October 2021

The Economic Impact of Overtime Pay for New York State Agriculture

Pursuant to the Farm Laborers Fair Labor Practices Act (FLFLPA), the state of New York has assembled a wage board to consider changes to the overtime wage threshold for farmworkers. The threshold is currently 60 hours per week. The wage board can recommend that the threshold remain at 60 hours, or that it be reduced. This report outlines the economic impact that changes to the overtime threshold could have on the agricultural sector in New York. The following are the key findings of the report:

- The increased labor costs resulting from a reduction in the threshold for mandatory overtime pay in combination with past and scheduled increases in the minimum wage could impact the financial viability of many farms by significantly increasing costs, reducing net farm income and cash flow.
- We estimate that reducing the overtime threshold for agricultural employees from 60 to 40 hours per week would result in increased labor costs for farms of about 17%. This would be in addition to the previously approved increases in minimum wage scheduled through December 2021.
- When combined with past and scheduled future minimum wage increases, we estimate mandatory overtime pay for agricultural employees in New York State would result in increased agricultural labor costs of approximately $264 million per year. The increase in labor costs resulting from mandatory overtime pay at 40 hours and the $13.20 minimum wage when fully implemented is estimated to increase farm labor costs by 42%.
- Although some farms have hired additional workers to accommodate the current 60-hour threshold, given the current conditions in the labor market we do not believe that farms would be able to hire enough additional workers to reduce average hours to 40 per week. In addition, because many farm employers provide worker housing, hiring additional workers, if available, is also likely to require increased housing costs, which are not included in this analysis.
- Higher labor costs from overtime pay will drive up other costs, including payroll taxes and workers' compensation insurance. These additional costs are not projected in this analysis but would place additional financial requirements on farms.
- A significant increase in labor costs would serve as a disincentive to growing the agricultural sector, and in some cases, if farms cease operations or shift to less labor-intensive crops, jobs could be lost both in production agriculture as well as related processing and marketing businesses which rely on farm output.

Background

The New York Wage Board is tasked with the mission of recommending (or not recommending) changes to the overtime wage threshold for farmworkers under the authority provided under the New York Farm Laborers Fair Labor Practices Act (FLFLPA). The threshold is currently 60 hours per week, beyond which farmworkers must be compensated at time-and-one-half. The wage board can recommend that the threshold remain at 60 hours, or that it be reduced.

This Farm Credit East Knowledge Exchange report reviews the impact that a reduction in the overtime threshold could have on agricultural labor costs and farm income.

Labor related costs are a major component of the overall cost of production on many New York farms, in part due to the labor intensive and high value nature of the state's agricultural production, especially for products such as dairy, fruit, vegetable, nursery and greenhouse.

According to the most recent USDA-Economic Research Service data, farm labor expense in New York was 12.5% of the value of total agricultural receipts for the five-year period 2016-2020, compared to the national average of 8.7%. California is the only state in the U.S. top 10 for value of agricultural production where labor is a higher percentage,[1] and in nearby states like Pennsylvania and Ohio, labor as a percent of the value of agricultural production is 9.7% and 7.6% respectively.[2] Note that these percentages are based on a five-year average so includes only one year (2020) of increases in labor costs as a result of the FLFLPA.

New York agriculture is fortunate to have highly skilled farm workers that work side-by-side with farm owners every day. One underlying issue for agriculture when faced with requirements like mandatory overtime pay is competitiveness with other producing regions. New York farmers compete in national and international markets and have limited power to increase their prices.

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[1] In California, labor costs average 21.5% of total agricultural receipts due to the high percentage of fruits and vegetables in its ag sector.
[2] USDA – ERS, *Farm Income and Wealth Statistics, 2016-2020*

New York Agriculture Overview

Agriculture and related food processing and input sectors are the backbone of the Upstate economy, and an important economic engine in New York, providing the basis for thousands of jobs and billions of dollars of economic activity.[3] New York farms represent:

- 6.9 million acres of land
- 33,438 total farms; 27% with labor expenses
- 8,963 farms employ 55,636 employees (full and part-time)
- $5.4 billion in total farm sales
- $812 million in total labor expense on farms
- $37.2 billion in economic impact for agriculture and related processing, marketing and inputs
- 160,202 jobs supported by the ag industry, including farms and related processing/inputs

New York Agriculture and the Current Economic Climate

New York farms of varying sizes are predominantly family-owned (98%).[4] These farms often have relatively narrow margins and limited ability to influence prices for their products. In addition, the markets for many farm products are regional, national or global, and New York farmers are competing in most instances with producers in other states or countries with lower production costs.

New York farms of varying sizes are predominantly family-owned.

Farms have considerable capital investments and may not be able to make short-term production shifts to adjust operations. Given that farms are largely price takers, it is difficult, if not impossible, for farms to simply pass through higher costs for labor, energy, feed or other expenses. Thus, farms are unlikely to be in a position to pass through higher labor expenses.

Most full-time farm operations have some employees, even if they are limited to seasonal workers. Of the more than 33,438 farms in New York, only about 27% are estimated to have hired farm labor, yet these farms also generate more than 80% of the state's gross farm income and 90% of the net income. Most of these farms' owners are dependent on agriculture as their primary source of income.

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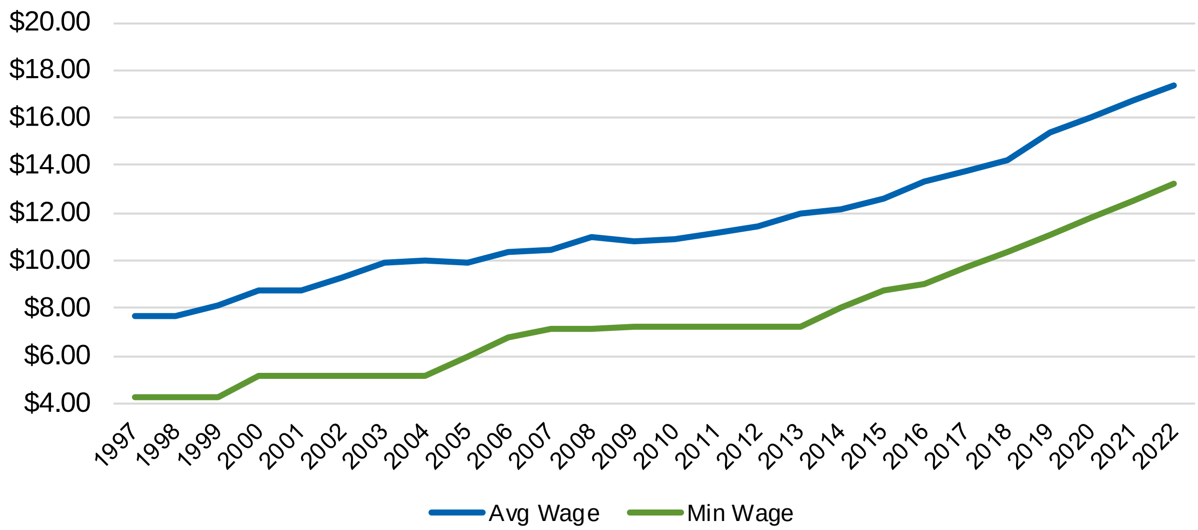
Requiring overtime pay for agricultural workers in New York, comes in addition to recent increases in the minimum wage. In 2016, New York passed a law raising the minimum wage to $15.00 per hour, phased in over a multi-year period.

[3] 2017 Census of Agriculture for New York State, USDA and Northeast Economic Engine, Farm Credit East, 2020, 2020 USDA-ERS Farm Income and Wealth Statistics

[4] 2017 Census of Agriculture for New York State, USDA - Includes incorporated farms owned by individuals or families

Figure 1: New York Minimum Wage and Average Agricultural Wage, 1997-2022



Sources: NY Department of Labor, USDA/NASS: Northeast I Region Average Wages. Minimum wage is for Upstate NY (Long Island and Westchester county minimum wage is higher)

Table 1: Historical NY Minimum Wage Rates and Average Agricultural Wages for the Northeast U.S.

Year[5]	NY Minimum Wage (upstate)[6]	Northeast Hired Agricultural Workers[7]
2009	$7.25	$10.83
2010	$7.25	$10.89
2011	$7.25	$11.20
2012	$7.25	$11.43
2013	$7.25	$11.97
2014	$8.00	$12.15
2015	$8.75	$12.63
2016	$9.00	$13.29
2017	$9.70	$13.77
2018	$10.40	$14.19
2019	$11.10	$15.37
2020	$11.80	$16.00
2021	$12.50	$16.69[8]
2022	$13.20	N/A

Source: NY Department of Labor, USDA/NASS

[5] December 31st wage increases are put in for the following year.
[6] Minimum wage is higher for Long Island, Westchester County and NYC.
[7] USDA/NASS Agricultural Labor Report, average annual wage for all hired farm workers.
[8] USDA/NASS Agricultural Labor Report, Wage rate for all hired workers, April 11-17, 2021

As can be seen in Figure 1 and Table 1, actual average farm wages have historically been higher than the minimum wage. To examine the impact of mandatory overtime on labor costs and farm income, using the average wage increase of the past five years as a baseline, we have first estimated average agricultural wages for the next three years, factoring in the slated increase in minimum wage and overtime, shown in Table 2. Note that as shown in Figure 1, when the minimum wage increases, the average worker wage typically increases as well.

We believe this is a conservative estimate as it factors in only about two-thirds of the statutory increase in minimum wage over the same period and considers wages only and not any increase in housing or associated taxes, workers' compensation or benefits that would be based on the underlying wages.

The right-most column in Table 2 shows the overtime rate associated with these forecast wages. Note that by 2022, the forecast average overtime wage is estimated to be $26.09. Given that market prices for many agricultural products have been flat or only moderately increasing, it may be difficult for a farm to economically cover that rate of pay.

Table 2: Future New York Minimum Wage Rates, Forecast Agricultural Wages, and Forecast Overtime Rates

Year	NY Minimum Wage (upstate)	Average Agricultural Wage[9]	Overtime Rate (150% of base rate)
2019	$11.10	$15.37	$23.06
2020	$11.80	$16.00	$24.00
2021	$12.50	$16.69	$25.04
2022	$13.20	$17.39	$26.09

As discussed earlier, this increase in labor costs for farms must be absorbed somewhere, and there are two primary possibilities: a) that these increased costs will be passed on to purchasers of their products, or b) that the increase will come out of farm earnings.

There is a third option, which is that longer term, operations may cut back on labor, operations, or shift to other, less labor-intensive types of agriculture. In the short term, assuming producers faced with

Note that by 2022, the forecast average overtime wage is estimated to be $26.09

…It may be difficult for a farm to economically cover that rate of pay.

[9] Figures for 2019-2021 are the actual average wage rates for hired agricultural workers as reported by USDA/NASS while 2022 is a forecast. This forecast is that average agricultural wages will increase at roughly 2/3 of the rate that minimum wage will increase each year, or 4.2% as it assumes some wage compression.

mandatory overtime maintain their current operations, most farms in New York have little ability to pass increased costs along to purchasers. Farmers producing commodities such as milk, grains, fruits, vegetables or other products for wholesale markets are competing in a complex marketplace with producers from other states and even other countries, many of which have different cost structures.

Prices are typically set by the market, due to factors beyond farmers' control, such as global supply and demand, and often bear little relationship to local costs of production. Depending on many factors, such as weather and production volumes in competing regions, market prices can range from providing a reasonable profit to being below local costs of production.

Sometimes these competing regions have lower production and labor costs and may have a greater impact on market prices than do local farmers. Even farms selling products direct to consumers are limited in the extent to which they can pass along cost increases. One reason for this is because although New York farmers have significant production, they may not be the primary suppliers for any specific product given the overall size of the New York and regional market, meaning that market supply and pricing is largely driven by production elsewhere.

Therefore, the likely scenario is that the majority of these increases in labor costs will come out of farm earnings. While the exact impact will vary from one farm to the next, and from year-to-year, the following is an illustrative example, analyzing the impact on the state's agricultural sector as a whole.

Analysis of Economic Impact of Mandatory Overtime

Assumptions

- In excess of 40 hours in a seven-day work week is considered overtime
- Overtime is paid at 1.5 times the base rate
- The "average" farm employee works 60 hours per week (20 hours overtime)[10]
- Scheduled increases in the minimum wage to $13.20 per hour occur as planned

[10] This scenario assumes that the average farm has been able to schedule work to meet the current 60-hour threshold without incurring overtime hours.

Depending on many factors … market prices can range from providing a reasonable profit to being below local costs of production.

The likely scenario is that the majority of these increases in labor costs will come out of farm earnings.

New York farmers have already made adjustments in staffing and scheduling to accommodate the current 60-hour overtime threshold, by staggering work schedules, hiring new workers where available and spreading out hours to come in at 60 hours per week on average. We believe this is the limit of the number of overtime hours that can be replaced with additional workers given the labor shortages that exist throughout the economy.

Many farms have difficulty finding local workers and given the challenges and expenses of using the H-2A program, especially for operations with year-round needs like dairy farms whose use of the program is limited, we believe farm employers would find it difficult to hire additional workers in order to limit overtime expense. For those farms that are able to add additional workers, many farms offer housing at little or no cost to their workers (for H-2A, inspected housing is required to be provided at no charge). Thus, adding workers could bring additional housing costs to farm operators.

… We believe farm employers would find it difficult to hire additional workers in order to limit overtime expense.

New York and U.S. agriculture have had wide swings in net earnings over the last several years as farm income dropped by two-thirds between 2013 and 2016, due to lower commodity prices for products like dairy, grains and oilseeds. For that reason, the analysis was based on New York USDA-ERS financial data over the last five years in order to take out some of the year-to-year variations in assessing the impact of mandatory overtime.

Still, it is important to note that this volatility in earnings is significant and complicates the ability of New York farms to absorb labor cost increases. In a “good year,” if prices and earnings are adequate, many farms could absorb the increased costs, but in “down years,” which inevitably occur, most farms would struggle to manage increased costs and would incur losses, and possibly have to take on additional debt to cover any shortfall in cash flow.

Table 3: Impact of Minimum Wage Increases and Overtime Pay on New York Farm Income						
(Figures in $1,000s)	2016	2017	2018	2019	2020	5-Year Average (2016-2020)
Value of Farm Production (crop and livestock receipts)	$4,999,502	$5,194,176	$4,980,915	$5,183,253	$5,184,215	$5,108,412
Hired Labor Costs (contract and hired labor)	$740,481	$699,570	$648,722	$531,641	$569,385	$638,014
Net Farm Income[11]	$705,891	$1,312,127	$1,031,348	$1,902,707	$1,827,134	$1,355,841
Minimum Wage Increase[12]	$228,809	$183,987	$146,611	$69,680	$48,967	$135,611
OT Increase	$161,871	$147,554	$132,821	$100,466	$103,265	$129,195
Impact of OT and Minimum Wage	$390,680	$331,541	$279,432	$170,146	$152,232	$264,806
New Net Farm Income[13]	$315,211	$980,586	$751,916	$1,732,561	$1,674,902	$1,091,035
% Increase in Wage Expense	53%	47%	43%	32%	27%	42%
% Reduction in Net Farm Income	55%	25%	27%	9%	8%	20%

As Table 3 shows, New York farmers could incur a major increase in farm labor costs averaging 42% higher, using the last five years as baseline. While a five-year average was chosen for this analysis to take out the variability between years, the impact on farm earnings from one year to the next can vary significantly depending on the net income in a given year.

Because of this volatility in farm income year to year, the impact of these increases in labor costs are also highly variable – they could reduce net farm income anywhere from 8% to 55%, depending on the year. While some labor costs are variable, in the short-term labor is a fixed cost to the operation, so the increased labor costs will generally have to be covered regardless if it's a profitable year or not.

There are several considerations based on the data from Table 3. One is that $1.1 billion in aggregate net farm income corresponds to approximately $32,629 per farm in New York,[14] which must cover family living expenses as well as debt payments.

The total debt principal payments made by New York farms each year is estimated at $469 million.[15] If this is subtracted from net farm income, the result is negative cash flow in some years and tight finances in others, leaving little for family living expenses.

[11] Value of farm production, hired labor, and net farm income figures are from USDA/ERS: Farm Income and Wealth Statistics.
[12] Assumes that wages would have to be paid reflecting the 2022 minimum wage.
[13] Assumes farms are unable to pass on increased labor costs.
[14] $1,091,035,000 / 33,438 farms
[15] Assumes an average interest rate of 5.0% and a blended debt term of 10 years.

It should be noted that these increased labor costs would not affect all farm sectors equally, as labor-intensive ag sectors would be disproportionately impacted by these changes. Using 2017 census data, we estimated the impact of the labor cost on three labor intensive industries, vegetables, fruit and greenhouse/nursery. Table 4 shows the projected increases in labor costs would reduce net income by between 40% and 75%, with the specific impact of mandatory overtime reducing net income between 18% and 34% based on 2017 census data.

Table 4: 2017 Farm Income and Impact of Overtime Pay and Minimum Wage Increases by Sector

Sector ($1,000s)	Total Sales, 2017	Total Labor Cost	Net Cash Farm Income	Adjustment to 2022 Wage Levels	Overtime Cost Increase	Potential Reduction in NCFI
Vegetable & Melons	$376,233	$94,821	$112,392	$24,938	$20,000	-40%
Fruit & Tree Nuts	$402,170	$157,604	$102,866	$41,450	$33,242	-73%
Greenhouse & Nursery	$384,222	$128,374	$80,719	$33,762	$27,077	-75%

Source: 2017 USDA Ag Census, NY Table 75 (columns 1-4), Farm Credit East estimates (columns 5-7).

For 40 years, Farm Credit East has prepared the *Northeast Dairy Farm Summary* (*DFS*), summarizing the financial results of individual dairy farms across the Northeast. Table 5 illustrates the impact of the proposed labor cost increases based on the five-year average financial results of the average individual dairy farm in the *DFS*. For the average farm over the five years in the 2016-20 *DFS*, the increase in labor costs would essentially erase the average net household income for those years.[16] The impact of mandatory overtime only for the average farm over the five years of the *Dairy Farm Summary*, would have decreased net household income by 52%.

Over the past five years (from 2016-2020), the minimum wage in New York has increased by 38.9%. Meanwhile, the price farmers receive for milk has increased by only 4.1% during the same period.

For the last 10 years, the state of New York has seen about 3% of its dairy farms go out of business each year. A significant increase in labor expenses, without a corresponding boost in revenue, will only accelerate that rate of attrition.

[16] After depreciation and family living expenses.

Table 5: 2016-2020 Northeast Dairy Farm Summary Average Farm and Impact of Overtime Pay and Minimum Wage Increases						
Sector	Average Sales Per Farm	Average Labor Cost	Net Household Income[17]	Adjustment to 2022 Wage Levels	Overtime Cost Increase	% Reduction in NCFI
Dairy	$2,900,347	$441,488	$169,497	$81,934	$87,411	-100%

Conclusion

This analysis focuses on the economic impact of overtime on the entire agricultural sector and specific farm types within the agricultural sector, but the impact of higher labor cost is borne by individual farms, and these impacts will vary widely depending on the farm's reliance on labor and its financial situation.

At any given point in the farm economy, there are some farms that may be doing well, earning strong profits, while many realize only modest earnings, and some farms experience losses.

The impact of the increased labor costs could be enough in some cases to move some farms from positive net earnings into a loss situation. This could have the effect of causing farms to transition out of agriculture, opening land up to non-farm development in some areas. Dairy is a sector of particular concern in New York. According to the USDA Census of Agriculture, New York has lost approximately 3% of its dairy farms each year since 2002. This trend is likely to continue, and moreover accelerate if labor costs continue to outpace the rate at which milk prices increase. Reducing the overtime threshold will only increase the financial stress that New York dairy farms are under and will undoubtedly increase the rate of attrition in that sector.

The impact will also likely be felt differently between smaller and larger producers. While larger farms are likely to have more employees, greater payroll expenses, and possibly greater impact due to increased wages, they are also more likely to be in a position to absorb these increases, and/or take steps to mitigate them, such as spreading hours out among more workers, cutting worker shifts or other practices. It is likely that smaller farms, especially those that rely upon a greater percentage of family labor will be more severely impacted.

The impact of mandating overtime pay in New York and not in competing states may shift agriculture in two ways. Labor intensive agriculture operations could shift to agricultural enterprises that are less labor intensive, such as dairy production shifting to grain or hay

[17] Does not include depreciation, family living or debt principal payments.

production. Full-time farms may transition to part-time to avoid hiring labor or paying overtime to their employees. Overall, this will reduce the size of New York's agricultural industry.

If we see a significant decline in production from labor intensive agricultural sectors, this could impact food processing and marketing businesses located in New York. Many of New York's higher value, labor intensive agricultural products generate the most economic activity further along the value chain in terms of processing, marketing and distribution, meaning the economic impact would be felt beyond the farm level, and would extend to local upstate New York communities already facing many economic challenges. While these businesses may seek raw product from other states, over time some of these businesses may look to relocate closer to major production areas.

Finally, the impact on farm workers could be mixed. While some workers may benefit from increased earnings, other workers may find their hours reduced as a result of employers trying to manage their increased costs. Many of New York's farm workers attempt to work as many hours as possible during peak periods, often to save money or send remittances to their families. A significant increase in labor costs would serve as a disincentive to hiring additional workers, and in some cases, if farms close or shift to less labor-intensive crops or implement labor saving technologies, jobs could be eliminated. The greatest impact of this labor cost increase would likely be on New York's most labor-intensive agricultural sectors: dairy, fruit, vegetable, greenhouse and nursery.

In the general economy, overtime hours are fairly rare. Manufacturing employees who do receive overtime typically average only about three hours of overtime pay per week.[18] It is likely that agricultural workers will eventually transition to similar work schedules. This may be desirable for some, but others may find it limiting their income potential. Some workers are likely to get second jobs (which would be at straight time). Note that this would not be possible for H-2A workers, as their visa status does not permit employment beyond their sponsoring employer.

Overall, this will reduce the size of New York's agricultural industry.

… The economic impact would be felt beyond the farm level, and would extend to local upstate New York communities already facing economic challenges.

[18] U.S. Bureau of Labor Statistics, 2020-2021 data.

Appendix 1: Labor regulations by U.S. State

Minimum Wage by State (as of October 2021)			
State	**Minimum Wage**	**Overtime Mandatory for Ag**	**Collective Bargaining Rights for Farmworkers**
Federal	$7.25	No	No
Alabama	Same as Federal	No	No
Alaska	$10.34	No	No
Arizona	$12.15	No	Yes
Arkansas	$11.00[19]	No	No
California	$14.00[20]	Yes – after 45 hours/wk[21]	Yes
Colorado	$12.32	No	No
Connecticut	$13.00	No	No
Delaware	$9.25	No	No
District of Colombia	$15.20	No	No
Florida	$10.00	No	No
Georgia	Same as Federal	No	No
Hawaii	$10.10	Yes – after 40 or 48 hours/wk[22]	Yes
Idaho	Same as Federal	No	No
Illinois	$11.00	No	No
Indiana	Same as Federal	No	No
Iowa	Same as Federal	No	No
Kansas	Same as Federal	No	Yes
Kentucky	Same as Federal	No	No
Louisiana	Same as Federal	No	Yes
Maine	$12.15	No	No
Maryland	$11.75	Yes – after 60 hours/wk	No
Massachusetts	$13.50	No[23]	Yes
Michigan	$9.65	No	No
Minnesota	$10.08	Yes – after 48 hours/wk[25]	No
Mississippi	Same as Federal	No	No
Missouri	$10.30	No	No
Montana	$8.75	No	No

[19] Some farm workers are exempt from the state minimum wage
[20] Applicable to employers with 26 employees or more, will increase to $15 in 2022.
[21] Overtime (1.5 rate) must be paid to workers after 8.5 hours per day or 45 hours per week. Scheduled to be adjusted to 8 hours per day and 40 hours per week by 2022 for farm employers with 26 or more employees.
[22] Overtime required after 40 hours per week. However, rules allow the farm employer to select up to 20 weeks per year to be exempt from overtime pay until 48 hours per week.
[23] A Recent court decision has significantly narrowed the scope of the ag overtime exemption in Massachusetts.
[24] Applicable to employers with annual revenues of $500,000 or more, increases to $10.33 in 2022.
[25] Exempts farm workers paid more than $735 per week according to a specific formula.

Appendix 1: Labor regulations by U.S. State

Minimum Wage by State (as of October 2021), continued			
State	**Minimum Wage**	**Overtime Mandatory for Ag**	**Collective Bargaining Rights for Farmworkers**
Nebraska	$9.00	No	Yes
Nevada	$8.75 / $9.75[26]	No	No
New Hampshire	Same as Federal	No	No
New Jersey	$12.00	No	Yes
New Mexico	$10.50	No	No
New York	$12.50/$14.00/$15.00[27]	Yes – After 60 hours/wk[28]	Yes
North Carolina	Same as Federal	No	No
North Dakota	Same as Federal	No	No
Ohio	$8.80	No	No
Oklahoma	Same as Federal	No	No
Oregon	$12.75	No	Yes
Pennsylvania	Same as Federal	No	No
Rhode Island	$11.50	No	No
South Carolina	Same as Federal	No	No
South Dakota	$9.45	No	No
Tennessee	Same as Federal	No	No
Texas	Same as Federal	No	No
Utah	Same as Federal	No	No
Vermont	$11.75	No	No
Virginia	$9.50	No	No
Washington	$13.69	No	No
West Virginia	$8.75	No	No
Wisconsin	Same as Federal	No	Yes
Wyoming	Same as Federal	No	No
Puerto Rico	Same as Federal	No	No

[26] Minimum wage is $9.75 if employer does not provide health insurance
[27] $14.00 for Long Island and Westchester counties, $15.00 for NYC, $12.50 for Upstate (Scheduled to increase to $13.20 on December 31, 2021).
[28] Time-and-one-half is also required for any work done on Sunday or the designated "day of rest"

Definitions

Net cash farm income: This concept is derived by subtracting total farm expenses from total sales, government payments, and other farm-related income. Depreciation is not used in the calculation of net cash farm income. It also does not reflect an owner's draw. (In other words, family living comes out of NCFI). It does include interest expense, but not debt principal payments.

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KNOWLEDGE EXCHANGE

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