

Appendix on Methodology: Impact of Minimum Wage of Local Governments

OCTOBER 31, 2019 – JAMES PARROTT

The research series published by the Bureau of Labor Statistics Occupational Employment Survey (OES) data provides consistent comparative employment and earnings data for local government employees for all states. The report's focus is on gauging the relative impact of a higher minimum wage on local government payrolls and overall budgets, rather than attempting to generate precise estimates of the number of workers affected and the dollar cost and its impact on local budgets in a particular year. In estimating the general impact of a phased-in \$15 minimum wage, the report follows the fairly standard practice of factoring in a spillover effect to reflect the indirect impact on workers whose current pay may be slightly above \$15 an hour. David Cooper of the Economic Policy Institute estimates the spillover effect to reach workers whose wages are up to 15 percent greater than the target minimum pay floor—that is, \$17.25 (115 percent of \$15).¹ In this report, when talking about the workers whose wages will rise as a result of a higher minimum wage, we use “affected” to refer to those directly and indirectly affected.

Using the 2017 OES data, we estimate for each state the percent and number of local government employees who would be directly and indirectly affected, with the latter being those subject to a spillover impact. We use two

OES files: local government employees except schools and hospitals, and elementary and secondary schools. The latter includes both private and public schools with public schools accounting for 90 percent of the total. Local government hospital employment generally is very small relative to overall local government employment so that is not examined here.

We then estimate the amount by which total wage and salary expenditures would rise to raise all local government employees to at least \$17.25 an hour, the spillover threshold. Since we do not have the detailed distribution of current earnings for the interval between the current minimum wage level for each state and \$17.25 an hour, we take the midpoint as an approximation. This method overstates the cost of increased wages necessary to implement a \$15 wage floor since it estimates the cost of raising all those below \$17.25 to \$17.25 in order to allow for some spillover increase for those currently above \$15 an hour but below \$17.25 an hour. We then calculate that amount as a share of total 2017 wage and salary costs. This provides an idea of the amount by which wage costs would need to rise to fund the minimum wage increase. Again, this method likely overstates the cost.

¹ David Cooper, “Raising the New York state minimum wage to \$15 by July 2021 would lift wages for 3.2 million workers,” Economic Policy Institute Briefing Paper, January 5, 2016, 36.

In order to compare the projected wage cost increase to recent trends, we use the 2013 and 2017 OES data series to calculate the increase in wages from 2013 to 2017 at the median (rather than the change in total wages since states may have increased local government employment at different rates.) (These estimates do not factor in wage increases that have occurred since May 2017.) We first look at the six jurisdictions (California, Massachusetts, Illinois, New York, New Jersey, and the District of Columbia) that enacted \$15 minimum wage floors by the end of February 2019, and that already have been increasing wages in recent years, and then we look at the other states, with special attention paid to the twenty-one states that have not increased their minimum wages above the \$7.25 federal level. (See Table A1 for a list of states.) These twenty-one

states generally have lower wage levels (for example, as indicated by the twenty-fifth percentile wage) and are the ones where a \$15 minimum wage would have the greatest impact. (There are a few exceptions; for example, both Arkansas and West Virginia have minimum wages above the federal level but have high shares of directly and indirectly affected workers.)

Finally, we model a six-year phase-in of a \$15 minimum wage beginning in 2019 and ending in 2024 and compare the average annual change over that period to the average annual median wage increases occurring in each state in the years from 2013 to 2017. For the six jurisdictions that have enacted \$15 minimum wage floors, we use the year each reaches \$15 when we annualize the cost of the minimum wage increase.

TABLE A1

States Grouped by Minimum Wage Level, as of 2017 (states listed according to 2017 minimum wage level)
Five states and the District of Columbia that have adopted \$15 minimum wage (as of March 1, 2019)
District of Columbia
Massachusetts
California
New York
New Jersey
Illinois
Twenty-four states with minimum wages above the \$7.25 federal minimum wage
Washington
Connecticut*
Arizona
Vermont
Alaska
Oregon
Rhode Island
Minnesota
Colorado
Hawaii
Maine

Nebraska
Michigan
Maryland*
West Virginia
South Dakota
Arkansas
Delaware
Nevada
Montana
Ohio
Florida
Missouri
New Mexico
Twenty-one states at the \$7.25 federal minimum wage
Alabama
Georgia
Idaho
Indiana
Iowa
Kansas
Kentucky
Louisiana
Mississippi
New Hampshire
North Carolina
North Dakota
Oklahoma
Pennsylvania
South Carolina
Tennessee
Texas
Utah
Virginia
Wisconsin
Wyoming

* Maryland adopted a \$15 minimum wage in March 2019 and Connecticut followed suit in May 2019.