### **Department of Revenue**



550 W. Seventh Ave., Suite 500 Anchorage, Alaska 99501-3555 Main: 907.269.6620 Fax: 907.269.6644





January 25, 2023

The Honorable Lyman Hoffman Senate Finance Committee, Co-Chair Alaska State Legislature State Capitol, Room 518 Juneau, AK 99801

The Honorable Donald Olson Senate Finance Committee, Co-Chair, Alaska State Legislature State Capitol, Room 516 Juneau, AK 99801

The Honorable Bert Stedman Senate Finance Committee, Co-Chair, Alaska State Legislature State Capitol, Rooms 508 Juneau, AK 99801

Dear Co-Chairs Hoffman, Olson, and Stedman,

Thank you for the opportunity to respond to the questions asked during the Department of Revenue's (DOR) Fall 2022 Forecast presentation to the Senate Finance Committee on January 20, 2023. Please see the questions in italics and our response immediately below the questions.

1. Provide information about management fees for Treasury-managed funds, similar to the information provided for the Alaska Retirement Management Board (ARMB) and Permanent Fund in the Revenue Sources Book.

According to the Treasury Division, total costs for managing non-ARMB assets in FY 2022 were \$4.0 million. On June 30, 2022, the net asset value of these assets was \$9.4 billion, costs were approximately 4.2 basis points (0.042%) of net assets.

### 2. Provide a restated version of Slide 13 adjusted for inflation.

The following chart shows the official forecast of the Percent of Market Value (POMV) transfer forecast in fiscal year (FY) 2023 real dollars. This chart assumes an inflation rate of 2.25% for FY 2024+ consistent with the Fall 2022 Forecast assumptions.



#### **POMV Transfer Forecast**

### **3.** Provide the Percent of Market Value Transfer Forecast chart with a high and low case for the POMV transfer.

The following chart shows the POMV transfer forecast with the official forecast, the potential high case, and the potential low case.

In the below analysis, the official forecast is based on a 7.05% average annual return assumption for FY 2024+, while the Low and High cases represent the 10th and 90th percentile from a Monte Carlo probabilistic analysis around that official return. The range of potential returns was developed based on the most recent return projections from Alaska Permanent Fund Corporation's (APFC) investment consultant, Callan Associates.

Note: Future analysis could have different results due to revised investment returns or other factors in the analysis.



#### 4. Provide a restated version of Slide 17 that shows historical futures prices beginning in 2019.

The following chart shows historical Alaska North Slope (ANS) oil prices since 2019 as well as the Spring 2022 and Fall 2022 forecasts for ANS prices. Brent Futures market prices have been added from five different points in time. The futures prices below represent the values used in prior fall forecast presentations to the legislature, and thus represent futures market projections from either December or January each year. A key takeaway from this slide is that futures market projections have been volatile just like oil prices; however, the longer-term outlook has been less volatile than near term prices.



#### Oil Prices: History and Forecast Alaska North Slope Prices and Historical Brent Futures

### 5. Provide the numbers behind Slide 18 to show a range of projected future oil prices for FY 2024 – FY 2030.

The following table shows projected average annual oil prices from the sources included on Slide 18: Brent futures market as of January 17, 2023; average analyst forecasts as of November 28, 2022; Energy Information Agency (EIA)'s January 2023 Short Term Energy Outlook (STEO); and DOR's Fall 2022 Forecast. Brent prices are chosen for comparison because Brent is a widely reported global benchmark crude that typically prices very similar to Alaska North Slope (ANS) crude.

Note: Projections from the EIA STEO and analyst forecasts are not available for the full time period shown. Also note, Slide 18 in the presentation incorrectly cited analyst forecast as of October 31, 2022; the forecasts presented were as of November 28, 2022.

Dollars per Barrel	FY 2024	FY 2025	FY 2026	FY 2027	FY 2028	FY 2029	FY 2030
Futures Market (Brent)	\$ 82.05	\$ 77.47	\$ 74.01	\$ 71.28	\$ 69.23	\$ 67.82	\$ 67.28
Analyst Forecasts Average (Brent)	\$ 88.00	\$ 82.00	\$ 80.05	-	-	-	-
EIA STEO Forecast (Brent) *	\$ 80.67	\$ 76.00	-	-	-	-	-
Fall 2022 Forecast (ANS)	\$ 81.00	\$ 77.00	\$ 75.00	\$ 73.00	\$ 72.00	\$ 70.00	\$ 72.00

\* The price for FY 2025 for the EIA STEO represents an average of the first six months of the fiscal year.

# 6. Provide a corrected version of Slide 19 showing forecasted price per barrel and revenue at the correct points on axis.

The following chart has been updated with correct axis labels and lines.



#### UGF Revenue Relative to Price per Barrel: Price Sensitivity for FY 2024

# 7. Provide a detailed analysis of the sensitivity of unrestricted general fund (UGF) revenue to per-barrel oil price.

The attached sensitivity analysis shows estimated UGF revenue, and specific components of revenue, at a range of prices for each year in the 10-year forecast.

### 8. Provide a restated version of Slide 21 going out to FY 2026 that clearly shows production changes. Provide the data that this projection is based on.

The following chart and table show actual annual average Alaska North Slope (ANS) oil production for FY 2020 – 2022 and forecasted annual average ANS oil production for FY 2023 – 2026, in thousands of barrels per day.



#### Alaska North Slope Oil Production: Spring 2022 vs Fall 2022 Forecasts

#### Alaska North Slope Average Daily Oil Prodution

Thousands of Barrels per Day	FY 2020	FY 2021	FY 2022	FY 2023	FY 2024	FY 2025	FY 2026			
Spring 2022 Forecast			476.5	502.3	503.2	511.6	510.1			
Fall 2022 Forecast			476.5	491.7	503.7	503.3	498.8			
Actuals	471.8	486.1	476.5							
Change Spring to Fall				(10.6)	0.5	(8.3)	(11.3)			

# 9. Provide a restated version of Slide 22 with a breakout of "deductible" and "non-deductible" lease expenditures.

The following charts show North Slope capital expenses (CAPEX) and operating expenses (OPEX) broken down into allowable, deductible, and non-deductible expenses, per the Fall 2022 Forecast.

Lease expenditures are upstream costs that are directly related to exploring for, developing, or producing oil or gas. Allowable lease expenditures are specifically defined in statute and regulations and dictate what can and cannot be applied in oil and gas production tax calculations. Certain expenses incurred by taxpayers fall outside this definition and are not tracked or reported by the Department of Revenue.

Deductible Lease Expenditures is a term of art, not defined in any statute or regulation, used to describe that portion of allowable lease expenditures actually applied in the tax calculation in the year

incurred. Non-deductible lease expenditures are the allowable lease expenditures minus the deductible lease expenditures in a given year.

In general, most deductible lease expenditures represent spending by incumbent producers and most non-deductible lease expenditures represent spending by explorers and companies developing new projects.





Alaska North Slope Operating Expenditures: History and Fall 2022 Forecast



# **10.** Provide an updated version of Slide **22** with a projection of future employment numbers coinciding with the historical data already provided.

The following chart shows North Slope capital expenditures (CAPEX) and operating expenditures (OPEX) as well as oil and gas industry employment, as reported by the Department of Labor and Workforce Development (DOLWD). DOLWD provided a forecast for 2023 and a forecast for 2030. DOLWD's 2023 forecast for oil and gas employment is 7,400 and their 2030 forecast is 9,600. The dashed line between the two years was added by the Department of Revenue to represent the overall expected upward trajectory of employment over the next eight years.



I hope you find this information to be useful. Please do not hesitate to contact me if you have further questions.

Sincerely,

Inver lleen H. A

Colleen M. Glover Tax Division Director

Enclosure: Fall 2022 oil price sensitivity analysis