

## Labor relations United States, 1800 - methodological paper

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### 1. Sources for population figures

The population data assembled in the database on labor relations in the United States of America 1800 arise from primary and secondary literature based on the official censuses, administrative enumerations and registration records. Just like its (former) colonial power, British colonies tended to organize regular enumerations at a comparatively early date.<sup>1</sup> The first census covering the USA was conducted in 1790, 14 years after its independence, and was repeated every decade. At its inception the requirements for the census were comparatively simple. The first six enumerations were made in connection with the name of the family head only and were mainly concerned with the distribution of free and slave population according to sex and age.<sup>2</sup>

The census of 1820 was the first one to include some information about the occupations of the American population and is thus the closest available data to the intersection of the year 1800. The census takers were instructed to categorize all working persons (including slaves) in one of three great classes of occupations, namely agriculture, commerce and manufactures.<sup>3</sup> These categories are too broad to link them to a specific labor relation, which makes it impossible to accurately determine the labor relations at the time. However, the census of 1820 does provide general information about the branches people were actively working in and it gives clear information about the free and slave population according to sex, race, age and state. Moreover, economists Stanley Lebergott and Thomas Weiss have both estimated the labor force by industry in 1820 as well. In 1984, Lebergott developed his labor force estimations to be conceptually comparable to the 'Current Population Survey'(CPS) of the *U.S. Bureau of Labor Statistics* (BLS), which first became available in 1938.

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<sup>1</sup> Mitchell, B. R. (ed.), *International Historical Statistics: The Americas 1750-1988*, New York, 1993. xix.

<sup>2</sup> Hunt, W. C., *The Federal Census of Occupations*, *Publications of the American Statistical Association*, vol. 11, no. 86, June, 1909. p. 467.

<sup>3</sup> Ibid. P. 468.

Another economist, Thomas Weiss, also designed estimations comparable to those in the CPS. Weiss built national estimates of the total and the agricultural labor force in the 19<sup>th</sup> century from state-level estimates. With regard to the overlap between the total and the farm labor force estimates of Lebergott and Weiss, the estimations by Weiss are the preferred ones, and are therefore included in the database rather than the estimations by Lebergott for these categories.<sup>4</sup> (For a comparison of the Lebergott and Weiss estimates for the years 1800-1860, see Claudia Goldin, "Comment," in Robert E. Gallman and John Joseph Wallis (ed.), *American Economic Growth and Standards of Living before the Civil War* (University of Chicago Press, 1992), pp. 75-8.) Even though the estimations by Lebergott and Weiss do not categorize the population according to their labor relation or occupation, but rather according to the branch of industry in which they are active, the categories allow us to draw some broad conclusions about the labor relations of the American population in 1820. More detailed occupational information is available for immigrants who arrived in the United States in 1820. This information is also included in the database and linked to specific labor relations.

In the seventh enumeration in 1850 the census inquiries were extended to include detailed occupational data for all free males over 15 years of age, and the method of enumeration was changed as well. Instead of gathering data through the heads of household only, a system of individual enumeration was implemented, whereby a detailed return was required concerning each inhabitant and each establishment of productive industry. In 1860 the census inquiries expanded to include occupational data for both free men and women over 15 years of age who reported an occupation.

With regard to the data assembled in this database, we chose to focus on the censuses from 1820 and 1860. While the estimations of the labor force of 1820 give us a general overview of the labor relations at the time, the eight enumeration of 1860 allows us to draw more accurate conclusions about the labor relations in the United States in the 19<sup>th</sup> century, as this census included

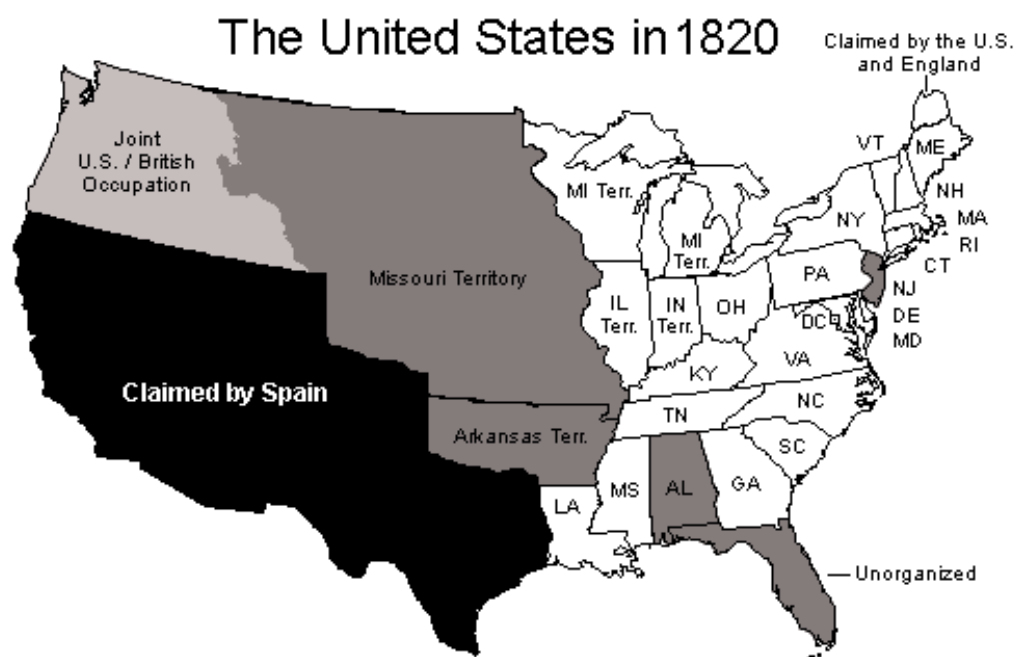
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<sup>4</sup> Carter, S. B. et al (ed.), *Historical Statistics of the United States: Earliest times to the present*, Millennial Edition, Vol. 2, New York, 2006. P. 110.

detailed information on the occupations of all free men and women over 15 years of age who reported an occupation to the census takers.

## 2. Geography

The censuses of 1820 and 1860, from which the majority of the data in the data bases originates, covered the total area of the United States. However, in the forty years between these two censuses the area of the United States expanded. All the information in the database is in accordance with the boundaries of the United States at the time that the census was taken. Consequently, the area covered by the census in 1860 includes regions that were not yet included in the census of 1820 and some state boundaries changed as well. For example, West Virginia was still part of the state of Virginia in 1820, but had become independent by 1860. The information in the database covering the state of Virginia in 1820 will therefore include the territories that are now part of West Virginia unless indicated otherwise. Hawaii and Alaska are not included in either census. To clarify the area covered by the censuses of 1820 and 1860, we included a map of the United States for both dates below.



Source: <http://www.csa.com/discoveryguides/census/review4.php>

## Map of the United States in 1860



Source: [http://familyimages.smugmug.com/Connect-with-the-past/selected-households-census/1860-US-Census-selected/3271383\\_bnkNkN#li=181317050&k=hvLCx](http://familyimages.smugmug.com/Connect-with-the-past/selected-households-census/1860-US-Census-selected/3271383_bnkNkN#li=181317050&k=hvLCx)

### 3. Method

As mentioned above the information in the database arises primarily from the censuses of 1820 and 1860. In 1820 the working population was divided in three main labor branches, these categories are too broad to draw any conclusions about the labor relations of the population. However, the labor force estimations by industry of Lebergott and Weiss are more helpful and allow us to link the branches of industry to a specific labor relation. Naturally, the labor relations linked to an entire branch are not very precise, but it does give a general overview of the labor relations at the time. Laborers active in mining, cotton textile, primary iron and steel industries, domestics or ocean vessel transportation are believed to be wage earners whose labor was used for the market (labor relation 14). Teachers are classified to be wage earners for non-market institutions (labor relation 18), fishermen could either be self-sufficient (labor relation 12) or work for the market (labor relation

14) and farmers could be self-sufficient (labor relation 12), employers (labor relation 13) or sell the fruits of their labor on the market (labor relation 14). Labor relation 13 is assigned to people with an occupation for which it is plausible that he or she employed three or more other people. The estimations by Lebergott and Weiss include slaves (labor relation 17), but excludes all children under the age of 10 and people who did not state an occupation. According to the population census of 1820, there were 2626000 children between the ages 0-9 years old. This group is classified as labor relation 1, which states that they are incapable or not supposed to work.<sup>5</sup> The rest of the people not accounted for by the estimations of Lebergott and Weiss are given the labor relation “1 or 3 or 5”, because they were most likely to be incapable of or not supposed to be working (labor relation 1), unemployed (labor relation 3) or working as a household kin producer (labor relation 5) without reporting this as an occupation.

The 1820 data for the immigrants (the term ‘immigrant’ refers in this database to people who arrived in the United States in the specific year the data was reported, the term ‘foreign-born’ encompasses all persons who were living in the United States during the time of the census, but were born in another country) was divided in a similar manner as the other occupational data of 1820: Laborers, private household workers and operative workers are believed to be wage workers whose labor benefitted the market (labor relation 14), craftsmen and managers, officials or proprietors could either also work for the market (labor relation 14) or be self-employed (labor relation 12), Clergymen either worked for the market or for the state (labor relation 14 or 18) and farmers could sell the fruits of their labor on the market or employ other persons to work for them (labor relation 14 or 13). There was also a large group of immigrants who did not report an occupation. This group includes housewives, unemployed persons, retired persons, students, children under the age of 14, aliens with no occupation and people with an unknown or unreported occupation (labor relations 1 or 3 or 5). Because the immigrants were registered only in three

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<sup>5</sup> According to the definition of the Collaboratory children start working at the age of six, however as Lebergott and Weiss established age groups starting from 0-9 and based their calculations on that division, I followed their example.

different age categories (people under 15 years of age, between 15 years and 39 years of age and people aged over 40 years) which do not correspond with the age categories that are being used to determine how many people were too young or too old to work, it is impossible to calculate or estimate how many people should be assigned to labor relation 1 as a separate category. Another problem is that some of the sources on the number of immigrants include returning citizens and others do not. For 1820 a total number of 8385 are mentioned with their country of origin. Of the total number of 10311 immigrants, 1926 were returning citizens. They are also included in table as immigrants with a labor relation.

The census of 1860 provides detailed occupational data according to sex, race and the country of birth (inside or outside of the United States, this information is stated in the column 'ethnicity'). Because the labor force is classified in occupation rather than labor branches in this census, the labor relations could be more accurately assigned to these data than to the data from 1820.. The census only registered free persons who were 16 years or older and who reported an occupation. It thus excludes people who were incapable or not supposed to work (labor relation 1), affluent persons (labor relation 2), unemployed persons (labor relation 3), almost all reciprocal labor (labor relation 5-7), tributary labor (labor relation 8-11) and slaves (labor relation 17). Information on children and slaves could be found in the population census of 1860, but the other groups could not be retraced and are therefore put in the 'remainder'-category (labor relations "1 or 3 or 5" for totals, labor relations "1 or 3" for males, and labor relations "1 or 5" for females). The 'remainder'-category was calculated by subtracting the sum of all people with labor relations (including children under the age of 16, slaves and slave owners) within a certain group, for example all white males, from the total population according to the population census of 1860 of that same group.

All children under the age of 10 years are considered to be too young to work (including slaves).<sup>6</sup> Children between the ages 10 to 15 years of age were more difficult to assign to a specific labor relation. First we had to estimate the number of children between the ages 10 and 15 years by

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<sup>6</sup> See reference 5.

adding a fifth of the number of children in the age category 15 to 19 years to the number of children between the ages 10 to 14 years. This estimation is in all likelihood slightly too low, as the number of people decreases in older age categories, but the difference will not be significant. From this age category we still had to subtract the number of slaves between the ages 10 to 15, as they were already assigned to labor relation 17. Slaves contribute 89.44% of nonwhite males and 88.59% of all nonwhite females,<sup>7</sup> so we subtracted 89.44% from the nonwhite males between 10 and 15 years old and 88.44% of the nonwhite females in the same age group. Naturally, this affected the data for the 'nonwhites' as well as the data in which all races are combined. Thomas Weiss had estimated the number of gainful workers between 10 and 15 years of age in 1820 according to sex and race. Everyone within this category was assigned to labor relation 14 (wage workers for market purposes). The remaining number of free children between the ages 10 and 15 years were divided over two different labor relations according to their race. The remaining free white children are equally divided between labor relation 1 (children who are going to school) and labor relation 5 (children who somehow contribute to the household), while we estimated that only 10% of the free nonwhite children between the ages of 10 and 15 years would still be in school, and the remaining 90% were assigned to labor relation 5 (contribute to the household).

Slave owners were also missing from the occupational data, but we included the data on the number of slaveholding families in the agricultural census of 1860.<sup>8</sup> If somebody owned three or more slaves he or she is classified as an employer (labor relation 13). However, it is possible that these slave owners sometimes reported another job as well, which leads to a slight overrepresentation of employers in the database and thus a small underrepresentation of the group not accounted (labor relation "1 or 3 or 5").

As children under the age of 15, slaves and slave owners come from another source than the occupational census of 1860, there was no information registered about the number of 'native-' and

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<sup>7</sup> Carter, S. B., et al. (ed.), *'Historical Statistics of the United States: Earliest Times to the Present'*. Millennial Edition. Vol. 1, New York, 2006. p. 48.

<sup>8</sup> Carter, S. B., et al. (ed.), *'Historical Statistics of the United States: Earliest Times to the Present'*. Millennial Edition. Vol. 2, New York, 2006. p. 380.

‘foreign-borns’ for these groups, and in the case of the slave owners the gender was also unknown. However, the missing data are important for our calculations, so we classified all slaves and slave owners as ‘native-borns’, because the slave trade was officially abolished by the ‘Slave Trade Act’ of 1807, 53 years before the census was taken, and the slaveholders as men, because the slave owners were calculated per family, and the head of the family is generally a man. We solely used these estimations in our calculations and did not include information we did not have in the database, because it is possible that some slaves and slave owners were born inside the United States or that some registered slave owners were female.

The group of foreign born slaves could include slaves who were born abroad and shipped to the United States before slave trade was abolished and that were still alive at the time the census was taken or slaves were illegally transported to the United States after the Act was passed. This group is probably quite small as slaves tended not to become very old and the slave population expanded mainly through natural reproduction in the years before the abolition of slave trade already, and continued to grow with an average of more than 2 percent per year across the half-century prior to the Civil War starting in 1861.<sup>9</sup>

It was impossible to determine how many children were born in- and outside of the United States. Children are therefore included in the remainders category (labor relation “1 or 3 or 5”) for the estimations about ‘foreign-borns’ and ‘native-borns’, rather than classified as a separate category for labor relation 1 only. The number of ‘native-’ or ‘foreign-born’ persons in labor relation 1 is unknown, which is indicated by the value ‘-1’.

#### **4. Results and Analysis**

After all the labor relations were assigned we converted our findings in three tables (see below), six histograms and thirteen pie charts (see Appendix).

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<sup>9</sup> Carter, S. B., et al. (ed.) *‘Historical Statistics of the United States: Earliest Times to the Present’*, Millennial Edition, Vol. 2, New York, 2006. p. 370



Table 1: Labor relations 1820

	Total all races 1820	Percentage
Labor relation 1	3326241	34.51
Labor relation 14	190000	1.97
Labor relation 17	1819112	18.87
Labor relation 18	20000	0.21
Labor relation 12 or 14	14000	0.15
Labor relation 12 or 13 or 14	2249000	23.33
Total population	9638000	100

Table 2: Labor relations immigrants 1820

	Immigrants 1820	Percentage
Labor relation 14	986	9.56
Labor relation 12 or 14	1447	14.03
Labor relation 13 or 14	874	8.48
Labor relation 14 or 18	63	0.61
Labor relation 12 or 14 or 18	105	1.02
Labor relation 1 or 3 or 5	6836	66.3
Total population	10311	100

Table 3: Labor relations 1860\*

Labor relation	Total (All races)**	% of total pop.	Male (All races)**	% of tot pop.	Female (All races)**	% of tot pop.	Total (White)	% of tot pop.	Male (White)	% of tot pop.	Female (White)	% of tot pop.
1	10600052	33,71	5297315	32,93	5302736	34,53	9237775	34,33	4622032	33,5	4615743	35,2
5	1641465	5,22	763782	4,75	877684	5,71	1593975	5,92	743232	5,39	850743	6,49
12	38300	0,12	26600	0,17	11700	0,08	37600	0,14	26300	0,19	11300	0,09
13	2701700	8,59	2607000	16,21	94700	0,62	2690200	10	2596300	18,82	93900	0,72
14	3864064	12,29	3024096	18,80	839868	5,47	3700251	13,75	2918536	21,15	781715	5,96
17	2452165	7,80	1235848	7,68	1216317	7,92	0**	0**	0	0**	0	0
18	214800	0,68	150100	0,93	64700	0,42	213900	0,79	149300	1,08	64600	0,49
12/14	211400	0,67	207900	1,29	3500	0,02	204800	0,76	201600	1,46	3200	0,02
12/18	72100	0,23	72100	0,45	0**	0**	71800	0,27	71800	0,52	0**	0
14/18	479000	1,52	402500	2,50	76500	0,50	464300	1,73	397300	2,88	75600	0,58
12/ 13/ 14	672600	2,14	638100	3,97	34500	0,22	667900	2,48	633500	4,59	34400	0,26
12/ 14/ 18	63900	0,20	58400	0,36	5500	0,04	63400	0,24	58000	0,42	5400	0,04
13/ 14/ 18	362900	1,15	342900	2,13	19900	0,13	361900	1,34	342000	2,48	19900	0,15
1/3/5/	7966554	25,34	1188359	7,39	6798395	44,27	7604199	28,26	1039100	7,53	6556499	50
total	31341000	99,68	1,6E+07	99,56	15346000	99,92	26912000	100,01	13799000	100,01	13113000	100
total population	31443000		1,6E+07		15358000		26912000		13799000		13113000	

Labor relation	Total (Non-white)	% of tot pop.	Male (Non-white)	% of tot pop.	Female (Non-white)	% of tot pop.	Native-Born	% of tot pop.	Foreign-born	% of tot pop.
1	1362277	30,76	675283	30,47	686993	30,90	-1		-1	
5	47490	1,07	20550	0,93	26941	1,21	1200	0,00	0**	0,00
12	600	0,01	300	0,01	400	0,02	21400	0,08	16900	0,41
13	11500	0,26	10700	0,48	800	0,04	2686025	9,84	331500	8,01
14	163013	3,68	105360	4,75	58053	2,61	2154002	7,89	1147600	27,73
17	2452165	55,37	1235848	55,77	1216317	54,72	2452165	8,98	0**	0,00
18	900	0,02	800	0,04	100	0,00	182300	0,67	32400	0,78
12/14	6600	0,15	6300	0,28	300	0,01	128700	0,47	82700	2,00
12/18	300	0,01	300	0,01	0**	0,00	63000	0,23	9100	0,22
14/18	6100	0,14	5200	0,23	900	0,04	319300	1,17	159600	3,86
12/ 13/ 14	4700	0,11	4600	0,21	100	0,00	468800	1,72	203900	4,93
12/ 14/ 18	500	0,01	400	0,02	100	0,00	52100	0,19	11700	0,28
13/ 14/ 18	900	0,02	900	0,04	0**	0,00	264300	0,97	98600	2,38
1/3/5/	371955	8,4	149459	6,74	231996	10,44	18511012	67,80	2044698	49,40
total	4429000	100,01	2216000	99,98	2223000	100	27304303		4138697	100
total population	442900		221600		2223000		27304303		4138679	

\* - Due to rounding errors the sum of males and females, and native- and foreign-borns do not always correspond to the total. **Also these rounding errors explain the small percentages of the total population without labor relation.**

\*\* - The value '0' in the occupational database of 1860 could either indicate that nobody was enumerated in that occupation or that the occupation did not yet exist at the time the census was taken.

\*\*\* - If data regarding occupations in 1860 included all races, the field in the column 'Race' was left blank.

Even though the labor relations could be assigned more precisely to the data from 1860 than to the data of 1820, it is still difficult to determine an exact labor relation even when the official occupational title is known, because the rank inside the occupation remains unclear. To circumvent this problem some occupations are assigned multiple possible labor relations.

Another difficulty is that the same person could work in different jobs during the year. There is no indication in the occupational census of 1860 that people who worked in multiple jobs during a year were counted twice, so we assume that the registrars classified the population under their main occupation only. Many people who, according to our standards, should be classified as 'household kin producers' (labor relation 5) did not report an occupation in the census. Consequently, not formalized work is underestimated in the census. Because women are more often 'household kin producers' than men, women's work is underrepresented in the database. It was impossible to calculate the number of married women who would probably contribute to the farm or business of their husband, since we could not find information about the marital status of the population before 1880. As a result the many household kin producers are assigned to the remainders category (for totals labor relation 1 or 3 or 5, for males 1 or 3 and for females 1 or 5). Subsequently, the number of people in the remainders category is higher for women than for men.

Yet another problem arises when one tries to precisely divide the labor relations according to race. Until 1960, the registrars taking the census assigned people to a racial category, mostly based on their appearance. Both of the categories 'nonwhite' and 'black' can include other nonwhite minorities as well, and the category 'white' can include some minorities as well.<sup>10</sup> It is impossible to retrace which minorities were included in which category. American Indians, for example, are in all likelihood included in the category 'black' or 'nonwhite' if they did not live in a reservation. American

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<sup>10</sup> B.R. Mitchell (ed.) *International Historical Statistics: The Americas 1750-1988*, New York, 1993. P. 29.

Indians who did live in a reservation were excluded from the census altogether until 1890.<sup>11</sup> The increasing popularity of the pseudoscientific social Darwinism at the end of the 19<sup>th</sup> century resulted in attempts to gather more detailed racial data. The relatively simple classification of color that was used in the censuses of 1850 and 1860, was expanded in 1870 with the categories 'Chinese' and 'American Indian' and by 1890 degrees of African ancestry were registered.<sup>12</sup> However, in 1860 the task of determining a person's race was very arbitrary, and thus made it possible that some people might be classified differently in different censuses. Even though the categories 'black' and 'nonwhite' basically encompass the same group, we decided to remain true to the source and use both terms in order to avoid confusion.

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- <http://www.archives.gov/publications/prologue/2006/summer/indian-census.html#f6>

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<sup>11</sup> Jobe, M. M., *'Native Americans and the U.S. census: A brief historical survey'*. *Journal of Government Information*, no. 30, 2004. Retrieved from: <http://dx.doi.org/10.1016/j.jgi.2001.10.001>

<sup>12</sup> Carter, S.B. et al. (ed.), *'Historical Statistics of the United States: Earliest Times to the Present'*, Millennial Edition, vol. 1, New York, 2006. P. 7.

### Maps of the united States

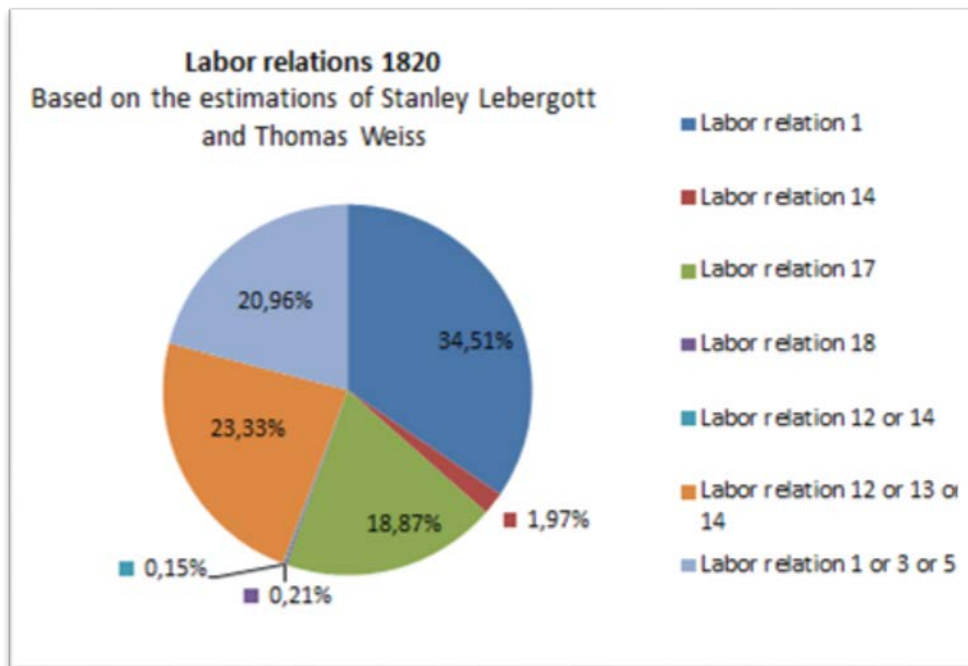
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## Appendix

**Table 1: Labor relations 1820**

	Totals	%
Labor relation 1	3326241	34,51
Labor relation 14	190000	1,97
Labor relation 17	1819112	18,87
Labor relation 18	20000	0,21
Labor relation 12 or 14	14000	0,15
Labor relation 12 or 13 or 14	2249000	23,33
Labor relation 1 or 3 or 5	2019647	20,96
Total population	9638000	100,0

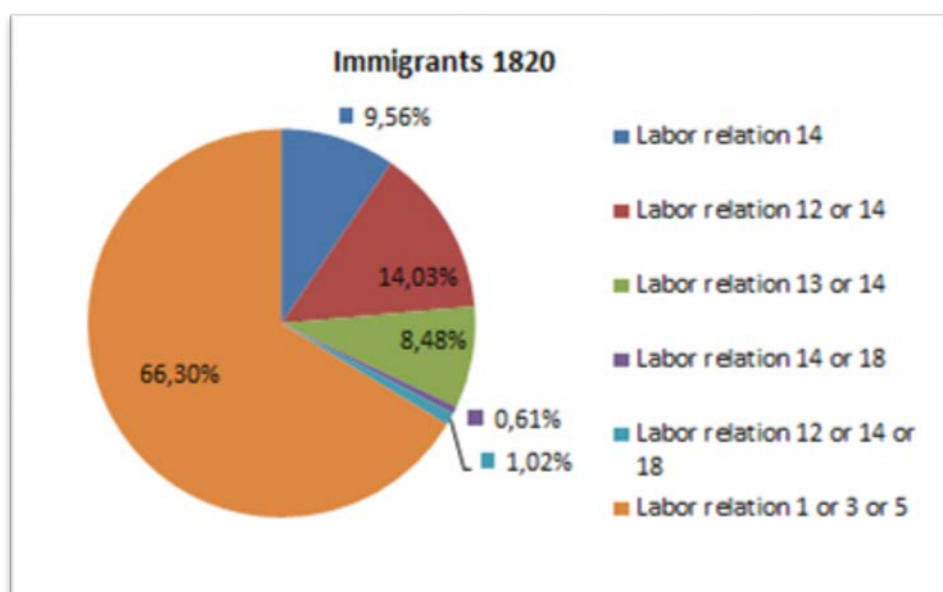
**Figure 1: Labor relations 1820**



**Table 2: Labor relations immigrants 1820**

	Totals	%
Labor relation 14	986	9,56
Labor relation 12 or 14	1447	14,03
Labor relation 13 or 14	874	8,48
Labor relation 14 or 18	63	0,61
Labor relation 12 or 14 or 18	105	1,02
Labor relation 1 or 3 or 5	6836	66,3
Total population	10311	100,0

**Figure 2: Labor relations immigrants 1820**



**Table 3: labour relations by race 1860**

	Total (all races)		Total (white)		Total (nonwhite)	
		%		%		%
Labor relation 1	10600052	33,82	9237775	34,33	1362277	30,76
Labor relation 5	1641465	5,24	1593975	5,92	47490	1,07
Labor relation 12	38300	0,12	37600	0,14	600	0,01
Labor relation 13	2701700	8,62	2690200	10,00	11500	0,26
Labor relation 14	3864064	12,33	3700251	13,75	163013	3,68
Labor relation 17	2452165	7,82	0	0,00	2452165	55,37
Labor relation 18	214800	0,69	213900	0,79	900	0,02
Labor relation 12 or 14	211400	0,67	204800	0,76	6600	0,15
Labor relation 12 or 18	72100	0,23	71800	0,27	300	0,01
Labor relation 14 or 18	479000	1,53	464300	1,73	6100	0,14
Labor relation 12 or 13 or 14	672600	2,15	667900	2,48	4700	0,11
Labor relation 12 or 14 or 18	63900	0,20	63400	0,24	500	0,01
Labor relation 13 or 14 or 18	362900	1,16	361900	1,34	900	0,02
Labor relation 1 or 3 or 5	7966554	25,42	7604199	28,26	371955	8,40
Total	31341000	100,0	26912000	100,0	4429000	100,0

Figure 3: Labor relation by race 1860

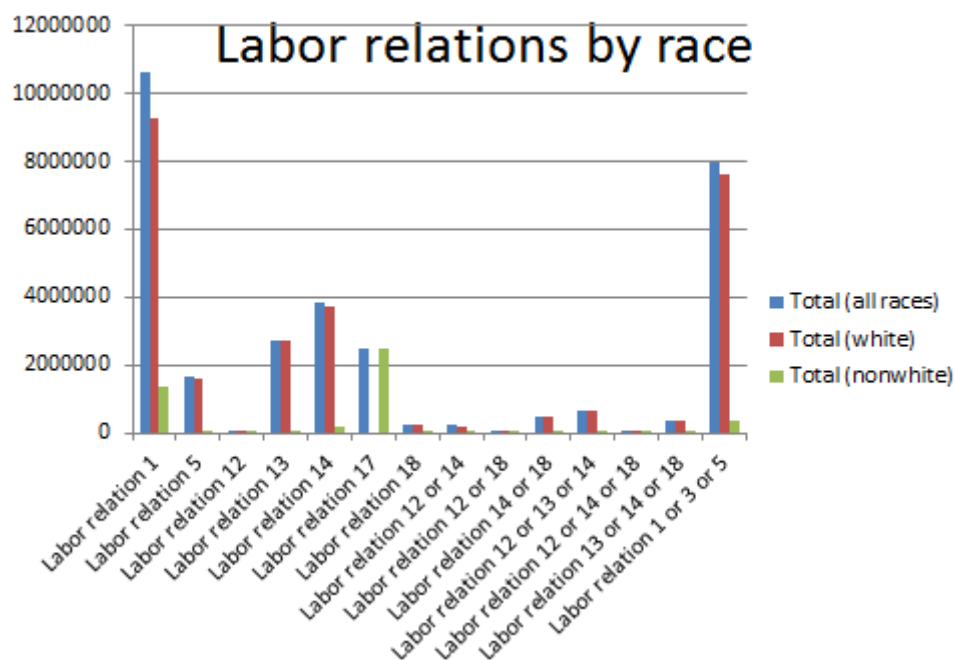


Figure 3a: Labor relations total (all races) 1860

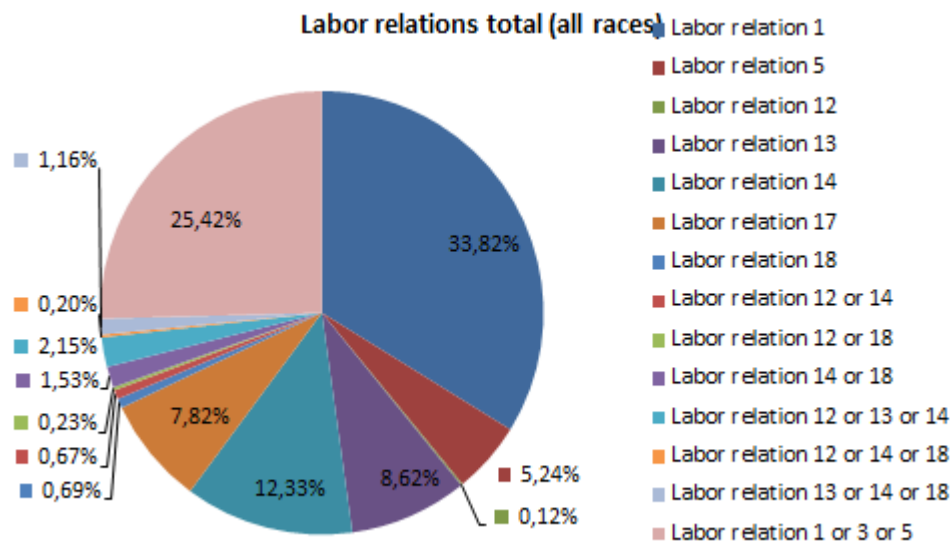




Figure 3b: Labor relations males (all races) 1860

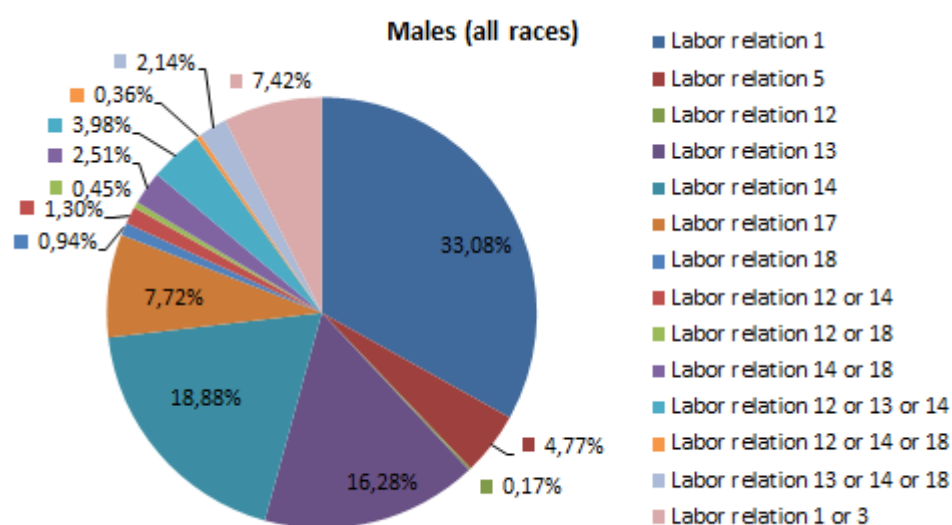
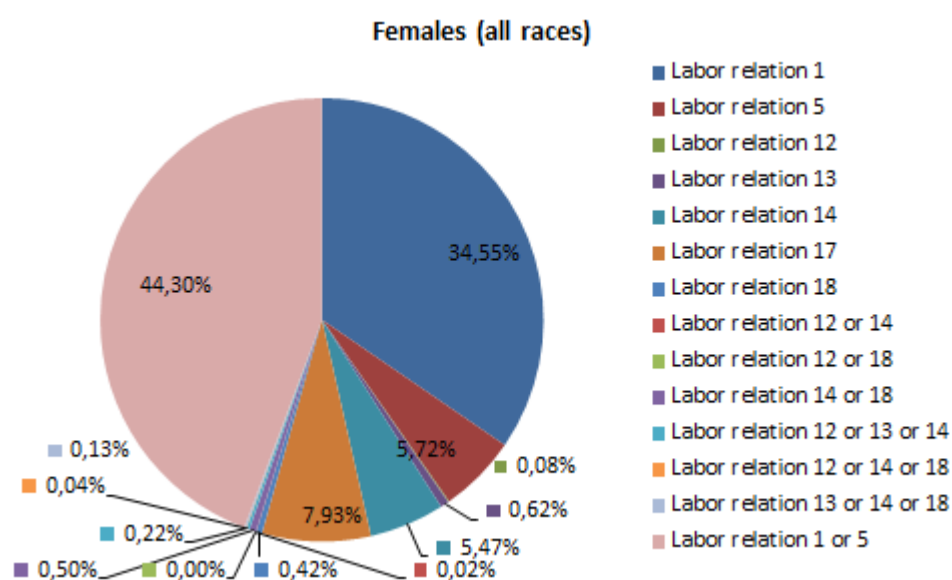


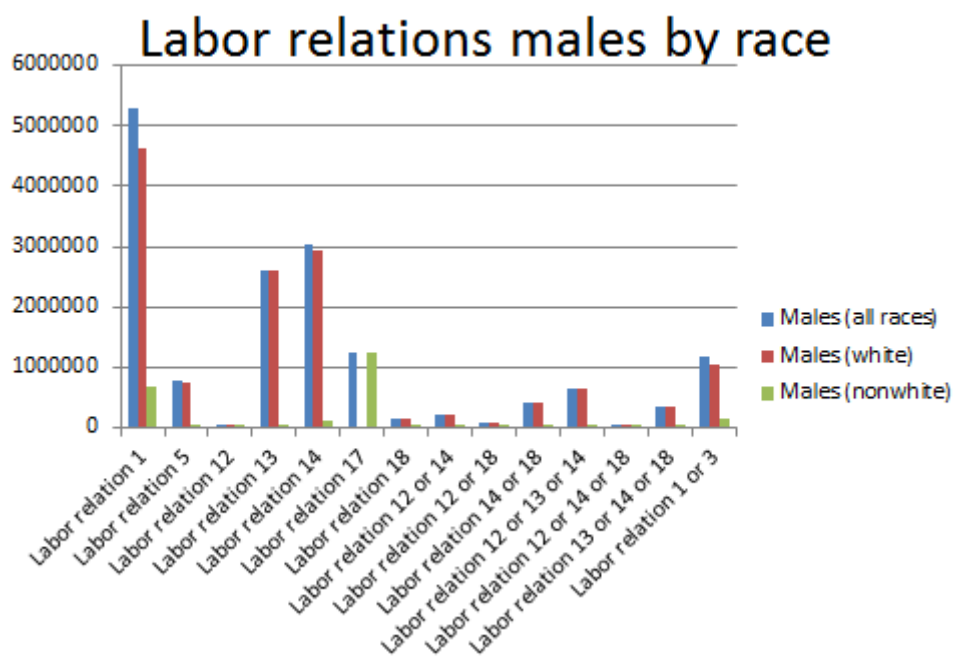
Figure 3c: Labor relations females (all races) 1860



**Table 4: Labor relations males by race 1860**

	Males (all races)	%	Males (white)	%	Males (nonwhite)	%
Labor relation 1	5297315	33,08	4622032	33,50	675283	30,47
Labor relation 5	763782	4,77	743232	5,39	20550	0,93
Labor relation 12	26600	0,17	26300	0,19	300	0,01
Labor relation 13	2607000	16,28	2596300	18,82	10700	0,48
Labor relation 14	3024096	18,88	2918536	21,15	105360	4,75
Labor relation 17	1235848	7,72	0	0,00	1235848	55,77
Labor relation 18	150100	0,94	149300	1,08	800	0,04
Labor relation 12 or 14	207900	1,30	201600	1,46	6300	0,28
Labor relation 12 or 18	72100	0,45	71800	0,52	300	0,01
Labor relation 14 or 18	402500	2,51	397300	2,88	5200	0,23
Labor relation 12 or 13 or 14	638100	3,98	633500	4,59	4600	0,21
Labor relation 12 or 14 or 18	58400	0,36	58000	0,42	400	0,02
Labor relation 13 or 14 or 18	342900	2,14	342000	2,48	900	0,04
Labor relation 1 or 3	1188359	7,42	1039100	7,53	149459	6,74
Total	16015000	100,0	13799000	100,0	2216000	100,0

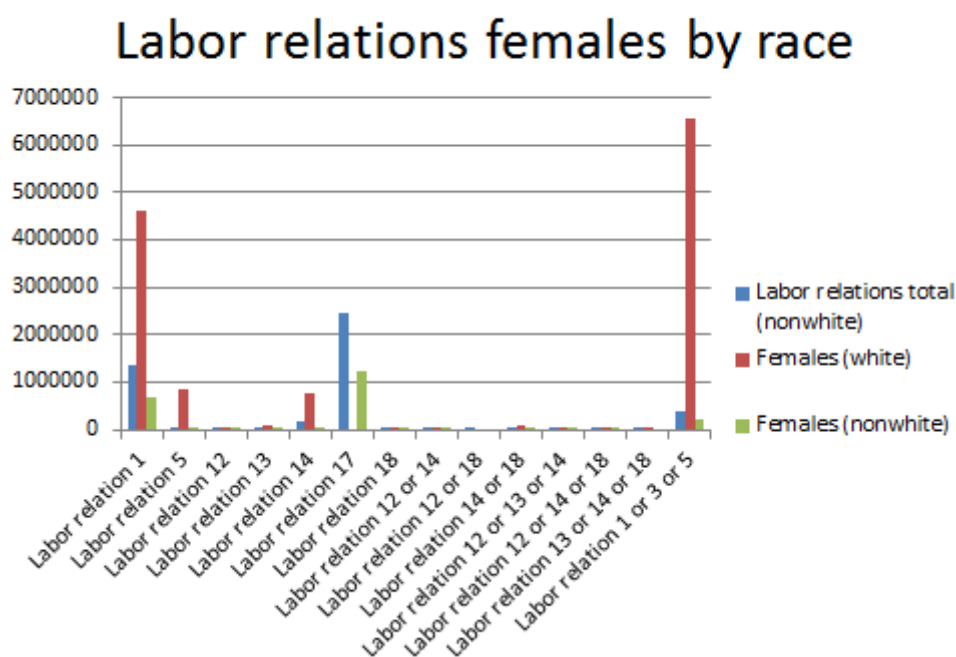
**Figure 4: Labor relations males by race 1860**



**Table 5: Labor relation females by race 1860**

	Females (all races)	%	Females (white)	%	Females (nonwhite)	%
Labor relation 1	5302736	34,55	4615743	35,20	686993	30,90
Labor relation 5	877684	5,72	850743	6,49	26941	1,21
Labor relation 12	11700	0,08	11300	0,09	400	0,02
Labor relation 13	94700	0,62	93900	0,72	800	0,04
Labor relation 14	839868	5,47	781715	5,96	58053	2,61
Labor relation 17	1216317	7,93	0	0,00	1216317	54,72
Labor relation 18	64700	0,42	64600	0,49	100	0,00
Labor relation 12 or 14	3500	0,02	3200	0,02	300	0,01
Labor relation 12 or 18	0	0,00	0	0,00	0	0,00
Labor relation 14 or 18	76500	0,50	75600	0,58	900	0,04
Labor relation 12 or 13 or 14	34500	0,22	34400	0,26	100	0,00
Labor relation 12 or 14 or 18	5500	0,04	5400	0,04	100	0,00
Labor relation 13 or 14 or 18	19900	0,13	19900	0,15	0	0,00
Labor relation 1 or 5	6798395	44,30	6556499	50,00	231996	10,44
Total	15346000	100,0	13113000	100,0	2223000	100

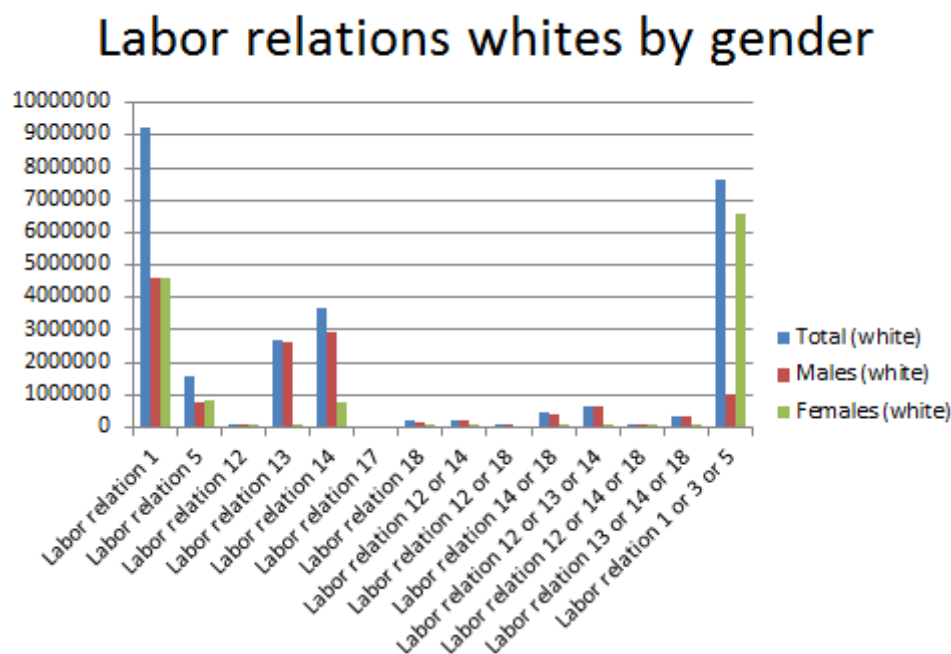
**Figure 5: Labor relations females by race 1860**



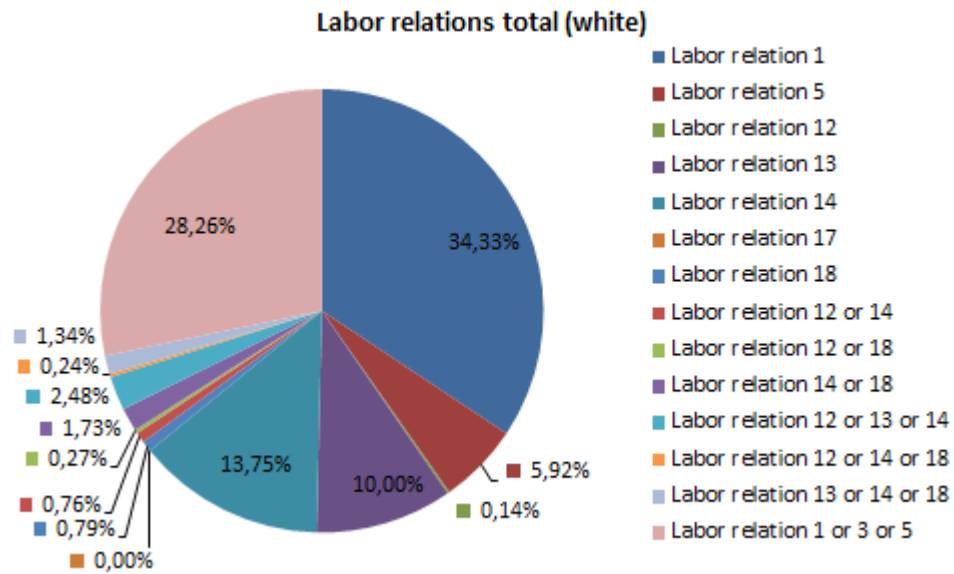
**Table 6: Labor relations whites  
by gender**

	Total (white)	%	Males (white)	%	Females (white)	%
Labor relation 1	9237775	34,33	4622032	33,50	4615743	35,20
Labor relation 5	1593975	5,92	743232	5,39	850743	6,49
Labor relation 12	37600	0,14	26300	0,19	11300	0,09
Labor relation 13	2690200	10,00	2596300	18,82	93900	0,72
Labor relation 14	3700251	13,75	2918536	21,15	781715	5,96
Labor relation 17	0	0,00	0	0,00	0	0,00
Labor relation 18	213900	0,79	149300	1,08	64600	0,49
Labor relation 12 or 14	204800	0,76	201600	1,46	3200	0,02
Labor relation 12 or 18	71800	0,27	71800	0,52	0	0,00
Labor relation 14 or 18	464300	1,73	397300	2,88	75600	0,58
Labor relation 12 or 13 or 14	667900	2,48	633500	4,59	34400	0,26
Labor relation 12 or 14 or 18	63400	0,24	58000	0,42	5400	0,04
Labor relation 13 or 14 or 18	361900	1,34	342000	2,48	19900	0,15
Labor relation 1 or 3 or 5	7604199	28,26	1039100	7,53	6556499	50,00
Total	26912000	100,0	13799000	100,0	13113000	100,0

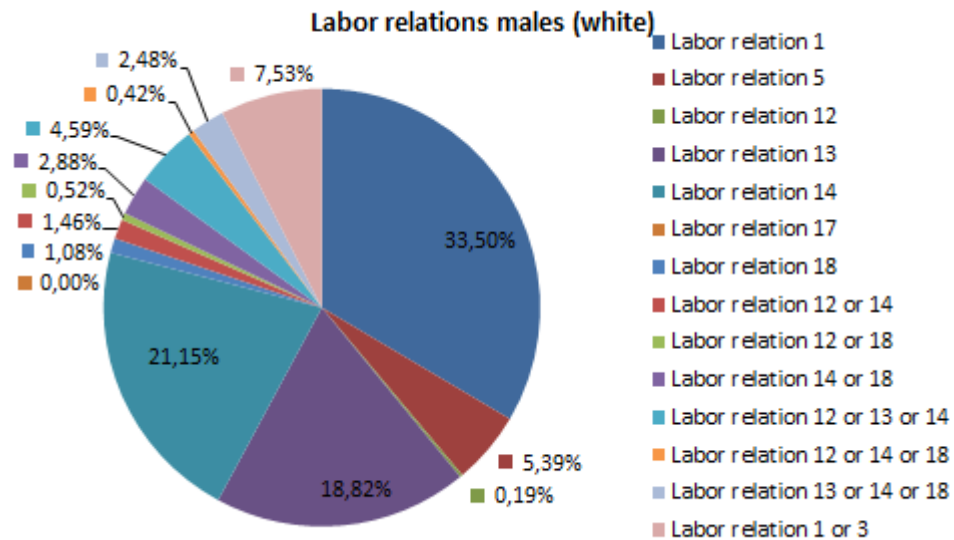
**Figure 6: Labor relations whites by gender 1860**



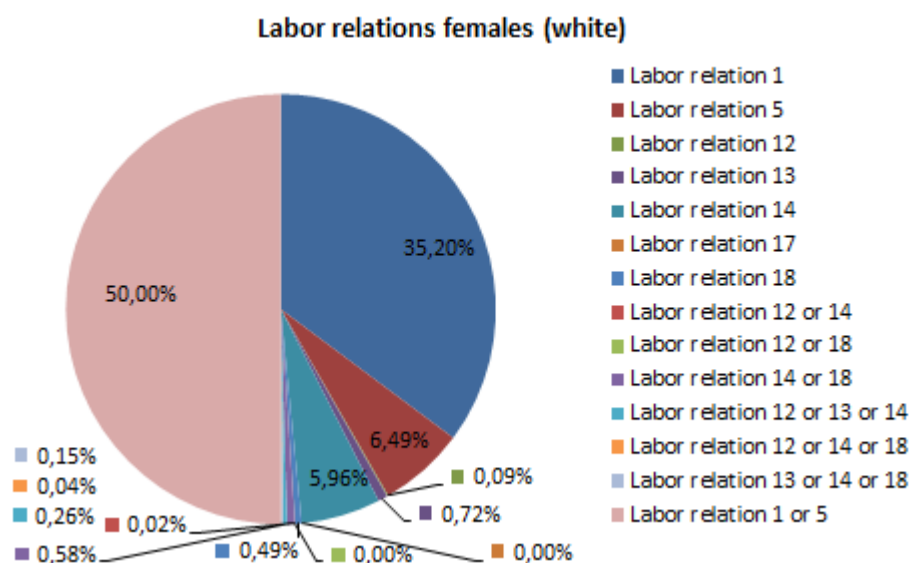
**Figure 6a: Labor relations total (white) 1860**



**Figure 6b: Labor relations males (white) 1860**



**Figure 6c: Labor relations females (white) 1860**



**Table 7: Labor relations nonwhites by gender 1860**

	Total (nonwhite)	%	Males (nonwhite)	%	Females (nonwhite)	%
Labor relation 1	1362277	30,76	675283	30,47	686993	30,90
Labor relation 5	47490	1,07	20550	0,93	26941	1,21
Labor relation 12	600	0,01	300	0,01	400	0,02
Labor relation 13	11500	0,26	10700	0,48	800	0,04
Labor relation 14	163013	3,68	105360	4,75	58053	2,61
Labor relation 17	2452165	55,37	1235848	55,77	1216317	54,72
Labor relation 18	900	0,02	800	0,04	100	0,00
Labor relation 12 or 14	6600	0,15	6300	0,28	300	0,01
Labor relation 12 or 18	300	0,01	300	0,01	0	0,00
Labor relation 14 or 18	6100	0,14	5200	0,23	900	0,04
Labor relation 12 or 13 or 14	4700	0,11	4600	0,21	100	0,00
Labor relation 12 or 14 or 18	500	0,01	400	0,02	100	0,00
Labor relation 13 or 14 or 18	900	0,02	900	0,04	0	0,00
Labor relation 1 or 3 or 5	371955	8,40	149459	6,74	231996	10,44
Total	4429000	100,0	2216000	100,0	2223000	100,0

Figure 7: Labor relations nonwhites by gender 1860

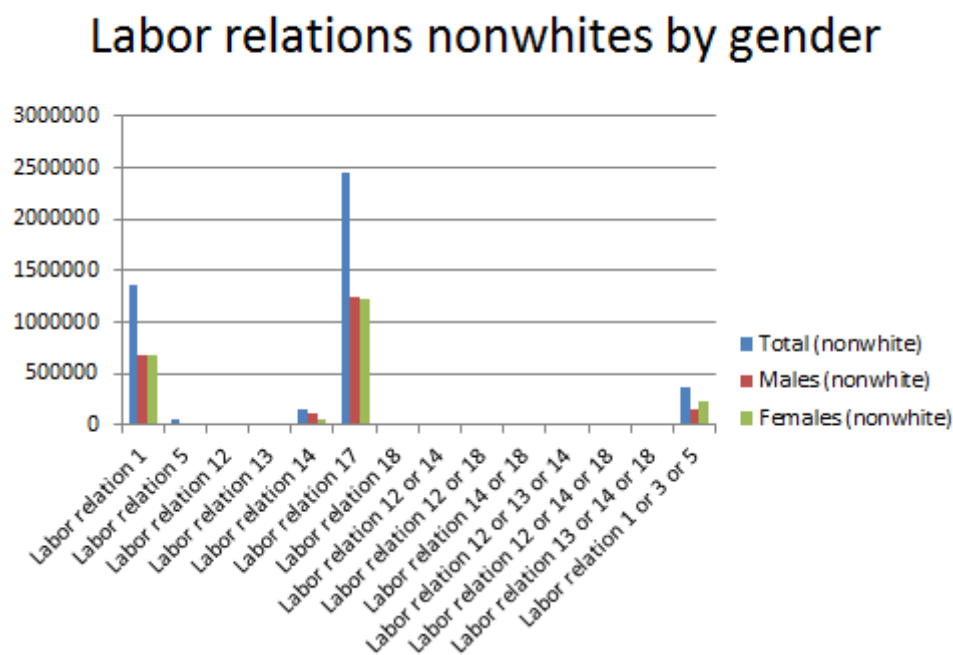


Figure 7a: Labor relations total (nonwhite) 1860

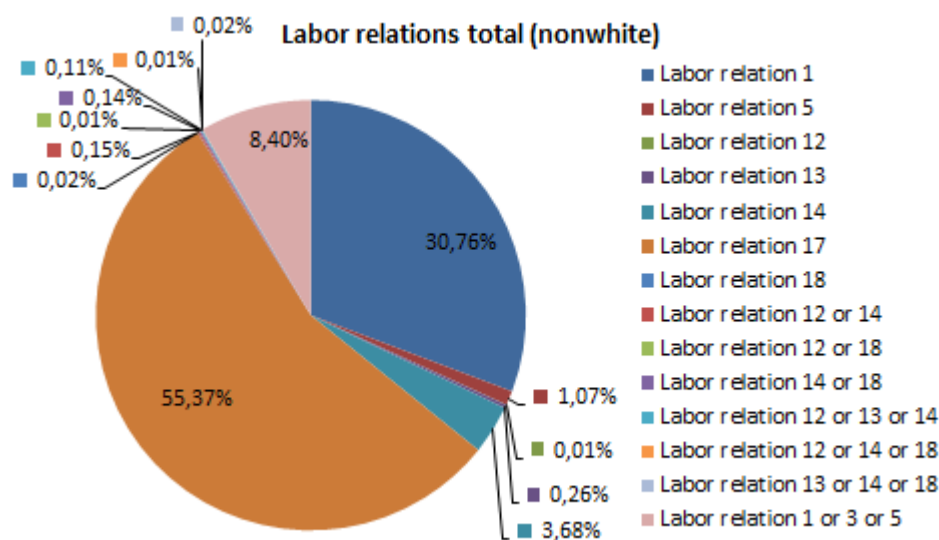


Figure 7b: Labor relations males (nonwhite) 1860

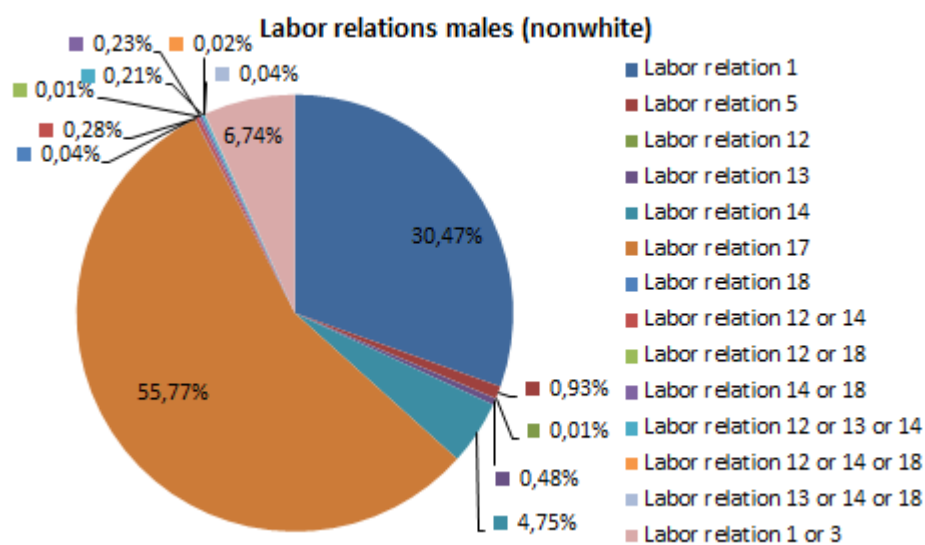
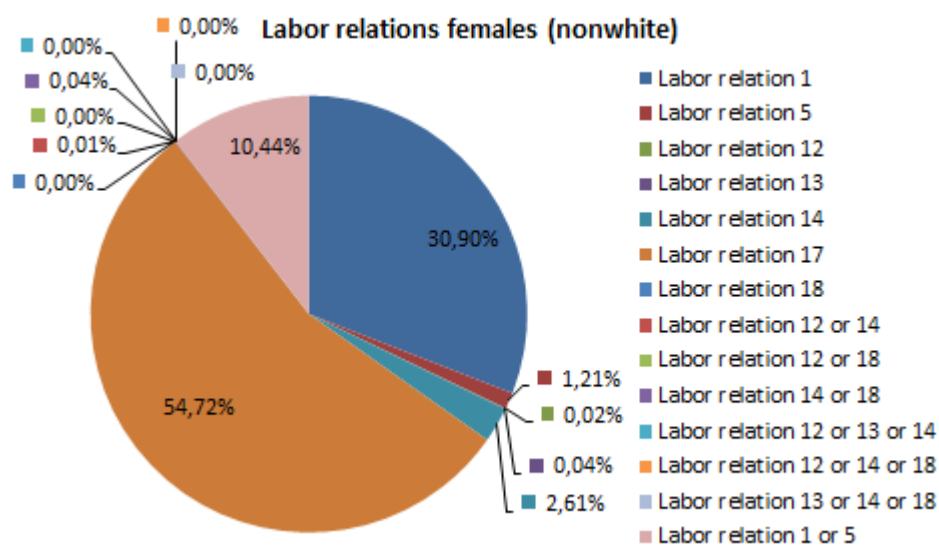


Figure 7c: Labor relations females (nonwhites) 1860





**Table 8: Labor relations by ethnicity 1860**

	Native-born	%	Foreign-born	%
Labor relation 1				
Labor relation 5	1200	0,00	0	0,00
Labor relation 12	21400	0,08	16900	0,41
Labor relation 13	2686025	9,84	331500	8,01
Labor relation 14	2154002	7,89	1147600	27,73
Labor relation 17	2452165	8,98	0	0,00
Labor relation 18	182300	0,67	32400	0,78
Labor relation 12 or 14	128700	0,47	82700	2,00
Labor relation 12 or 18	63000	0,23	9100	0,22
Labor relation 14 or 18	319300	1,17	159600	3,86
Labor relation 12 or 13 or 14	468800	1,72	203900	4,93
Labor relation 12 or 14 or 18	52100	0,19	11700	0,28
Labor relation 13 or 14 or 18	264300	0,97	98600	2,38
Labor relation 1 or 3 or 5	18511012	67,80	2044698	49,40
Total	27304304	100,0	4138698	100,0

**Figure 8: Labor relations by ethnicity 1860**

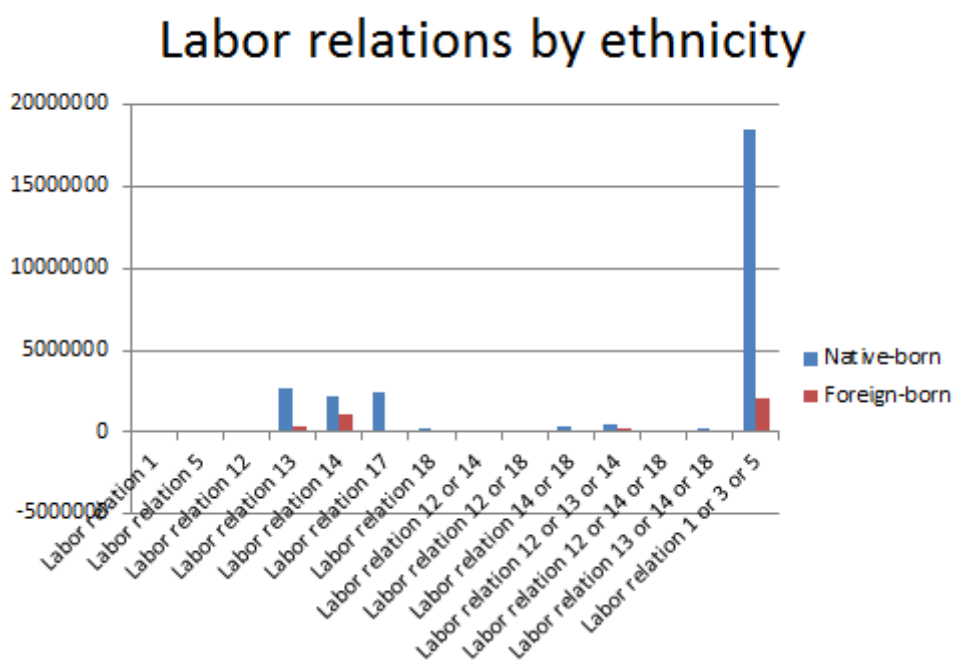


Figure 8a: Labour relations native-borns 1860

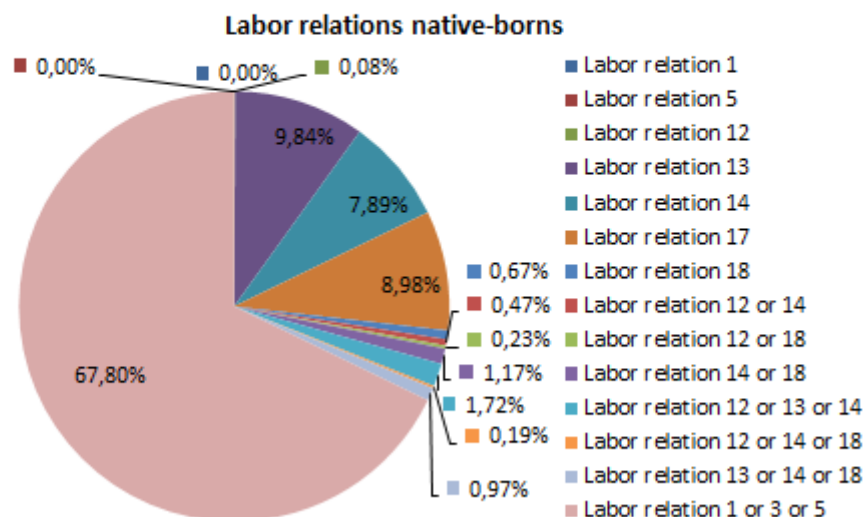


Figure 8b: Labor relations foreign-borns 1860

