Thank you for the opportunity to speak with you today.

I’m Program Director and Staff Attorney at the non-profit FRESC: Good Jobs, Strong Communities (formerly the Front Range Economic Strategy Center). We focus on economic issues facing the Denver Metro region and the state of Colorado. We utilizes research, policy, and community organizing to promote the creation of jobs that pay family-sustaining wages with benefits, housing and health care which are affordable to all families, and neighborhoods that are environmentally safe and sustainable.

Most, but not all jobs, are created in the private sector. FRESC’s focus is on the nexus between the public and private sector -- how government influences creation of good jobs through its purchasing of goods/services and its direct/indirect investments in the private sector through programs such as Tax Increment Financing, Industrial Revenue Bonds, other economic development incentives – influence that can be for better OR for worse in terms of creating good jobs.

This committee has already discussed and previous speakers have already addressed the fact that a Colorado investment in construction of infrastructure and in new energy technology/energy efficiency can create jobs. Our research supports these recommendations. I’d like to address how Colorado can maximize the short and long-term economic impact of such investments.

I. Colorado should maximize human infrastructure outcomes of its construction infrastructure investments

Construction is a key sector in the Colorado economy.

- $12 billion to state GDP
- employed 165,000 workers in May 2008, 7% of the state’s nonfarm employment

You may be aware that the Colorado construction sector has seen significant job losses, primarily in the residential sector – so stemming the loss of jobs in this sector is a good in and of itself for the state’s economy.

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But the lasting legacy of infrastructure investments shouldn’t just be bricks and mortar, but a better trained workforce. A well-trained workforce attracts private investment, and in construction it ensures that we have the workforce to build future projects with local labor instead of out-of-state workers who won’t spend their earnings in our state. If Colorado grows its human infrastructure as we build physical infrastructure, we will be better positioned for greater economic growth in the future.

So what about training? If we have job losses today, why should we train more workers?

- Because the state is projected to face a shortage of highly-trained skilled craft workers in spite of current job losses in the residential sector.
- The average age of retirement in the industry is 58, but not all workers make it to retirement and a typical construction worker leaves the industry at age 36.\(^2\)
- In Denver Metro alone more than 38% of construction/extraction workers are over age 40 – and 14% are over age 50.\(^3\)
- It takes 4-5 years to train the most highly skilled construction workers in some of the mechanical and electrical crafts projected to have the greatest shortages (plumbing, pipefitting, sheet metal). This means we need to begin training now in order to have the workforce ready to replace retiring and departing workers in coming years.

A national group of construction owners recommends that public entities like states use their purchasing power to ensure that individuals are trained on their projects.\(^4\) Apprenticeship utilization on publicly funded construction infrastructure is the best practice for achieving this result.

Apprenticeship utilization establishes expectations of the percentage or number of hours on a particular construction project that will be performed by apprentices, under the supervision of experienced journey level workers. Apprentices must be enrolled in an approved program that provides standardized, career training that is recognized nationwide and ensures the worker has a credential they can carry throughout their career.

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\(^4\) Construction Users Roundtable (hard copy of report provided to Senate Staff).
States such as Washington and Wisconsin are examples of states that have apprenticeship utilization standards connected to public works. Wisconsin establishes that 10% of the hours should be performed by apprentices on certain projects. Washington establishes that 15% of hours on all projects over $1 million will be performed by apprentices.\(^5\)

- Apprentice training is cost effective, there is a $1.30 return on every $1 spent on certified craft training invested at the project level\(^6\).
- Workers learn career-skills that are more adaptable to future work (not just one skill needed for the job at hand).
- Workers involved in formal training programs with craft certification – apprenticeship – experience greater wage progressions than other craft workers, every 100 hours of training is associated with 10 cents per hour increase in wages.\(^7\)

This takes me to my second recommendation for the committee’s consideration.

**II. Colorado should maximize the economic stimulus impact of job creation through measures that ensure creation of GOOD JOBS**

We aren’t talking about job creation just because its good for people to work, we’re talking about it because we recognize that earnings from work are used to purchase goods and services, which in turn create demand for more jobs – because jobs drive the economy of our state.

We know that increased wages = increased consumption, AND 70% of economic activity is consumer spending

This means that the economic stimulus impact of the jobs you create is in part determined by the wages paid to workforce. Colorado’s goal should be not just to create jobs, but to create good jobs that stimulate the most downstream economic growth for the state. Many states have incorporated standards into their approach to private sector purchasing and/or subsidies. Colorado will have to make choices as to which industries or employers it invests in, and it can choose to invest in those businesses which create the best quality jobs for Coloradoans.

\(^7\) Construction Industry Institute, *Construction Industry Craft Training in the United States and Canada* (August 2007).
Colorado should establish job quality standards to maximize the outcome of any investments in private industry, including “green jobs” and construction infrastructure spending.

*Job quality standards* are requirements that subsidized companies create jobs that meet certain criteria, including wage levels, availability of health insurance, and/or full-time hours. Standards can be used in all types of subsidy programs, including training grants, tax abatements, industrial revenue bonds, enterprise zones, tax increment financing (TIF), and tax-free loans. Job quality standards are used in a variety of programs by at least 43 states, and by many more cities and counties.  

The best standards are market-based wages standards based on the actual wages paid in the relevant area/industry. Prevailing wage is an example for the construction industry. Median or average wages are often used as the standard for permanent jobs.

Provision of health care can also be included in the standard, with the express goal of avoiding the transfer of this obligation onto the taxpayers of Colorado. If we create new jobs but those jobs pay low wages without health care, resulting in workers who are eligible for state Medicaid, then we will have only transferred the burden onto a strapped state budget, rather than actually grown our economy.

It is a best practice to include the ability to take back any investments where jobs created are not of the quantity AND quality promised (clawbacks).

A word about WHO we should be trying to get into these jobs:
If we create jobs for low and moderate income individuals, most of the increase in income they experience will be spent in the local economy on food, rent and transportation. Increasing incomes (rather than just moving someone from one job to another of similar pay) will mean more wages flowing through the economy, and less need for costly government services; in other words, economic growth.

This doesn’t just happen but requires a strategy where clear expectations are laid out to private employers, and where workforce development programs are aligned to train and deliver. First Source or Local Hiring programs are the best practice for achieving these results.

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III. Caution regarding undermining job growth in the private sector through public sector reductions.

Job growth in the private sector is not separate from or independent of government, which provides many services that make it possible for businesses to function. As the legislature looks at difficult budget decisions in the next cycle, it's important to be aware that reductions in the public sector can slow economic growth for private industries that rely on the services government provides.

Example 1 - CUTTING WORKERS - State road workers keep our highways open as much as possible during winter weather, and it hurts private business profits, our overall economy, and tax revenue if state worker layoffs or attrition due to low pay and benefits lead to more or longer road closures.

Example 2 - CUTTING REGULATION - Cutting regulation may seem attractive to help some businesses, but in many cases regulation helps to protect the interests of many more businesses (not to mention local governments, the public). Take clean water, which is relied upon by Colorado’s fishery and tourism industries, beer brewers, and agricultural industry. The oil and gas industry may suggest that eliminating regulations or staff who process storm water permits at the state level would create jobs in that industry. Without evaluating the accuracy of that claim, we can look to other unintended consequences that could lead to job losses elsewhere in the economy if water quality is lowered: higher water treatment costs on local governments (municipal worker layoffs), reduced fishing and tourism, etc. Regulatory reductions often lead to unintended consequences that endanger the economy in other ways.

IV. Colorado should Maximize the Creation of Good, Green Jobs

Estimates are that aggressive renewable energy policy in Colorado could create 75,000 new jobs. The Renewable Energy Policy Project estimates 1 megawatt of solar electricity creates 32 person-years of employment, while 1 megawatt of wind energy creates 4 person-years of employment. (1 person employed full time for a year).

But we can only be poised to fully benefit if we ensure these are good jobs and that we have the workforce that is trained to do those jobs.10 We should make every investment in private industry through government contracts or direct/indirect incentives linked to training in proven programs. For energy efficiency measures

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such as retrofitting existing buildings, construction apprenticeship programs are already training on new technologies and workers should learn through these existing, bona fide programs. For other green jobs the state may need to support other types of training programs.

**To the extent the state is going to invest in energy efficiency or new green industries, we should couple that investment with a parallel strategy to achieve local, green manufacturing.** Although a comprehensive strategy would ensure success, one simple measure the legislature could consider to incentivize production is to link renewable/energy efficiency investments to a preference for use of locally manufactured materials.

Manufacturing is a cornerstone of an economy that depends on middle-class jobs, and is on the decline in the US and in Colorado. But new energy and energy efficient practices will create manufacturing jobs – the question is who will capture those jobs?

- $1 million in renewable energy – creates 5 full-time manufacturing jobs
- $1 million in building energy efficiency – creates 3-4 building material manufacturing jobs, 5 energy efficient appliance manufacturing jobs
- $1 million in energy efficient retrofits generates 10 person-years of employment in installation and 3-4 person-years in manufacturing of materials
- The Economic Policy Institute estimates that every manufacturing job in turn supports 2.9 indirect jobs in other sectors

If we are going to make an investment in one aspect of the green economy, we can maximize our investment by also making sure that Colorado is poised to capture the downstream manufacturing jobs that will be created as well.

These recommendations are intended to help Colorado maximize the economic impact of any investments we make in the private sector, and to caution against cuts in the public sector that will undermine the private sector. Thank you for your time.

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