

The Johns Hopkins Center for a Livable Future
Johns Hopkins Bloomberg School of Public Health
Baltimore, MD 21202

February 17, 2020

**Re: Environmental Quality Incentives Program Interim Final Rule, NRCS-2019-0009
(Fed. Reg. Vol. 84, No. 242, Dec. 17, 2019, page 69272ff.)**

Disclaimer: The opinions expressed herein are our own and do not necessarily reflect the views of The Johns Hopkins University.

Matt Lohr
Chief, Natural Resources Conservation Service
U.S. Department of Agriculture
Washington, DC 20250

Dear Chief Lohr:

We are researchers at the Johns Hopkins Center for a Livable Future (CLF) based at the Bloomberg School of Public Health in the Department of Environmental Health and Engineering. The Center for a Livable Future investigates the interconnections among diet, food production, public health, and the environment. Since 1996, the Johns Hopkins Center for a Livable Future has applied a public health lens to the ecological, economic, and social considerations across the food system. We are concerned about the possible negative public health implications that could result from adopting the EQIP Interim Final Rule. EQIP has enormous potential to support agricultural practices that protect the public's health and the environment. Yet, the Interim Final Rule in its current state would stray further from the program's original mandate and weaken the program's public health benefits. We therefore posit three requests:

- I. Do Not Double the EQIP Payment Limit to \$900,000 for the Largest Farms
- II. Require Progressive Implementation of Nutrient Management Plans for CAFOs
- III. Make Soil Health and Resilience an EQIP Priority

I. Do Not Double the EQIP Payment Limit to \$900,000 for the Largest Farms

Confined Animal Feeding Operations (CAFOs) pose a risk to the public's health and to the environment. The enormous accumulation of manure and other untreated waste created by CAFOs is often stored and disposed of in a manner that pollutes the air, surface, and groundwater, posing risks to the environment and human health, particularly for CAFO workers and nearby residents.¹ These operations also disproportionately affect low-income, disadvantaged communities with high proportions of racial and

¹ Literature Review of Contaminants in Livestock and Poultry Manure and Implications for Water Quality. Washington, DC: Environmental Protection Agency; 2013.

ethnic minority residents, raising serious social and environmental justice concerns.² Due to these negative impacts associated with CAFOs, the Center for Disease Control determined that these operations pose risks to public health and the environment.³ The American Public Health Association also released a policy statement calling for a moratorium on new and expanding CAFOs based on these operations' negative public health impacts.⁴

While EQIP works to provide producers with financial and technical assistance to improve the environmental services on their farms, irrigation equipment and CAFOs represent the biggest share of EQIP contracts that reach the \$450,000 payment limit. EQIP's current track record also does not demonstrate a strong commitment to small and mid-size producers. In fiscal year 2016, 11 percent (\$113 million) of EQIP funds were allocated toward CAFO operations. While many CAFOs are run by contract growers, the large companies own the animals, facilities, and ultimately the profits. Of this \$113 million EQIP dollars that went to CAFOs, the top supported practices included waste storage facilities (\$51,634,622); waste facility covers (\$33,582,510); animal mortality facilities (8,867,865); and manure transfer (\$7,779,326).⁵ Doubling the EQIP payment limit would only further support CAFO operations.

To maximize the positive environmental and public health services that the EQIP program supports, the EQIP payment limit should not expand to \$900,000. The proposed IFR funding limit will further support the largest and highest-capacity farms, many of which are CAFO operations, and will likely encourage further consolidation of farms. This is antithetical to EQIPs goal to improve water and air quality, conserve water and soil health, improve natural habitat, and mitigate weather volatility. The EQIP Final rule should maintain the \$45,000 payment limit in order to ensure the support of small and mid-size producers that are working to protect our shared natural resources. We must not allocate Natural Resources Conservation Service funding towards larger projects for fewer producers.

II. Require Progressive Implementation of Nutrient Management Plans for CAFOs

Given that many of the negative public health impacts associated with CAFOs are borne from the mismanagement of manure and untreated waste, the Comprehensive Nutrient Management Plan (CNMP) requirements for CAFO operations applying for the EQIP program is a necessary, though limited, safeguard for the public's health. The proposed changes outlined in the Interim Final Rule, however, render ineffective the modest safeguards these plans create. While the 2018 Farm Bill weakened the CNMP provisions by requiring only progressive implementation of the CNMP (rather than full implementation), the IFR does not require CNMP implementation at all. The current IFP only calls for the development of the CNMP by the end of the contract period, after EQIP money has been utilized. Not only is this change counter to the language authorized in the 2018 Farm Bill and the congressional intent

² Nicole W. CAFOs and environmental justice: the case of North Carolina. *Environ Health Perspect.* 2013;121:a182–a189.

³ Centers for Disease Control and Prevention. Animal feeding operations. Available at: <https://www.cdc.gov>. Accessed November 28, 2019.

⁴ <https://www.apha.org/policies-and-advocacy/public-health-policy-statements/policy-database/2020/01/13/precautionary-moratorium-on-new-and-expanding-concentrated-animal-feeding-operations>

⁵ <https://sustainableagriculture.net/blog/eqip-fy2016-analysis/>

contained in the Conference Report, but it renders ineffective the CNMP requirement and therefore eliminates needed public health protections.

We request that NRCS make the following changes to the IFP:

In Section 1466.7, subsection (d) should be rewritten as follows:

(d) If an EQIP plan of operations includes an animal waste storage or treatment facility or associated waste transport or transfer device, to manage manure, process wastewater, or other animal waste generated by an AFO, the participant must agree to develop a CNMP and demonstrate progressive improvement by the end of the contract period, and any conservation practices in the EQIP plan of operations must be implemented consistent with a CNMP.

III. Make Soil Health and Resilience an EQIP Priority

Sustainable livestock production practices are strongly associated with improved soil health and climate resilience. For example, well-managed rotational grazing often significantly boosts the accumulation of soil organic carbon and organic matter, which enhances soil health by building a diverse microbial community, accelerating nutrient cycling, and improving soil water storage capacity.⁶ The Union of Concerned Scientists found that if a farmer converted one-third of a 1,000-acre conventional corn-soy farm to a well-managed, grass-based grazing system, the farmer could potentially save \$28,000 in fertilizer costs and \$1,500 in fuel costs. This would reduce climate emissions from fertilizer, fuel, and soils by more than 400 t CO₂e and reduce the farm water consumption by 280 million gallons.⁷ Projects related to cover crops and crop rotation, combined with improved grazing management for livestock, can also break pest cycles and reduce soil N₂O emissions.^{8 9 10}

The national priorities enumerated in Section 1466.4 do not include soil health and climate resilience. This represents a significant gap and missed opportunity. EQIP priorities should include responses to accelerated weather volatility, which threatens all producers and growers. For example, in the case of heavy rainfall, conservation practices such as no till, cover crops, and buffer strips can effectively prevent sediment and nutrient runoff into nearby streams.¹¹ On the other hand, waste management facilities (or “lagoons”) that are funded through EQIP often do not mitigate harmful effects of extreme weather volatility and often breach and spill during flooding events.¹² Runoff containing CAFO manure can

⁶ Cano, A., A. Nunez, V. Acosta-Martinez, M. Schipanski, R. Ghimire, C. Rice, and C. West. 2018. Current knowledge and future research directions of soil health and water conservation in the Ogallala aquifer region. *Geoderma* 328:109–118. doi:10.1016/j.geoderma.2018.04.027

⁷ DeLonge, Maria. 2017. Reintegrating Land and Livestock. Union of Concerned Scientists.

⁸ DeLonge, Maria. 2017. Reintegrating Land and Livestock. Union of Concerned Scientists.

⁹ Davis, A.S., J.D. Hill, C.A. Chase, A.M. Johanns, and M. Liebman. 2012. Increasing cropping system diversity balances productivity, profitability and environmental health. *PloS ONE* 7:e47149. doi:10.1371/journal.pone.0047149.

¹⁰ Wolf, B., X. Zheng, N. Brüggemann, W. Chen, M. Dannenmann, X. Han, M.A. Sutton, H. Wu, Z. Yao, and K. Butterbach-Bahl. 2010. Grazing-induced reduction of natural nitrous oxide release from continental steppe. *Nature*, April 8, 881–884. doi:10.1038/nature08931.

¹¹ Hovorka, D. 2018. Leveraging Conservation Dollars: Agricultural Practices that Deliver Water Quality, Wildlife Habitat, and Soil Health. Izaak Walton League of America.

¹² Burkholder J, Libra B, Weyer P, et al. Impacts of waste from concentrated animal feeding operations on water quality. *Environ Health Perspect.* 2007;115(2):308-312. 14 doi:10.1289/ehp.8839

contaminate ground and drinking water with nitrates, drug residues, and other health and environmental hazards.¹³ EQIP funding should prioritize agricultural practices that enhance soil health and as a result build more resilient agricultural systems.

We recommend that NRCS revise the list of EQIP National Priorities and add two items:

- (1) protecting and enhancing soil health, soil organic matter and carbon sequestration, and other soil biological functions, and
- (2) enhancing farm and ranch resilience to the impacts of increased weather variability.

In conclusion, we contend that the EQIP Interim Final Rule must not move away from the program's original mandate and/or undermine the public's health. Rather, it should clearly outline measures that contribute to the stewardship of natural resources and the protection of the public's health. NRCS must not allocate EQIP funding towards larger projects for fewer producers, but instead reward creative conservation practices for small and mid-sized producers that build soil health and support agricultural resilience. In addition, EQIP funding that supports CAFO operations should, at minimum, require progressive implementation of nutrient management plans. EQIP is a valuable resource for producers to establish necessary conservation projects and should be accessible for farmers who are making true contributions to protect the environment and the public's health.

Sincerely,

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¹³ United States Environmental Protection Agency. 2013. Literature Review of Contaminants in Livestock and Poultry Manure and Implications for Water Quality.