

Estimation of Region 10's Economic Impact

Presentation to the Board of Directors

August 24, 2023



Region 10



Overview

- Approach to estimating R10's economic impact
- Data sources
- Model designs
- Averages and assumptions
- The IMPLAN Input-Output Model
- Results by program area
- Total Region 10 economic impact
- Q & A

Thinking about Region 10's Impacts

- Budget Spending
 - Payroll
 - Supply purchases
 - Program expenses, for example software, bad debt, facility maintenance
- Program Benefits, for example:
 - Increased transportation funding
 - New businesses creating jobs
 - Support for seniors
 - Planning and research
 - Bandwidth

Data Sources for Budget Spending

DRAFT

Summary Breakdown by Program

Budget FY 2023-2024

Expenses

	Community Living Services	BLF	Small Business Resources	USDA RISE	Regional Development	Enterprise Zone	Transportation & Transit	Broadband (Assume 2x Rev)	Administration Services & Facility	Proposed Budget
SALARIES	347,786	190,945	128,951	197,844	61,276	24,599	11,835	232,825	296,923	1,492,983
FRINGE BENEFITS	104,333	57,286	38,687	59,355	18,386	7,381	3,551	69,846	89,076	447,901
Meetings & Travel Expenses	10,800	11,200	6,000	6,000	6,000	3,600		9,600	6,000	68,800
Broadband Service								120,000		120,000
Taxes License and Fees (Includes Property Taxes)									180	180
Telephone/Fax	720	1,200	600	1,200					8,400	12,120
Rent/CoLocations	4,000	4,000	4,000	42,000				37,800	0	91,800
Postage & Shipping	1,200	1,200	600	600					600	4,200
Educational Supplies				6,000						6,000
Printing & Supplies	3,600	24,000	3,600	6,000	2,400			3,000	6,000	48,600
DOLA_Community Development					36,000					36,000
Software-Finance									6,000	6,000
Software Miscellaneous	30,000	3,600		3,000					2,400	39,000
Web Hosting & Design									3,600	3,600
Computer Repair & Maintenance									36,000	36,000
Dues & Subscriptions	1,200	3,600	2,400		3,600			3,600	3,600	18,000
Consulting Fees			3,000						0	3,000
Contractual Services	4,200	96,000	3,000	12,000			21,000	60,000	0	196,200
Legal Fees		6,000						3,600	2,400	12,000
Audit & Accounting									36,000	36,000
Empoyee Recruitment & Retention	1,500								1,200	2,700
Donation & Sponsorship	1,200	2,400	2,400	2,400					2,400	10,800
Promotions	6,000	9,000	3,600	4,200				6,000	2,400	31,200
Bank Service Charges									240	240
Other Insurance								9,600		9,600
Commission Paid on Rent Contract										0
Depreciation Expense								840,000	44,000	884,000
RSVP Expenses										0
Equipment Repairs and Maintenance									2,400	2,400
Equipment & Furniture				36,000	1,800				3,600	48,600
Building Insurance				12,000				7,200	3,600	14,400
Building Maintenance				9,000					18,000	27,000
Building Loan Interest									18,000	18,000
Building Utilities				12,000				3,600	6,000	21,600
CNL Rent										0
Bldg Expences-EC										0
RSVP Expenses	291,430									291,430
AAA NSIP Subgrantee Fed	36,000									36,000
AAA State Caregiver Match	5,200									5,200
AAA Subgrantee Fed	925,730									925,730
AAA Subgrantee State	1,015,750									1,015,750
Other CLS Grant Expense	52,000									52,000
EZ Marketing Sub-Grantee										0
SBA Loan Interest		10,800								10,800
Loan Expenses		12,000								12,000
Bad Debt/Write Off		42,000								42,000
Expenses	2,842,649	475,231	196,838	409,599	129,462	35,580	45,986	1,406,671	597,819	6,139,834
Net Margin prior to allocation:	171,188	120,774	(4,338)	98,001	10,538	7,893	9,875	(782,671)	(492,279)	(861,019)
Admin/Facility Allocation	(143,143)	(78,590)	(53,074)	(81,429)	(25,219)	(10,124)	(4,871)	(95,826)	492,276	0
Net Margin:	28,045	42,184	(57,412)	16,571	(14,681)	(2,230)	5,003	(878,497)	(3)	(861,019)
Add Back Depr	28,045	42,184	(57,412)	16,571	(14,681)	(2,230)	5,003	(38,497)	43,997	22,981

Data Sources for Program Benefits

- Member Services reports
- Business Loan Fund reports
- Area Agency on Aging records
- Broadband and economic development literature
- Center IC and other SBR tracking
- Enterprise Zone records
- And assumptions ...

Model Design for Budget Spending

- Based on Region 10 financials and budget
- Pro forma framework for each program
- Available for future forecasting

AAA	GR	FY22 A	FY23 E	FY24 B	FY25	FY26	FY27	FY23-24 Avg
Payroll								
Salaries	1.03	\$280,867	\$293,008	\$347,786				\$320,397
Benefits	1.03	\$59,994	\$68,157	\$104,333				\$86,245
T&E	1.03	\$22,697	\$10,063	\$10,800				\$10,432
Subtotal payroll		\$363,558	\$371,228	\$462,919				\$417,074
Operating expenses								
Telephone	1.03	\$1,937	\$3,283	\$720				\$2,002
Rent/CoLocations	1.03	\$300	\$3,944	\$4,000				\$3,972
Postage and shipping	1.03	\$114	\$837	\$1,200				\$1,019
Education supplies	1.03	\$0	\$0	\$0				\$0
Printing/supplies	1.03	\$5,494	\$12,683	\$3,600				\$8,141
Web hosting, design, software	1.03	\$32,097	\$4,453	\$30,000				\$17,226

Model Design for Program Benefits

- Unique tally for each program
- Measured by incremental investment
 - Transportation
 - Portion of AAA
 - Enterprise Zones
- Measured by jobs
 - Business Loan Fund
 - Portion of SBR
- Measured by incremental GDP
 - Broadband
 - Community Development
- RISE extrapolated from BLF and SBR

Model Design for Program Benefits

➤ Transportation example

Transportation/Transit

MMOF Projects Funded 2021-2024

Agency	Funding
Town of Mountain Village	\$ 400,000
San Miguel Reg Transp	\$ 100,000
San Miguel County	\$ 75,000
San Miguel County	\$ 120,000
Lake City	\$ 858,062
All Points Transit	\$ 225,000
All Points Transit	\$ 40,000
All Points Transit	\$ 90,097
City of Gunnison	\$ 393,750
	\$ 2,301,909

- Annual funding = \$577,477
- Assume 50% incremental
 - \$287,739 is program benefit
- Assume half new construction and half maintenance

Impact	Industry Description	IMPLAN Code
\$143,869	Construction of new highways and streets	54
\$143,869	Maintenance and repair construction of highways, streets, bridges, and tunnels	62

Model Design for Program Benefits

- Business Loan Fund example
 - Assume credit for all jobs created and only half of the jobs retained
 - Share credit with SBR without double counting

# Jobs	Industry Description	IMPLAN Code
2	Retail - Motor vehicle and parts dealers	402
5	Confectionery manufacturing from purchased chocolate	76
4.5	Dry-cleaning and laundry services	519
10	Construction of new single-family residential structures	57
3	Hotels and motels, including casino hotels	507
25.5	Sporting and athletic goods manufacturing	382
31	Full-service restaurants	509
5.5	Retail - Health and personal care stores	407
1.5	Retail - Clothing and clothing accessories stores	409
2	Community food, housing, and other relief services, including rehabilitation services	495

Averages and Assumptions

- *Every effort made to be conservative*
- *Averages and assumptions tend to cancel in total*
- Budget spending averages FY23 and FY24 budget
 - Assume payroll portions spent within Region 10
 - Assume payroll spending in only 10 industries
- Assume portions of incremental gains
- IMPLAN averages employee compensation, output and other metrics across 546 industries
- Assume incremental broadband impacts based on research literature guidance
- We assume RISE will compare to BLF and SBR
- ...

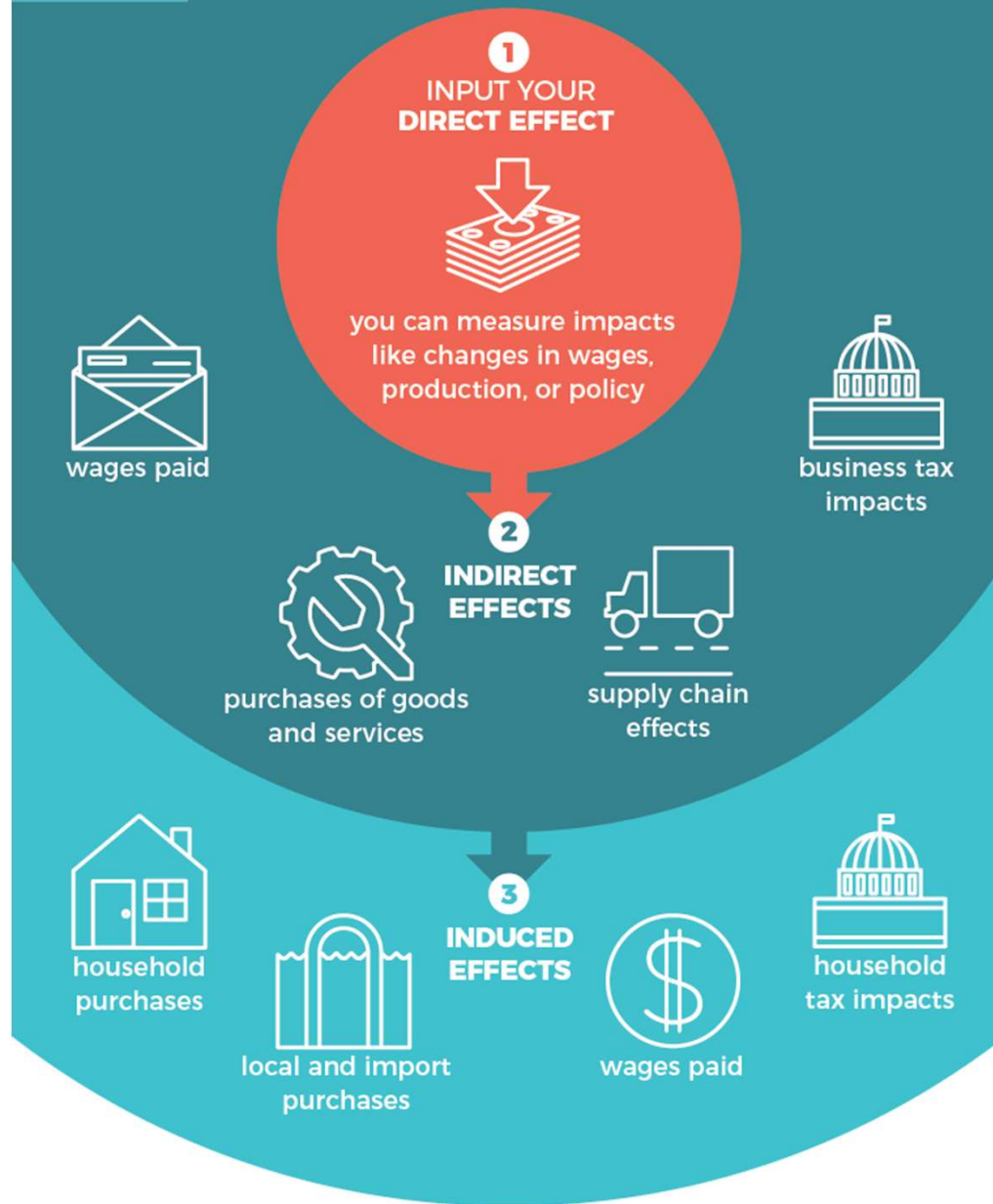
IMPLAN

- Input-Output Model
 - Numerical analysis approach to modeling interdependencies between different sectors of an economy
 - Leontief wins Nobel Prize 1973
- IMPLAN developed by USFS in 1970s, later privatized
- Based on BEA, BLS, IRS, NOAA, etc, etc
- Perfect data model of regional economy
- Used to estimate changes to an economy as investment multiplies or ripples through an economy

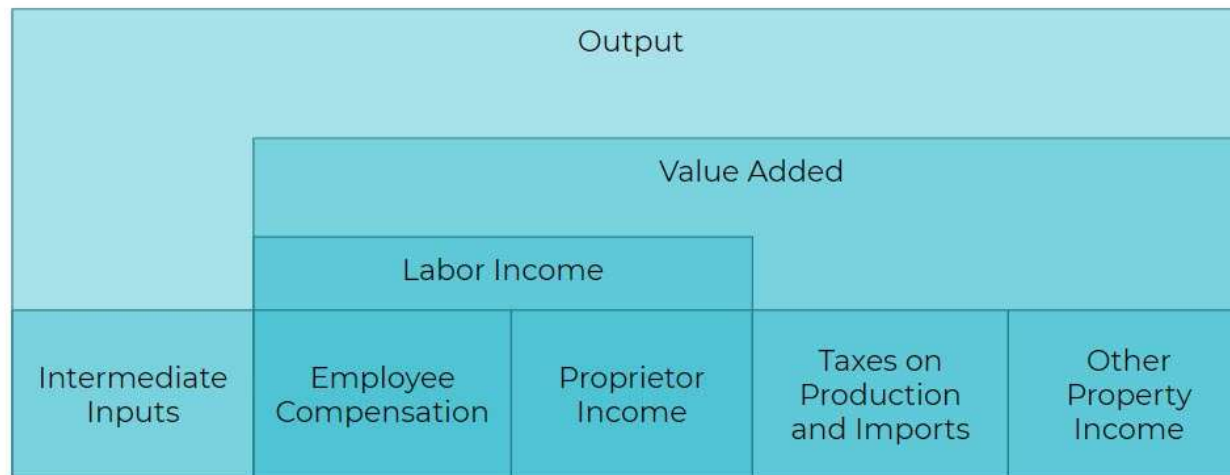
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= Regional Absorption											
Taxes	%	%	%	%	%	%	%	%	%	%	
Payroll	%	%	%	%	%	%	%	%	%	%	
Profit	%	%	%	%	%	%	%	%	%	%	
	=	=	=	=	=	=	=	=	=	=	
	95%	80%	92%	75%	90%	93%	87%	97%	83%		

IMPLAN

Cascade of direct, indirect, and induced impacts



IMPLAN Leontief Production Function



- Extensive government data sources, including:
 - Bureaus of Economic Analysis and Labor Statistics
 - National Agricultural Statistical Service
 - Annual State and Local Government Finances Survey
 - Annual Survey of State Government Tax Collections
 - Energy Information Administration

IMPLAN Industry Data

- Region 10 “region” created by combining 6 counties (requires more averaging)

Code	Display Description	Employment	Labor Income	Output	Avg Employee Comp	Avg Proprietor Income
10	All other crop farming	843.39	\$10,223,193.46	\$21,008,239.87	\$44,515.00	\$2,059.33
11	Beef cattle ranching and farming, including feedlots	1,972.13	\$33,342,926.72	\$198,630,042.75	\$52,846.90	\$15,228.57
12	Dairy cattle and milk production	37.87	\$1,043,241.61	\$9,332,284.74	\$34,409.08	\$20,985.31
13	Poultry and egg production	45.09	\$2,443,625.75	\$17,989,211.89	\$72,161.05	\$22,357.78
14	Animal production, except cattle and poultry and eggs	214.06	\$9,428,489.15	\$18,607,056.92	\$47,401.11	\$42,492.64
15	Forestry, forest products, and timber tract production	5.41	\$359,184.84	\$527,093.41	\$66,359.27	
16	Commercial logging	35.7	\$1,583,294.77	\$3,173,753.28	\$68,739.70	(\$1,363.46)
17	Commercial fishing	0	\$0.00	\$0.00		
18	Commercial hunting and trapping	19.98	\$946,075.87	\$13,151,432.65	\$62,531.26	\$42,692.08
19	Support activities for agriculture and forestry	513.78	\$19,566,219.60	\$20,074,204.90	\$52,577.35	\$19,076.16
20	Oil and gas extraction	226.83	\$6,325,751.73	\$126,431,578.84	\$199,665.13	\$14,633.64
21	Coal mining	532.56	\$15,927,707.60	\$203,680,683.10	\$115,072.80	(\$12,474.46)
22	Copper, nickel, lead, and zinc mining	0	\$0.00	\$0.00		
23	Iron ore mining	0	\$0.00	\$0.00		
24	Gold ore mining	155	\$12,887,371.11	\$78,576,854.05	\$154,407.21	(\$13,607.18)
25	Silver ore mining	146.11	\$15,935,034.56	\$76,387,917.87	\$171,152.45	(\$4,436.05)
26	Uranium-radium-vanadium ore mining	2.16	\$110,759.94	\$1,340,117.16	\$203,269.59	(\$26,819.87)
27	Other metal ore mining	0	\$0.00	\$0.00		
28	Stone mining and quarrying	40.9	\$1,250,873.64	\$16,084,798.63	\$61,958.77	(\$126,229.97)
29	Sand and gravel mining	15.19	\$656,252.64	\$4,118,353.95	\$63,837.80	(\$230,032.94)

IMPLAN Occupation Data

- IMPLAN accounts for a total of 823 occupations
- Example below shows top 15 occupations in Nursing and Community Care Facilities Industry in Region 10 in terms of employment

Occupations in Industry 491	Employment	W & S Income	Supplements to W & S	Employee Compensation	Hours Worked	EC / Hour
Nursing Assistants	174	\$4,598,318.13	\$1,237,216.99	\$5,835,535.12	290,289.41	\$20.10
Home Health and Personal Care Aides	87.66	\$2,132,884.09	\$573,870.79	\$2,706,754.87	138,000.99	\$19.61
Licensed Practical and Licensed Vocational Nurses	63.67	\$2,910,883.08	\$783,198.10	\$3,694,081.18	114,572.16	\$32.24
Registered Nurses	46.58	\$2,834,804.00	\$762,728.37	\$3,597,532.37	83,798.13	\$42.93
Food Servers, Nonrestaurant	33.18	\$588,430.09	\$158,322.17	\$746,752.26	42,200.33	\$17.70
Maids and Housekeeping Cleaners	29.68	\$695,862.73	\$187,227.85	\$883,090.58	44,053.64	\$20.05
Cooks, Institution and Cafeteria	24.9	\$585,595.19	\$157,559.42	\$743,154.61	35,648.30	\$20.85
Recreation Workers	16.61	\$361,119.29	\$97,162.25	\$458,281.54	23,308.27	\$19.66
Maintenance and Repair Workers, General	12.29	\$454,082.27	\$122,174.74	\$576,257.00	23,988.13	\$24.02
Medical and Health Services Managers	10.47	\$855,849.26	\$230,273.60	\$1,086,122.86	21,667.67	\$50.13
Receptionists and Information Clerks	9.88	\$244,909.24	\$65,894.94	\$310,804.18	15,305.92	\$20.31
Food Preparation Workers	7.57	\$133,888.55	\$36,023.86	\$169,912.42	9,435.03	\$18.01
Laundry and Dry-Cleaning Workers	6.64	\$151,088.97	\$40,651.79	\$191,740.76	10,040.54	\$19.10
First-Line Supervisors of Food Preparation and Servers	5.68	\$238,595.97	\$64,196.29	\$302,792.26	9,886.80	\$30.63
Janitors and Cleaners, Except Maids and Housekeepers	5.46	\$159,443.22	\$42,899.57	\$202,342.78	8,690.80	\$23.28

IMPLAN Model Design

- Eight program models
- 266 unique “events”
- Approx 50 unique industries/546 total
- Data year = 2021
- Dollar year = 2023
- Leakage considered
- Margins not counted in retail and wholesale industries

- Summary results to follow
 - **Green shaded cell** shows effective “input”

Transportation Impact

Impact Type	Labor Income	Intermediate Expenses	OPI/TOPI	Total Output
Direct	\$109,000	\$184,000	\$21,000	\$314,000
Indirect	\$27,000	\$53,000	\$21,000	\$101,000
Induced	\$18,000	\$31,000	\$21,000	\$70,000
Transport Total	\$154,000	\$268,000	\$62,000	\$484,000

Impact Type	Annual Jobs
Direct	2
Indirect	1
Induced	0
Total	3

Business Loan Fund Impact

Impact Type	Labor Income	Intermediate Expenses	OPI/TOPI	Total Output
Direct	\$4,072,000	\$9,607,000	\$1,960,000	\$15,639,000
Indirect	\$1,056,000	\$2,277,000	\$581,000	\$3,914,000
Induced	\$669,000	\$1,156,000	\$778,000	\$2,603,000
BLF total	\$5,798,000	\$13,040,000	\$3,319,000	\$22,157,000

Impact Type	Annual Jobs
Direct	93
Indirect	25
Induced	17
BLF Total	135

Broadband Impact

Impact Type	Labor Income	Intermediate Expenses	OPI/TOPI	Total Output
Direct	\$5,133,000	\$20,435,000	\$6,407,000	\$31,975,000
Indirect	\$3,985,000	\$10,176,000	\$2,803,000	\$16,964,000
Induced	\$1,197,000	\$2,068,000	\$1,392,000	\$4,657,000
Broadband Total	\$10,316,000	\$32,679,000	\$10,602,000	\$53,597,000

Impact Type	Annual Jobs
Direct	137
Indirect	90
Induced	30
Broadband Total	257

Area Agency on Aging Impact

Impact Type	Labor Income	Intermediate Expenses	OPI/TOPI	Total Output
Direct	\$2,005,000	\$3,013,000	\$693,000	\$5,711,000
Indirect	\$603,000	\$1,508,000	\$351,000	\$2,462,000
Induced	\$342,000	\$590,000	\$397,000	\$1,329,000
AAA Total	\$2,949,000	\$5,111,000	\$1,441,000	\$9,501,000

Impact Type	Annual Jobs
Direct	71
Indirect	18
Induced	9
AAA Total	97

Small Business Resources Impact

Impact Type	Labor Income	Intermediate Expenses	OPI/TOPI	Total Output
Direct	\$4,182,000	\$11,847,000	\$2,512,000	\$18,541,000
Indirect	\$1,204,000	\$2,580,000	\$630,000	\$4,414,000
Induced	\$702,000	\$1,213,000	\$816,000	\$2,731,000
SBR Total	\$6,088,000	\$15,640,000	\$3,959,000	\$25,687,000

Impact Type	Annual Jobs
Direct	87
Indirect	27
Induced	18
SBR Total	132

RISE Impact (anticipated)

Impact Type	Labor Income	Intermediate Expenses	OPI/TOPI	Total Output
Direct	\$4,127,000	\$10,727,000	\$2,236,000	\$17,090,000
Indirect	\$1,130,000	\$2,429,000	\$606,000	\$4,165,000
Induced	\$686,000	\$1,184,000	\$797,000	\$2,667,000
RISE Total	\$5,943,000	\$14,340,000	\$3,639,000	\$23,922,000

Impact Type	Annual Jobs
Direct	90
Indirect	26
Induced	17
RISE Total	133

Community Development Impact

Impact Type	Labor Income	Intermediate Expenses	OPI/TOPI	Total Output
Direct	\$2,822,000	\$8,685,000	\$2,115,000	\$13,622,000
Indirect	\$1,140,000	\$2,661,000	\$692,000	\$4,493,000
Induced	\$518,000	\$894,000	\$602,000	\$2,014,000
Comm Dev Total	\$4,481,000	\$12,239,000	\$3,409,000	\$20,129,000

Impact Type	Annual Jobs
Direct	63
Indirect	26
Induced	13
Comm Dev Total	102

Enterprise Zones Impact

Impact Type	Labor Income	Intermediate Expenses	OPI/TOPI	Total Output
Direct	\$605,000	\$939,000	\$252,000	\$1,796,000
Indirect	\$177,000	\$361,000	\$104,000	\$642,000
Induced	\$102,000	\$176,000	\$119,000	\$397,000
E. Zones Total	\$885,000	\$1,476,000	\$475,000	\$2,836,000

Impact Type	Annual Jobs
Direct	19
Indirect	4
Induced	3
EZ Total	26

Region 10 Total Economic Impact

Impact Type	Labor Income	Intermediate Expenses	OPI/TOPI	Total Output
Direct	\$23,055,000	\$65,437,000	\$16,196,000	\$104,688,000
Indirect	\$9,322,000	\$22,045,000	\$5,788,000	\$37,155,000
Induced	\$4,234,000	\$7,312,000	\$4,922,000	\$16,468,000
Region 10 Total	\$36,614,000	\$94,793,000	\$26,906,000	\$158,313,000

Impact Type	Annual Jobs
Direct	562
Indirect	216
Induced	107
Region 10 Total	885

Tax Impacts	Sub County	Special Districts	County	State	Federal	Total
Direct	\$491,500	\$671,500	\$580,000	\$1,567,000	\$4,914,000	\$8,224,000
Indirect	\$259,000	\$350,000	\$303,500	\$738,000	\$1,865,500	\$3,516,000
Induced	\$227,000	\$306,000	\$264,000	\$542,000	\$814,500	\$2,153,500
R10 Total	\$977,500	\$1,327,500	\$1,147,500	\$2,847,000	\$7,594,000	\$13,893,500

Thank You



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