

APPENDIX A

Environmental Stewardship Assessment: Nutritional Evaluation of Feedlot Operations

For each issue listed in the left column of the worksheet, read across to the right and circle the statement that best describes conditions on your farm. If any categories do not apply, leave them blank.

Issue	Low Risk (Risk 1)	Low to Moderate Risk (Risk 2)	Moderate to High Risk (Risk 3)	High Risk (Risk 4)	Environmental Benefit
	Nutrient concentration in diet				
Feedlot calves	MP system (UIP of 4.5% DIP matched with needs of microbes), phase-fed diets			CP system (one diet fed to maximize performance), not formulated with UIP/DIP	N, NH ₃
	Not supplementing P in grain-based or grain-based with byproduct diets			Supplementing P, not distributing excess dietary P from byproducts and grains	P
Feedlot yearlings	MP system (UIP of 40%, DIP matched with needs of microbes), phase-fed diets			CP system (one diet fed to maximize performance), not formulated with UIP/DIP	N, NH ₃
	Not supplementing P in grain-based or grain-based with byproduct diets			Supplementing P, not distributing excess dietary P	P

Practices in the low-risk category produce environmental benefits according to the following key:

- N: Reduced nitrogen excretion
- NH₃: Reduced ammonia emissions
- P: Reduced phosphorus excretion

Adapted from the Guide to Agricultural Environmental Management in New York State 2001.

APPENDIX A Environmental Stewardship Assessment: (continued)

For each issue listed in the left column of the worksheet, read across to the right and circle the statement that best describes conditions on your farm. If any categories do not apply, leave them blank.

Management of Feedlot Cattle Feed Nutrients

Issue	Low Risk (Risk 1)	Low to Moderate Risk (Risk 2)	Moderate to High Risk (Risk 3)	High Risk (Risk 4)	Environmental Benefit
P supplementation	Not supplementing	Supplementing grain-based diets to achieve NRC recommendations or feeding by-products without supplemental P	Supplementing grain-based diets to achieve 0.35% P	Supplementing P and feeding byproducts	
P distribution	Regardless of dietary P, managing manure P to distribute manure at agronomic rates (removed by crop).	Minimizing dietary P, but applying to closest acres	Applying manure based on N content of feedlot manure	Supplementing P, applying on closest acres, and applying manure based on N content	N NH ₃ P
Analysis of feed/manure	Analyze feedstuffs for both N and P, AND analyze manure for N and P.	Analyze manure nutrients only.	Analyze feed ingredients only.	No analysis conducted	O
Protein supplementation	Formulate using the MP system to minimize excess protein, i.e., phase feed.	Formulate using MP system, but feed one diet throughout despite changing requirements.	Formulate using CP system, but try to minimize excess.	Formulate using CP system with no regard for requirements, only maximal gain.	
Salt and potassium	Minimize salt and K inclusion to NRC recommendations.	Salt greater than 0.25%, K greater than 0.6% (except newly received calves)	Dry climate areas with high dietary salt		

Practices in the low-risk category produce environmental benefits according to the following key:

- N: Reduced nitrogen excretion
- NH₃: Reduced ammonia emissions
- P: Reduced phosphorus excretion
- O: Reduced odor emissions

Additional Information:

- Acres available for spreading?
- Nutritionist accurately formulating diets?
- Grain and other feeds grown on own acres or purchased?
- Runoff retention facilities ensure no runoff nutrients exiting feedlot to surface water?