

Alaska's Construction Spending

2011 Forecast



Annual Report for the Construction Industry Progress Fund and the Associated General Contractors of Alaska

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Northrim Bank

Dear Alaska Resident,

For the eighth consecutive year, the Construction Industry Progress Fund (CIPF) and the Associated General Contractors of Alaska (AGC) are gratified to provide "Alaska's Construction Spending Forecast" for your reading and use.



This publication provides an informative review and estimate of construction activity in Alaska for 2011.

Compiled and written by Scott Goldsmith and Mary Killorin of the University of Alaska's Institute of Social and Economic Research (ISER), the "Forecast" reviews construction activity, projects and spending by both the public and private sectors for 2011.

The construction industry is Alaska's third largest industry, paying the state's second highest wages, employing nearly 21,000 workers with a payroll over \$1 billion, accounting for 20 percent of Alaska's economy and currently contributing approximately \$7 billion to the state's economy.

I hope this publication is of value to you. When the construction industry is vigorous, so is the state's economy.

Roger Hickel
CIPF Chairman

The 2011 Forecast is generously underwritten by Northrim Bank

Overview

The total value of construction spending "on the street" in Alaska in 2011 will be \$7.1 billion, up 4% from 2010.^{1,2,3}

Wage and salary employment in the construction industry will continue the slow decline that began in 2006, but the level remains above the long-term average for the industry.

Excluding the oil and gas sector—which accounts for 41% of the total—construction spending will be \$4.2 billion—up 5% from 2010.

Private-sector construction spending will be up 6% from 2010, to \$4.5 billion, in spite

of the expected slow growth in the overall Alaska economy. Oil and gas sector spending will be about \$2.9 billion, up 3%. Spending will increase in the utility and hospitals⁴ categories, but will decline in residential and other commercial categories.

Public construction spending will be up 1%, to \$2.7 billion, due to the large FY 2011 state capital budget. The main infusion of cash from the American Recovery and Reinvestment Act (ARRA) has worked its way through the system, and federal spending overall has declined.

Uncertainty is particularly significant in the forecast this

¹ Our revised projection for 2010 was \$6.8 billion, based on a \$200 million downward revision for oil and gas, a small downward revision for highways, and slight upward adjustments for airports and education.

² We define construction spending broadly to include not only the construction industry as defined by the U.S. Department of Commerce and the Alaska Department of Labor but also other activities. Specifically, our construction spending figure encompasses all the spending associated with construction occupations (including repair and renovation), regardless of the type of business where the spending occurs. The value of construction is the most comprehensive measure of construction activity across the entire economy.

³ "On the street" is a measure of the level of activity anticipated during the year. It differs from a measure of new contracts because many projects span more than a single year.

⁴ A portion of utility and hospital funding comes from public sources.

year, especially in the oil and gas sector—in spite of high oil prices. In January 2011, uncertainty surrounds most of the large-scale petroleum projects on the North Slope and in Cook Inlet. Environmental reviews are slowing development drilling at Point Thomson east of Prudhoe Bay and Alpine West in the National Petroleum Reserve Alaska. Exploration drilling offshore in the Chukchi and Beaufort seas continues to face legal challenges. The offshore Liberty project is under internal environmental review. In Cook Inlet, a major offshore exploration effort awaits the uncertain arrival of a jack-up rig. In this forecast we assume most of these projects will move forward this year, but their pace is hard to predict. If several are delayed in 2011, oil and gas spending will be significantly lower.

The national economic recovery continues to be extremely weak. Although

Alaska has been insulated from the worst effects of the recession—the crash in the housing market, high unemployment, and lack of credit—concerns about the national recovery will continue to influence investment decisions in the state, particularly in the commercial and residential markets. Capital spending by local governments is also vulnerable to reductions in tax revenues from activities—such as tourism—that are driven by the national economy.

The federal tax relief legislation passed at the end of 2010 will not affect new investment, and it is unlikely that the new Congress will increase funding in the near term for infrastructure repairs and construction, as some have proposed.

Slow economic growth resumed in 2010 and is expected to continue. The economy had contracted in 2009, for the first time in more than 20 years, but the

Alaska Construction Spending 2011 Forecast		
	Level	Change
TOTAL	\$ 7,110,000,000	+4%
Total without Oil and Gas	\$ 4,200,000,000	+5%
PRIVATE	\$ 4,455,000,000	+6%
Oil and Gas	2,910,000,000	+3%
Mining	305,000,000	-1%
Other Rural Basic Industry	0	
Utilities	615,000,000	+28%
Hospitals	305,000,000	+38%
Other Commercial	120,000,000	-21%
Residential	200,000,000	-4%
Private without Oil and Gas	\$ 1,545,000,000	+13%
PUBLIC	\$ 2,655,000,000	+1%
National Defense	555,000,000	+1%
Highways	530,000,000	-5%
Airports and Ports	310,000,000	-11%
Alaska Railroad	50,000,000	+16%
Denali Commission	60,000,000	-
Education	355,000,000	+25%
Other Federal	285,000,000	-26%
Other State and Local	510,000,000	+29%

Source: Institute of Social and Economic Research. Percent change based on revised 2010 estimates.

drop in employment was only about 1%. Uncertainty about future developments in the oil industry underscores the continued sense of caution within the business community about the prospects for the economy.

In spite of the uncertainty associated with the economy this year, there is little downside risk to the forecast, aside from the petroleum sector. Most non-petroleum spending will be financed by public money that is already committed. Of course, it is not always possible to predict exactly when that money will “hit the street.” And public construction spending estimates are perennially complicated by consistent delays in passage of the budget for the federal fiscal year (October through September).

As in past years, some firms are reluctant to reveal their investment plans, because they don't want to alert competitors; also, some have not completed their 2011 planning. Large projects often span two or more years, so estimating “cash on the street” in any year is always difficult—because the construction “pipeline” never flows in a completely predictable fashion. Tracing the path of federal spending coming to Alaska without double counting is also a challenge.

We are confident in the overall pattern of the forecast—but as always, we can expect some surprises as the year progresses.

⁵ We try to include in this category all spending that is financed primarily from private sources. Although this is relatively straightforward for oil and gas, mining, fishing, timber, manufacturing, and tourism, it is not so easy for hospitals, utilities, and other commercial construction. We include spending from all sources in our hospital and utilities categories. However, the federal government finances Alaska Native and military clinics and hospitals, and the state provides some of the funding for electric utility investment. Construction activity reported by local governments as residential or commercial often includes projects financed in whole or in part by public sources.

PHOTO BY DANNY DANIELS



Regal Cinemas Stadium 16, Anchorage

PRIVATELY FINANCED CONSTRUCTION

The private sector⁵ will spend \$4.5 billion on construction-related activities in Alaska in 2011. That is 63% of total construction spending and an increase of 6% compared with 2010.

Oil and Gas: \$2.91 Billion

Oil and gas industry spending, which will account for 41% of all construction spending in 2011, is expected

to be up about 3% from last year's revised projections — if most projects are able to move forward as planned.

None of the three major producers on the North Slope—British Petroleum (BP), Conoco Phillips, and Exxon—will be exploring. BP will concentrate on bringing the Liberty field into production, developing existing reserves, and maintaining infrastructure. Conoco Phillips will also concentrate on developing existing reserves, particularly the Alpine West prospect in

the National Petroleum Reserve Alaska. However, all these projects face environmental or legal hurdles that have slowed their development, and in the current environment it is difficult to predict how much further their timetables will slip over the next year. With significant slippage, our forecast for oil and gas spending would be considerably lower.

Three other companies—Eni, Pioneer, and Shell—will have large North Slope budgets this year. Eni will bring the Nikaitchuq field into

PHOTO BY KEN GRAHAM COURTESY UNIT COMPANY



Providence Health and Services Alaska Mountain Haven, Seward



PHOTO BY DANNY DANIELS

Alaska State Regional Court House, Nenana

production in early 2011 and have an active development drilling program in that field for several years. Pioneer continues development drilling at the nearby Oooguruk field. Shell will again try to drill one or two exploratory wells offshore in the Beaufort Sea, although it still faces legal hurdles before it can move forward.

Smaller companies, including Brooks Range Petroleum and Savant, will also be active. Brooks Range Petroleum is working to develop a couple of small

prospects, and Savant will be re-starting the Badami field, which has been shut-in for many years.

Marathon, Chevron, and Conoco Phillips will all be active in Cook Inlet, as will a number of smaller companies like Armstrong Petroleum—which is leading a partnership to develop a North Fork gas field—and Cook Inlet Energy, which has taken over the assets of bankrupt Pacific Energy.

Several companies have been trying to bring a jack-up rig into Cook Inlet for the

last two years, to explore offshore oil and gas prospects, but they are challenged by cost and logistical problems. We assume they will not succeed this year.

Outside the oil patch, plans for a gas storage facility in Cook Inlet—to deal with the challenge of having enough gas to meet demand in Southcentral during the winter—are finally moving forward after a delay last year. We assume construction will begin this year.

**Mining:
\$305 Million**

Spending by the mining industry—on exploration,⁶ development, and upgrading existing mines—will be about the same as last year. The only significant large-scale mine development this year will be expansion of the Red Dog mine in northwest Alaska into the adjacent Aqqaluk site. Capital spending at the other operating mines, including the recently opened Kensington Mine in southeast Alaska, will primarily be for normal maintenance and modest upgrades.

Exploration and project planning will continue at the two large prospects—Donlin Creek and Pebble. But decisions about development of these projects are still years away.

High world metal prices have stimulated a lot of interest in exploration, as well as development of smaller prospects.

**Utilities:
\$615 Million**

Spending in this category will be up 28% this year, because many railbelt electric utilities are in various stages of developing new generating facilities, and also because telecommunications firms are expanding their networks in rural Alaska.

Construction of the new gas-fired electric generation facility by Chugach Electric Association and Anchorage Municipal Light and Power is moving forward, as are plans by Homer Electric Association to generate its own power with steam generation and gas turbines. Golden Valley Electric Association is planning a wind project at Eva Creek near Healy, and CIRI (Cook



PHOTO BY DANNY DANIELS

Chena River Bridge, Fairbanks

⁶ Excluding exploration and development costs associated with environmental studies, community outreach and engineering.

Inlet Region, Inc.) hopes to move forward with its Fire Island wind project, in Cook Inlet just west of Anchorage.

Stimulus money is funding \$88 million in grants and loans to United Utilities for installation of broadband service to 65 communities in southwest Alaska, using fiber-optic cable and a microwave network. This was the largest of several stimulus grants and loans awarded to improve broadband access for rural Alaska.

There will be numerous smaller electric generation facilities—mostly wind and hydroelectric—constructed throughout the state, with funding from the state renewable energy program.

Hospitals: \$305 million

Hospital spending will be considerably higher than it was last year (38%). Providence Hospital in Anchorage is embarking on its largest expansion program in 11 years—the modernization

and enlargement of the newborn intensive care and maternity suites and expansion of cardiac surgery capacity. Two other large continuing projects this year are the new hospitals in Nome and Barrow. In addition, work will begin this year on a new Chief Andrew Isaac Medical Center in Fairbanks.

Hospitals across the state are also expanding their facilities, and community health centers are under construction in many locations.

Other Private Commercial: \$120 Million

Private commercial construction spending consists of many building types, including retail, office, medical, hotel, and warehouse space.⁷ The level of spending from year to year can be influenced by a few large projects, which is one reason we project spending will be down this year. There are no new large projects—such as new high-rise office towers or shopping



PHOTO BY DANNY DANIELS

Ship Creek Fish Hatchery, Anchorage

centers—planned for this year, and commercial construction is projected to fall 21%.

The absence of large projects reflects both the

slowdown in the overall economy and the adequacy of the existing stock of retail, commercial, and warehouse space in most communities.

Medical office space is the one category where demand continues to grow.

Residential: \$200 Million

Although Alaska has been largely insulated from the national housing market crash—both in terms of prices and foreclosures—residential construction will decline slightly again this year, continuing a trend that began in 2007.



PHOTO COURTESY PCL CONSTRUCTION

Anchorage International Airport Concourse B Improvement

⁷ Our commercial construction figure is not comparable to the published value of commercial building permits reported by Anchorage and other communities. Municipal reports of the value of construction permits may include government-funded construction, which we capture elsewhere in this report. We have also excluded hospitals and utilities from commercial construction to provide more detail about the composition of private spending (even though some hospital and utility spending is funded from public sources).



PHOTO COURTESY AMERICAN MARINE CORPORATION

Ship Creek Dam Inspection, Anchorage

PUBLICLY FINANCED CONSTRUCTION

Publicly financed construction spending⁸ in 2011 is expected to be \$2.7 billion, up 1% from our revised 2010 projection, thanks to the boost from the large state government capital budget of FY 2011.

Historically, the majority of funding for public construction has come from the federal government, and much of it flows through state government as grants, thus showing up in the state budget. Once in the state budget, these federal funds are often combined with state appropriations.

Federal funds also flow directly to nonprofit organizations, like the Alaska Native health organizations, and to a modest extent directly to local governments. Federal agencies, both military and civilian, also have their own capital budgets.

Non-federal funds for state capital spending have historically come primarily from the state General Fund and bond sales. With the growth in complexity of the state budget, an

⁸ This category includes all spending financed by federal, state, and local government sources, except hospitals and electric utilities. Public dollars often support the funding of construction projects owned by private and nonprofit organizations. That spending is included here. Funding for some projects comes from multiple public sources, or from a combination of public and private sources. We try to net out these multiple funding sources in this analysis.

increasing share of state-financed construction is coming out of other funds.

An important source of local government spending is grants from the state. For the larger communities, current revenues and bond proceeds also contribute to construction spending.

Finally, local enterprises like the local wastewater and sewer utilities generate funds for capital expenditures from current revenues, the sale of revenue bonds, and capital grants from the state and federal governments.

There are numerous ways to categorize public construction spending. We present them by function.

National Defense: \$555 Million

Spending for national defense will be up 1% from last year, even though ARRA funds for military purposes have largely been spent. Military spending is divided into three basic categories—MILCON (Military Construction), civil works, and environmental remediation, including FUDS (Formerly Used Defense Sites).⁹

The largest share of the budget is for military construc-

⁹ The military capital budget for Alaska also includes a category called “Interagency and International Services and Humanitarian Assistance.” Much of this spending occurs outside the state, but we include an estimate of the share that takes place in Alaska.

tion at the main bases in the Anchorage and Fairbanks regions. Typical projects include aircraft hangers, housing replacement, training facilities, air support facilities, and utility upgrades.

The Corps of Engineers provides funds for civil works such as flood control and environmental remediation. We include these corps activities in the national defense total, although they are primarily for the benefit of communities rather than for national defense.

Transportation—Highways: \$530 Million

Spending for highways and roads will be 5% lower than the revised total for last year. Even though the proceeds from the state transportation bond package from 2009 are just starting to hit the street, the ARRA funds for transportation have mostly been

spent. Highway projects funded by a portion of the deferred maintenance package in last year’s capital budget will cushion the decline.

A large share of highway transportation funding comes as a formula grant from the federal government through the Safe, Accountable, Flexible, Efficient Transportation Equity Act—A Legacy for Users (known as SAFETEA-LU). But that program expired in 2009 and has not yet been reauthorized by Congress. Until a new formula grant program is put in place, federal dollars will continue to be allocated based on a continuing resolution, and Alaska should continue to receive about the same amount each year. But when Congress does replace this formula program, Alaska might receive a smaller share if—as many think will be the case—mass transit receives a larger share of the allocation.



PHOTO BY DANNY DANIELS

Old Glenn Highway Improvement, Eagle River



PHOTO BY KEN GRAHAM COURTESY KIEWIT CORNERSTONE JV

VA Outpatient Clinic and Regional Offices, Anchorage

**Transportation—
Airports, Ports,
and Harbors:
\$310 Million**

Spending for airports, ports, and harbors will again be lower than the year before—down about 11%—because of the absence of new large projects and because most of the ARRA funds have been spent. Federal funding in the form of grants from the Federal Aviation Administration provides the bulk of funding for airports, and that funding will be about the same as in past years. However, no major projects that would be financed from other sources are planned for either the Anchorage or Fairbanks international airports.

The Anchorage and Point MacKenzie port development projects will continue, but at a modest level of effort because at this point they depend on state funding. The FY 2011 state capital budget had only small appropriations for these projects.

**Alaska Railroad:
\$50 Million**

The capital construction program for modernizing and upgrading the Alaska Railroad will continue this year at a slightly faster pace than last year. Project fund-

ing comes from a variety of federal sources as well as retained earnings. The focus of the program continues to be track rehabilitation, siding extensions and upgrades, bridge replacement and upgrades, passenger equipment, and a collision-avoidance system. Construction of the Tanana River bridge, the first step in extending the railroad to Fort Greely, is underway, but is encountering design challenges that may delay the project timetable.

**Denali
Commission:
\$60 Million**

The Denali Commission—an innovative federal-state partnership Congress created in 1998 to more efficiently direct federal capital spending to rural infrastructure needs—will spend about the same this year as last year. Major activities will include waterfront development and road projects, bulk-fuel tank farms, rural power system upgrades, and renewable and alternative energy projects, as well as clinics and behavioral health projects. Projects funded by the commission are frequently leveraged with additional federal, state, and local contributions.

**Education:
\$355 Million**

Education project funding will be up 25% from last year, largely due to passage of the large state education general obligation bond package in late 2010. That will fund primary and secondary schools throughout the state; university facilities in Anchorage, Fairbanks, Mat-Su, and other locations; and other state educational facilities.

The state capital budget allocation for school construction and maintenance will be about the same as last year, and we expect local school districts to spend about the same amount as in previous years on construction, renovations, and upgrades. These are financed

by local sources, as well as partial debt reimbursement by the state for qualifying expenditures.

**Other Federal:
\$285 Million**

The categories already discussed—national defense, transportation, education, and the Denali Commission—together make up the largest and most visible part of federal construction spending in Alaska. We forecast an additional \$285 million of federally funded capital spending in Alaska for other types of projects—26% lower than last year.¹⁰ The reduction comes because most of the ARRA funds allocated to these programs have now been spent, and because the federal government is reducing base funding for many of these programs.

Excluding transportation, the largest capital program funded by federal grants to state government is the Village Safe Water program for rural sanitation. These funds come from a number of sources, including the Environmental Protection Agency and the Indian Health Service. Funding

¹⁰ It is difficult to track all the federal dollars that find their way into construction spending in the state because there are so many pathways, and they change every year. The possibility of double counting funds as they pass from agency to agency, or become part of a larger project, also creates difficulties for the analyst.



PHOTO BY DANNY DANIELS

Goose Creek Correctional Center, Mat-Su

from these agencies for this program has been slowly trending downward, although it temporarily increased due to an infusion of ARRA funds that have now been spent.

The federal government also provides grants and other construction funds to Alaska tribes, nonprofit organizations, and local governments across the state. Alaska Native nonprofit corporations, housing authorities, and healthcare providers receive most of this money. The largest of these programs in Alaska is the Native American Housing Assistance and Self Determination Act (NAHASDA), which provides funds for housing construction in Alaska Native communities, through grants to federally-recognized tribes and Alaska Native housing authorities statewide. Funding for these programs is also lower this year.

We expect the level of direct construction spending by other federal departments to be somewhat less than in 2010. That includes spending by the Department of the Interior (National Park Service, U.S. Fish and Wildlife Service, and Bureau of Land Management), the Postal Service, the Department of Agriculture, and the National Oceanic and Atmospheric Administration (NOAA).

Other State and Local: \$510 Million

State and local government capital spending—excluding transportation, education, and energy (electric utilities)—will be about 29% higher than last year, because of the large FY 2011 state capital budget. The largest project will be continued construction of the new Goose Creek Correctional Center in the Mat-Su Borough.

The FY 2011 capital budget had large allocations for deferred maintenance and grants to municipalities and nonprofit organizations.

Money will also be spent on projects funded by the cruise-ship tax and the state energy rebate and weatherization programs. The ARRA weatherization funding has been leveraged in an AHFC bond package to cover weatherization grants for commercial buildings.

Local government capital spending, from general funds as well as enterprise funds, will be about the same as last year.

WHAT'S DRIVING SPENDING?

Construction activity—measured by total spending, jobs, payroll, or gross product—has experienced strong growth for more than a decade, driven largely by



PHOTO COURTESY NORTH STAR PAVING

Road Improvement, Pile Bay

growing federal capital grants to Alaska, large federal agency capital budgets, oil and gas spending, and more recently, large state capital budgets.

These large external sources of construction funds not only fuel public spending and oil patch spending but also give a general boost to the economy—and thus add to the aggregate demand for new residential, commercial, and private infrastructure spending.

CONSTRUCTION IN THE OVERALL ECONOMY

Construction spending is one of the important contributors to overall economic activity in Alaska. Annual wage and salary employment

in the construction industry in 2010 was about 16,000 workers, with average annual payroll of \$60 thousand per worker. Missing from this total are the “hidden” construction workers employed in other industries like oil and gas, mining, and government (force account workers). In addition, this total does not account for the large number of construction workers who are self-employed—estimated to be about 9,000 in 2010.

Construction spending generates activity in a number of industries that supply inputs to the construction process. These “backward linkages” include, for example, sand and gravel purchases (mining), equipment purchase and leasing (wholesale trade), design and administration (business services), and construction finance and management (finance).

The payrolls and profits from this construction activity support businesses in every community in the state. As this income is spent and circulates through local economies, it generates jobs in businesses as diverse as restaurants, dentists’ offices, and furniture stores.



PHOTO COURTESY ASRC CONSTRUCTION

Airport Heights Fire Training Center, Anchorage

Cover: Small Boat Harbor Improvements, Skagway

PHOTO COURTESY PACIFIC PILE & MARINE