



Monthly Economic Update

April 2022

Business Cycles and the North Carolina Economy

March 2022 marked the sixth straight month that establishment employment expanded across North Carolina². The March increase of 18,100 workers is below the February increase of 29,100 but above the six month average monthly pace of 16,000.

Figure 1 provides an overview of North Carolina’s establishment employment recovery and expansion following the March 2020 - April 2020 recession. While full employment recovery from the recession-induced downturn first materialized in July 2021, this initial recovery was short-lived. Two months of jobs losses (August and September 2021) returned the state to a level below the recovery threshold. We believe that the expansion phase of the economy (in red) is now permanent and should continue barring another national or global recession.

The labor force data also shows a strong and expanding North Carolina economy³. As found in Table 1, the unemployment rate fell to 3.5 percent in March 2022, down 0.2 percent over the month and 1.7 percent since March 2021. As one would hope when an economy is expanding, the number of employed persons increased over the month and year, while the number of unemployed persons fell. Additionally, the labor force participation rate

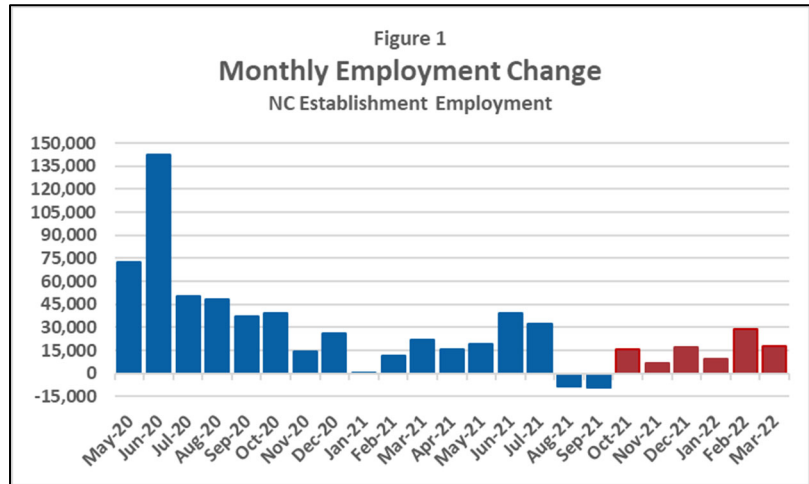


Table 1
North Carolina's Labor Force
March 2022

	Labor Force	Employed	Unemployed	Unemployment Rate(%)	Labor Force Participation Rate(%)
Mar-2022	5,030,542	4,853,239	177,303	3.5%	59.8%
Feb-2022	5,015,299	4,828,116	187,183	3.7%	59.7%
Mar-2021	4,919,387	4,661,350	258,037	5.2%	59.4%
Apr-2000	4,111,263	3,968,367	142,896	3.5%	67.5%
Monthly Change	15,243 0.30%	25,123 0.52%	-9,880 -5.28%	-0.2%	0.1%
Annual Change	111,155 2.3%	191,889 4.1%	-80,734 -31.3%	-1.7%	0.4%
Change since Apr-2000	919,279 22.4%	884,872 22.3%	34,407 24.1%	0.0%	-7.7%

² The establishment employment count comes from a survey of businesses and estimates the number of employees based upon where they work. If a person has two jobs, each job is in the total.

³ The labor force totals come from a household survey which estimates the number of employed and unemployed workers. A person is counted once, and the count based upon where they reside. The unemployed worker must be actively seeking a job to be included in the total.

climbed modestly over the month and year, suggesting that individuals are slowly returning to a working environment.

This current unemployment rate is the lowest since April 2000, when unemployment was also 3.5 percent of the labor force. The inclusion of this month in the table shows how different (and smaller) the North Carolina labor force was over twenty years ago. While the unemployment rate was the same, there were 34,400 fewer unemployed persons and nearly 885,000 fewer workers. In April 2000, there also were more North Carolinians willing and able to work, as shown by the labor force participation rate that was 7.7 percent higher (at 67.5 percent).

Over the past year North Carolina’s establishment employment grew by 185,300 jobs (4.2 percent at an average of 15,400 per month). Table 2 summaries the changes by major sector over the past year and provides each industry status in relation to its pandemic recovery. For example, the state’s

Table 2
North Carolina Establishment Employment
Employment is in Thousands

	Mar-22	Mar-21	Absolute Change	Percent Change	Percent Recovered*
Total Establishment Employment	4,712.8	4,527.5	185.3	4.1%	102.0%
Mining & Logging	5.4	5.7	-0.3	-5.3%	93.1%
Construction	243.7	237.2	6.5	2.7%	104.0%
Manufacturing Durable Goods	256.4	248.1	8.3	3.3%	99.6%
Manufacturing Nondurable Goods	216.3	214.1	2.2	1.0%	99.7%
Wholesale Trade	194.5	187.0	7.5	4.0%	103.4%
Retail Trade	516.1	511.0	5.1	1.0%	102.8%
Transportation, Warehousing, & Utilities	193.8	190.1	3.7	1.9%	116.9%
Information	81.2	74.6	6.6	8.8%	106.3%
Finance & Insurance	214.9	206.9	8.0	3.9%	110.2%
Real Estate & Rental Leasing	66.0	62.0	4.0	6.5%	104.9%
Professional, Scientific, & Technical Services	304.8	280.7	24.1	8.6%	113.1%
Management of Companies	75.8	77.1	-1.3	-1.7%	89.0%
Administrative & Waste Management	326.0	307.4	18.6	6.1%	108.7%
Educational Services	100.5	94.2	6.3	6.7%	102.9%
Health Care & Social Services	543.1	532.9	10.2	1.9%	102.2%
Arts, Entertainment, & Recreation	69.0	58.5	10.5	17.9%	91.1%
Accommodation & Food Services	423.0	379.0	44.0	11.6%	95.2%
Other Services	165.4	159.2	6.2	3.9%	98.0%
Federal Government	76.2	76.3	-0.1	-0.1%	101.6%
State Government	201.9	200.1	1.8	0.9%	97.9%
Local Government	438.8	425.4	13.4	3.1%	95.0%

* Percent Recovered in relation to February 2020. This month was the peak of the recent business cycle and the month before the March 2020-April 2020 pandemic recession began.

recovery stands at 102 percent, making its employment level 2.0 percent higher than in February 2020. On the other hand, *Mining & Logging* stands 6.9 percent below its corresponding February 2020 count.

Only three industries lost employment during the previous twelve months: *Management of Companies* (down 1,300 and 1.7 percent); *Mining & Logging* (down 300 and 5.3 percent); and *Federal Government* (down 100 and 0.1 percent). Of these three sectors, only *Federal Government* has surpassed its pre-pandemic total.

Eighteen of the twenty-one remaining sectors grew between March 2021 and March 2022 and nearly 60 percent of the total gain was found in only five of these sectors. The fastest growing was *Accommodation & Food Services* (up 44,000 and 11.6 percent). It was followed by *Professional, Scientific, & Technical Services* (up 24,100 and 8.6 percent), *Administrative & Waste Management* (18,600 and 6.1 percent), *Local Government* (up 13,400 and 3.1 percent), and *Arts, Entertainment, & Recreation* (up 10,500 and 17.9 percent).

Three of these top five job-creating sectors have yet to reach their respective February 2020 recovery threshold: *Arts, Entertainment, & Recreation* (down 8.9 percent); *Local Government* (down 5.0 percent); and *Accommodation & Food Services* (down 4.8 percent). Figure 2 shows these three sectors, along with their other six counterparts, remain in the recovery stage of the business cycle.

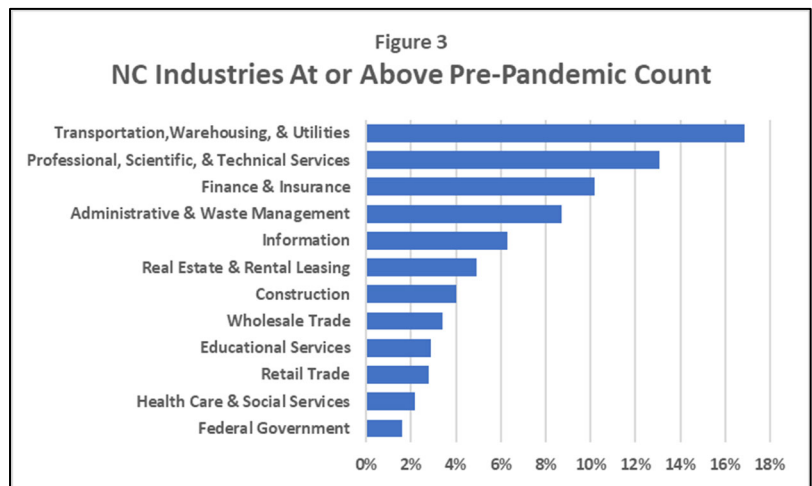
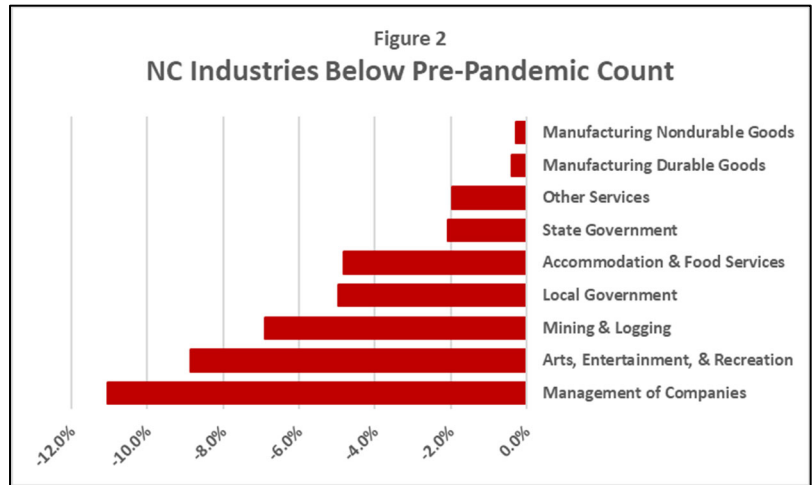


Figure 3 shows the relative increase of the twelve industries that have surpassed their pre-pandemic threshold and are now in the expansionary phase of growth. Three of these sectors have seen double-digit expansion: *Finance & Insurance* (up 10.2 Percent); *Professional, Scientific, & Technical Services* (up 13.1 percent); and *Transportation, Warehousing, & Utilities* (up 16.9 percent).

Now that North Carolina has entered the expansion stage of the business cycle, it is of interest to see how this past recession - and its effect upon North Carolina's establishment employment - compares to prior downturns. Table 3 provides this profile for the past four recessions.

**Table 3
Recession, Recovery, and Expansion in North Carolina**

Recession			Maximum Employment Loss				Recovery and Expansion					
Begin	End	Length in Months	Month	Note	Total	Percent Loss	Begin Recovery	Begin Expansion	Number of months to Expansion	Total Recovery and Expansion	Employment Gain	Employment Percent Gain
Aug-90	Mar-91	8	Jun-91	3rd month of recovery	(67,300)	-2.15%	Apr-91	May-92	14	120	797,000	25.50%
Apr-01	Nov-01	8	Jul-03	20th month of recovery	(160,500)	-4.09%	Dec-01	Sep-05	46	73	238,500	6.08%
Jan-08	Jun-09	18	Feb-10	8th month of recovery	(328,300)	-7.89%	Jul-09	Oct-14	64	128	457,500	10.99%
Mar-20	Apr-20	2	Apr-20	2nd month of recession	(558,500)	-12.1%	May-20	Jul-21* & Oct-21	15* & 18	23	92,400	2.00%

* July 2021 was the first month where total employment surpassed the pre-pandemic high (February 2020), but the accomplishment was temporary. The total fell below the pre-pandemic high in September.

Recessions and expansions in the US are defined by the National Bureau of Economic Research (NBER) Dating Committee. The recession, or contraction of economic activity, is broadly defined so that the Committee emphasizes a variety of national measures of economic activity. These include real personal income less transfers, nonfarm payroll employment, employment as measured by the household survey, real personal consumption expenditures, wholesale-retail sales adjusted for price changes, and industrial production⁴.

The first box in Table 3 lists the dates of the four recessions. The first two (1990-91 and 2001) each lasted eight months. The third (2008-2009), which lasted 18 months, was the generally considered the largest economic downturn since the Great Depression. However, the more recent pandemic-induced recession, which lasted only two months, had a much deeper impact upon employment.

The second box shows the impact of the recession upon total employment. The relative negative impact had become progressively worse through time. The 1990-91 recession reduced employment by only 2.1 percent, while the March-April recession of 2020 had a peak employment reduction of 12.1 percent. Following the first three recessions on the list, the maximum loss in employment took from 3 to 20 months following the officially defined end to the recession. Due to the unique nature of the COVID-19 related shutdown, the maximum employment loss was during the recession.

The third box overviews the recovery and expansion. The recovery begins the month following the recession, while the expansion in this example is defined by the first month following the recovery of all lost jobs. In each case it took at least one year to fully recover the lost employment. During the period following the 2001 recession, it took nearly four years, while it took over five years to recover the jobs lost following the 2008-2009 downturn.

It is an interesting exercise to see how much growth has occurred during economic cycles, but it is important to understand the underlying influences of growth. A popular tool to accomplish this task is called shift-share analysis, which decomposes the economic change over time into local and

⁴ <https://www.nber.org/research/business-cycle-dating>

external factors. Table 4 provides a shift-share overview for North Carolina during the current and past three growth cycles.

The column for National Growth is the portion of the change attributed to the total growth of the national economy. It equals the theoretical change in the state had it increased by the same percentage as the national economy. Importantly, it shows that the majority of North Carolina’s statewide employment growth is due to the nation’s growth. The Industrial Mix is the portion of the change attributed to the performance of the specific economic industry. It equals the theoretical change in the state had it increased by the same percentage as the industry nationwide. A negative industry mix number suggests that the state contained an abundance of industries that were slow growing or declining in nature - such as seen in North Carolina’s textile and furniture manufacturing sectors. The Competitive Share is the portion of the change attributed to regional influences, such as ongoing economic development efforts.

Table 4
A Recovery and Expansion Shift-Share
North Carolina

Recovery and Expansion		National Growth	Industrial Mix	Competitive Share
Begin	End			
Apr-91	Mar-01	80.3%	-13.2%	32.9%
Dec-01	Dec-07	65.0%	-14.4%	49.4%
Jul-09	Feb-02	87.4%	-2.7%	15.2%
May-20	Mar-03	95.4%	0.8%	3.8%

It should be noted that the current cycle (May 2020 to March 2022) is dominated by the recovery portion of the cycle. As the state moves forward with its expansion, it is likely that the national growth influence will decline and the competitive share of growth will rise - particularly given some of the large industry announcements that have recently materialized in North Carolina.

Most forecasts suggest that the national economy, along with North Carolina, will grow this year. However, there are strong headwinds that the economy must overcome: inflation, rising interest rates, continuing supply chain bottlenecks, and the invasion of Ukraine. And, as we have often seen during the past two years, Covid infections are once again on the rise. While the impact of the disease is slowly being incorporated into everyday living, a major spike of cases is likely to have a negative impact into overall economic growth.

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