From: MDA.Info@state.mn.us
To: Gunderson, Larry (MDA)
Cc: Wolf, Katie (MDA)
Subject: Draft Nitrogen Fertilizer Rule Comment
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The following information has been submitted through the Draft Nitrogen Fertilizer Rule Comment Form.

Name: Jeff Schoer
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Comment: I not sure I understand the difference between parts 1 and 2 of the rules impact my farm. but I did lookup on the interactive map and it seems like there are so many small areas that impact small % of every farm field we have. I can see areas that are very sandy would affect ground water very quickly as water flows very easily through that. We have very heavy clay soils in our area that hold water all too well. We use all variable rate equipment for our fertilizer application in spring or in the fall. we have had all our soils grid sampled and know what CEC rate is on every acre. we know that most soils in Redwood county have a very high Nitrogen holding capacity. MAP or DAP applications in the fall have very little N in them and the Nitrogen in those products are not in a volatile form until the soils warm up in the spring and break the Nitrogen down into a useable form of N. Urea we know should never be applied in the fall because it is more volatile then other sources of Nitrogen we have available to us. Fall applied NH3 is very stable when applied to soil that is 50 degrees or less, because the form of N is not mobile until after the soil warms in the spring. If you think about NH3 placed in the ground only 8" deep in the fall and not being mobile until after the soil temps warm in the spring time. That makes it the most eco friendly Nitrogen available to us because we plant corn in the spring as soon as the 2" soil temp is 50 degrees. at that time the 8" soil temp is still below 50 degrees and the NH3 as not started to mobilize yet. So as soon as the NH3 starts being broken down into a mobile form the corn plant is there sucking it up. Lets contrast that with spring applied Nitrogen, it is spread on the top of the field worked in at a depth of about 2 to 3 inches and then planted. Now the Nitrogen sitting in the top soil is warmed very quickly and starts to break down before the corn plant even starts germinating, letting the Nitrogen be mobile three to four weeks before the corn plant is large enough to start sucking up all the Nitrogen. Lets make sure this time before we implement new regulations that it is actually going to help what we are trying to help with. Unlike taking all the sulfur out of our fuels across the USA, and now we are finding out that when we apply sulfur to our fields it helps to stabilize the nitrogen causing less Nitrogen loss. Just makes me wonder that if we had the small amount of sulfur in our rain we wouldn't have as much nitrogen lost as it would attach to the sulfur molecules. PS. lets not forget about our friends living in the cities and suburbs who in the last years have applied a Nitrogen rate of 4 to 5 times the rate needed to grown their lawns. A farmer living off the land is like a

business place that only spends enough money on their inputs as they will reclaim in profitability. A person just wanting his/her lawn greener than the neighbors have no incentive to not over apply their Nitrogen. Jeff Schoer