

VERMONT Anaerobic Digester Partnership:



Rural Development and Natural Resources Conservation Service

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To avoid the appearance of competition between the two agencies, Rural Development & NRCS met and developed a working partnership to deliver USDA Services to producers interested in pursuing an anaerobic digester for their farming operation. Since forming this partnership, many collaborations have taken place. One of the most successful collaborations for an anaerobic digester project in Vermont is provided in this fact sheet, to demonstrate exactly how the two agencies can work together to help the producer.

A detailed break-down of the project costs and a 50%-50% EQIP/REAP program split is shown in the table on page 2. The producer's name and confidential information has been removed in order to use these cost figures as an example. The success with this project was that NRCS and RD coordinated and met together with the producer to discuss all possible options.

The idea was to “split” the components of the anaerobic digester costs into “manure handling” components and “electrical” components. NRCS would provide EQIP financial assistance for the manure handling components which includes the digester, manure pumps, separator, etc. Rural Development would provide grant and low interest loans for the electrical generation equipment which includes engines, generators, electrical hook up, etc.

Coincidentally for this proposed anaerobic digester project, costs broke down into a roughly 50% split in terms of what each program is authorized to cover with assistance. If a producer has no other contracts with NRCS, up to \$300,000 (or \$450,000 if an exception is requested by the NRCS State Conservationist) in financial assistance can be available (to EQIP eligible producers) through the NRCS EQIP program to at least partially fund 50% of the project costs. Coordination between NRCS and RD also enables the agencies to provide assistance for this project without the risk of duplicating funding.

Cheryl and Bob have agreed to meet together with every producer who is considering installing an anaerobic digester to:

- 1) Determine if the producer is eligible for financial assistance through both EQIP and REAP.
- 2) Explain all the milestones the producer must complete before becoming eligible for NRCS/RD assistance.
- 3) Explain all the financial options to potentially maximize the funding the producer can receive.

Developing a great partnership between Rural Development and NRCS is beneficial for the producer, Rural Development, NRCS, and most importantly for the environment and the future of meeting our increasing demand for energy. Please feel free to give Cheryl or Bob a call if you have any questions.

PROPOSED EQIP & REAP PROGRAM COST SPLIT

Anaerobic Digester System Costs - 850 Head Equivalent Dairy

			EQIP	REAP
I. Mixing Pit				
- Pit / Plumbing / Pump / Mixer	\$ 108,000		\$ 108,000	
II. Digester				
- Walls and Floor (poured concrete)	\$ 170,000		\$ 170,000	
- Precast Roof	90,000		90,000	
- Insulation / Concrete Coating / Foam	87,000		87,000	
- Excavation (only for digester)	25,000		25,000	
III. Digester Heating System		Costs		
- Heat Exchanger Header	8,800		8,800	
- Heat Exchangers	32,850		32,850	
- Heat Piping	10,000		10,000	
- Piping Racks	7,000		7,000	
- HDPE Draft Wall	8,950	\$ 166,200	8,950	
- Circulation Pumps / Solenoids (5 digester / 1 barn)	10,000		10,000	
- Sludge Recirculation Pump	6,100		6,100	
- Misc Piping / Valves	12,500		12,500	
- Labor / Mobilization / Equipment Rental	70,000		70,000	
IV. Gas Mixing System				
- Diffuser Heads / Header	15,500			15,500
- Blower / Solenoids / H2S reduction system	45,000	\$ 69,250		45,000
- Labor / Equipment Rental	8,750			8,750
V. Building Interior Plumbing and Electrical				
- Labor	25,000			25,000
- Electrical (includes digester controls)	52,500	\$ 96,500		52,500
- Automatic Flare and Flame Arrestors	19,000			19,000
VI. Electrical Gen-Set				
- 225 kW Gen-Set	207,000			207,000
- Gen-Set Plumbing / Hook-up	50,000	\$ 50,000		50,000
- Utility Interconnection (estimate only)	150,000			150,000
VII. Building				
- Solids Press / Handling Equipment	70,000		70,000	
- Electrical	80,000			80,000
- Building Shell	100,000			100,000
- Concrete	15,000			15,000
Engineering / Start-Up	100,000	\$ 195,000	50,000	50,000
Administrative	95,000		47,500	47,500
Contingency	100,000		50,000	50,000
TOTAL	\$ 1,778,950	\$ 576,950	\$ 863,700	\$ 915,250
			EQIP	REAP

****Price is an estimate only**

50%-50% EQIP-REAP split of equipment building, engineering, and project administrative