New York Phosphorus Runoff Index (2.0) Field Worksheet

Field ID:	
Soil Type:	
Soil Test P (Cornell Morgan)	*(if > 160 lbs P/acre, no need to continue)*

RAW TRANSPORT SCORE		***DP Score***	***PP Score***
Circle the score under each column (DP & PP) that corresponds with the existing conditions for each transport factor for the field you are scoring.			
Hydrologic Soil Group (HSG)	A	0	0
	B	4	1
	C	6	3
	D	8	5
Erosion (E) (tons/acre/year)	≤1.0	N/A	0
	1.1 – 3.0	N/A	1
	3.1 – 5.0	N/A	3
	>5.0	N/A	5
Flooding Frequency	Never	0	0
	Occasionally	2	2
	Frequent	5	5
Concentrated Flow	None/Treated	0	0
	Present	4	4
Flow Distance to Stream	>500 ft	0	0
	301-500 ft	4	4
	101-300 ft	6	6
	≤100 ft	8	8
Vegetated Flow Distance	<35 ft	0	0
	≥35 ft	-2	-4
Total Transport Score *(Column Total X 10)*		_____ *x 10 =* _____	_____ *x 10 =* _____

Information collected from your office (i.e. maps, soil survey, RUSLE2 software, etc.).

Information collected or verified during a field visit.

BMP COEFFICIENTS			
Method of Application	**Coefficient**		
	Scen. A	Scen. B	Scen. C*
Surface spread without setback	1.0	1.0	1.0
Surface spread with ≥100-ft setback from the field boundary (start of the predominant flow path)	0.8	0.8	0.8
Surface spread with ≥35-ft managed vegetated (sod/harvested) setback from the field boundary (start of the predominant flow path)	0.7	0.7	0.7
Incorporation within 24 hours with ≥15-ft setback from down-gradient surface waters	0.7	0.7	0.7
Injection with ≥15-ft setback from down-gradient surface waters	0.5	0.5	0.5
Ground Cover/Timing			
Bare ground and more than 2 weeks before planting	1.0	1.0	1.0
Bare ground and within 2 weeks of planting (in spring)	0.8	0.8	0.8
Winter-hardy cover crop (fall/winter)	0.8	0.8	0.8
Whole-plant crop residue (~80% or more ground cover, e.g. corn grain)	0.7	0.7	0.7
Sod after last cutting (fall/winter)	0.6	0.6	0.6
Growing sod or row crop/planting green	0.5	0.5	0.5

Information collected during a meeting with the farmer.

*Here you can select three different BMP scenarios to compare results. For example:

*Scenario A = 100 * 0.5 * 0.5 = 25*
*Scenario B = 100 * 0.8 * 0.7 = 56*
*Scenario C = 100 * 1.0 * 1.0 = 100*

Phosphorus Index Score

Higher Total Transport Score *(of DP/PP above)*		Method Coefficient Scen. A	Scen. B	Scen. C		Cover/Timing Coefficient Scen. A	Scen. B	Scen. C	=	P Index Score Scen. A	Scen. B	Scen. C
	X				X							

Interpreting your NY PI-2.0 Score:

Once you have calculated your transport score x BMP coefficient to arrive at your NY-PI Score, you can determine the management implications dependent on the Cornell Morgan Soil test P (in lbs P/acre) by using the table below.

Zero P	No manure or P fertilizer *
P-based	Manure and fertilizer P application not to exceed annual P removal with harvest of that crop
N-based	Manure and fertilizer application not to exceed annual nitrogen (N) needs for the crop grown based on Cornell Nutrient Guidelines for Field Crops in New York

**see 'Incidental P Application' (Section 7 in manual) for exceptions.*

PI categories	PI score	Cornell Morgan-extractable soil test P (lbs P/acre)			
		< 40	40-100	101-160	> 160
Low	< 50	N-based	N-based	P-based	Zero P
Medium	50 to 74	N-based	P-based	Zero P	Zero P
High	75 to 99	P-based	P-based	Zero P	Zero P
Very High	≥100	Zero P	Zero P	Zero P	Zero P

Adaptive Management Option:

Farms with a whole-farm P mass balance (3-yr running average) **≤12 lbs P/acre** can apply manure at N-based rates on fields with STP ≤ 100 lbs P/acre, even if the initial NY-PI 2.0 score limits rates to P-based, as long as the selected BMPs to get to a P-based score are implemented.

PI categories	PI score	Cornell Morgan-extractable soil test P (lbs P/acre)			
		<40	40-100	101-160	> 160
Low	<50	N-based	N-based	P-based	Zero
Medium	50 to 74	N-based	N-based	Zero	Zero
High	75 to 99	N-based	N-based	Zero	Zero
Very High	≥100	Zero	Zero	Zero	Zero

NOTES: