FUTURE ENERGY RESOURCE DEVELOPMENT

One indicator of Alaska's future economy and its labor force requirements rests on the prospects of mining and energy resource development within the state. Though the actual number of persons directly employed in the mining industry is relatively small (about 2 percent of Alaska's labor force), the impact this industry has on other segments of the economy is quite significant. Industries such as transportation and construction would be directly affected by any major development in the mining industry. Secondary industries such as services and trade would also be affected depending on the magnitude and duration of the development. A good example of the impact energy development can have on employment is the Prudhoe Bay Oil Field. development of that field created thousands of jobs which otherwise would not have been available. Many of these jobs were only indirectly related to oil development on the North Slope.

It is important to note that due to the massive construction effort necessary to build the Alaskan oil pipeline from Prudhoe Bay, the effect of future energy resource development may never have such a dramatic impact on the labor force of Alaska.

At this point a look at what is in store for the future in energy resource development may shed some light on the effect it will have on Alaska's economy and its labor force. Within Alaska and off its coastline there are an estimated 86.6 billion barrels of oil, 469.3 trillion cubic feet of gas and more than 2 trillion tons of coal. However, according to an open file report prepared by the Division of Geological and Geophysical Survey three conditions must be met before development can begin.

- 1. The land must be available for leasing so that private enterprise has a justification to begin exploring for oil (or coal).
- 2. The land must be leased and drilled to evaluate the economic potential of the area (two or five years).
- 3. If an economic field is discovered, the necessary engineering, transportation, and drilling procedures must be undertaken to bring the field into production (three to five years).

Given the present state of the art in arctic and offshore drilling techniques, the drilling and engineering problems mentioned by the Division of Geological & Geophysical Survey should not prove to be insurmountable. The knowledge gained in the Prudhoe Bay field and in other parts of the world such as the North Sea, will be most useful in the continued development of Alaska's on and offshore energy resources.

However, there is one major stumbling block which could effectively prevent almost all future development of Alaska's onshore natural resources. The massive withdrawal of public lands by the Federal government has reduced the amount of land presently available for leasing to almost nothing. Only 4 percent of the 231,887 square miles of onshore oil potential land is currently available for leasing. A similar situation is true for coal development, where 18 percent of the 41,552 square miles of onshore coal potential land is available for leasing at the present time.

Currently the only onshore fields of any significance open to oil development are Prudhoe Bay, the onshore portions of Cook Inlet, and an area near Yakutat Bay. With such severe limitations on available land, further onshore oil development in the near future does not look very promising.

It should be pointed out that future onshore oil development should not be written off completely. It is estimated that 19 percent of the total oil potential land on shore may be available within one to five years, and another 35 percent may be available within five to ten years. However, this still leaves approximately 42 percent of the total onshore oil potential land closed to development indefinitely.

The development of coal may also see some relief in the availability of coal bearing lands. An estimated 17 percent of the total onshore coal deposits may become available within one to five years, with another 17 percent becoming available in five to ten years. It is further believed that one percent of the total coal bearing lands could be made available by the Secretary of Interior. On the other hand, if all the land which may be opened is made available, 47 percent of the total onshore coal bearing lands will still remain indefinitely closed to development.

As it stands now the development of much of Alaska's onshore mineral resources, particularly coal and oil, will depend upon the judgement of the Federal government. Without a release of federally withheld land for development, Alaska may see little growth in this industry for the near future.

A bright note in the energy resources industry is the possibility of developing the vast oil reserves offshore. There is an estimated 394,881 square miles of oil potential land off the coast of Alaska, none of which has been withdrawn by the Federal government. As Prudhoe Bay goes into production, further exploration for oil will probably be centered in the Gulf of Alaska.

Any development of oil in the Gulf will have a substantial impact on the communities near-by. Historically, most of the communities in the Gulf of Alaska have had an economy primarily based on fishing. Oil development will bring increased employment on a year-round basis to those communities which will serve as staging points for the oil fields offshore.

The next offshore area to be leased and undergo development in all probability will be the Beaufort Sea. However, it is not likely that exploration of this oil field will create a dramatic increase in the labor force in the Prudhoe area. Most of the support facilities needed for Beaufort Sea development have already been established at Prudhoe Bay, which also has an experienced labor force that could easily adapt to offshore operations.

Further offshore areas which have yet to be scheduled for a lease sale are the Bering and Chukchi Seas, both of which have a very high oil potential.

Alaska has vast potential oil and coal resources lying beneath its land both on and offshore, however, due to the massive withdrawal of land by the Federal government much of that land may not be developed. Further growth of the energy resources industry in the state would be negligible if it were not for the development of offshore oil fields such as the Gulf of Alaska and the Beaufort Sea.

ALASKA'S LABOR MARKET IN FEBRUARY

Employment - Unemployment: The total number of unemployed dropped one percent to 20,800 persons during the month of February. The unemployment rate for February was 11.0 percent,

showing an improvement over the revised January rate of 11.6 percent.

Mining: Employment in the mining industry rose 3 percent during the month of February. It is anticipated that employment in this industry will continue to experience employment gains through the spring and summer. In comparison to February 1975, employment in February 1976 rose 8 percent.

Construction: The continued hiring by construction firms working on the oil pipeline led the industry as employment rose 17 percent in February. Employment in February 1976 was 113 percent higher than the level of employment of one year ago.

Manufacturing: Employment in manufacturing rose 4 percent during the month of February. The most active sector during the month was food processing which rose 10 percent.

Transportation, Communication & Utilities: Overall employment in this industry was mixed with a one percent decrease over the previous month. The air transportation sector dropped by 2 percent continuing its gradual decline in employment, while trucking showed a three percent gain. Employment for the industry rose 9 percent over the previous year.

Trade: The trade industry experienced a one percent decline in employment. The greatest loss in employment was in eating and drinking establishments which dropped 5 percent from December. However, when compared to the previous year employment in the trade industry remained 19 percent above the employment level of one year ago.

Finance, Insurance & Real Estate: This industry remained fairly constant with only a 2 percent decline in employment. However, employment was 23 percent above the level of February 1975.

Services & Miscellaneous: The gradual decline of employment in this industry turned around in February with a one percent gain. Though employment in this industry has been declining in recent months, employment in February was 8 percent greater than the employment level experienced in February 1975.

Government: Government employment increased by two percent in February, regaining the employment lost in January. Employment when compared to one year ago increased by 3 percent.

Private Industry I.U.R.: The insured unemployment rate rose slightly to 11.9 percent in the month of February. The area showing the highest U.I. rate during the month was the Kenai-Kodiak-Seward