

State of Wisconsin Governor Scott Walker

Department of Agriculture, Trade and Consumer Protection

Ben Brancel, Secretary

Submitted by: Otto Oemig Effective Date:February 23, 2015

Subject: Guidance on Nitrogen Stabilizers as Pesticides

References: Instinct Memo (10-7-2010) N-Serve Memo (12-7-2010) 7 U.S.C § 136 [FIFRA]

Common Nitrogen Inhibitors:

Active Ingredient	Abbreviation	Sample Products	Mode of Action	EPA Registered
Chemical Name				Pesticide
Nitrapyrin		Instinct, N-Serve	Nitrification inhibitor	Yes
N-(n-butyl)	NBPT	Agrotain	Urease (enzyme)	No
thiophosphoric triamide			inhibitor	
Dicyandiamide	DCD	Agrotain Plus,	Nitrification inhibitor	Exempt under FIFRA
		Super U		Section 2 (hh) (1)
Ammonium thiosulfate	ATS or		Weak nitrification	Exempt under FIFRA
	Amthio		inhibitor	Section 2 (hh) (2)
Maleic itaconic		Nutrisphere-N,	Weak Urease and	
co-polymer calcium salt		More than	Nitrification inhibitor	No
		Manure		
Polymer coated urea	PCU	ESN	Physically slows	No – Use of physical
			hydrolysis of urea	not chemical means

Currently the EPA has only one nitrogen stabilizer active ingredient (A.I.) registered as a pesticide, Nitrapyrin. For more guidance on these products see <u>Instinct memo</u> and <u>N-Serve memo</u>.

Urease inhibitors do not qualify as pesticides because they act on enzymes, rather than organisms. With the exception of dicyandiamide (DCD) and ammonium thiosulfate, nitrification inhibitors may qualify as being a pesticide.

The EPA's rules concerning nitrogen stabilizers as pesticides are covered under FIFRA Section 2 (hh) and 40 CFR 152.6 (b). The state of Wisconsin has no specific rules concerning nitrogen stabilizers as pesticides.

Any living organism that acts as a nitrogen stabilizer is not viewed as a pesticide per 40 CFR 152.6 (b) (1).

This guidance is subject to change if the EPA changes their interpretation of 40 CFR 152.6 (b).

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