Economic Impacts of Minnesota Conservation Partners

Conservation programs impact local economies with changes in production, recreation, jobs, taxes, and spending. This analysis was conducted using Impact Analysis for Planning (IMPLAN) software to estimate these impacts on the state's economy attributable to the funds spend by the conservation partners. The analysis includes data from several sources and includes all the NRCS conservation program payments and the cost of the NRCS conservation technical assistance, the FSA Conservation Reserve Program (CRP) program payments to farmers, expenditures of Soil and Water Conservation Districts (SWCD), and state of Minnesota funding for conservation. The following are the state funding data inputs: Minnesota Board of Water and Soil Resources (MBWR) Comprehensive Local Water Management TA, MWBR Wetland Conservation Agency TA, Minnesota Department of Natural Resources SHORELAND TA, and the Minnesota Pollution Control Agency Subsurface Sewage Treatment Systems administration TA, incentive FA and upgrade FA.

Determining the impact of conservation programs was made possible using the Impact Analysis for Planning (IMPLAN) software. IMPLAN is useful for tracking the economic impacts of conservation program expenditures beyond the farm or ranch and into the surrounding community and economy. Conservation programs impact local economies with changes in production, recreation, jobs, taxes and spending. These impacts on the state's economy attributable to conservation partners were analyzed for 2016. Data was retrieved based on conservation and technical assistance funds. This data was used to reflect the economic impacts in Minnesota.

The analysis results includes the jobs supported, value added and value of output in the MN economy. Jobs represents the jobs supported in the economy; not new jobs created. Value added represents the total amount of additional or new economic activity that occurs from the influx of funds from the partners. Total Output shows the value of increased sales in the economy. When using this data the user must choose to use output or value added as it would be inappropriate to double count economic impacts. Total output would be expected to be larger for programs where materials are purchased or the conservation increases sales in the economy, so this measure is more often used when there are a lot of sales as a result of the spending. Because of the amount of funds spent for technical assistance and personnel in conservation planning and assistance (TA); this report focuses more on the total value added to the economy.

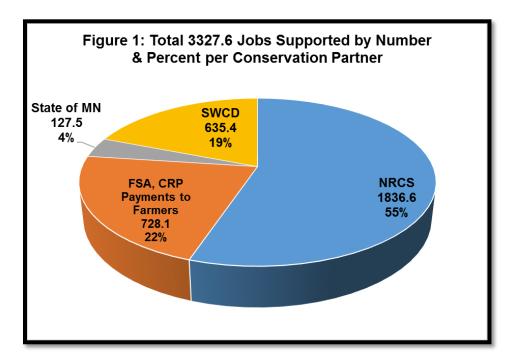
Jobs

Table 1 shows the funds spent and total jobs supported by each conservation partner. The funds spent divided by total jobs supported is shown as cost per job. The calculation of total jobs comes from adding up all the hours needed in various jobs and dividing by the hours of a full time job to develop the equivalent of full time jobs. The jobs supported in the economy are more people working in various short term and part time activities in conservation. The cost per job represents the amount of conservation funds spent to

support the jobs. This calculation does not mean it is a wage or salary amount, but is just the funding used per job supported.

Table 1: Jobs Supported Impact for 2016 Conservation						
Partner	Funds Spent	Total Jobs	Cost per Job			
NRCS, All Programs and TA	\$ 135,288,702	1836.6	\$73,662.58			
CRP Payments to Farmers	\$ 114,991,879	728.1	\$157,934.18			
State of Minnesota	\$ 5,975,136	127.5	\$46,863.81			
SWCD	\$ 48,952,079	635.4	\$77,041.36			
Total	\$ 305,207,796	3327.6	\$91,720.10			

The equivalent of 3327.6 full time jobs are supported by the \$305.2 Million dollars spent by the conservation partnership. Figure 1 shows the number and percent of the total jobs supported by each of the partner's funds spent in 2016. The jobs supported are proportional to the amount of funds spent, so partners with more funds spent have a higher portion of the total jobs supported in the Minnesota economy.



Value Added

The total value added and value added multiplier show the amount of additional economic value added to the MN economy as a result of the conservation spending. Figure 2 shows the total value added compared to the funds spent by the conservation partnership.

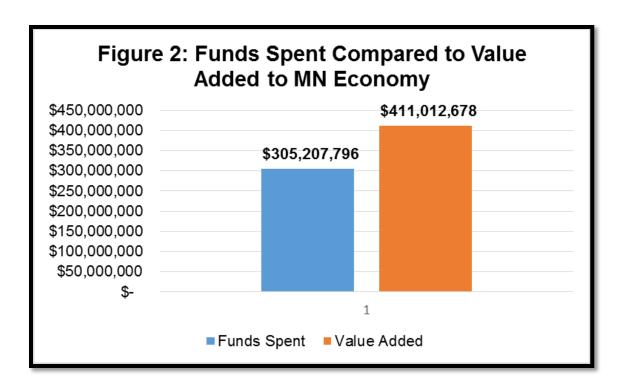


Figure 3 shows the \$411 Million in value added to Minnesota's economy by in a pie chart to display the portion of value added from each partner.

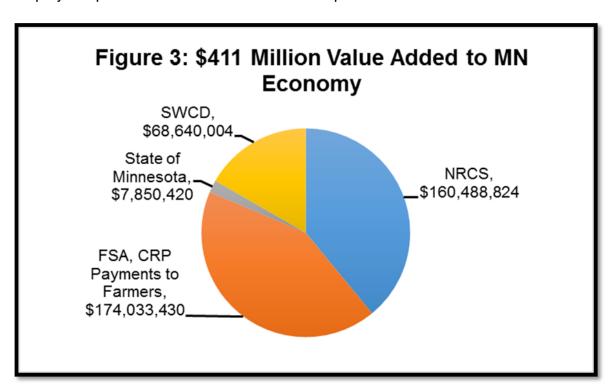


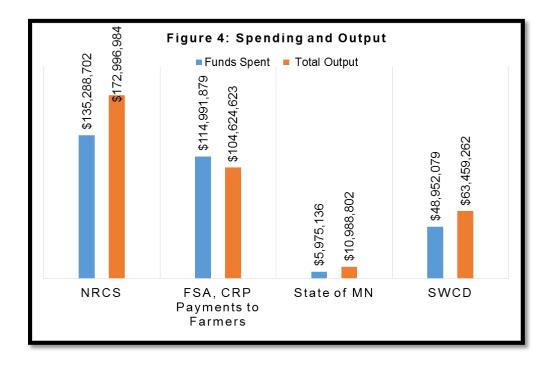
Table 2 shows the total value added to the state's economy by each partner's spending and the multiplier effect by partner. The total multiplier for the conservation partnership

is 1.35 meaning each dollar spent generates an additional 35 cents in the state's economy. Value added and multipliers vary because of the kinds and types of items or staff costs in the funds spent.

Table 2: Value Added and Value Added Multiplier by Partner						
Partner	Funds Spent	Total Value Added	Value Added Multiplier			
NRCS, All Programs and TA	\$ 135,288,702	\$ 160,488,824	1.19			
CRP Payments to Farmers	\$ 114,991,879	\$ 174,033,430	1.51			
State of Minnesota	\$ 5,975,136	\$ 7,850,420	1.31			
SWCD	\$ 48,952,079	\$ 68,640,004	1.40			
Total	\$ 305,207,796	\$ 411,012,678	1.35			

Output

Total output is a measure of added sales in the economy and can be used instead of the value added to the economy as a way to report economic impacts of spending. When the spending is for a lot of materials such as concrete, seed, plants, or other items needed to install conservation the use of total output can be useful to explain the added sales in Minnesota. Figure 4 shows the funds spent compared to total output for each of the partners. Generally funds that go to personnel expenses and easement payments will have less sales associated with them as the persons receiving the payments may not spend all of the funds in categories of purchases that are added sales in the economy.



The total funds spent by the conservation partnership in 2106 was \$305.2 Million. The economic impact of this spending was \$352 Million in total output (added sales) in Minnesota and the output multiplier was 1.15 showing an additional \$0.15 per dollar spent in the state's economy. Table 3 shows the breakdown of total output and multiplier by partner.

Table 3: Total Output and Output Multiplier by Conservation Partner						
Partner	Funds Spent	Total Output (Added MN Sales)	Cost to Output Multiplier			
NRCS, All Programs including TA	\$135,288,702	\$172,996,984	1.28			
CRP Payments to Farmers	\$114,991,879	\$104,624,623	0.9			
State of Minnesota	\$5,975,136	\$10,988,802	1.84			
SWCD	\$48,952,079	\$63,459,262	1.3			
Total	\$305,207,796	\$352,069,671	1.15			

Total output is less than value added because working lands program payments are used to contract for services and used in other farming operations expenses in addition to the purchase of materials to install conservation practices. As program payments are used by the producers to purchase what is needed to implement or install the practices those dollars are received and used by suppliers in the local economy, thus they will have a higher value added and larger multiplier than funds spent on TA or easement programs.

NRCS Programs

NRCS has a large portion and a variety of programs and technical assistance (TA) spending close to \$135.3 Million or 44% of the total spent by the partnership. Table 4 shows the breakdown of the NRCS IMPLAN results.

Table 4: NRCS IMPLAN results for FY 2016 by	Table 4: NRCS IMPLAN results for FY 2016 by Program								
Program	Program	FA Federal Cost	Direct Minnesota Impacts	Total Output	Total Value Added	Direct Jobs	Total Jobs	Jobs per \$1M of Federal Cost	Federal Cost to Output Multiplier
Ag Conservation Easement Program	ACEP	\$380,870	\$182,811	\$336,174	\$514,281	1.6	2.6	6.83	0.88
Agriculture Water Enhancement Program	AWEP	\$349,681	\$253,389	\$542,264	\$402,137	3.2	5.1	14.58	1.55
Conservation Security	CSPG		\$-	\$-	\$-	0.0	0.0	-	-
Conservation Stewardship	CSTP	\$73,759,315	\$24,231,141	\$90,025,184	\$105,606,087	421.3	874.1	11.85	1.22
Environmental Quality Enhancement	EQIP	\$19,734,144	\$16,977,634	\$32,534,456	\$19,781,339	177.0	276.4	14.01	1.65
Farmland Protection Program	FRPP	\$717,392	\$228,639	\$420,860	\$967,327	2.5	3.7	5.16	0.59
Regional Conservation Partnership Program	RCPP	\$123,942	\$107,298	\$199,609	\$121,472	1.4	2.1	16.94	1.61
Small Watershed Rehab Program	SWRP	\$192,147	\$192,147	\$307,684	\$216,563	3.2	4.0	20.82	1.60
Wildlife Habitat Incentives Program	WHIP	\$104,570	\$95,772	\$181,875	\$118,064	1.3	1.8	17.21	1.74
Wetland Reserve Program	WRPG	\$8,165,487	\$5,073,850	\$9,455,355	\$10,048,409	39.6	68.9	8.44	1.16
Waterbank Program	WSBP	\$10,817	\$-	\$9,841	\$16,371	0.0	0.1	9.24	0.91
Financial Assistance Totals		\$103,538,364	\$47,342,681	\$134,013,302	\$137,792,050	651	1,239	11.96	1.29
Combined Technical Assistance Impacts	TA	\$31,450,846	\$20,442,944	\$38,484,253	\$22,365,511	476.4	592	18.82	1.22
Combined Reimbursable Assistance	RA	\$299,492	\$265,058	\$499,429	\$331,263	4.3	5.8	19.37	1.67
Total Impacts		\$135,288,702	\$68,050,683	\$172,996,984	\$160,488,824	1,132	1,837	13.58	1.28