

USE WITH IRRIGATED CROPLAND, HAYLAND, AND PASTURELAND

Revision 07/10/03

RESOURCE CONCERN: WATER QUANTITY

INDICATOR: Water Management for Irrigated Land

Information from Farm Irrigation Rating System (FIRIS) tables, figure or printouts will be utilized to determine the ranking points where noted. Where indicated, you will use the seepage templates sent recently by Mark Twyeffort.

	Method of Irrigation	Potential Efficiency (FIRS Table 4-8 or Irrigation Method of FIRS worksheet)			POINTS Planned Value - Present Value	Planned Practice(s) Number to address resource concern
A. Irrigation System Efficiency (Field Application Type)	Present: Planned:	A (1) Present Value: _____ A (2) Planned Value: _____				
B. Irrig. Conveyance Efficiency. Pt. of delivery to fields	B (1) Conversion of Irrigation System Type	B (2) Conveyance Efficiency After Conversion (Use Seepage Template)	B (3) Reduction In Seepage Ac.In/Ac/Year	B (4) Factor of importance for sustainability of operation	POINTS B (4) value x B (3) value	Planned Practice(s) Number to address resource concern
(1) Full Season Water Pumped storage (meets ET)	Present: _____ Planned: _____			5		
(2) Full Season Water – Surface (meets ET)	Present: _____ Planned: _____			5		
(3) Limited Water Supply - pumped (aquifer overdraft – doesn't meet ET)	Present: _____ Planned: _____			10		
(4) Limited Water Supply - Surface (does not meet ET)	Present: _____ Planned: _____			10		
(5) On-Farm Storage – to meet ET or drought mitigation	Non-existent/will be installed – 10 pts.		Expand storage – 5 pts.		POINTS	
	Tailwater recovery syst. installed – 5 pts		Expand existing tailwater recovery system – 2 pts			
C. Water Distribution Control	Present System	Planned System			POINTS	
Surface System	Temporary structures/ Shovel cuts	Permanent structures – 5 pts				
	Permanent (includes those exceed life span)	Permanent structures – 2 pts				
	Permanent inadequate	Permanent structures - 3 pts				
	Permanent adequate	Permanent adequate - 0 pts				
Sprinkler System	High pressure	Retrofit to low pressure – nozzles only – 3 pts				
	High pressure	Retrofit to low pressure – nozzles and pump - 5pts				
	High pressure	Retrofit to low pressure, nozzles, pump, bowls – 10 pts				
Micro Irrigation	Surface system only	Retrofit emitters, nozzles - 3 pts/				
Energy Consumption w/ conversion of system (see worksheet in Ranking material)	Reduced consumption – 0.5 pts for each value change on table **	Increased Consumption - minus 0.5 pts for each value change in table up to maximum of minus 3 pts. (- 3 pts)				
Land Leveling, current condition	Unlevel	Land Leveled	Leveled, laser finished		POINTS	
Unleveled	0 pts	3 pts	5 pts			
Land Smoothed	0 pts	2 pts	5 pts			
Leveled	0 pts	0 pts	2 pts			
D. Local Resource Concern:					POINTS	
Modifier:						

WATER QUANTITY TOTAL POINT SCORE: _____

Water Quantity Total Point Score will be placed on Ranking Coversheet and will be used in conjunction with score from other ranking worksheets to determine total score for ranking purposes. If an irrigation water management plan will be developed and irrigation water is either measured or will be measured as result of practice installation, complete the worksheet for Ground and Surface Water. An EQIP contract may be funded with both EQIP regular funds and G&SW funds. You will need to note on the application Final Ranking Report the amount for each fund allocation, if both situations apply.

GROUND AND SURFACE WATER ONLY. To receive points and to compete for these funds, an irrigation water management plan must be developed and the irrigation system must either be currently metered or will be metered as part of EQIP contract. Points will be given to improve net saving to operation. Net savings is defined as – water saved per irrigation to meet evapo-transpiration (ET) where limited ground water supplies exist due to aquifer overdraft or where surface systems do not meet full season evapo-transpiration (ET) needs of the crops grown. Check the following if they apply:

- _____ Overdraft of groundwater supply is occurring. Note who’s made this designation _____.
- _____ Current surface water has been impacted by reoccurring drought conditions.
- _____ Current groundwater supply has been impacted by re-occurring drought conditions.

Those individuals who do not wish to develop an IWM plan or install a water meter will have their applications considered for regular EQIP funds only. Applications selected for EQIP Ground and Surface Water funds will be selected from each local work group ranking list utilizing the EQIP G&SW ranking column. Those applications not funded with G&SW remain eligible for regular EQIP funds in order of ranking priority.

	IWM Plan - incentive	Current System Adequate at-QC	System Conversion Needed/not planned	System Conversion needed & planned w/contract	Present Water delivery Measured	Planned Water Measurement w/ contract	Points	POINTS
Low priority	X		X		X		2 pts	
Low priority	X		X			X	4 pts	
Med Priority	X	X			X		6 pts	
Med Priority	X	X				X	8 pts	
High Priority	X			X	X		10 pts	
High priority	X			X		X	12 pts	

Additional Improvements	Automated Measuring System – 5 pts	Increase storage (surface only) 5 pts	Permanent Conversion to Less CU crop – 10 pts.	POINTS
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C (1): Present Application Efficiency- Criteria A (1) ___ x Present Conveyance Efficiency B (1) ___ = _____

C (2): Planned Application Efficiency – Criteria A (2)___ x Planned Conveyance Efficiency - criteria B (2)) ___ = _____

Overall Efficiency Change – C(2) _____ minus C(1) _____ = _____ C(3)

Overall System Efficiency Change in C (3) is:	POINTS
≥ 30 %	45 pts
≥ 20 % < 30 %	35 pts
≥ 10 % < 20 %	25 pts
≥ 5 %	15 pts
< 5 %	5 pts

G&SW TOTAL POINTS _____