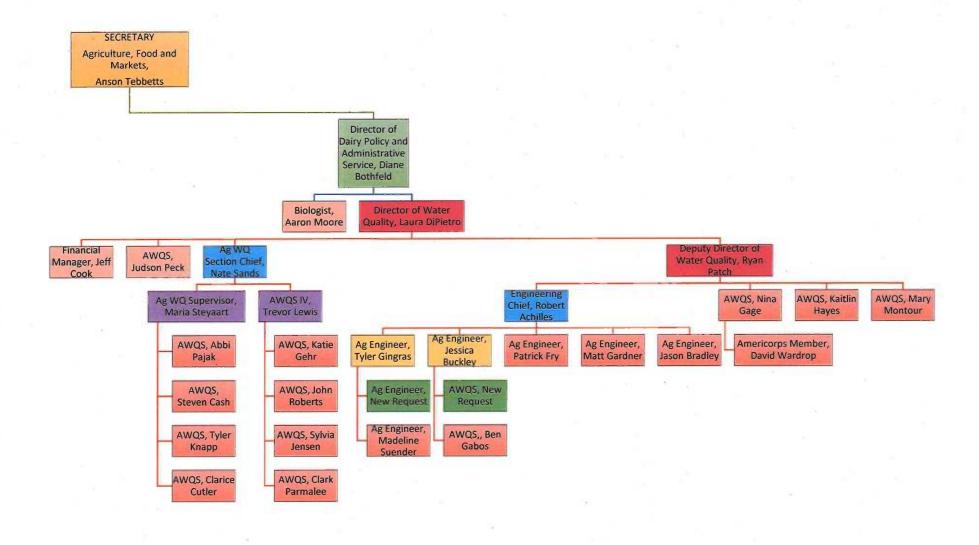
What do you consider the most impo	tant duties of this job and	why?	*	
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What do you consider the most imposessarily the qualifications of the pres		d abilities of an e	mployee in this jo	ob (n
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Supervisor's Section:

Request for Classification Review Position Description Form A Page 9 (for example, have duties

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AGRICULTURAL ENGINEER I

Job Code: 448700

Pay Plan: Classified

Pay Grade: 23

Occupational Category: Engineering and Architecture

Effective Date: 07/15/2014

Class Definition:

Engineering and hydrogeology work at a journeyman to advanced professional level for the Agency of Agriculture involving the design, construction and management of agricultural waste storage/management systems, environmental monitoring systems and other infrastructure to prevent and remediate environmental contamination. Duties include the collection and analysis of engineering and environmental water quality data, evaluation of preliminary engineering plans and the preparation and evaluation of engineering design and construction plans and specification for new and modified waste management systems or structures to control runoff or infiltration of agricultural contaminants such as pathogens, nutrients and soil erosion from farm fields and production facilities. Duties also entail the design, conduct and technical review of environmental site investigations to determine the success/effectiveness of engineering structures and waste management system practices to prevent or remediate the contamination of surface water and groundwater.

Duties also entail the design, conduct and technical review of environmental site investigations to determine the success/effectiveness of engineering structures and waste management system practices to prevent or remediate the contamination of surface water and groundwater. May act as a project coordinator or provide expertise on specialized engineering projects, water quality sampling studies or geologic mapping projects. Work is performed under the general supervision of the Agriculture Resource Management Section supervisor of the Agriculture Resource Management and

Environmental Stewardship Division and may coordinate with the USDA Natural Resources Conservation Service (NRCS) engineering staff, the Vermont Agency of Natural Resources Stream Back Alternations, Stormwater Permitting or Geological Survey and Sections private sector engineers and environmental consultants.

Examples of Work:

Assists in the preparation of engineering designs for agricultural waste storage structures, channels, and appurtenances, earth dam embankments, above ground tanks, and special stability features, mechanical and vegetative spillways or other improvement work according to NRCS technical standards and specifications or equivalent standards. Provide technical and regulatory assistance in the design and review of animal feed storage bunkers and silos; agricultural chemical storage and their applications; heavy use area; and stream bank stabilization.

Under the guidance of the Agency's professional engineer or NRCS engineering staff prepares design documents for practices and structures to include material standards and quantities, construction standards and acceptable site modifications. Conducts field investigations and soil and water sampling to obtain planning and design data for engineering practices or environmental monitoring systems commonly installed on farms. Generate construction layouts and as-builds. Performs field inspections and provide regulatory compliance recommendations during construction to document that conservation practices and structures will meet construction standards. Oversee the installation of groundwater monitoring wells by farm operators and well drillers. Design and implement procedures and protocols for surface and groundwater sampling projects. Conduct environmental sampling to ensure compliance with construction standards, waste management system operation practices, farm operation permit conditions and other agricultural practices regulations.

Provide technical assistance to Vermont farmers regarding how management practices effect agricultural waste storage systems and other infrastructure to manage agricultural discharges. Prepares and reviews plans generated by Computer Assisted Design (CAD) or CAD type programs. Recommends technical and administrative program changes. Performs related duties as required.

Environmental Factors:

Duties are performed in both a standard office setting and in the field, necessitating private means of transportation. Fieldwork may involve exposure to animal manure and other farm wastes; hazardous chemicals, gases and liquids on operating farms and construction sites may be anticipated. Workload volume may create deadline pressures. Monitoring or reviewing consulting engineer and contractor performance may require a subtle combination of tact and firmness.

Minimum Qualifications

Knowledge, Skills and Abilities:

Considerable knowledge of civil and structural engineering principles and practices as used in earthen dam and tank construction for agriculture.

Considerable knowledge of management practices designed to enhance agricultural water quality and pollution prevention efforts.

Considerable knowledge of the materials, methods and equipment including the preparation of cost estimates and specifications.

Working knowledge of geology, hydrogeology, hydrologic and groundwater modeling.

Knowledge of the characteristics, usage, and management of agricultural chemicals.

Ability to inspect work under construction and evaluate it in conformity with specifications. Installation

Ability to review plans, cost estimates, and specifications prepared by others and to make sound decisions concerning difficult civil and structural problems.

Ability to conduct investigations into the usages of

agricultural chemicals in and around the vicinity of monitoring sites.

Ability to establish and maintain effective working relationships.

Ability to communicate effectively orally and in writing to the farming community.

Education and Experience:

Bachelor's degree in agricultural, civil, environmental, or structural engineering AND two (2) or more years of professional level engineering experience that is fundamental to the design, construction, and management of agricultural waste systems.

OR

Associate's degree in agricultural, civil, environmental or structural engineering AND four (4) or more years of professional level engineering experience that is fundamental to the design, construction, and management of agricultural waste systems.

OR

Master's degree in agricultural, civil, environmental, or structural engineering.

Special Requirements: n/a