Deconstructing Mountain State Unemployment Rates

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The U.S. economy has been recovering from the 2007-09 recession for more than three years, but the effects of the recession are still being felt across most of the United States. Perhaps no other indicator reflects the hardship still experienced by many individuals better than the unemployment rate. The national unemployment rate remains frustratingly high at 7.7 percent in November with more than 12 million workers currently unemployed. Unemployment places a strain on individuals, their families and the entire U.S. economy. Unemployed workers typically spend less money, which holds back demand for goods and services. And importantly, these individuals are not able to fully add to the productivity of the U.S. economy. This issue of the Rocky Mountain Economist discusses how the unemployment rate is calculated and explores recent trends in the Mountain States’ unemployment rates.

Unemployment in the Mountain States

The unemployment rate is released each month by the Bureau of Labor Statistics and is based on a survey of about 60,000 households across the nation. The survey asks respondents a number of questions regarding their employment status over the prior four weeks. Based on this survey, the Bureau of Labor Statistics estimates that in October, 214,000 individuals were unemployed in Colorado, 58,000 in New Mexico and 15,800 in Wyoming. To be counted as unemployed, an individual cannot be employed, must be available for work and must have actively looked for a job in the past four weeks. Therefore, an individual who wants to work but isn’t searching for a job is not counted as unemployed.

The unemployment rate is calculated as the number of unemployed people divided by the number of individuals...
in the labor force (which is the sum of the employed and unemployed). Based on this calculation, the unemployment rate in October was 7.9 percent in Colorado, 6.3 percent in New Mexico and 5.2 percent in Wyoming. Because the unemployment rate is calculated by using both the number of unemployed and the size of the labor force, the rate can change if either of these numbers change. Unemployment rates can decline because unemployed workers find jobs or because individuals stop looking for work and therefore the size of the labor force declines.

Unemployment rates fluctuate with the business cycle, with increases during recessions and decreases during expansions (Chart 1). However, even in booming economies, there is still some unemployment. This occurs because invariably some workers are between jobs and new entrants come into the workforce. Over the past 10 years, unemployment rates have averaged 6.3 percent in Colorado, 5.8 percent in New Mexico and 4.6 percent in Wyoming. During the recent recession, unemployment rates increased sharply in all three states, peaking at 9 percent in Colorado, 8 percent in New Mexico and 7.5 percent in Wyoming.

Within each state, many factors can lead to higher or lower unemployment rates across counties (Map). Industry mix can play a key role, especially during downturns, where counties with heavy concentrations in hard-hit industries are likely to have higher unemployment rates. For instance, during the 2007-09 recession, the construction and manufacturing sectors were particularly hard hit, causing some counties with a strong reliance on those sectors to experience larger increases in unemployment.

The education level of the population can also influence unemployment rates. Although unemployment

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**Map**

**October 2012 Unemployment Rates by County**

**Seasonally Adjusted**

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**Chart 1**

**Unemployment Rates**

**Seasonally Adjusted**

(Note: Gray bars indicate recessionary periods. Source: Bureau of Labor Statistics.)

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rates increased sharply for all education groups during the recent recession, unemployment rates are much higher among less educated workers. In November, 12.2 percent of U.S. workers with less than a high school diploma were unemployed, while 8.1 percent of high school graduates were unemployed. Among individuals with some college education, 6.5 percent were unemployed, and only 3.8 percent of individuals with a bachelor's degree or more were unemployed.

Across the Mountain States, unemployment rates are higher in south central Colorado. Relative to the state as a whole, Las Animas County’s mining and construction sectors were particularly hard hit during the recession. In Pueblo County, a higher share of manufacturing and construction employment led to higher unemployment relative to the state as a whole. On average, the workforce in southern Colorado has a lower level of educational attainment than the state as a whole, which may also be a factor in higher levels of unemployment in the region.

Along Colorado’s Western Slope, unemployment also remains relatively high, especially for Montrose County. The energy industry slowdown due to low natural gas prices have kept unemployment rates elevated.

In New Mexico, Mora and Luna counties both have unemployment rates of more than 11 percent due in part to large job losses in the mining sector during the recession. In addition, both Mora and Luna counties have fewer college graduates than the statewide average. Unemployment rates are low across the entire state of Wyoming, with the highest county unemployment rate in Teton County at 6.1 percent. Unemployment rates tend to be lower in rural areas, which helps explain lower rates in Wyoming, and along the Eastern Plains of Colorado and southern half of New Mexico.

**Alternative Measures of Unemployment**

The Bureau of Labor Statistics publishes several measures of unemployment and labor underutilization. U-5 and U-6 are two such measures that are more inclusive than the “official” unemployment rate (the U-3 rate), which is the most commonly cited measure. While U-3 is published monthly for the nation, states and selected metro areas, U-5 and U-6 are published quarterly at the state level. These estimates summarize the prior four quarters of underutilization. In addition to the unemployed, the U-5 underutilization rate includes discouraged and marginally attached workers as unemployed (see Table for definitions). The U-6 measure includes all of these types of workers plus part-time employees unable to obtain full-time jobs due to economic reasons.

**Table**

<table>
<thead>
<tr>
<th>Type of Worker</th>
<th>Definition</th>
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<tbody>
<tr>
<td>Employed</td>
<td>Performed work during the past week.</td>
</tr>
<tr>
<td>Unemployed</td>
<td>Not employed but available for work and sought work during the past four weeks. (U-3, U-5 and U-6)</td>
</tr>
<tr>
<td>Marginally attached</td>
<td>Available for work and sought employment during the past 12 months, but not during the past four weeks. (U-5 and U-6)</td>
</tr>
<tr>
<td>Discouraged</td>
<td>Available for work and sought work during the past 12 months but stopped looking because they believe no jobs are available or they are unqualified for available jobs. (U-5 and U-6)</td>
</tr>
<tr>
<td>Part-time for economic reasons</td>
<td>Working part-time and seeking full-time work but unable to obtain it due to economic reasons. (U-6)</td>
</tr>
<tr>
<td>Not included in the labor force</td>
<td>Those who have not actively sought work during the past 12 months.</td>
</tr>
</tbody>
</table>

Unemployment and underutilization rates generally trend together (Chart 2). However, the gap between U-3 and the more inclusive measures widened during the 2007-09 recession. Among the Mountain States, this was especially true for New Mexico, where the
official unemployment rate has remained relatively low compared with the more inclusive underutilization rates.

In the four quarters between September 2011 and September 2012, Colorado’s U-5 and U-6 rates averaged 9.4 percent and 15 percent, respectively, compared with a U-3 rate of 8.2 percent. These measures were slightly lower for New Mexico, reaching 9.3 percent and 14.8 percent during the four-quarter period compared with a U-3 rate of 7.2 percent. Wyoming rates were the lowest of the Mountain States at 6.7 percent and 10.4 percent compared with a U-3 rate of 5.7 percent. Nationally, these underutilization rates ticked down to 9.2 percent and 14.4 percent, respectively, in November, compared with an official unemployment rate of 7.7 percent.

### Current Trends Affecting Unemployment

Nationally and in the Mountain States, the unemployment situation continues to be shaped by demographic change and the business cycle. Long-term trends including an aging population and more women entering the workforce continue to influence labor force participation. Additionally, the U.S. economy continues to add jobs and absorb unemployed and underutilized workers in the aftermath of the Great Recession.

**Demographic change.** The labor force participation rate provides a ratio of the population participating in the labor force (employed and unemployed workers) relative to the total civilian population. The participation rate of women in the U.S. labor force nearly doubled in the 50 years between 1950 and 2000, rising from 33.8 percent to 59.9 percent. Over this same period, male participation declined from 86.3 percent to 74.8 percent. The combined participation rate of both men and women rose over this 50-year period. However, the rate leveled in the early 2000s for both men and women and has since been declining.

Though some of the decline is attributable to the business cycle, reflecting the 2001 and 2007-09 recessions, the decline also reflects an aging population. The baby boomer generation, defined by the Census Bureau as people born between 1946 and 1964, began to reach age 60 in 2006. Based on the 2010 Census, baby boomers currently represent more than a quarter of the U.S. population. As this generation has begun to retire, their absence from the labor force has pulled down the labor force participation rate. In a recent study, Kansas City Fed Senior Economist Willem Van Zandweghe found that demographic factors
have contributed to about half of the downward trend in the labor force participation rate in recent years, while the business cycle has been responsible for the other half.²

Like the nation, the Mountain States have experienced a downward trend in labor force participation since the early 2000s (Chart 3). However, Colorado and Wyoming have maintained higher labor force participation rates than the nation as a whole, and some of the highest rates among the 50 states. As of October, Colorado and Wyoming had respective rates of 68.3 and 69.1 percent, compared with a national rate of 63.8 percent. New Mexico’s rate remains one of the lowest in the nation at 57.9 percent. Only Alabama and West Virginia had lower rates in October. Based on the 2010 Census, New Mexico’s retirement population represented a similar share to that of the nation as a whole. People older than 65 represented 13 percent of the total population nationally and 13.2 percent of New Mexico’s total population. This suggests the state’s lower labor force participation rate reflects economic and demographic factors that are unrelated to age distribution.

Chart 3
Labor Force Participation Rates
Seasonally Adjusted

Endnotes