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# **Survey of New York Dairy Farm Employers 2009**

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## **PREFACE**

Thomas Maloney is a Senior Extension Associate and Nelson Bills is an Emeritus Professor in the Charles H. Dyson School of Applied Economics and Management at Cornell University.

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## **Abstract**

The purpose of this study is to gather information from fruit, vegetable and dairy farm employers regarding agricultural workforce issues in New York agriculture. The survey provides new insights into five key topic areas; the number of workers on New York farms, employee wages and benefits, characteristics of the Hispanic workforce, attitudes among farm operators regarding proposed State labor law changes and Federal immigration reform.

The agricultural workforce for fruit, vegetable and dairy farms in New York including part-time and full-time workers totaled 33,200. The focus of this report is on the dairy industry where the number of hired dairy employees is estimated to be 9,600.

Dairy farm employers reported that experienced general laborers were paid an average of \$9.98 per hour and experienced milkers were paid an average of \$9.71. Dairy employers also reported salary ranges for hired managers. They reported that 8% of middle managers and 38% of top-level managers earn salaries of \$50,000 or more annually.

Hispanic workers play an increasingly important role in the New York dairy industry. The survey found that there are 2,600 Hispanic dairy workers in the State. Regarding their Hispanic workers, dairy farm employers reported that the two issues requiring the most assistance were immigration issues and language skills.

At the time the survey was conducted, New York's labor advocates and farm employers were debating legislation that would have required farm employers to provide their workers overtime pay and collective bargaining rights. The majority of dairy farmers surveyed indicated that they would be very concerned if their workers were allowed to form unions and if they were required to pay overtime.

Regarding Federal immigration reform, survey participants were asked to rate the importance of national immigration reform, a path to citizenship and a guest worker program to their business. While all three issues were important to farm managers, a path to citizenship was reported to be less important than national immigration reform or a guest worker program.

## **Introduction**

A longstanding concern for American agriculture is the availability and adequacy of on-farm labor. Most farm businesses are relatively small, do not have a payroll, and rely on family labor. Some farm businesses hire farmworkers intermittently to meet seasonal labor needs while many others require a regular workforce. In recent years, increasing numbers of New York State farm operators have reached out to Hispanic immigrants to help meet their labor needs. As a result, the farm community is actively engaged in the debate over immigration issues across the United States. These issues have received much recent attention from the media, employers, policymakers and the public. Stalled attempts to enact comprehensive immigration reform in the US Congress and increased immigration enforcement activities have heightened concerns over illegal immigration.

Farm organizations engage State legislators regularly on issues related to evolving State labor laws and regulations. These legislative actions can affect the availability and cost of on-farm labor. New York's labor advocates and farm employers have recently debated legislation that would require farm employers to provide their workers overtime pay and collective bargaining rights.

Whether focused on State or Federal policy, an overarching question deals with workforce ethnicity and the use of immigrant labor by business firms. Unfortunately, core data on the immigrant population are often limited or absent altogether from the discussion. Clarity on concerns over unauthorized individuals who are living and working in the United States suffers accordingly. According to a widely cited report published by the Pew Hispanic Center four years ago, the estimated population of unauthorized individuals ranges between 11.5 and 12 million (Passel, 2006). There are acute gaps in the details. Very little is known about the work status of this population in various industries and the number employed on farms. Surprisingly, detailed annual descriptions of the farm labor pool are not published by the USDA at state level, let alone a database providing insight into immigration issues, the ethnic composition of the farm labor force, and the value of farm employee wages and benefits.

To help the information gap and better inform policy discussions at State level, this study was undertaken with five objectives. The first is to add to the available data relating to the estimated number of farm workers in three of the most labor-intensive segments of New York agriculture: fruits, vegetables and dairy. The second is to provide current information on employee wages and benefits on both general laborers and managers. The third objective is to gather information on Hispanic workforce issues. The fourth objective is to gather attitudinal data from farm managers regarding proposed State labor policies that impact overtime pay and collective bargaining rights for farm workers. The fifth objective is to gather attitudinal data from farm managers to assess their attitudes regarding policies that would reform immigration laws in the U.S.

## **Survey Methodology**

This survey was designed to better inform discussions on several key labor issues important to New York farms. The survey centered on the Hispanic farm workforce; and targeted labor use in three agricultural sectors: dairy, fruit and vegetables. Together, these farm commodities account for 71 % of total cash receipts from farm marketing in New York State (USDA, 2010b). This survey is the third in a series of survey efforts to help inform educational programs and public policy discussions dealing with ethnicity and farm labor use in New York State. A 2005 New York State study used personal interviews to obtain detailed information on Hispanic employment and employment practices in the New York State dairy industry (Maloney and Grusenmeyer, 2005). A second New York State study, published in 2008 (Maloney and Bills, 2008b), concentrated on Hispanic labor use in the dairy, fruit, and vegetable sectors and farmer's views on Federal immigration policy.

### **Other Sources of Information**

Looking at other states, the USDA-NASS Wisconsin Field office surveyed about 3,000 dairy farm operators in 2007, focusing on structural features of the Wisconsin dairy industry and issues confronting dairy producers (USDA-NASS, 2008). Those survey results included an estimate of the number of hired, nonfamily workers on Wisconsin dairy farms and the fraction categorized as Hispanic. The Wisconsin study added a new level of precision by classifying farmworkers based on their language skills. Those employees who use Spanish as their first language were classified as Hispanic workers. More recent work in Wisconsin deals with a variety of social and economic issues confronting the State's dairy sector. A series of five briefing papers details the circumstances surrounding Hispanic farm labor use, along with consideration of the wider communities impacted by the arrival of immigrant labor (Harrison, et al, 2009a-e). Much of the Wisconsin work is complementary to analyses of the New York State communities and the social connections with immigrant/migrant populations (Parra and Pfeffer, 2006; Pfeffer, 2008; Pfeffer and Parra, 2004; Pfeffer and Parra, 2005a; Pfeffer and Parra, 2005b; Pfeffer and Parra, 2008). Looking beyond New York State and Wisconsin, analysts in Washington State have accessed farm level survey results that allow them to generate extensive data on farm employment, including seasonal labor use in the State's fruit commodities sectors (Stromsdorfer et al, 2008).

Analysis of Hispanic farm employment at the state level is in sharp contrast to USDA survey/Census efforts. The USDA publishes results from an ongoing Farm Labor Survey (USDA-NASS, 2010c), but that survey does not deal with management or policy. Further, the design provides multistate rather than state-level estimates of labor use and practice on farms. USDA-NASS regularly collaborates with the Economic Research Service (ERS), and conducts an annual Agricultural Resource Management Survey (ARMS). The ARMS results are published on a regional basis, but do not touch on labor use or labor management issues (USDA, 2010a). Instead, USDA-ERS analysis and commentary on farm labor (for example, see Kandel, 2008), is based on results obtained from the US Census Bureau's annual Current Population Survey (CPS). Results from the

CPS are only reported at the national level. The CPS also provides benchmark data for the widely cited and discussed reports recently published by the Pew Hispanic Center (Passel, 2006; Passel and Cohn, 2009a; Passel and Cohn, 2009b; Passel and Cohn, 2010). Finally, a recent study prepared under contract for the national milk producers Federation examined the economic impact of immigrant labor use in the dairy sector (Rosson, et al, 2009; Manthei, 2010). Responses from just over 5,000 dairy farm operators in 47 states indicated that 50% of all dairy farms use immigrant labor. The number of immigrants employed was estimated at 138,000, measured in terms of full-time equivalents (FTE). These farms account for an estimated 62% of the US fluid milk supply.

The aforementioned studies are valuable and demonstrate the wider and deeper engagement of the research community in a variety of concerns related to the US immigrant population and labor availability<sup>1</sup>. Much, but not all, of this work deals specifically with farm labor concerns but does not touch on public policy issues. A complete and adequately nuanced farm labor picture, especially at the state and sub-state level, is absent. As a result, many questions on farm labor use are unanswered or not answered in a timely fashion.

The information gaps are especially acute in the policy arena. The farm community often grapples with policy concerns in an information vacuum, meaning that numerous debates and discussions about farm labor and farm labor policies and programs are not data-driven or fact based. Conversely, opportunities to fine tune or even craft an educational message tailored to the needs of New York State farm and food industry appear to have considerable merit.

### **Survey Design**

Ideally, one would put agricultural labor concerns into perspective with comprehensive and internally consistent definitions of farm businesses, farm workers, and key demographic characteristics of the agricultural workforce. To that end, we employ data conventions and definitions that parallel those used by the USDA and their five-year Census of Agriculture where possible. The Census stands alone as a linchpin data source because data are released at state level and below. Further, only this source allows analysts to distinguish between labor use on different types of farm businesses.

The Census reports on farms with gross sales of \$1,000 or more during the Census year. Additional farms are counted if the USDA deems that business has potential to generate \$1,000 of product or more each year<sup>2</sup>. A substantial share of all New York farms do not have a payroll. For those that do, the Census asks farm operators to report on numbers of hired farm workers, and the associated payroll expense, during the census year. Total

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<sup>1</sup> Another large and long-lived research area deals with international patterns of migration. A complete accounting of this work is beyond the scope of this study. See Cairns, et al (2010) for a recent analysis of long term migration into the US.

<sup>2</sup> The 2007 Census shows that nearly 25 % of all New York farms had sales under \$1,000 during the Census year (Bills and Stanton, 2009)

hired farm workers, including paid family members, are reported in two categories: those working more or less than 150 days a year. This procedure explicitly recognizes the seasonal nature of labor use on farms. Counts of farm workers, on the other hand, exclude contract laborers. These are labor services provided to farm operators under a contractual arrangement with a third party.

Published Census data allow comparisons of labor utilization and employee numbers between farm types aggregated to the state level. Farm types are defined by the mix of commodities produced and sold by the business; many farms produce more than one commodity and, in those cases, the businesses are classified based on a plurality of receipts among commodity groups. This means that a dairy farm could gather as much as half of total receipts from other livestock enterprises or from crop sales and still be classified as a dairy farm.

Farm types of interest in this study are businesses classified by the USDA as dairy farms, vegetable farms, or fruit farms. Table 1 summarizes results from the most recent 2007 Census for each of these farm classes. These data demonstrate the predominance of the dairy sector with respect to labor use, with nearly 25% of all farm workers employed on dairy farms during the Census year. Businesses classified as fruit or vegetable farms account for another 41% of all farm workers. However, a relatively large number of these workers are employed on a seasonal basis as reflected in employment for fewer than 150 days during the Census year (Table 2).

The survey design for this study differs from the Census data reported in Tables 1 and 2 in two important ways. First, we decided to handle the seasonality of farm employment in a different way. Instead of focusing on a 150 day break point, we asked respondents to report on the number of employees on the farm at “peak” during calendar 2009. Deriving estimates of “peak employment” means that our results may or may not coincide with those published in the census because of ambiguities in interpretation. But, the peak employment metric, in our judgment, provides a better understanding of the labor complement on New York State farms.

The second difference is that we asked respondents to exclude paid or payrolled family workers. This data convention will lead to an unambiguous decrease in the number of workers reported our survey, compared to census results, because many New York State farms are operated by family members. However, once again, our approach streamlines the line of questioning in the survey and provides the focus we want on public policy issues and farm worker ethnicity.

To classify employees based on ethnicity, we employ definitions used in Wisconsin (USDA, 2008) and asked employers to count the number of workers who use Spanish as their first language. We classified those workers as Hispanic and the remainder as non-Hispanic. It was assumed that this result would most closely correspond to the results one might obtain by asking farm employees themselves to self-identify based on their ethnicity.

Two different questionnaires were used: one for dairy and one for both fruits and vegetables. Each contained identical questions except that the dairy questionnaire contained extra questions about wages paid to workers who milked cows exclusively in addition to wages paid general farm laborers. These survey instruments were designed to provide maximum overlap among questions so all three sectors could be compared head-to-head as well as collectively. The dairy questionnaire is provided in Appendix I.

### **Characteristics of the Farm Labor Force**

Goals of this survey were to provide a population estimate of farm workers in each sector, their ethnicity, and average wages and salaries paid. Definitions of ethnicity can vary. As noted above, we used language capability to distinguish between Hispanic and non-Hispanic workers, both for hourly employees and salaried managers. Individuals using Spanish as their first language were classified as Hispanics. Then, we inquired further about this collection of workers to see how accomplished they were with English as a second language. This distinction is important because we wanted to learn more about any services farm operators would like to make available for Hispanic employees and for managers who work with Hispanic employees.

To further refine our understanding of the labor complement on each farm, we asked respondents to characterize their employees based on those with limited or substantial experience with farm work. We also inquired about working conditions for employees, as reflected in hours worked and the value of benefits provided by each farm employer. Finally, we posed several questions designed to gauge farm operators' opinions on a range of State and Federal issues surrounding farm employees and the availability of immigrant labor.

To accomplish our study objectives, the population surveyed needed to include all dairy, fruit, and vegetable farms with a high potential for using supplemental hired workers, Hispanic workers in particular. The entire list frame of farmers compiled by the USDA National Agricultural Statistics Service served as the population base for the survey. Overall sampling parameters for this survey were that the sample be drawn with a 95 % confidence level and a target Coefficient of Variation of 5 %. It was assumed that 50 % of all farm operators with hired labor would have immigrant farm workers and that we would have a 50 % response rate.

The effective subpopulations targeted for each sample, while maintaining a manageable level of costs for data collection, are shown in Table 3. Because of the diversity of farms in New York State, any given operator in this sample had a potential to be in one to three of these sub-populations. During each stage of sampling, appropriate statistical procedures were followed to remove a farm from being sampled in subsequent samples. This process was done to minimize respondent burden of answering multiple questionnaires.

The final survey sample used and rates of response are shown in Table 4. Data collection methodology involved mailing and telephone follow-up. On February 18, 2010, all

sample units were mailed an initial questionnaire. About three weeks later, on March 10, a follow-up post card reminder was mailed to all sample units that had not returned their survey. At that time, approximately 460 mail responses (both usable and non-usable) had been returned for all three surveys. Calling mail non-respondents began on April 12 and was scheduled for two weeks. Approximately 650 calls were completed (again including usable and non-usable responses). The final response totaled 933 usable reports for a 51 % response rate (Table 4).

**Table 1: Farm employment by farm type: farms with payroll and number of hired farm workers, New York State, 2007**

Type of farm	All farms	Farms with payroll	Hired farm workers
	Number	Number	Number
Total	36,352	9,273	59,683
Crops:	18,743	4,606	38,518
Vegetables	1,876	699	7,943
Fruit	2,339	1,217	16,442
Greenhouse, nursery, and floriculture	2,193	897	7,893
Other crop farming	12,335	1,793	6,240
Livestock:	17,609	4,667	21,165
Dairy cattle and milk production	5,237	2,645	14,038
Beef cattle	4,803	821	2,486
Poultry and egg production	1,005	116	906
Sheep and goats	1,068	134	357
Other animal production	5,496	951	3,378
	Percent	Percent	Percent
Total	100	100	100
Crops:	51.6	49.7	64.5
Vegetables	5.2	7.5	13.3
Fruit	6.4	13.1	27.5
Greenhouse, nursery, and floriculture	6	9.7	13.2
Other crop farming	33.9	19.3	10.5
Livestock:	48.4	50.3	35.5
Dairy cattle and milk production	14.4	28.5	23.5
Beef cattle	13.2	8.9	4.2
Poultry and egg production	2.8	1.3	1.5
Sheep and goats	2.9	1.4	0.6
Other animal production	15.1	10.3	5.7

Source: 2007 Census of Agriculture (USDA, 2010d)

**Table 2: Farm employment by farm type: farm workers by number of days worked, New York State, 2007**

Type of farm	Hired farm labor (workers)		
	Total	Work 150 days or more	Work less than 150 days
	Number	Number	Number
Total	59,683	23,993	35,690
Crops:	38,518	11,766	26,752
Vegetables	7,943	2,831	5,112
Fruit	16,442	3,730	12,712
Greenhouse, nursery, and floriculture	7,893	3,659	4,234
Other crop farming	6,240	1,546	4,694
Livestock:	21,165	12,227	8,938
Dairy cattle and milk production	14,038	9,130	4,908
Beef cattle	2,486	949	1,537
Poultry and egg production	906	522	384
Sheep and goats	357	96	261
Other animal production	3,378	1,530	1,848
	Percent	Percent	Percent
Total	100	40.2	59.8
Crops:	100	30.5	69.5
Vegetables	100	35.6	64.4
Fruit	100	22.7	77.3
Greenhouse, nursery, and floriculture	100	46.4	53.6
Other crop farming	100	24.8	75.2
Livestock:	100	57.8	42.2
Dairy cattle and milk production	100	65.0	35.0
Beef cattle	100	38.2	61.8
Poultry and egg production	100	57.6	42.4
Sheep and goats	100	26.9	73.1
Other animal production	100	45.3	54.7

Source: 2007 Census of Agriculture (USDA, 2010d)

**Table 3: Proposed survey sub-population**

Sub-population	Number of farms
Operators with dairy cows and hired workers	3,453
Operators with any fruit and hired workers	1,292
Operators with any vegetables and hired workers	1,259

**Table 4: Mail survey sample**

Type of farm	Sample size	Useable responses	
		Number	%
Dairy	692	346	50.0
Fruit	592	326	55.1
Vegetables	542	261	48.2
Total	1,826	933	51.1

## Survey Results

The answers to the survey questions are summarized in the following sections. The number of employees and farms reported are a result of statistical expansions of the survey data.

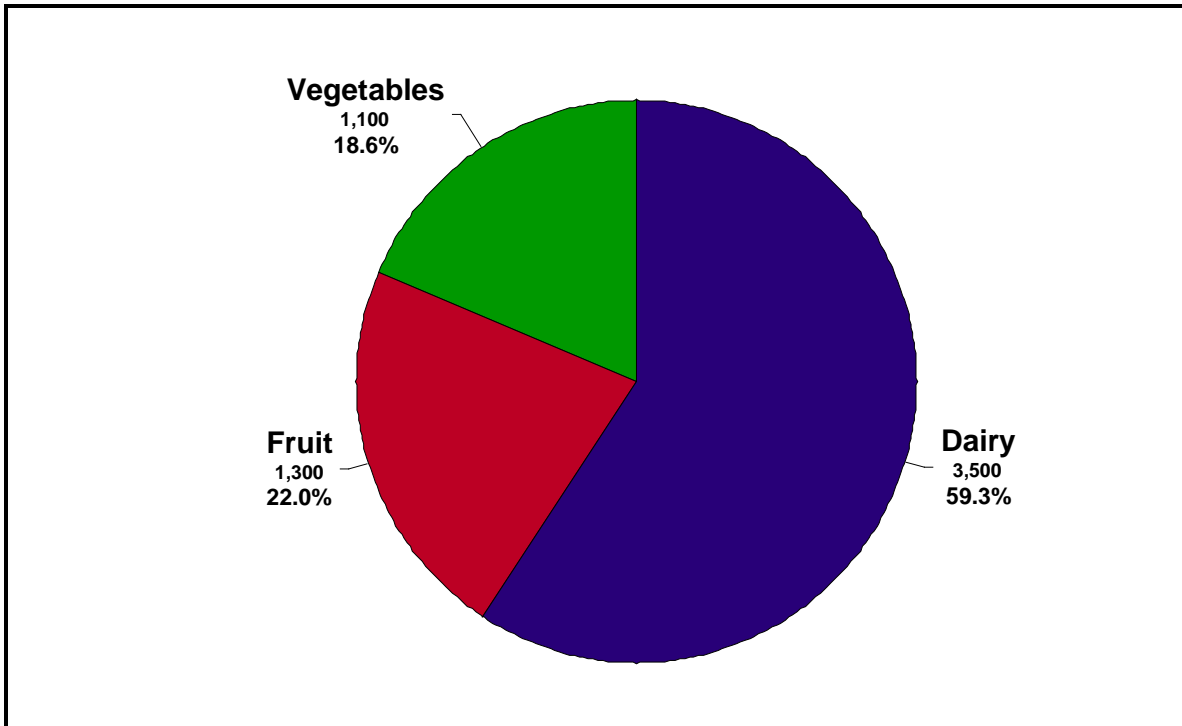
### A. Profile of Fruit, Vegetable and Dairy Farms

The focus of the survey is on the fruit, vegetable and dairy industries, three of the largest and most labor-intensive segments of New York agriculture. The figures in this section provide a general overview of farms and workers in these three agricultural sectors. Employers were asked to report the number of workers at the peak period of employment for their farm. This approach provides an opportunity to estimate the maximum number of employees on New York farms annually. When the 933 survey responses reported in Table 4 were expanded to derive population estimates, results indicate that there were 33,200 hired workers on 5,900 New York fruit, vegetable and dairy farms in 2009 (Figures 1 and 2).

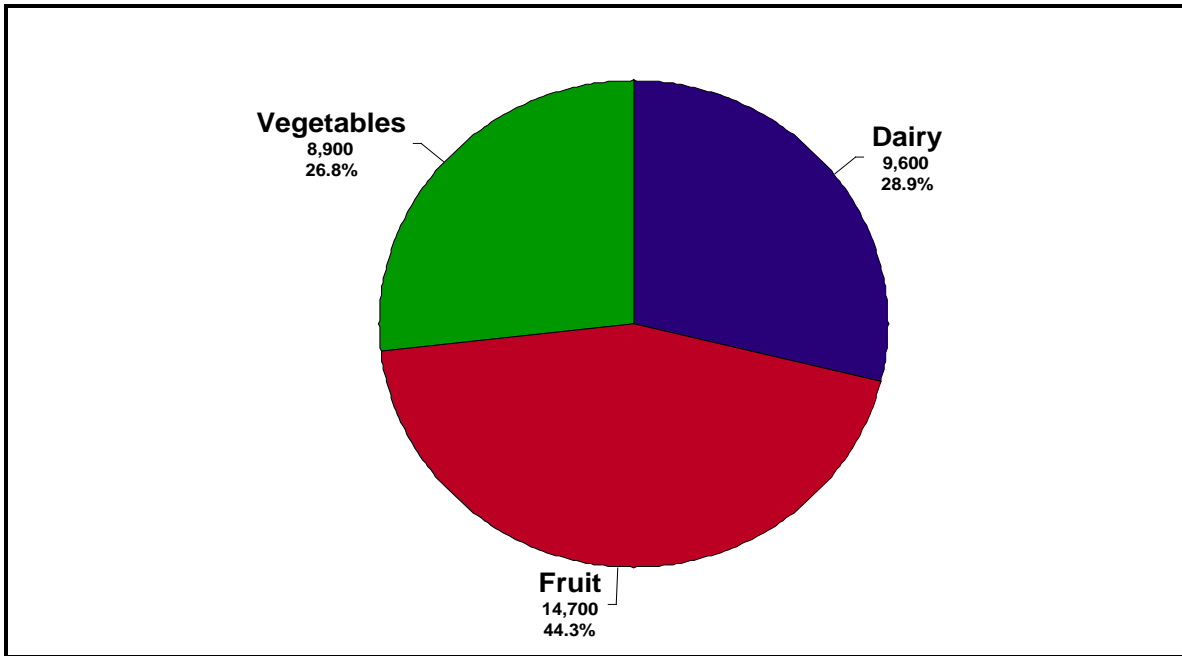
Farm employers were also asked to report the market value of their agricultural products sold in 2009; this allows for an opportunity to look at employment characteristics by farm size categories. Of the farms surveyed, a majority (54%) of farms had product sales between \$100,000 and \$499,000 (Figure 3). This result clearly illustrates our sample design and an effort to target larger farms with a higher potential to have a payroll and a hired farm workforce. In sharp contrast to our survey results, statewide estimates of farm numbers by sales class show that farms with sales between \$100,000 and \$499,000

reported by the USDA in 2009 account for only 13% of all New York State farms (USDA, 2010b). For the largest farm businesses, 25% of the farm population sampled in our survey had sales of \$500,000 or more in 2009; statewide, only 5% of all farms fall in this category (USDA, 2010b).

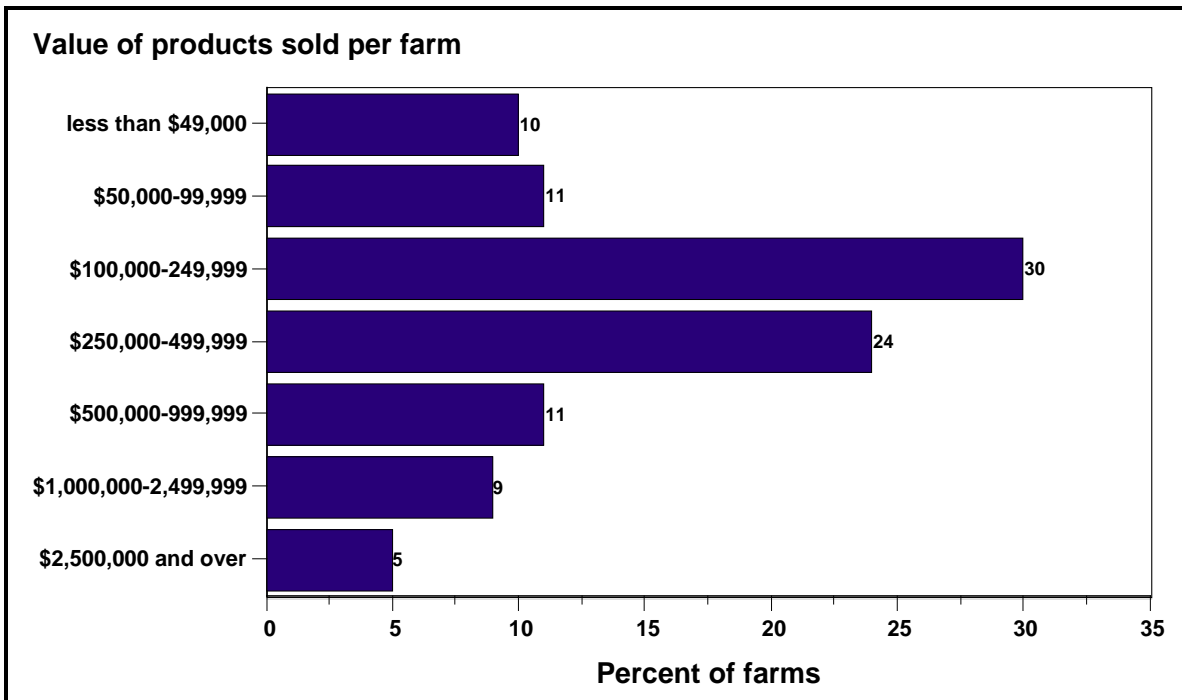
**Figure 1: Usable Surveys, Expanded Sample of Farms - Expanded survey sample, representing 5,900 New York State farms, 2009**



**Figure 2: Workers Employed at Peak - Estimated number of workers employed at peak, 33,200 hired workers total, New York State, 2009**



**Figure 3: Market Value of Agricultural Products - Average market value of agricultural products sold over last three years, 3,500 New York State dairy farms, 2009**



## **B. Dairy Farm Laborers and Milkers: Hours, Wages and Benefits**

This section describes hours, wages and benefits of production workers, specifically general laborers and milkers on New York dairy farms. Considerable attention is paid to these types of data by farmers and policymakers. Farmers want to know how competitive their wages and benefits are within the industry as they attempt to attract the best workers to their business. Policymakers want to be able to compare agricultural industry wage rates with other industries. Figure 4 illustrates the size distribution of the workforce based on the number of farms and the number of employees. For example, 31% of the farms represented in the survey had only 1 hired employee while 11% of the farms had 10 or more employees. When the sample was sorted by the number of employees, 7% of the workers came from farms that employed one worker while 45% of workers were employed on farms with 10 or more workers.

The average number of weekly hours milkers and general laborers worked varied widely from farm to farm. Those working less than 40 hours per week represented 24% of the workers while those working more than 70 hours representing 21% of the workers (Figure 5). This result seems out of step with conventional wisdom, which invariably stresses the long hours often associated with employment on dairy farms. Under these conditions, it seems unlikely that as many as one quarter of all workers reported in our survey realized hours below the conventional 40 hour work week. However, the structure of the survey questions must be kept in mind to put the results in proper perspective. Recall that we asked respondents to report on number of employees, excluding paid family members, at peak during calendar 2009. Both peak employment and family relationships probably dictate our results in a significant way. Inquiring about peak employment is an explicit recognition of the seasonality involved in farm pursuits. But seasonality affects animal agriculture differently than crop agriculture. In the dairy sector, if herd size is reasonably stable, the number of workers assigned to animal enterprises on a dairy farm does not vary a great deal during a calendar year. Instead, since most New York State dairy farmers rely on home-grown feed crops, raise some crops for direct cash sale, or both, labor use only spikes only during relatively narrow crop planting and harvesting windows. It's possible, therefore, that a good many of such employees reported at peak in our survey are seasonal workers who are not necessarily realizing a workweek of 40 hours or more. Unfortunately, we were unable to collaborate our results with other surveys because other analysts have not concentrated on peak employment to allow seasonality of employment to be taken into account.

The same information gap exists for paid family workers. We decided not to count family members in our survey even though ignoring this labor segment runs counter to information supplied in Federal statistics and results obtained from an earlier New York State survey (Maloney and Bills, 2008b). The 2008 study demonstrated that paid family workers are the predominate workers on New York dairy farms; we estimated that 45% of all payrolled employees on dairy farms fall into this category. For purposes of the current study, we ignored family employees to sharpen the study focus on ethnicity, immigration concerns and the issues surrounding policy debates on collective bargaining and overtime pay. The trade-off, once again, is survey numbers which may seem

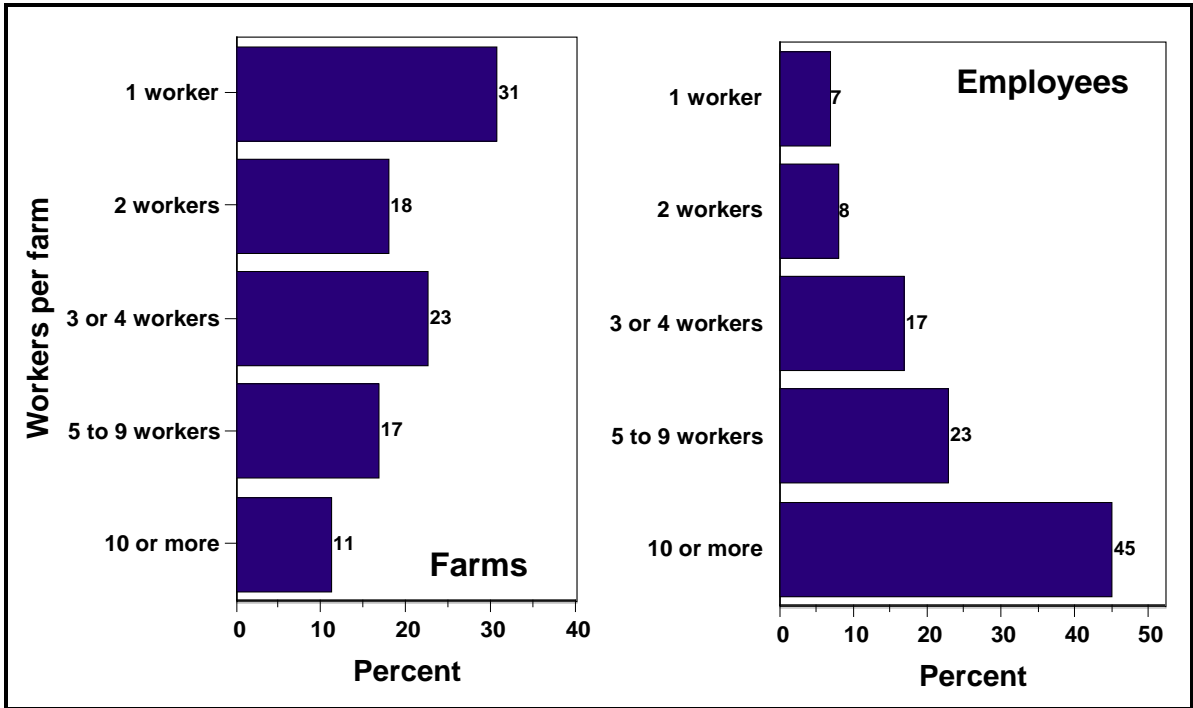
counterintuitive at first glance. That is, there is every reason to suspect that a disproportionately large number of paid family workers realize work weeks at or well above 40 hours. Counting paid family workers therefore, would dramatically reduce the overall percentage of workers reported at less than 40 hours per week.

Fortunately, more comparisons with other data sources are available when one's attention turns to hourly wage rates, a ubiquitous question on all farm labor surveys. Figure 6 shows the average hourly wage rates reported from our survey for experienced and inexperienced milkers and general laborers. As one would expect, experienced workers were paid more than their inexperienced counterparts. Experienced milkers received an average of \$9.71 per hour and inexperienced milkers received \$8.58 per hour. Experienced general laborers received an average of \$9.89 per hour and their inexperienced counterparts received \$8.39 per hour. More than 20% of experienced milkers made between \$10 and \$11 per hour while just over one-third of inexperienced milkers made \$8.00 or less (Figure 7). More than 25% of experienced general laborers made between \$10 and \$11 per hour as compared to less than 10% of inexperienced laborers who earned the same hourly wage rate. More than 65% of inexperienced general laborers made up to \$9 per hour (Figure 8).

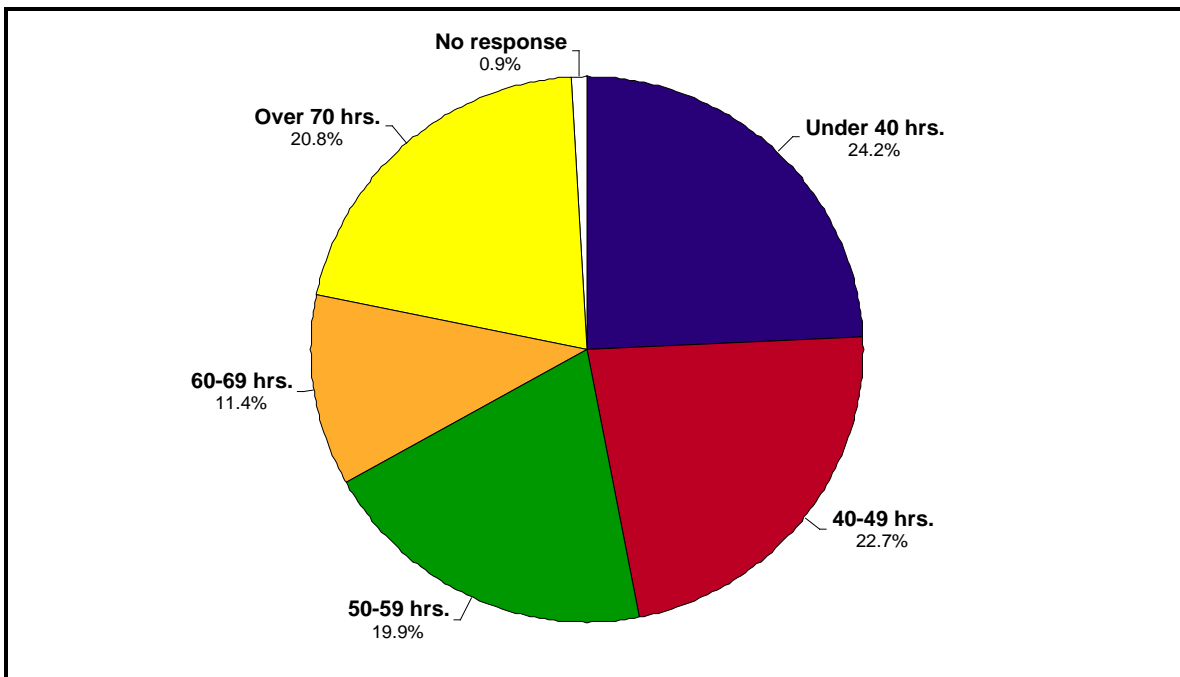
Our results on wage rates appear to be consistent with those reported in other studies. Companion results from recent surveys are summarized in Table 5 and show that our numbers are in line with those reported elsewhere for the most part. It should be noted that none of these survey results fully address all the subtleties of wage rate determination in the dairy sector. Such determinations turn on a number of factors beyond the distinction we make in our survey based on "experience". As Harrison, et al, (2009c) point out, farm wages can and do vary significantly according to region, what job one does on the farm, worker origin (US-born or immigrant), experience with the current employer, and non-wage benefits.

Among these factors, the presence or absence of a nonwage benefit package, along with its composition, can materially affect one's interpretation of average hourly wage rates. Our survey shows that both milkers and general laborers received some benefits. These benefits can extend to one time bonuses, retirement contributions, access to health insurance, and in-kind provision of housing services. We asked respondents to estimate the value of these benefits and assign a dollar amount to each category. Farm employers reported that 27% of milkers received benefits valued at \$5,000 or more, in contrast with 48% who received less than \$1,000 in benefits (Figure 9).

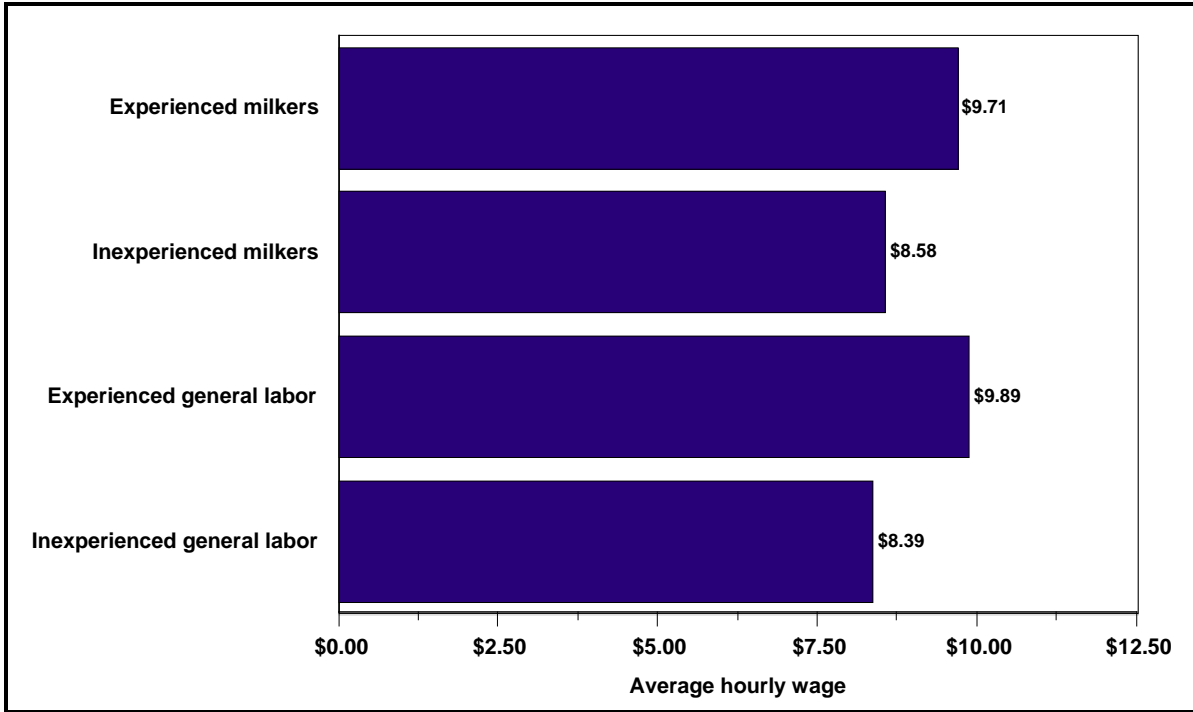
**Figure 4: Size Distribution of Peak Labor Force - 9,600 workers on 2,100 New York State dairy farms, 2009**



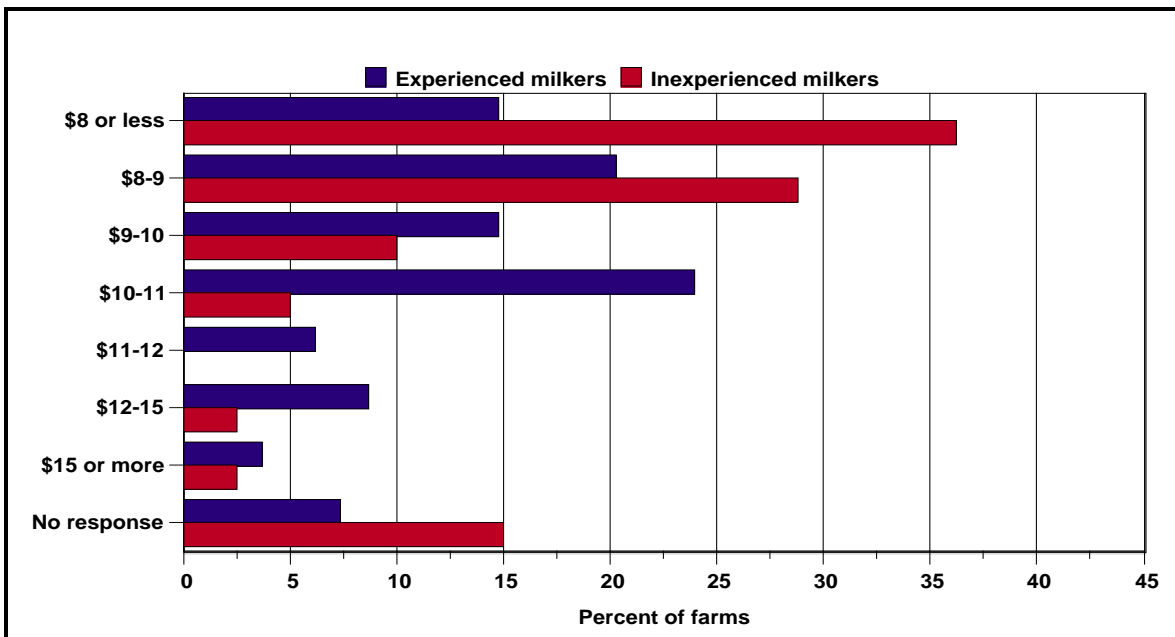
**Figure 5: Average Hours Worked for Milkers and General Laborers - Average hours worked per week for milkers and general laborers on New York dairy farms, 2009**



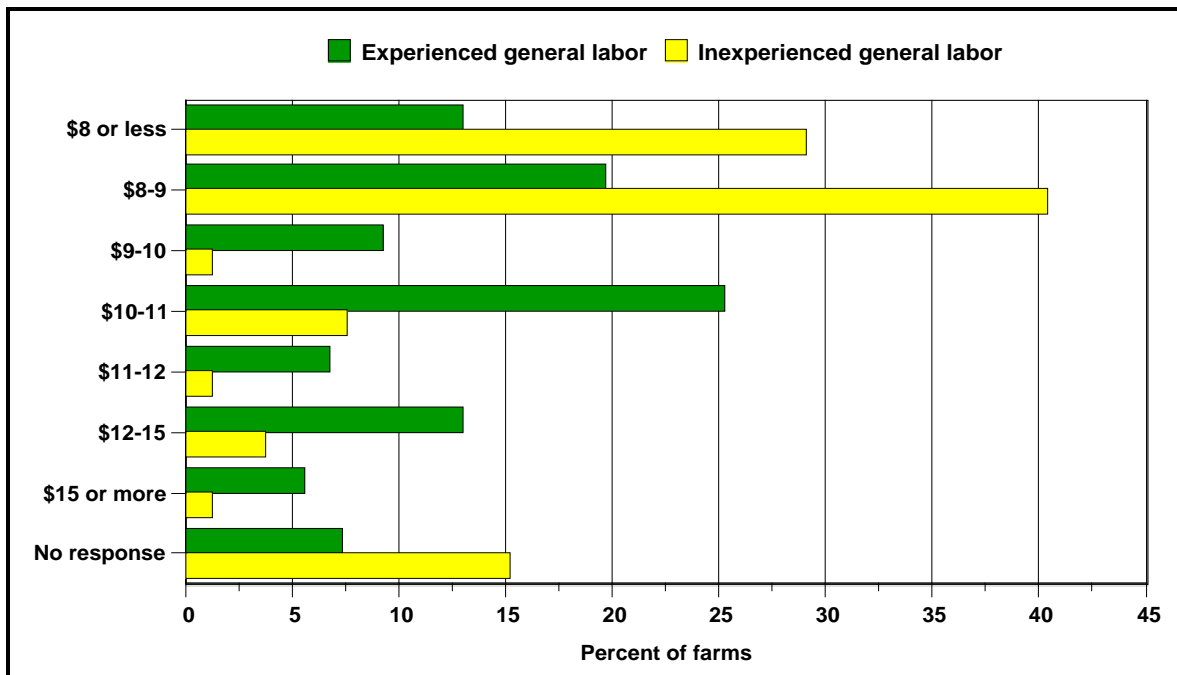
**Figure 6: Average Hourly Rate Paid for Milkers and General Laborers - Average hourly wage rate for New York dairy farms, 2009**



**Figure 7: Distribution of Hourly Wages Paid to Experienced and In-experienced Milkers - Distribution of average hourly wages paid to milkers, New York dairy farms, 2009**



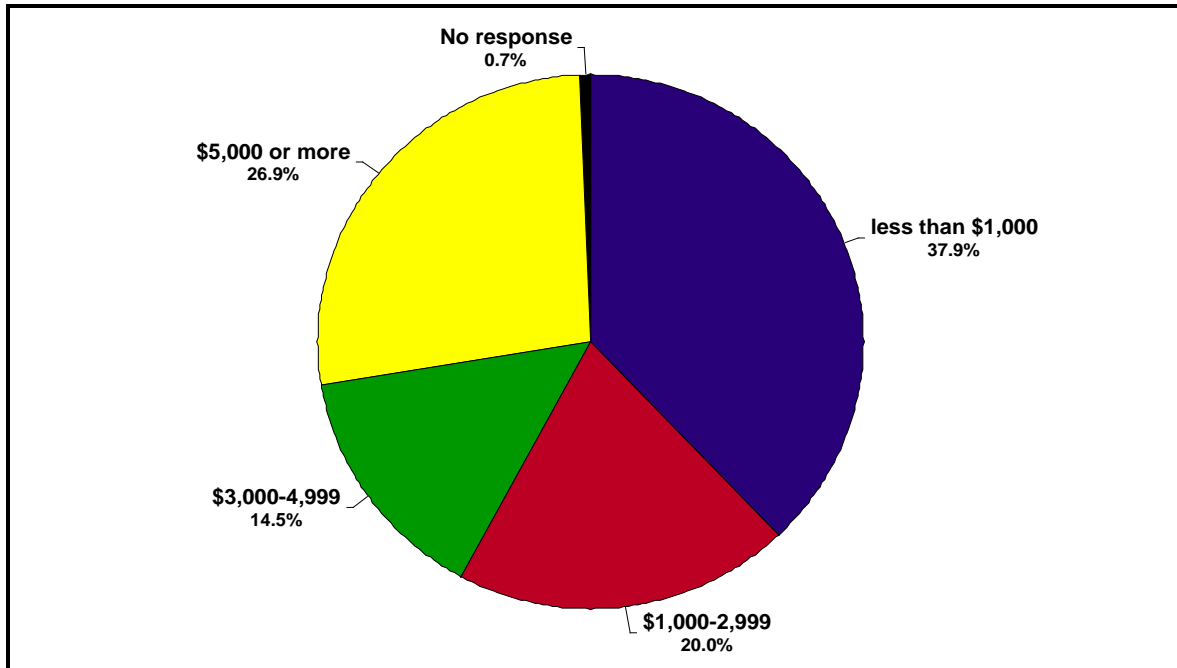
**Figure 8: Distribution of Hourly Wages Paid to Experienced and In-experienced General Laborers - Distribution of average hourly wages paid to general laborers, New York dairy farms, 2009**



**Table 5. Hourly wages reported in recent surveys of dairy farm employers**

Data source	Year	Hourly wages <u>Range or average</u>
Survey of New York Dairy Farm Employers	2009	\$9.71-\$9.89
P. Rosson et al (2009)	2008	\$9.97
USDA-NASS (2008a)	2007	\$7.75-\$7.80
J. Harrison et al (2009c)	2008	\$10.06
NYS Dept. of Labor (2011)	2009	\$8.94-\$13.66

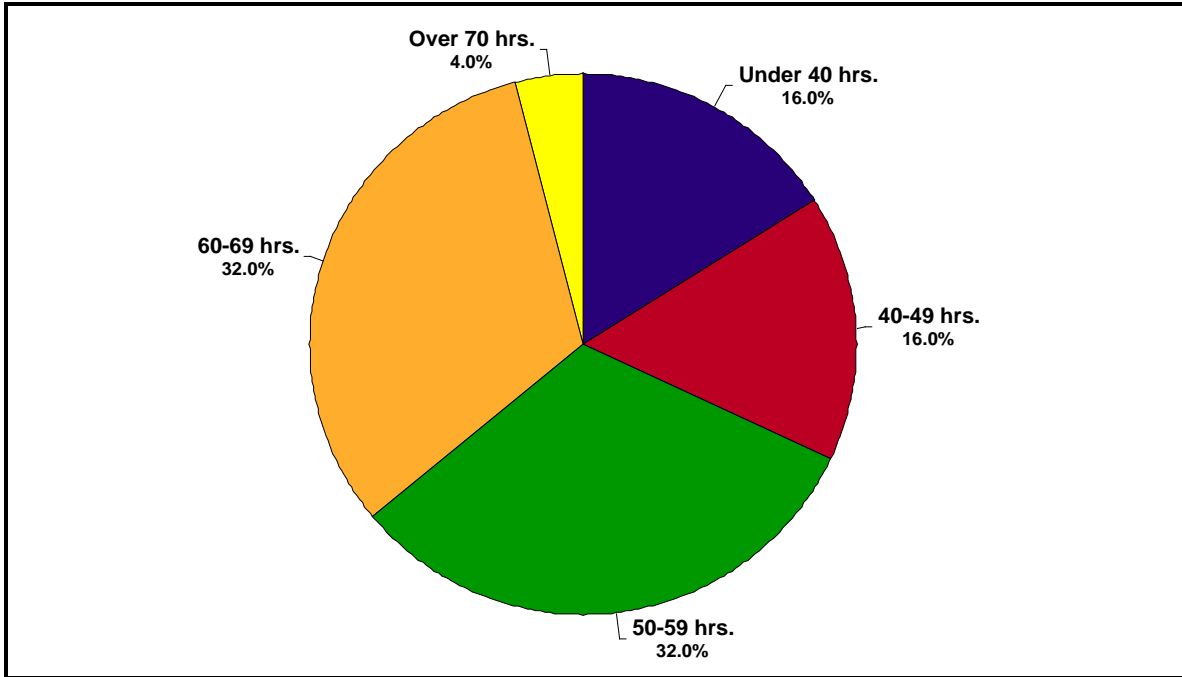
**Figure 9: Value of Benefits - Estimated annual value of benefits provided per hired worker, New York dairy farms, 2009**



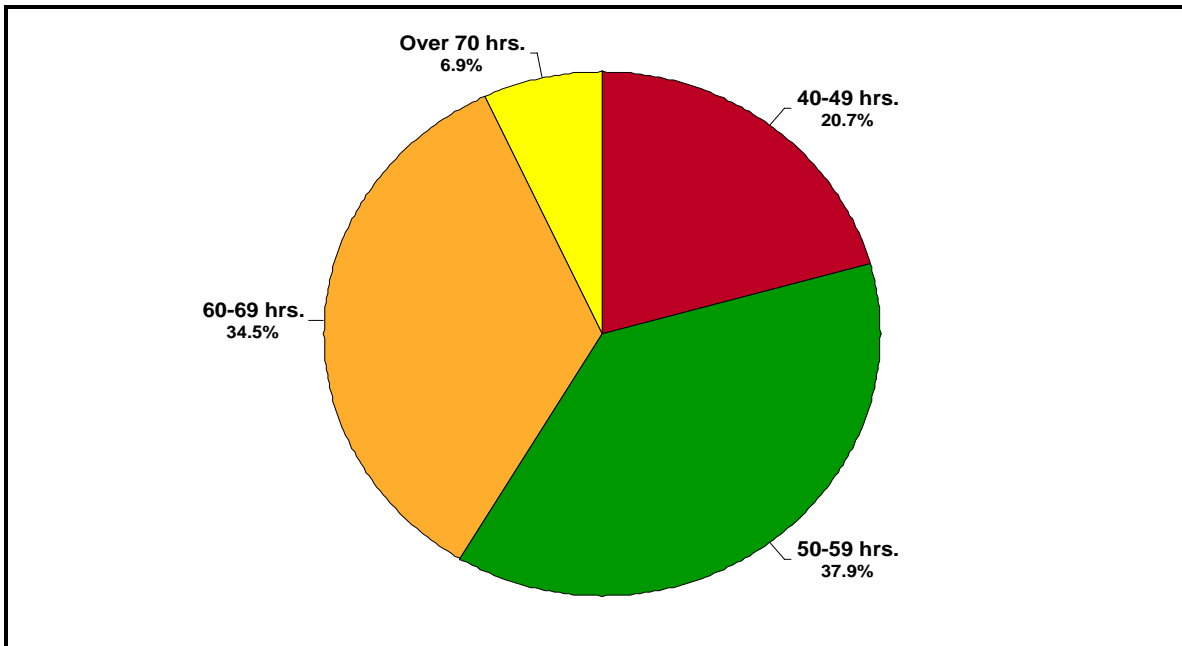
### **C. Dairy Managers: Hours, Wages and Benefits**

This section describes hours, wages and benefits of dairy farm managers, distinguishing between those with middle and top-level managerial responsibilities. It should be noted that respondents were not given any guidance on distinctions between middle and top managers; they defined each based on their own business situation. As dairy farms grow over time, employers recognize a commensurate need for capable middle managers. Management positions in dairy businesses, especially large ones, require long work weeks. Figure 10 shows that 68% of middle managers worked 50 hours or more per week. By contrast, 79% of top level managers worked 50 or more hours per week (Figure 11). When the average weekly hours of top managers, middle managers and milkers, and general laborers were compared, we found that the top managers work the most weekly hours on average at 56.2, followed by middle managers at 52.6 and general laborers at 44.5 (Figure 12). New York's dairy farm managers earn a wide range of salaries, as shown in Figures 13 and 14. As expected, top level managers earn substantially higher salaries than middle managers. For example, 38% of top level managers receive salaries of \$50,000 or more compared with 8% of mid-level managers who receive \$50,000 or more. The average value of benefits, both top and mid-level dairy managers received is shown in Figure 15. Over 65% of dairy managers on average received benefits totaling \$5,000 or more and 10% received benefits on average totaling \$15,000 or more.

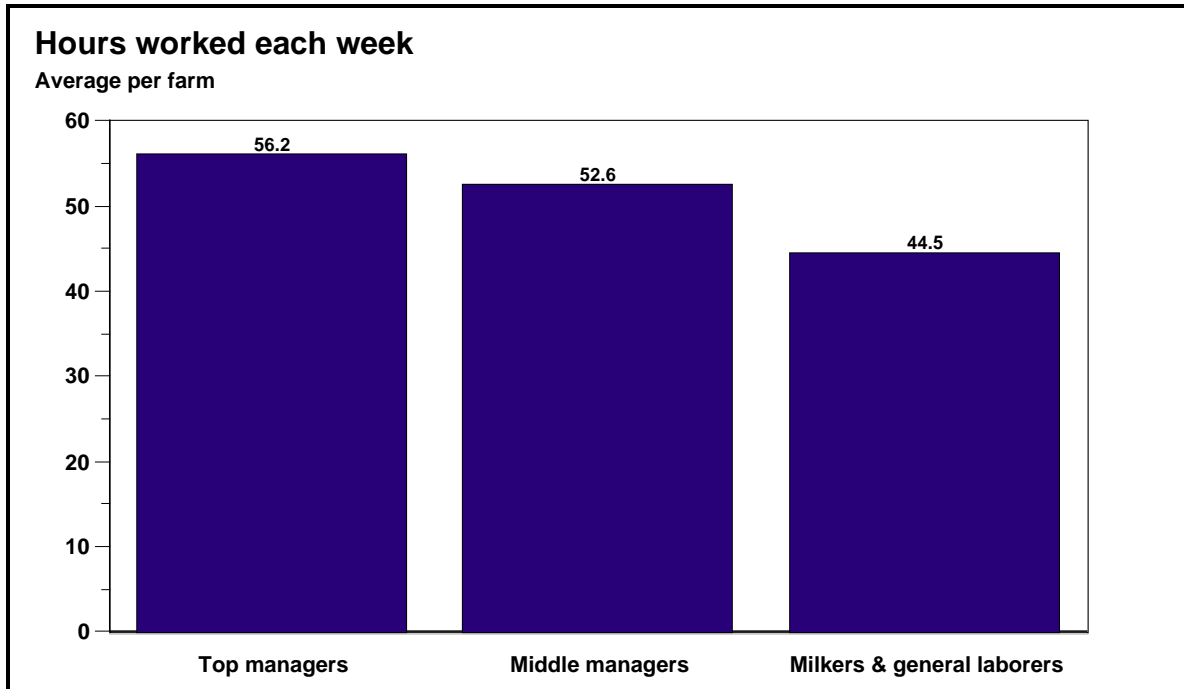
**Figure 10: Average Hours Worked Per Week for Middle Managers - New York dairy farms, 2009**



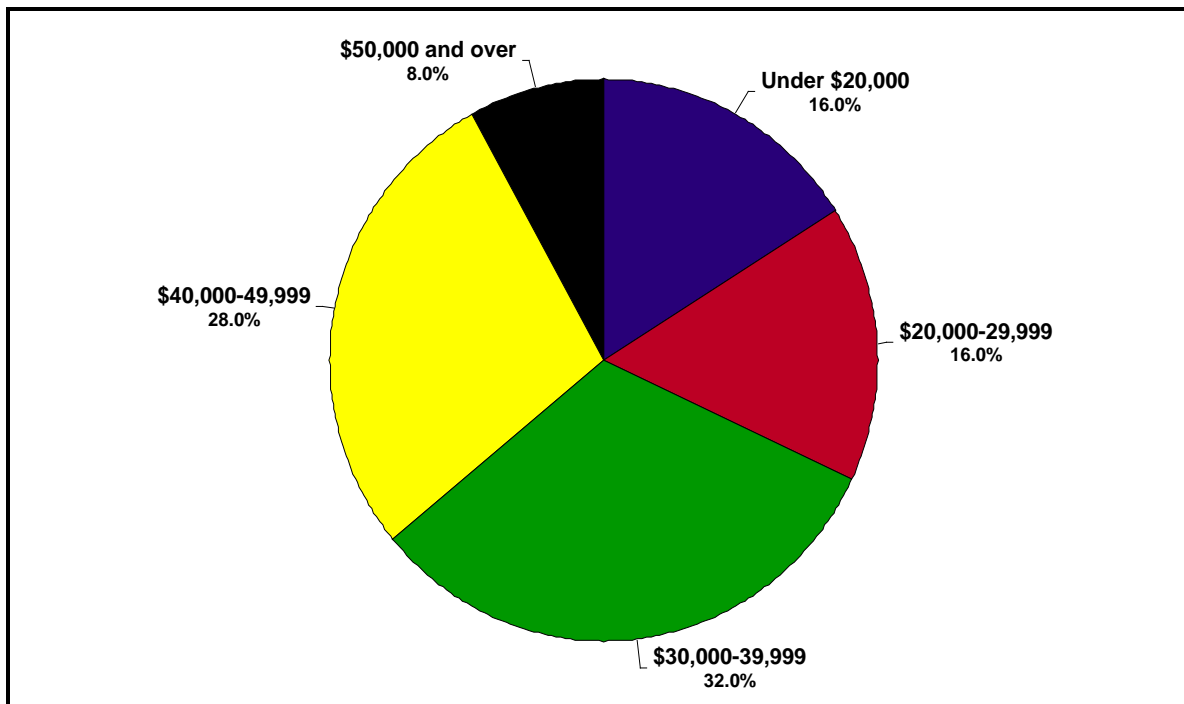
**Figure 11: Average Hours Worked Per Week for Top Managers - New York dairy farms, 2009**



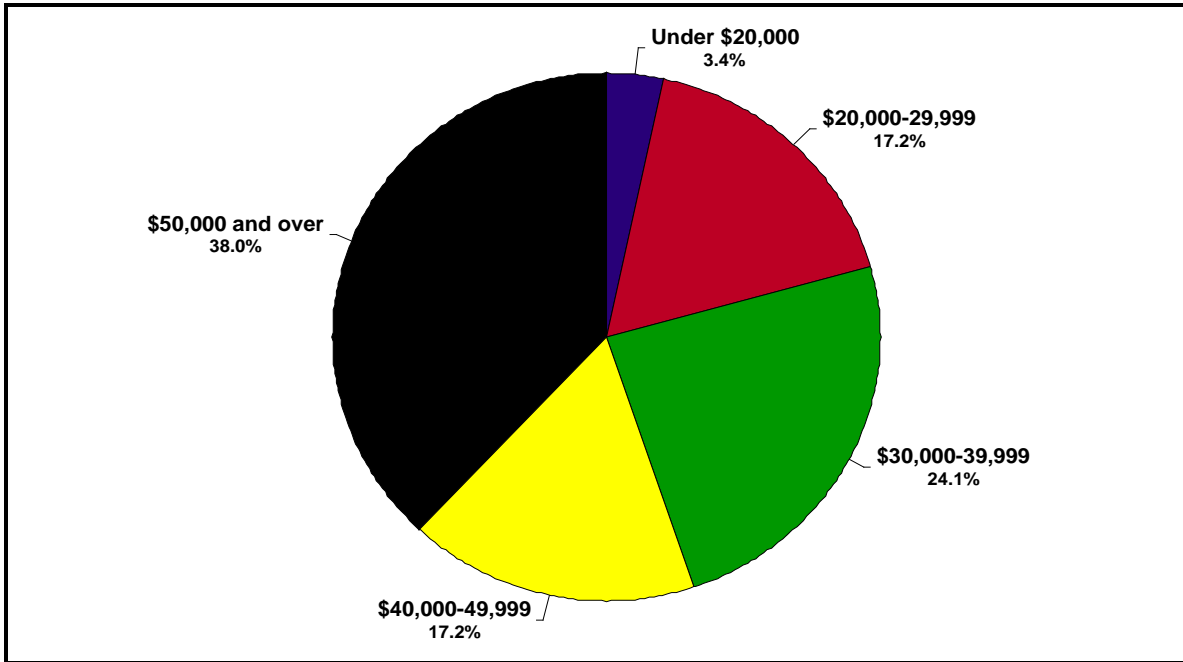
**Figure 12: Average Hours Worked Per Week by Type of Employee - New York dairy farms, 2009**



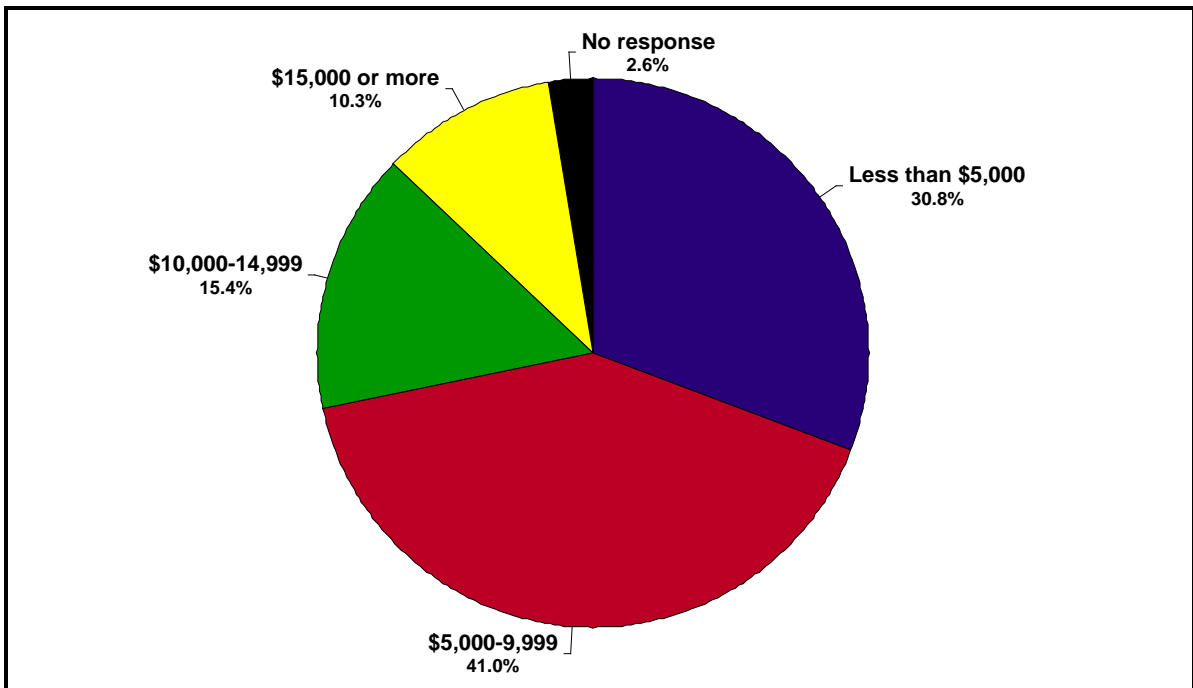
**Figure 13: Annual Salaries for Mid-level Hired Managers - New York dairy farms, 2009**



**Figure 14: Annual Salaries for Top-level Hired Managers - New York dairy farms, 2009**



**Figure15: Estimated Annual Value of Benefits Provided Per Hired Manager, New York dairy farms, 2009**



## **D. Hispanic Workforce Issues**

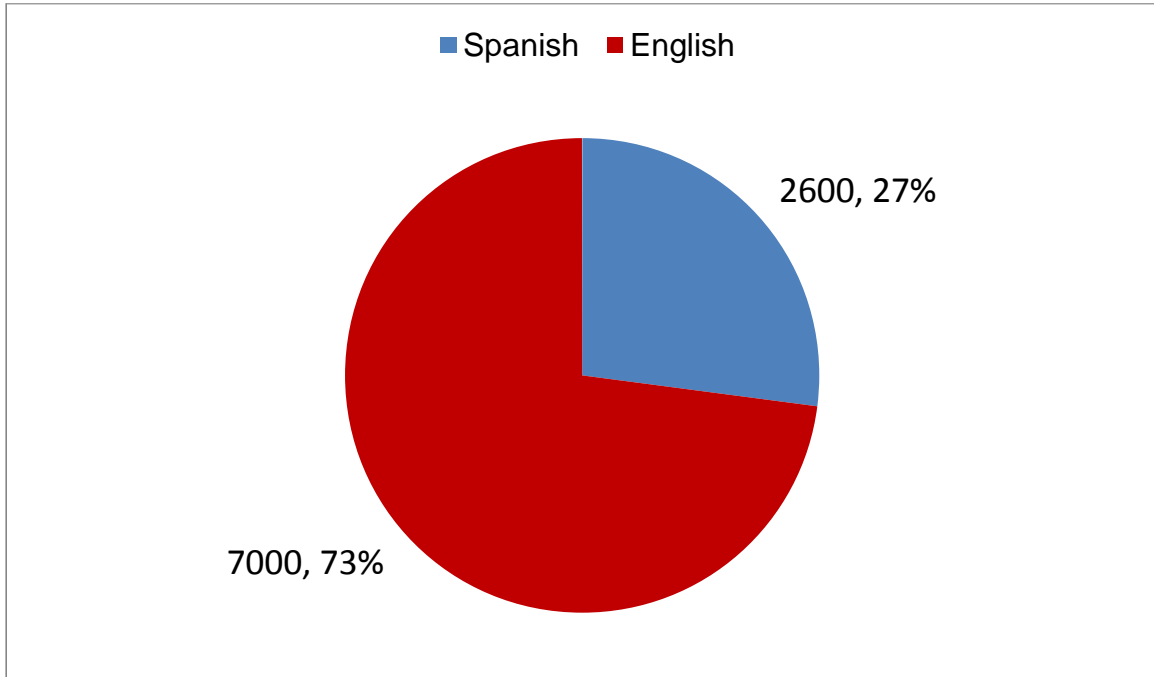
Since the mid-1990's the number of Hispanic workers on New York dairy farms has grown steadily. The NASS Wisconsin Field office was one of the first to report on the significance of Hispanic workers to the dairy industry in a 2007 study (USDA 2008). The Wisconsin study reported that there were a total of 4,220 Hispanic dairy workers employed in the Wisconsin dairy industry. By contrast, we gathered data in 2007 that suggested that about 2,900 workers in New York dairy farms were Hispanic (Maloney and Bills, 2008b). In this survey, we estimate that there were 2,600 Hispanic dairy workers in New York in 2009.

A comparison of results from the Wisconsin and New York surveys appears to reveal important differences in ethnicity until one reflects on the size and spatial distribution of the US dairy sector. New York State ranks third in fluid milk production behind Wisconsin but it is a distant third (USDA, 2009). In 2008, cow numbers in Wisconsin were nearly double those in New York State and the volume of milk production was 100% higher in Wisconsin. Looking at production levels, one would suspect that the Hispanic presence on New York State dairy farms is far less in absolute terms than it is in Wisconsin.

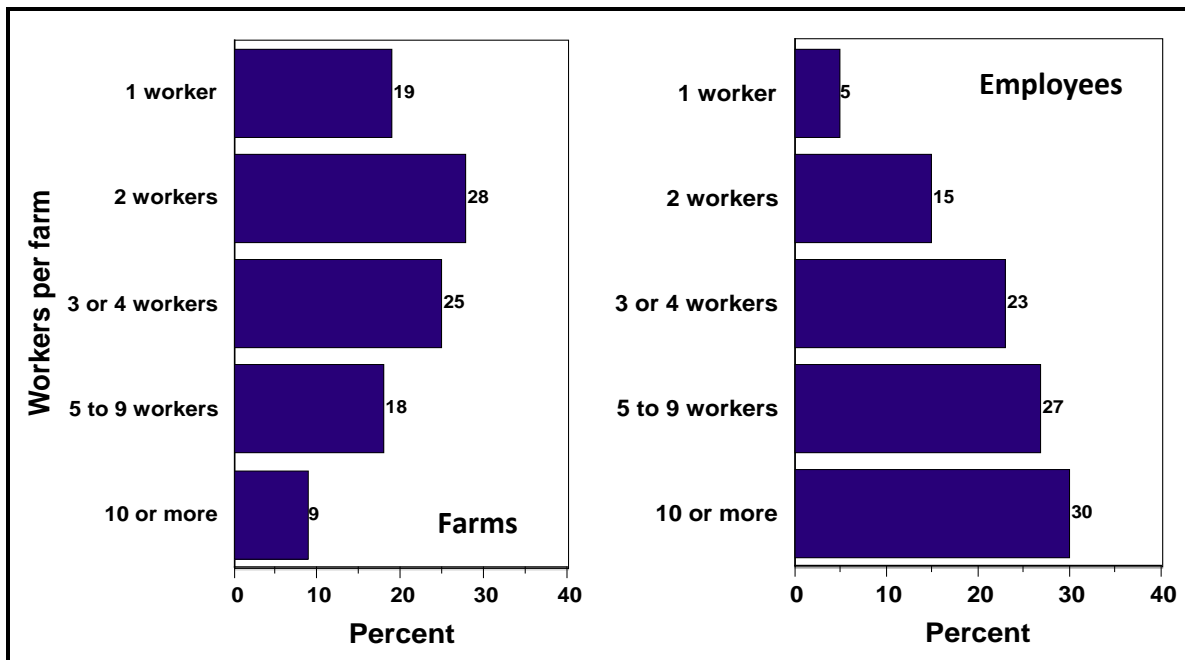
Figure 17 shows the concentration of Hispanic workers on New York dairy farms. For example, 19% of New York dairies with Hispanic workers hire only one Hispanic worker while at the other end of the spectrum, 9% of the dairies employing Hispanic workers had 10 or more workers. Looked at another way, 5% of the Hispanic workers work on dairies with only one worker while 30% of the Hispanic workers work on dairies with 10 or more Hispanic workers. Figure 18 shows the total number of Hispanic workers and non-Hispanic workers grouped by number of workers employed.

Figure 19 describes the language skills of the current Hispanic workforce. Only 27% of employers reported that their workers spoke English well. The dairy employers surveyed also acknowledged the need for services to assist Spanish speaking employees. In Figure 20, help with immigration issues was identified by employers as the most important factor for workers followed by English classes and access to interpreters. The survey also asked employers to identify sources to assist dairy managers in working with Spanish speaking employees. The top two needs identified were help with immigration issues and access to interpreters (Figure 21).

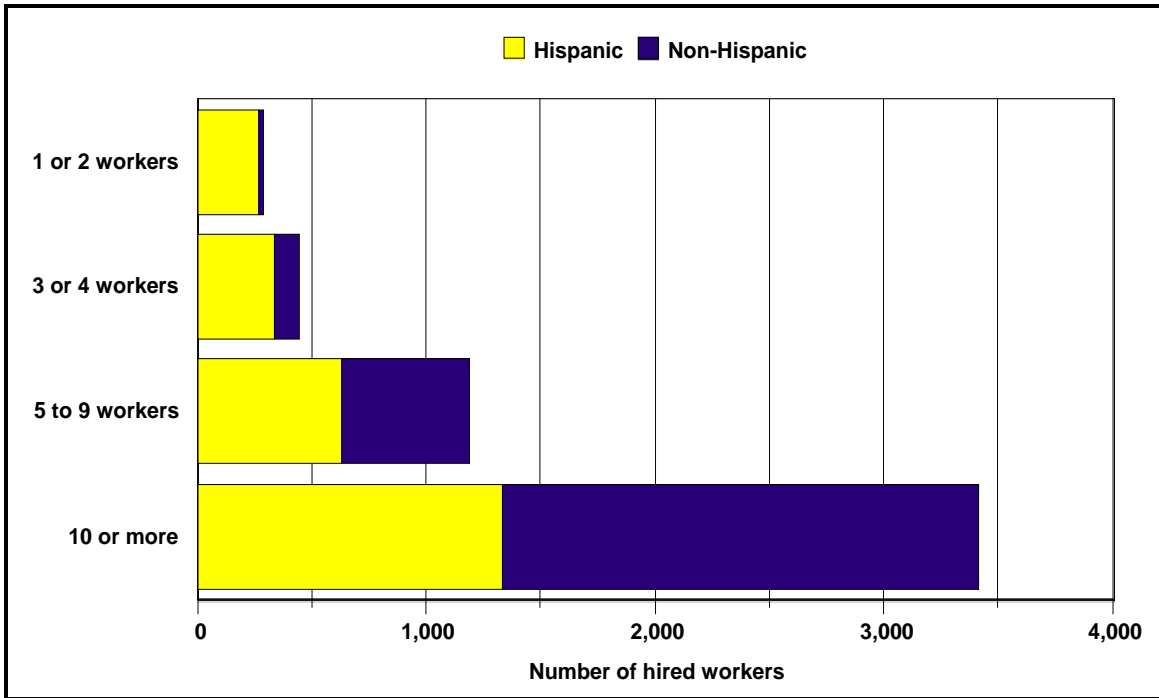
**Figure 16. Estimated Number of Workers with Spanish or English as a First Language - 9,600 hired workers total**



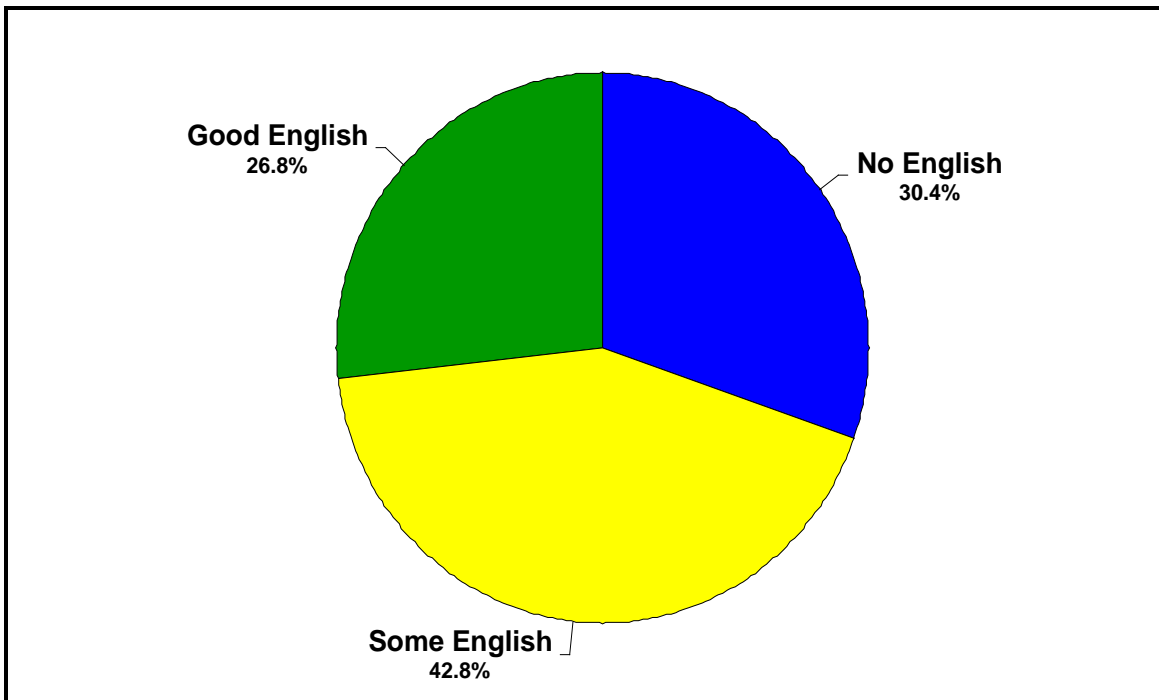
**Figure 17: Size Distribution of Peak Hispanic Labor Force - 2,600 workers on 670 New York State dairy farms, 2009**



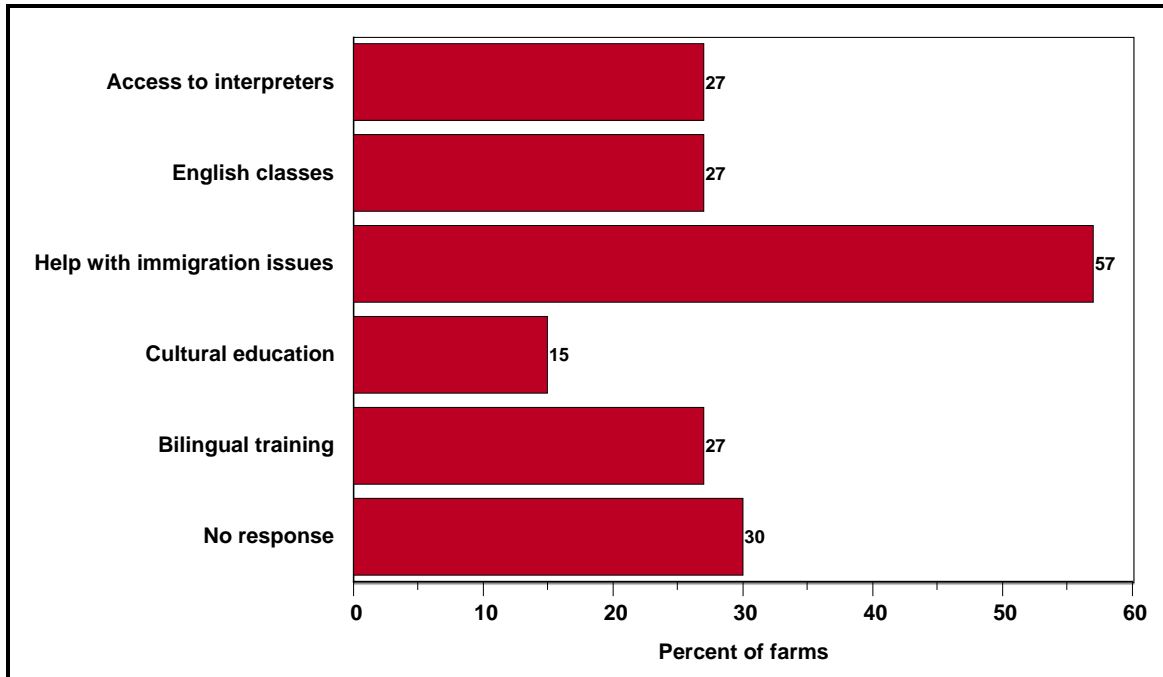
**Figure 18: Ethnicity of Peak Labor Force on Farms with One or More Hispanic Workers - 5,300 workers on 670 New York State dairy farms, 2009**



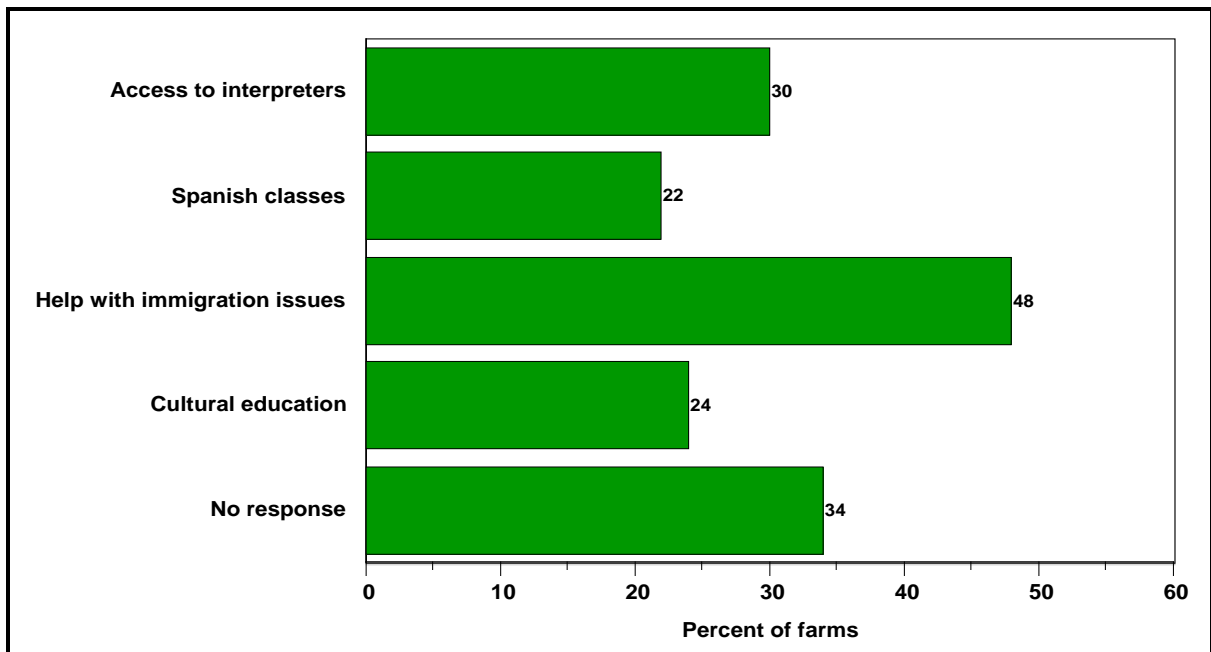
**Figure 19: Language Skills of Hispanic Workers - 2,600 workers on 670 New York State dairy farms, 2009**



**Figure 20: Services Needed to Assist Spanish Speaking Employees - 670 New York State dairy farms (multiple responses allowed), 2009**



**Figure 21: Services Needed to Assist Farm Managers Who Work with Spanish Speaking Employees - 670 New York State dairy farms (multiple responses allowed), 2009**



## **E. Policy Issues**

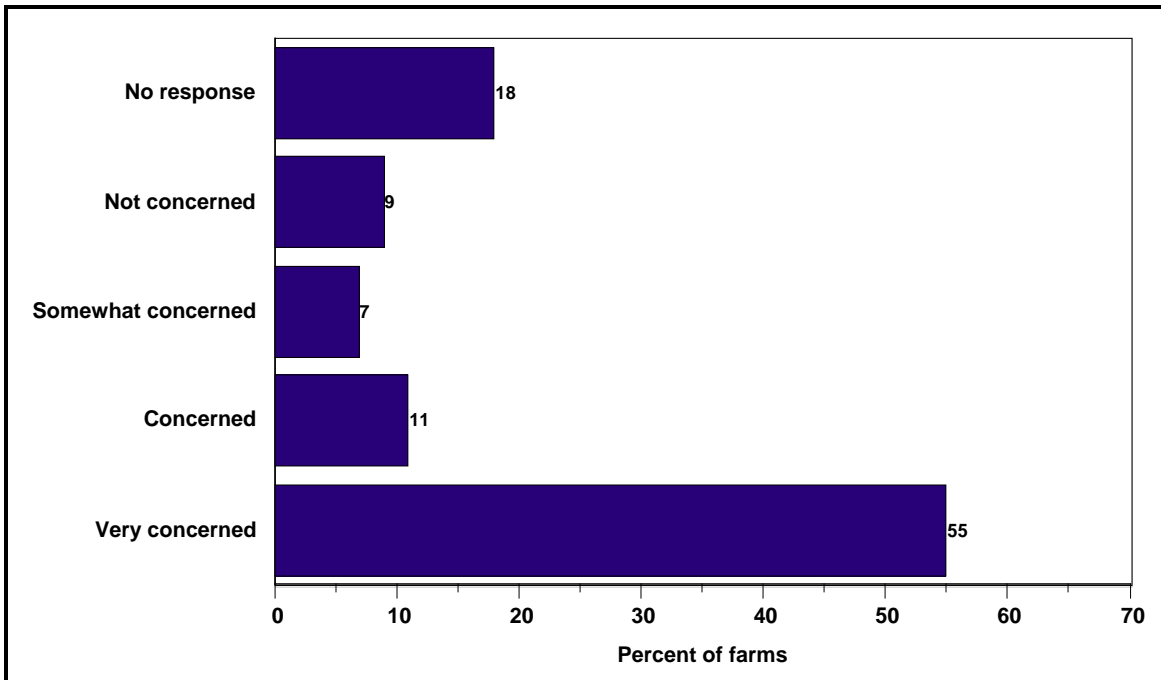
One of the primary objectives of this study to inform the State and Federal policymaking process as it affects agricultural labor. On the State level, New York lawmakers in the past two years have debated policies that would allow collective bargaining and overtime pay on New York farms. On the Federal level, national immigration reform policy would have a major impact on agricultural producers in New York State. Survey participants were asked their opinions regarding both of these policy issues.

Farmers were asked how concerned they would be if their employees were allowed to form unions and engage in collective bargaining. A total of 73% expressed concern with 55% indicating they were very concerned (Figure 22). In the past two years State legislators have proposed overtime pay at three different levels. The first proposal mandated overtime pay at the rate of time and one half after 40 hours per week. A later proposal mandated overtime pay at the rate of time and one half after 60 hours per week, with a change to 55 hours after two years. Based on these three proposals, survey participants were asked how concerned they would be if they were required to pay overtime. When asked how concerned they would be if they were required to pay overtime after 40 hours per week, 65% indicated that they would be very concerned (Figure 23).

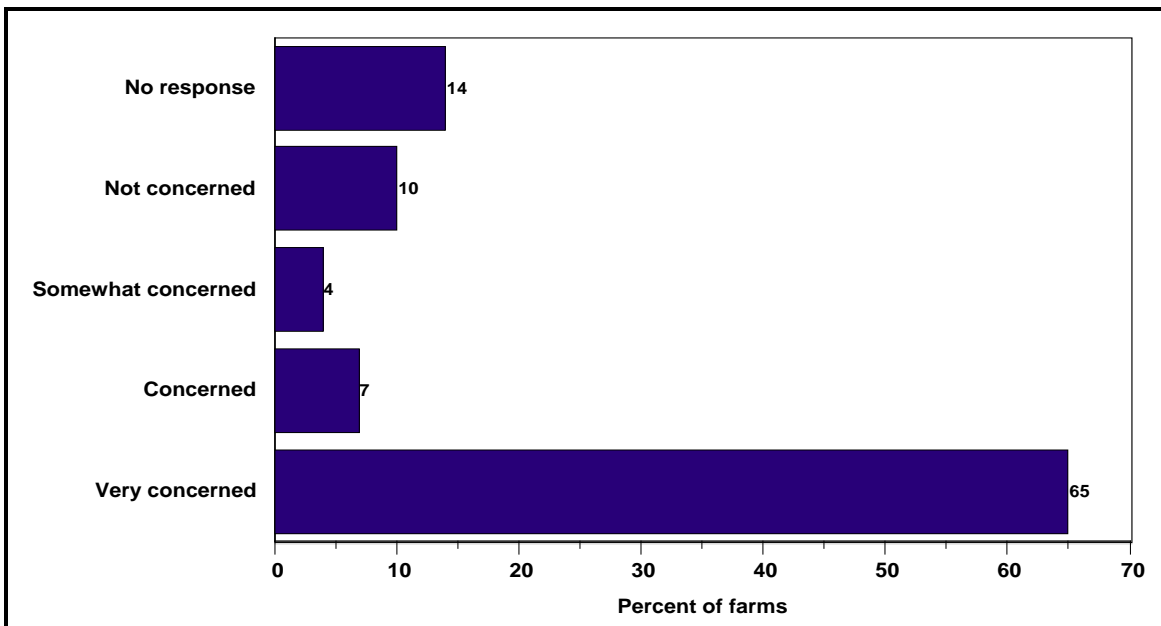
When asked about paying overtime after 55 hours per week, 54% said they were very concerned (Figure 24) as compared to 45% who said they would be very concerned if they had to pay overtime after 60 hours per week (Figure 25). Figure 26 summarizes the average attitudinal scores relating to collective bargaining and the three overtime categories. It is important to note that farmer concern about overtime pay is still substantial even after 60 hours per week when added costs would be considerably lower than if overtime were required after 40 hours per week.

Survey participants were asked to rate the importance of immigration reform options; those who employed Hispanic workers rated the policy options more important than those who didn't (Figure 27). Survey respondents who hire Hispanic workers believed a guest worker program to be only slightly more important than overall immigration reform. A path to citizenship was viewed as slightly less important than either overall reform or a guest worker program.

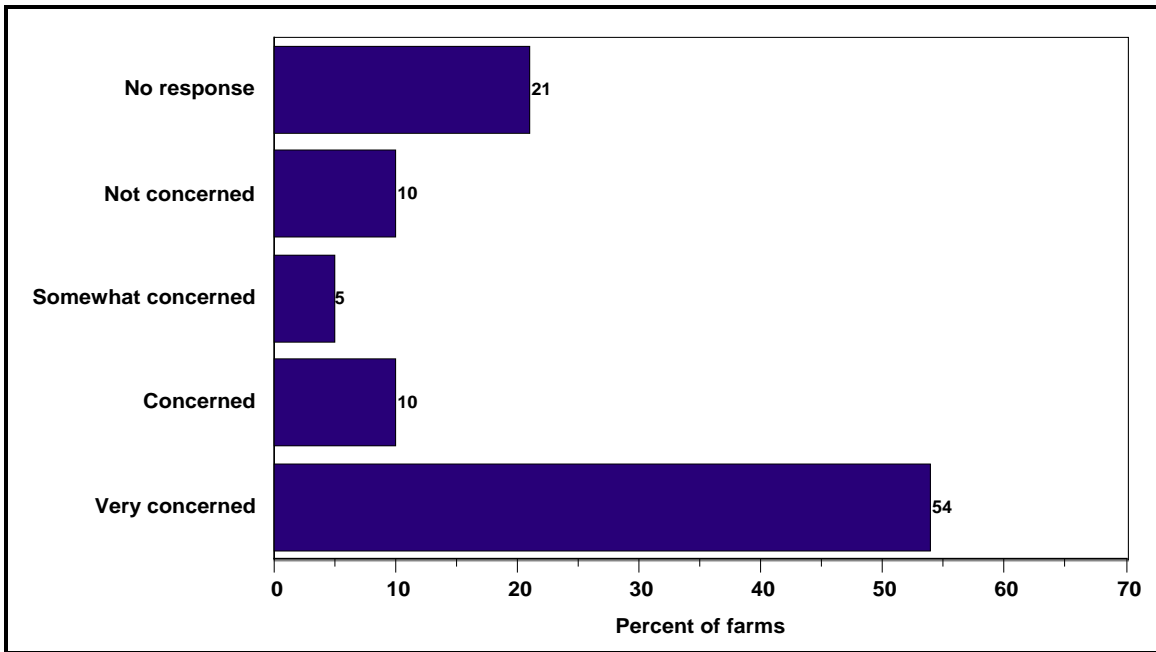
**Figure 22: How Concerned Would You Be If State Law Allowed Your Workers The Right To Form Unions And Engage In Collective Bargaining? - 2,100 New York dairy farms, 2009**



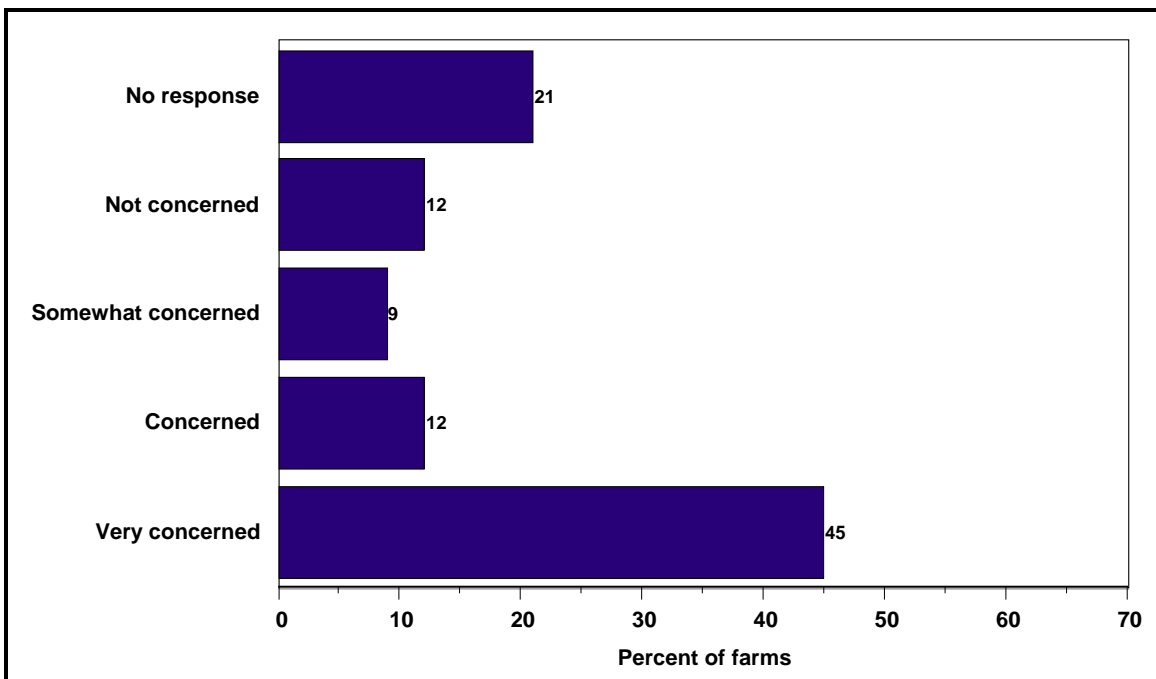
**Figure 23: How Concerned Would You Be If State Law Required You To Pay Overtime After 40 Hours Per Week? - 2,100 New York dairy farms, 2009**



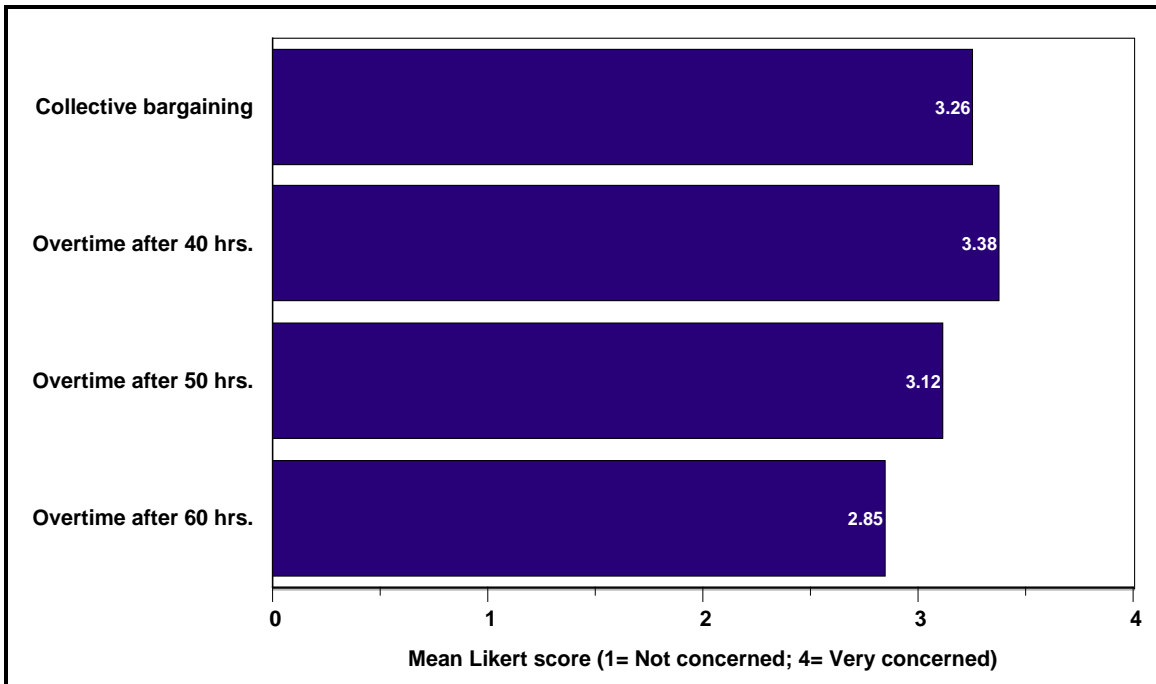
**Figure 24: How Concerned Would You Be If State Law Required You To Pay Overtime After 55 Hours Per Week? - 2,100 New York dairy farms, 2009**



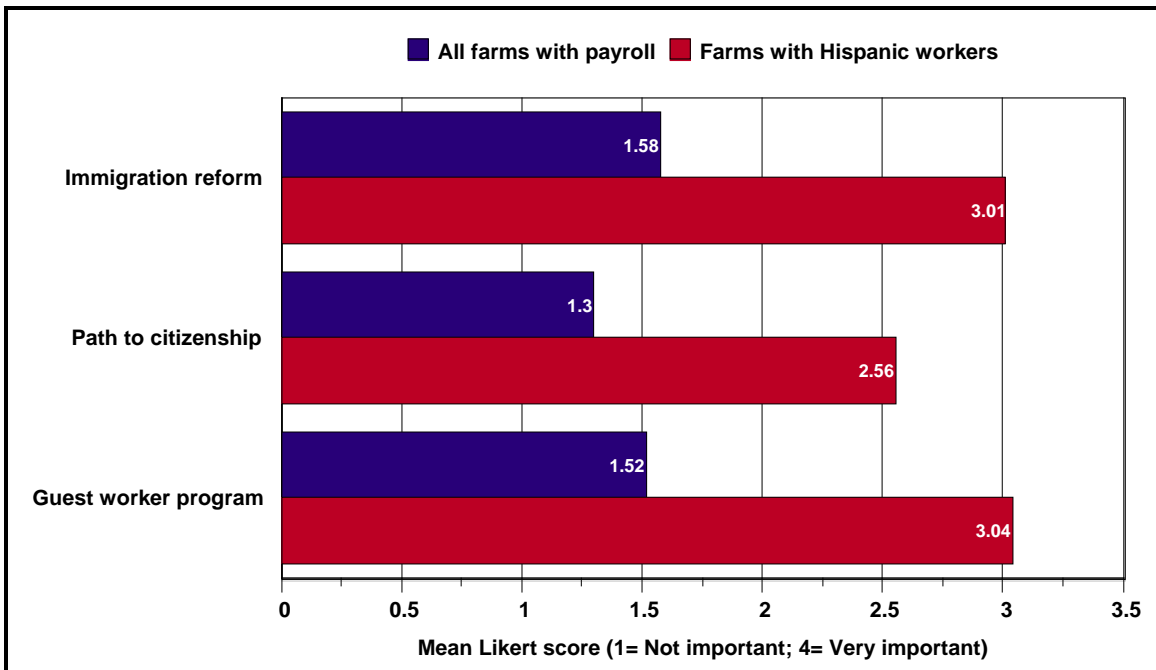
**Figure 25: How Concerned Would You Be If State Law Required You To Pay Overtime After 60 Hours Per Week? - 2,100 New York dairy farms, 2009**



**Figure 26: Average Scores on Employer Attitudes Toward Proposed Changes in State Law - 2,100 New York dairy farms, 2009**



**Figure 27: Average Scores on Employer Attitudes Toward Changes in Federal Immigration Policies, 2,100 New York dairy farms, 2009**



## **Discussion & Implications**

Collecting information on agricultural workers is always challenging because of the nature of the workforce and the number of variables that must be considered. Farm work is often seasonal and the workforce transient. In addition, farm workers may include family members, contract workers, hired employees, managers and immigrants. For this study we identified three important areas of focus, hired employees (excluding family members and contract workers), Hispanic employees and employees present at the annual workforce peak. Estimating the peak workforce has seldom been done in other studies, but was done here to help us better understand the maximum number of employees needed for agricultural production work. This study focuses on five important areas; workforce population estimates, employee wages, benefits and hours worked, Hispanic workforce issues, attitudes regarding proposed State farm labor law changes and proposed immigration reform policies.

### **1) Agricultural Workforce Population Estimates**

Agricultural workers in the fruit, vegetable and dairy sectors make up the majority of the workforce in New York's production agriculture. Using a stratified random sample and expanding the data to the entire population we arrived at a total number of 5900 farms (Figure 1) and 32,200 farm workers employed at the peak work period (Figure 2). This is a lower number than that reported in the US Census of Agriculture likely because family workers and contract workers were not counted here. As expected, we found that the majority of workers are concentrated on larger farms (Figure 4). The study showed that 79% of the farms surveyed had farm product sales of \$100,000 or more in 2009 (Figure 3).

### **2) Farm Employee Wages, Benefits and Hours Worked**

In the absence of annual wage and benefit studies for New York agriculture, occasional studies that collect wage and benefit data are extremely valuable. Farm employers are always interested in how competitive their compensation rates are compared to other farms. Also, considering recent farm labor policy discussions on both the State and Federal levels, up-to-date wage and benefit information provides policymakers with important facts about how employees are paid. This is particularly helpful, for example, when discussing overtime pay proposals at the State level and wage rates required by the H-2A (a seasonal guest worker program) at the Federal level.

We collected wage rates on four categories of dairy farm workers; experienced milkers with an average hourly pay rate of \$9.71, inexperienced milkers with an average hourly pay rate of \$8.58, experienced general laborers with an average hourly pay rate for \$9.89, and inexperienced general laborers with an average hourly pay rate of \$8.39 (Figure 6). The survey questions regarding pay rates were replicated from a 2007 Wisconsin dairy study conducted by NASS. By contrast, the corresponding wage rates found in the Wisconsin survey were as follows: experienced milkers \$9.60 per hour, inexperienced milkers \$7.75 per hour, experienced general laborers \$9.80 per hour and inexperienced general laborers \$7.80 per hour (USDA 2008). It should be noted that even though the

wage rates from both states are similar, the wage rates in Wisconsin are effectively higher when one considers that the New York data was collected two years later.

There is much debate about how well farmworkers in the U.S. are paid. When discussing farm employee wage rates, it is important to take into consideration hours worked and benefits. We found that more than 50% of the dairy workers in this study worked 50 hours or more per week (Figure 5). Employers were also asked to estimate the value of benefits paid to workers. Of the employers surveyed, 38% provided benefits valued at less than \$1000 per year, 35% provided benefits valued from \$1000-\$4999 per year and 27% provided benefits valued at \$5,000 per year or more (Figure 9). Data on individual benefits were not collected in this survey; however a 2004 study of Hispanic dairy workers in New York State in 2004 indicates that housing was provided in more than 90% of cases (Maloney and Grusenmeyer, 2005). It is likely that in cases where employee benefits are \$5,000 per year or more, some type of housing has been provided.

The farm managers survey also provided information regarding employees who held management positions on New York dairy farms. As dairy businesses grow over time, the need for capable middle managers increases. Data was collected on two levels of management: mid-level managers and top level managers. As expected, top-level managers earn substantially higher salaries than mid-level managers (Figures 13 and 14). For example, 8% of mid-level managers earned \$50,000 per year or more as compared with 38% of top-level managers who earned \$50,000 per year or more. Farm owners are continually challenged to attract the best managers at salary levels that will be competitive with non-farm businesses.

### **3) Hispanic Worker Issues**

New York dairy farm employers began hiring Hispanic dairy workers in the mid-1990s and numbers have steadily increased since then. One important piece of information missing from most prior surveys is an estimate of the number of Hispanic workers employed on New York dairy farms. The survey data shows that there are an estimated 2,600 Hispanic dairy workers employed in New York (Figure 16). This contrasts with 4,220 dairy workers reported in a 2007 Wisconsin survey (USDA 2008). Figure 17 shows that 30% of Hispanic workers work primarily on large farms (those with 10 or more total employees). However, the workers also have a presence on mid-sized and smaller dairies. In both the Wisconsin and New York surveys, dairy farm employers were asked about the level of English proficiency among their Spanish-speaking employees. English proficiency was reported to be slightly better in New York than in Wisconsin. New York area employers reported that 30% of their workers spoke almost no English compared to 45% in Wisconsin. Also, in New York 27% of the dairy employers reported that their Spanish-speaking workers spoke English well (Figure 19) as compared to 18% in Wisconsin (USDA 2008). This difference is understandable since the New York survey was conducted two years after the Wisconsin survey and one could reasonably expect at least incremental improvement in Hispanic workers' English skills each year. The results of both studies suggest that much more work is needed to help Spanish-speaking workers improve their English skills. In those businesses where

English language skills among Spanish speaking employees are modest, management level English proficiency and the assistance of interpreters becomes much more important.

When farm employers were asked what services were needed to assist Spanish-speaking employees, 57% of employers in the New York survey listed help with immigration issues; 27% also listed access to interpreters, English classes and bilingual training as employee needs (Figure 20). When asked what assistance managers needed to work more effectively with their Spanish-speaking employees 48% of New York dairy employers said help with immigration issues, 30% said access to interpreters and 22% said Spanish classes. Based on the survey results it seems clear that farm employers are primarily concerned about two very important issues relating to their Hispanic employees: immigration issues and language issues. Based on anecdotal observations, New York dairy farm managers have made great strides to overcome the language barrier. They provide job instructions and training in Spanish and many have learned some Spanish themselves. However, based on the survey results, more attention to language issues is still needed. It is also important to note that public perceptions of the importance of English proficiency may significantly influence government immigration policy in the future. A number of Federal immigration reform proposals include a provision that unauthorized immigrants be legally required to demonstrate English proficiency to be eligible for a path to citizenship. Proposals such as these may provide further incentive for workers to learn English.

#### **4) Proposed State Labor Law Changes**

In 2009 the New York State Legislature introduced the Farmworkers Fair Labor Practices Act and, if passed, the bill would have made major changes in the laws that regulate farm employment. The legislation was narrowly defeated, but pressure from farm labor advocates to extend collective bargaining rights and overtime pay to farm employees is likely to continue. Because this legislation was pending at the time the survey was designed, it was decided to add questions that would help document farmer attitudes toward granting collective bargaining rights and overtime pay to farm employees.

When farm employers were asked how concerned they would be if the State allowed their workers the right to form unions and engage in collective bargaining, the respondents indicated a high level of concern (Figure 22). From a union organizing perspective, New York agriculture is a relatively small economic sector and business premises are geographically dispersed. Nonetheless, if workers have the option to form unions, farmers fear that union organizers would become active in the State. Anecdotal reports from farm employers indicate that they view the potential of unionization as a direct impediment to management. They fear that they would lose their flexibility to manage and that the farm's employer-employee relationships would turn impersonal and adversarial. There were several versions of the proposed legislation. The bill that was voted down on August 3, 2010 would have granted collective bargaining rights to employees working on New York farms that sell more than \$650,000 in farm products annually.

When asked how concerned they would be if State law required them to pay overtime, respondents indicated a high level of concern. There were several different overtime pay proposals. The original bill would have required overtime pay after 40 hours per week. The bill that was voted down on August 3, 2010 would have required overtime pay after 60 hours per week and then beginning in 2013 overtime pay after 55 hours per week. The survey questions were designed to capture farm employer attitudes regarding these three overtime pay scenarios. When asked how concerned they would be of State law required them to pay overtime after 40 hours, 65% of respondents indicated that they were very concerned. This compares with 54% of respondents who said they would be very concerned if they were required to pay overtime after 55 hours per week and 45% who said they would be very concerned if they had to pay overtime after 60 hours per week (Figures 23, 24, 25). Media coverage of the Farmworkers Fair Labor Practices documents the dairy farm employers' position that the bill would increase their labor costs dramatically. The bill was also introduced during a period of low milk prices and any increase in costs was viewed by farm managers as detrimental to their business.

Given the long history and contentious battle over agricultural labor exemptions like collective bargaining and overtime pay in New York State, it is likely that the conflict over these issues will continue. This is the first study in New York to collect data on farmer attitudes regarding overtime pay and collective bargaining. Having data that reflects the concerns of farm employers will help to inform the discussion in the likely event that similar legislation is introduced in the future.

## **5) Immigration Reform**

Immigration concerns have become a major issue for New York farm employers and Hispanic workers. Figures 20 and 21 shows that dairy employers and their Hispanic workers feel that help with immigration issues is the area of greatest need. There are many Hispanic immigrants working on New York farms and it is likely that a portion of these immigrants are not authorized to live and work in the United States. In 2006 the PEW Hispanic Center reported an estimated 11.5 to 12 million unauthorized individuals in the U.S. (Passel, 2006). More recent evidence indicates that numbers of unauthorized individuals are currently lower (Passel and Cohn, 2010). In recent years immigration enforcement activities across New York State have created a great deal of anxiety for farm employers and their workers. Many farm employers feel that the best solution to the uncertainties created by immigration enforcement on New York farms is a new set of Federal immigration policies that will allow employees a path to citizenship as well as a policy that will provide a streamlined guest worker program. Survey respondents who currently have Hispanic employees rated the importance of a national immigration reform policy, a path to citizenship and a guest worker program. While all are important, a path to citizenship was rated slightly less important (Figure 27). Not all Hispanic immigrants want to be citizens or live in the United States over the long term. Rather they want the opportunity to work in the United States temporarily to support family members in their home country (Maloney and Grusenmeyer, 2005). From the farmer's perspective the most practical solution to the unauthorized immigrant problem is a new set of Federal immigration policies. Also, from the farmer's perspective, increased immigration

enforcement in the absence of a workable policy creates substantial labor supply uncertainty if a farm relies on immigrant workers as its primary labor pool.

## **Summary**

Farm managers today are facing a variety of labor related challenges. On New York dairy farms today labor is the second largest business expense after purchased feed (Knoblauch et al, 2009). An adequate supply of productive and motivated workers is essential to maintain a viable dairy industry in New York State. The challenges that dairy employers face are both internal and external to the business. Internal factors include the development of competitive wage and benefit packages, appropriate work schedules, and creating a work environment where employees will stay with the business over the long term and be productive, satisfied and motivated. Externally, dairy farmers and the organizations that advocate for them face potential State policy changes relating to overtime pay and collective bargaining and Federal policies relating to immigration reform and guest worker programs. Successful farm human resource management will increasingly require managers to adopt top-notch human resource management practices including competitive wages and benefits, as well as to actively support government policies that help ensure an adequate supply of qualified workers.

## References

- Bills, N., B. F. Stanton. 2009. Census of Agriculture Highlights New York State, 2007. EB 09-09, Department of Applied Economics and Management, Cornell University, July.
- Harrison, J., S. Lloyd, and T. O’Kane. 2009a. Briefing no. 1: Overview of Immigrant Workers on Wisconsin Dairy Farms. Changing Hands: Hired Labor on Wisconsin Dairy Farms, University of Wisconsin – Madison, February.
- Harrison, J., S. Lloyd, and T. O’Kane. 2009b. Briefing no. 2: A Look into the Lives of Wisconsin's Immigrant Dairy Workers. Changing Hands: Hired Labor on Wisconsin Dairy Farms, University of Wisconsin – Madison, February.
- Harrison, J., S. Lloyd, and T. O’Kane. 2009c. Briefing no. 3: Dairy Workers in Wisconsin: Tasks, Shifts, Wages, and Benefits. Changing Hands: Hired Labor on Wisconsin Dairy Farms, University of Wisconsin – Madison, February.
- Harrison, J., S. Lloyd, and T. O’Kane. 2009d. Briefing no. 4: Immigrant Dairy Workers and Rural Wisconsin Communities. Changing Hands: Hired Labor on Wisconsin Dairy Farms, University of Wisconsin – Madison, July.
- Harrison, J., S. Lloyd, and T. O’Kane. 2009e. Briefing no. 5: Legal Issues Facing Immigrant Dairy Workers in Wisconsin. Changing Hands: Hired Labor on Wisconsin Dairy Farms, University of Wisconsin – Madison, July.
- Kandel, W. 2008. Profile of Hired Farmworkers, a 2008 Update. Economic Research Report Number 60, Economic Research Service, US Department of Agriculture, July.
- Knoblauch, Wayne A., Linda P. Putnam, Jason Karszes and Jessica Anderson. 2009. Dairy Farm Business Summary: New York 2008. R.B. 2009-01. Department of Applied Economics and Management, College of Agriculture and Life Sciences, Cornell University, November.
- Maloney, T. and D. Grusenmeyer. 2005. Survey of Hispanic Dairy Workers in New York State, RB 05-02, Department of Applied Economics and Management, Cornell University, February.
- Maloney, T. and N. Bills. 2008a. Farmer Perceptions of Labor Supply and Immigration Reform in New York State. Department of Applied Economics and Management, College of Agriculture and Life Sciences, Cornell University, Paper prepared for the conference on Immigration Reform: Implications for Farmers, Farm Workers, and Communities, Washington, D.C., May.
- Maloney, T. and N. Bills. 2008b. The New York State Agricultural Immigration and Human Resource Management Issues Study. RB 08-01, Department of Applied Economics and Management, College of Agriculture and Life Sciences, Cornell University, August.

Manthei, E. 2010. Economic Impacts and Implications of Foreign-Born Labor Reductions in Agriculture-Emphasis on Dairy Farms. Selected paper, Southern Agricultural Economics Association annual meeting, February.

New York State Department of Labor. 2011. Occupational Wages in New York State. Available at: <http://www.labor.state.ny.us/stats/lswage2.asp>

Parra, P. and M. Pfeffer. 2006. "New Immigrants in Rural Communities: The Challenges of Integration." *Social Text* 88 24 (3):81-98.

Passel, J. 2006. "The Size and Characteristics of the Unauthorized Migrant Population in the U.S." Research Report, Pew Hispanic Center, March 7.

Passel, J. and D. Cohn. 2009a. A Portrait of Unauthorized Immigrants in the United States. Research Report, Pew Hispanic Center, April 14.

Passel, J. and D. Cohn. 2009b. Mexican Immigrants: How Many Come? How Many Leave? Research Report, Pew Hispanic Center, July 22.

Passel, J. and D. Cohn. 2010. U.S. Unauthorized Immigration Flows Are down Sharply since Mid-Decade. Research Report, Pew Hispanic Center, September 1.

Pfeffer, M. 2008. "The Underpinnings of Immigration and the Limits of Immigration Policy." *Cornell International Law Journal* 41(1):83-100.

Pfeffer, M. and P. Parra. 2004. Immigrants and the Community. Development Sociology Department, College of Agriculture and Life Sciences, Cornell University.

Pfeffer, M. and P. Parra. 2005a. Immigrants and the Community: Community Perspectives. Development Sociology Department, College of Agriculture and Life Sciences, Cornell University.

Pfeffer, M. and P. Parra. 2005b. Immigrants and the Community: Former Farmworkers. Development Sociology Department, College of Agriculture and Life Sciences, Cornell University.

Pfeffer, M. and P. Parra. 2008. Community Response to Immigrants in New Destinations. Development Sociology Department, College of Agriculture and Life Sciences, Cornell University, Paper prepared for the conference on Immigration Reform: Implications for Farmers, Farm Workers, and Communities, Washington, D.C., May.

Rosson, P., F. Adcock, D. Susanto and D. Anderson. 2009. The Economic Impacts of Immigration on US Dairy Farms. Report prepared under contract for National Milk Producers Federation. Texas A&M University and the National Milk Producers Federation, June.

Stromsdorfer, E., Wines, J., and S. Bailey. 2008. Agricultural Workforce in Washington State: The Question of a Structural Shortage of Agricultural Labor in Washington State, 2007. Paper presented at the Conference on Immigration Reform: Implications for Farmers, Farm Workers, and Communities, Washington, DC, May.

U.S. Census Bureau. 2008. Current Population Survey. Available at: <http://www.census.gov/cps/>

U.S. Department of Agriculture. 2008. The 2007 Dairy Producer Survey. National Agricultural Statistics Service, Wisconsin Field Office in cooperation with the Wisconsin Department of Agriculture, Trade and Consumer Protection. Available at: [http://www.nass.usda.gov/Statistics\\_by\\_State/Wisconsin/Publications/Dairy/dairyproducer2007.pdf](http://www.nass.usda.gov/Statistics_by_State/Wisconsin/Publications/Dairy/dairyproducer2007.pdf)

U.S. Department of Agriculture. 2009. Milk Production, Disposition, and Income: 2008 Summary. National Agricultural Statistics Service, Washington, DC. Available at: [http://future.aae.wisc.edu/collection/MilkProduction/mprod\\_2008\\_13.pdf](http://future.aae.wisc.edu/collection/MilkProduction/mprod_2008_13.pdf)

U.S. Department of Agriculture. 2010a. Agricultural Resource Management Survey (ARMS). Economic Research Service, Washington, DC. Available at: <http://www.ers.usda.gov/Data/ARMS/>

U.S. Department of Agriculture. 2010b. New York Annual Statistics Bulletin. National Agricultural Statistics Service, Washington, DC. Available at: [http://www.nass.usda.gov/Statistics\\_by\\_State/New\\_York/Publications/Annual\\_Statistical\\_Bulletin/index.asp](http://www.nass.usda.gov/Statistics_by_State/New_York/Publications/Annual_Statistical_Bulletin/index.asp)

U.S. Department of Agriculture. 2010c. Farm Labor. National Agricultural Statistics Service, Washington, DC. Available at: <http://usda.mannlib.cornell.edu/usda/current/FarmLabo/FarmLabo-08-19-2010.pdf>

U.S. Department of Agriculture. 2010d. The 2007 Census of Agriculture. National Agricultural Statistics Service, Washington, DC. Available at: <http://www.agcensus.usda.gov/Publications/2007/index.asp>

# Appendix I

Project Code 754



**NATIONAL  
AGRICULTURAL  
STATISTICS  
SERVICE**

## New York Dairy Farm Labor Survey 2010

**New York Field Office**  
10B Airline Drive  
Albany, NY 12235-1004  
Phone: 1-800-821-1276  
Fax: 1-800-591-3834  
Email: nass-ny@nass.usda.gov

New York State farmers continue to deal with changes and challenges in acquiring and retaining farm labor. We are asking for your input on several key labor issues. Please help by completing and returning this questionnaire. Individual responses are kept confidential by law. Thank you for your cooperation.

1. Is your operation currently producing farm commodities for sale?

Yes                      No                      If no, what year did you exit farming?  
(Continue to #2)                      ⇒ (Enter year and end the survey)  
Please return the survey in the enclosed envelope. Thank you for your time.

0101
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2. How many hired workers were employed on your farm during the peak of 2009?  
(Exclude family members, partners and workers provided by a third-party contractor)  
If none, skip to question 16.

0201
------

3. How many of these hired workers speak Spanish as their first language?

0301
------

- a. How many speak almost no English?
- b. How many speak some English?
- c. How many speak English very well?

0302
0303
0304

If no Spanish speaking workers are on your payroll, skip to question 6.

4. What opportunities and services would you like to have available to help your Spanish-speaking employees?  
(Enter "1" in the appropriate box for all that apply below)

Access to interpreters	0401
English classes	0402
Help with immigration issues	0403

Cultural education	0404
Bilingual training	0405
Other	0406

If no Spanish speaking workers are on your payroll, skip to question 6.

5. What opportunities and services would you like to have available to help farm managers work with your Spanish-speaking employees?

(Enter "1" in the appropriate box for all that apply below)

Access to interpreters	0501
Spanish classes	0502
Help with immigration issues	0503

Cultural education	0504
Other	0505

6. What is the average wage you pay for (exclude managers, family members, and partners)?

	Experienced			Inexperienced		
Milkers	0601	\$ _____	Per hour	0602	_____	Per hour
General farm laborers	0603	\$ _____	Per hour	0604	_____	Per hour

7. On average how many hours per week do milkers and general laborers work? 0701

8. For ALL benefits you offer to your hired worker(s) (exclude managers, family members, and partners):  
Enter "1" in the appropriate box.

Housing	0801	Health ins.	0803	Transportation	0805
Retirement	0802	Paid time off	0804	Bonuses	0806

9. What is the estimated annual value of benefits provided per hired worker, excluding mandatory withholding for Social Security and unemployment insurance (exclude managers, family members, and partners)?

Less than \$1,000 = 1      \$1,000-\$2,999 = 2      \$3,000-\$4,999 = 3      \$5,000 or more = 4      Enter Code 0901

10. Please complete the following table for any managers you employ (*exclude family members and partners*)

Type of manager	Annual Salary		Avg number of hours worked per week	Typical years of manager experience (Enter "1" in appropriate box)	
	1001	\$ _____		1003	LLe Up to 5 years
Top level hired manager		Per year	1002	Hours	1004
					5 years or more
Hired middle manager	1005	\$ _____	1006	Hours	1007
	000				1008
					5 years or more

11. Please enter a "1" for ALL benefits you offer to your hired manager(s) (exclude family members, and partners):

Housing	1101	Health ins.	1103	Transportation	1105
Retirement	1102	Paid time off	1104	Bonuses	1106

12. What is the estimated annual value of benefits provided per hired manager, excluding mandatory withholding for Social Security and unemployment insurance (exclude family members and partners)?

Less than \$5,000 = 1      \$5,000-\$9,999 = 2      \$10,000-\$14,999 = 3      \$15,000 or more = 4      Enter Code 1201

In 2009, the New York State legislature proposed changing State labor laws applying to farm employees. One provision would give farm employees the right to form unions (collective bargaining). Another would require farmers to provide overtime pay at the rate of time and one half.

13. How concerned would you be if State law allowed your workers to form a union & engage in collective bargaining?

Enter "1" in the box you agree with

Not Concerned	Somewhat Concerned	Concerned	Very concerned	Don't know
1301	1302	1303	1304	1305

14. How concerned would you be if state law required you to pay overtime after:

Enter "1" in the box you agree with

40 hours per week?

55 hours per week?

60 hours per week?

Not Concerned	Somewhat Concerned	Concerned	Very Concerned	Don't Know
1401	1402	1403	1404	1405
1411	1412	1413	1414	1415
1421	1422	1423	1424	1425

15. Please indicate how important each of the following immigration issues are to your business

Enter "1" in box you agree with

A national immigration reform policy.

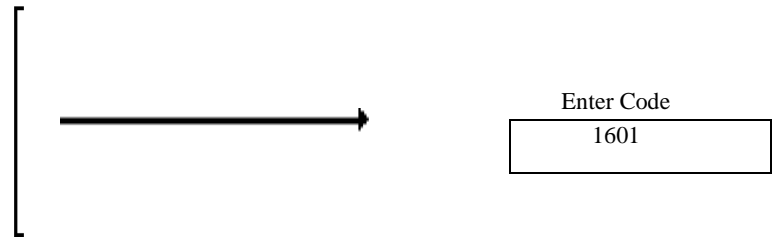
A path to citizenship for unauthorized workers

A guest worker program

Not Important	Somewhat Important	Important	Very Important	Not Applicable
1501	1502	1503	1504	1505
1511	1512	1513	1514	1515
1521	1522	1523	1524	1525

16. What is the average market value of agricultural products sold from your farm over the last three years, not including direct government farm payments

- Less than \$49,000 =
- \$50,000-\$99,999 =
- \$100,000-\$249,999 =
- \$250,000-\$499,999 =
- \$500,000-\$999,999 =
- \$1,000,000-\$2,499,999 =
- \$2,500,000 and over =



The survey results will be available on the internet at <http://www.nass.usda.gov/ny>  
 This completes the survey. Thank You

For office use only								
Response		Respondent			Mode		um.	Eval.
1-Comp	9909901	1-Op/Mgr	4-44-Partner	9909902	1-Mail	9909903	0090098	0100100
2-Refusal		2-Spouse	9- 9-Other		2-Tel			
3-Inac		3-Acct/Bkpr			7-Fax			

**OTHER A.E.M. RESEARCH BULLETINS**

<b>RB No</b>	<b>Title</b>	<b>Fee (if applicable)</b>	<b>Author(s)</b>
2010-01	Measuring the Impacts of Generic Fluid Milk and Dairy Marketing		H. Kaiser
2009-01	Dairy Farm Management Business Summary, New York State, 2008	(\$20.00)	Knoblauch, W., Putnam, L., Karszes, J. and J. Anderson
2008-03	Dairy Farm Management Business Summary, New York State, 2007	(\$20.00)	Knoblauch, W., Putnam, L., Karszes, J., Murray D. and R. Moag
2008-02	100 Years of Dairy Farming: Town of Dryden, Tompkins County		Stanton, B., Conneman, G., Crispell, C. and S. Smith
2008-01	The New York State Agricultural Immigration and Human Resource Management Issues Study		Maloney, T. and N. Bills
2007-01	Dairy Farm Management Business Summary, New York State, 2006	(\$20.00)	Knoblauch, W., Putnam, L. and J. Karszes
2006-07	Financial Performance and Other Characteristics of On-Farm Dairy Processing Enterprises in New York, Vermont and Wisconsin		Nicholson, C. and M. Stephenson
2006-06	Dairy Farm Management Business Summary, New York State, 2005	(\$20.00)	Knoblauch, W., Putnam, L. and J. Karszes
2006-05	Measuring the impacts of generic fluid milk in dairy marketing		Kaiser, H. and D. Dong

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