Petroleum: Jobs and Revenues

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House Resources Committee
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Petroleum: Jobs and Revenues

Primary Financial Support from

Northrim Bank
Customer First Service

STATE of ALASKA
Basis for a Prosperous Economy
The Alaska Economy Runs on $$$ From Outside

- Sale of Resources
- Tourists
- Federal Spending
- Retirees
As Those $$ Circulate Thru the Economy, They Support These Other Types of Businesses
What is the Impact on Jobs and Revenues from a Cut in Petroleum Taxes?

- State Revenues from Currently Anticipated Production Fall
- Budget Cuts Reduce Public and Private Jobs

- Increase in Petroleum Industry Investments Increases Private Jobs

- Increase in Oil Production increases state revenues
- Higher state revenues increases Public and Private Jobs
Oil and the Alaska Economy
What Happens to Investment When taxes Cut $1 Billion?

If Alberta cuts its tax rates, will oil companies take that money and come to Alaska to invest?

Or, Is Alaska different from every other oil rich region?

LEVERAGE
Oil Development & Production: Each Project Unique
Jobs to Production Relationship

Oil and the Alaska Economy
How Does the State Spend its Money?

Responsible and Responsive

Alaska’s Fiscal Year 2014 Budget Proposal

<table>
<thead>
<tr>
<th>Source of Funds</th>
<th>Amount</th>
</tr>
</thead>
<tbody>
<tr>
<td>General Funds</td>
<td>$6.66 billion</td>
</tr>
<tr>
<td>DFG/FTH</td>
<td>$2.94 billion</td>
</tr>
<tr>
<td>Federal Funds</td>
<td>$2.94 billion</td>
</tr>
<tr>
<td>Other Funds</td>
<td>$3.36 billion</td>
</tr>
<tr>
<td>Total</td>
<td>$12.36 billion</td>
</tr>
</tbody>
</table>

The FY 2014 Budget Proposal Supports Alaska’s Priorities:

Resource/Energy Development
- Roads to Resources $18 million
- Oil and Gas Development $50 million
- Geologic Materials Center $10 million
- Chinook Salmon Research $10 million
- Strategic Minerals $2.7 million
- Permitting and Statewide Mapping $7.3 million
- Sustainable Energy Fund $1.25 million
- Susitna Wastana Hydro Protect $95 million
- Interior Energy $40 million
- Ventilation/Smoke Energy $81.5 million
- Renewable Energy $25 million

Transportation/Infrastructure
- Statewide Highway and Aviation $971 million
- Alaska Marine Highway $132 million
- Municipal Water and Sewer Projects $54 million
- Village Safe Water $16.5 million
- State Funds to leverage federal and local $141 million

Public Safety
- The budget prioritizes safe homes and strong families.
- Choose Respect Initiative $14.8 million
- 18 New Alaska State Troopers $5.7 million
- 15 New Village Public Safety Officers $2.7 million
- Investigate/Prosecute Child sexual abuse $1.6 million
- Emergency - Blood Bank of Alaska $7 million

Military Support
- We honor Alaska’s military community.
- Interior Alaska Veterans Cemetery $2.5 million
- Homeland Security $19.6 million
- Alaska Military Youth Academy $11.1 million
- Veterans Services and Outreach $2 million

“Our fiscal plan is built on our state’s resources and spending discipline. We focus on priorities that grow our economy and strengthen our families – for Alaskans today and tomorrow.”

Sean Parnell
Governor

Oil and the Alaska Economy

Institute of Social and Economic Research
University of Alaska Anchorage

Understanding Alaska: Special Economic Studies
Hypothetical $1 Billion Field

- 18K Barrels per Day
- 10% Decline Rate
- $20 Tax per Barrel
New Field: Direct Jobs
New Field: Direct Jobs
25 Year Cumulative Totals

Production = 72 Million Barrels

Revenues = $1.445 Billion (2012 $)*

Direct Oil Patch Jobs = 4,349

* NPV @ 5% = $827 Million
Hypothetical Field: Make Room on Graph for Other Jobs
Petroleum Job Pyramid: The Economic “MULTIPLIER”

- Advertising
- Air Carriers
- Arctic Engineering
- Arctic Gear
- Aviation Fuel
- Catering
- Communications
- Chemicals
- Hazardous Waste
- Commercial Diving
- Construction Equipment
- Project Management
- General Contractors
- Control Systems
- Corrosion Control
- Drilling
- Electrical Contracting
- Employee Services
- Environmental Engineering
- Engineering Services
- Heavy Hauling
- Expediting
- Oilfield Supplies
- Geophysical Services
- Geological Services
- Hydraulic Supply
- Industrial Gases
- Inspection Services
- Instrumentation Services
- Machining
- Logistics
- Maps
- Medical Services
- Mat Systems
- Mud
- Permitting
- Photography
- Plumbing
- Soil Stabilization
- Safety Equipment
- Rigging Supplies
- Security
- Seismic
- Steel Fabrication
- Storage Space
- Tank Fabrication
- Welding
- Vessel Charter

Oil Company Employee > $147K

< Field Development and Maintenance

< Consumer Businesses

Suppliers >
### Petroleum “MULTIPLIER”

\[
\frac{45}{4} = 10
\]

\[
\frac{45}{4+8} = 4
\]

\[
\frac{45}{4+8+7} = 2.4
\]

\[
2.4 = 1 + 1.4
\]

<table>
<thead>
<tr>
<th>Alaska Resident Employment and Labor Income in the Oil and Gas Industry, 2010</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>Employment</strong></td>
</tr>
<tr>
<td><strong>Direct Impacts</strong></td>
</tr>
<tr>
<td>Primary Companies</td>
</tr>
<tr>
<td><strong>Indirect Impacts</strong></td>
</tr>
<tr>
<td>Reported Oil &amp; Gas Industry Support Services*</td>
</tr>
<tr>
<td>Other Support Services**</td>
</tr>
<tr>
<td><strong>Other Indirect and Induced Impacts</strong></td>
</tr>
<tr>
<td>All Other Indirect and Induced</td>
</tr>
<tr>
<td><strong>Grand Total (Direct, Indirect, and Induced)</strong></td>
</tr>
</tbody>
</table>

*Includes ADOILWD Oil and Gas Support Services Sectors 213111 and 213112. **Other Support Services includes construction, transportation services, engineering, and a variety of other business and professional services provided under contract to P
New Field: Total Oil Patch Jobs

Add 6,088 for total of 10,437

Oil and the Alaska Economy
Hypothetical $1 Billion Field

- 18K Barrels per Day
- 10% Decline Rate
- $20 Tax per Barrel
State Spending
Bang per Buck & Multipliers

OPERATIONS
\[
\frac{20}{12} = 1.66
\]

CAPITAL
\[
\frac{7}{4} = 1.75
\]

Oil and the Alaska Economy
Bang per Buck & Multipliers

- Operations: Direct 12, Indirect/Induced 8
- Capital: Direct 4, Indirect/Induced 3
- Petroleum: Direct 2, Indirect/Induced 2.8

Oil and the Alaska Economy
New Field: Total Jobs including Public Capital Spending

Add 10,117 for grand total of 20,554
New Field: Total Jobs including Public Operations Spending

Add 28,790 for grand total of 39,227
Cumulative Jobs Generated

- **PRIVATE INVESTMENT GAIN**
  - CAPITAL FOR CAPITAL = 2.9: 20,554
  - OPERATING FOR OPERATING = 2.0: 39,227
  - CAPITAL FOR OPERATING = 5.6: 39,227

- **PUBLIC SPENDING LOSS**
  - CAPITAL FOR CAPITAL = 2.9: (7,000)
  - OPERATING FOR OPERATING = 2.0: (20,000)
  - CAPITAL FOR OPERATING = 5.6: (7,000)

Oil and the Alaska Economy
Cumulative Revenues Generated (Million 2012 $)

$2,000
$1,500
$1,000
$500
$0
$-500
$-1,000
$-1,500

PRIVATE INVESTMENT GAIN
PUBLIC SPENDING LOSS

$1,445
$1,445
$1,445

$(1,000)
$(1,000)
$(1,000)

CAPITAL FOR CAPITAL = 1.45
OPERATING FOR OPERATING = 1.45
CAPITAL FOR OPERATING = 1.45

Oil and the Alaska Economy
Job Growth Since 2001
How Much Due to Govt Investment?

- Health Services
- Military
- Professional Services
- Govt: State and Local
- Tourism
- Oil and Gas
- Other Services
- Resident Leisure
- Mining

Oil and the Alaska Economy
Progress Toward Fiscal Diversification
Non-Residents?

### Ratio of Non-Resident Worker Share

<table>
<thead>
<tr>
<th>Industry</th>
<th>Non-Resident Worker Share</th>
</tr>
</thead>
<tbody>
<tr>
<td>Seafood Processing</td>
<td>77</td>
</tr>
<tr>
<td>Visitor (Accomodations)</td>
<td>42</td>
</tr>
<tr>
<td>Metal Mining</td>
<td>35</td>
</tr>
<tr>
<td>OIL AND GAS</td>
<td>31</td>
</tr>
<tr>
<td>Construction</td>
<td>20</td>
</tr>
<tr>
<td>State Govt</td>
<td>7</td>
</tr>
</tbody>
</table>

Oil and the Alaska Economy
Jobs
Sensitivity to “Leverage”
Revenues: Sensitivity to “Leverage”
Sensitivity to Leverage

CAPITAL SPENDING

LEVERAGE

JOE MULIPLE

REVENUE MULTIPLE

LEVERAGE

Oil and the Alaska Economy
Sensitivity to Leverage

OPERATIONS SPENDING

Oil and the Alaska Economy
State Fiscal Plan

Scenario 3: Governor’s FY2014 Budget with 4% Annual GF Expenditure Growth beginning in FY2015

GF Revenue versus Appropriations FY13 to FY23
Fall 2012 Revenue Forecast GF Spending growth (all components) at 4% annual rate through FY2023 (Scenario 3)
Looking Beyond the 10-Year Horizon

**ALASKA 10-YEAR FISCAL PLAN**

- CASH RESERVE
- NEW OIL
- DOR OIL REVENUES
- NON OIL
- GF SPENDING: 4.5%

**LOOKING BEYOND THE 10-YEAR HORIZON**

- CASH RESERVE
- NATURAL GAS
- NEW OIL
- DOR OIL REVENUES
- NON OIL
- GF SPENDING: 4.5%
Move Towards Sustainability

[Graph depicting economic trends over time, with arrows indicating changes.]
Continuous Spending for 25 Years: Jobs

- Petroleum Future: Oil Patch Jobs
- Petroleum Future: State $ Jobs
- Business as Usual

Oil and the Alaska Economy
Continuous Spending for 25 Years: Revenue

- BUSINESS AS USUAL
- PETROLEUM FUTURE

Oil and the Alaska Economy
Non-Petroleum Strategies for Continuing Economic Prosperity

- Natural Resource Development
- Value Added Processing
- Economic Diversification
- Infrastructure Investments in Power and Transportation
- Footloose Industry
- Renewable Energy
Cumulative Jobs Generated

- Private Investment Gain
- Public Spending Loss

- Capital for Capital = 2.9
- Operating for Operating = 2.0
- Capital for Operating = 5.6

Oil and the Alaska Economy