

# ECON4225 Homework 1

Anna Duan

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## Part 1: Overview of the Dataset

### Question 1: household and variable count

This dataset has 9066 households and 38 variables, including the household ID.

```
## [1] "PSID row count: 9066"
```

```
## [1] "PSID variable count: 38"
```

### Question 2: age of household head

The average age of the household head is 46.25. The highest age is 102 and the lowest age is 18.

```
## [1] "Mean age: 46.25"
```

```
## [1] "Highest age: 102"
```

```
## [1] "Lowest age: 18"
```

### Question 3: average household income

The average household income is \$78,265.69. This is lower than the \$142,000 reported by the SCF (based on class slides for Section 1.2, slide 9). One possible reason for this difference is that the SCF intentionally oversamples wealthy households to collect information about the income and wealth patterns at the top of the income distribution. In addition to SCF's intentional focus on a high-income subset of the population, other differences that may create differences in the mean household income collected include SCF's smaller sample size (6k, compared to PSID's 10k) and lower frequency.

SCF also surveys a smaller (6k) group compared to PSID (10k).

```
## [1] "Mean household income: 78265.69"
```

### Question 4: income range

The household incomes in the dataset have a wide range: the lowest is -\$267,900 and the highest is \$2,125,100. According to the codebook, the households with negative incomes likely incurred business or farm losses. This may include losses from business investments, farming, or other financial decisions.

```
## [1] "Lowest household income: -267900"
```

```
## [1] "Highest household income: 2125100"
```

### Question 5: age of household head's spouse

Of the 4,523 households with a spouse present, the average age of the spouse is 45.64 years.

```
## [1] "Mean spouse age: 45.64"
```

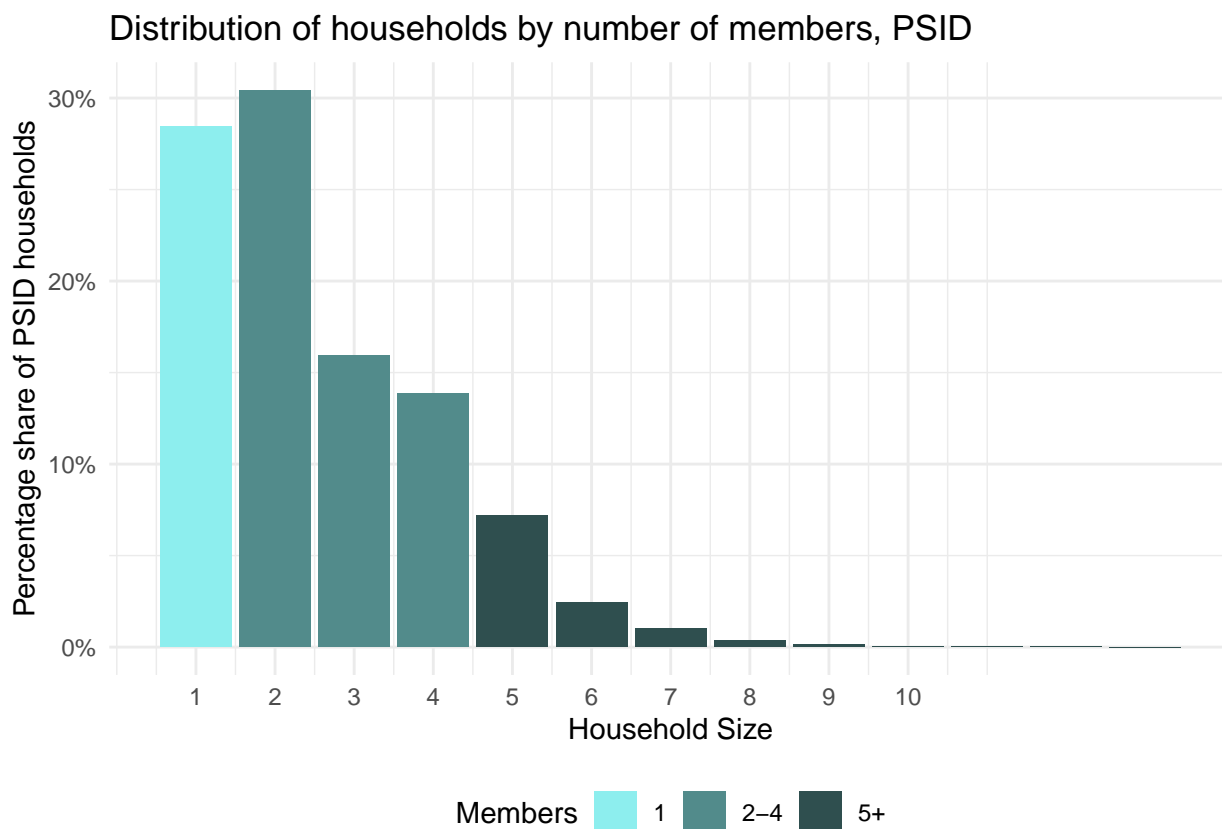
## Question 6: household size

The average household in the dataset has 2.6 members. Households with only 1 member make up 28.45% of the data. Households with 5 or more members make up 11.29%.

Table 1: Percentage share of PSID households by size

size_group	count	pct
1	2579	28.45
2-4	5463	60.26
5+	1024	11.29

The histogram below shows the distribution of households by member count in the PSID dataset. Compared to the SCF histogram shown in class, the PSID histogram has fewer 2-member households and more 3-5 member households. The PSID dataset has 30.43% two-member households compared to the nearly 35% shown on Slide 2 of Section 1.1. PSID has a slightly larger share of households with 3 members: 15.95%, compared to the slide's 15%; a 13.88% share of 4-member households, compared to the slide's 12.5%; and a 7.2% share of 5-member households, compared to just past 5% in the slide.



## Part 2: Income Distribution

### Question 1: distribution of household income

The following histogram shows the distribution of household incomes in the PSID, with outliers exceeding the 99th percentile (\$396,420) omitted. The distribution is right-skewed, meaning there is a long trailing tail of outliers to the right. The median of \$55,090 is lower than the mean of \$78,266. The majority of households

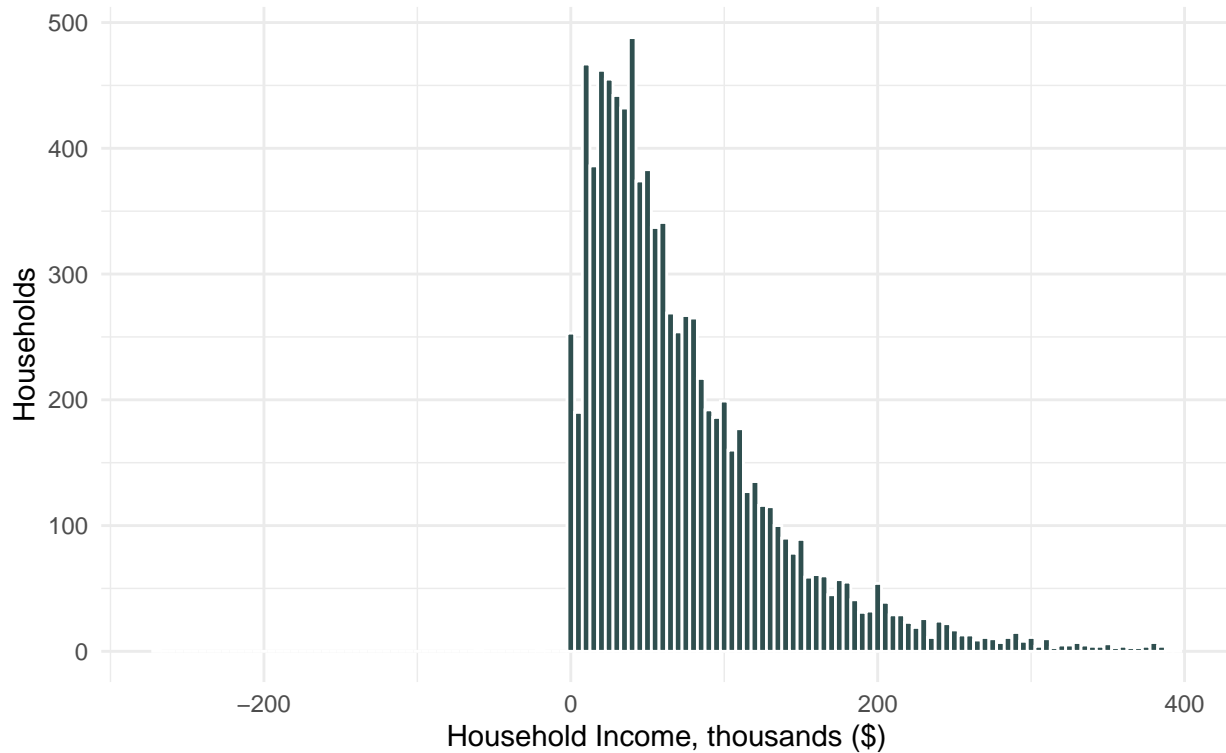
earn less than \$100,682, which is the 75th percentile. 25% of households surveyed have higher household incomes, up to \$2.125 million. 137 households have no income, and three households have negative income, with the lowest income being -\$267,900.

Table 2: Distribution of Household Incomes

Min.	1st Qu.	Median	Mean	3rd Qu.	Max.
-267900	28000	55090	78266	100681	2125100

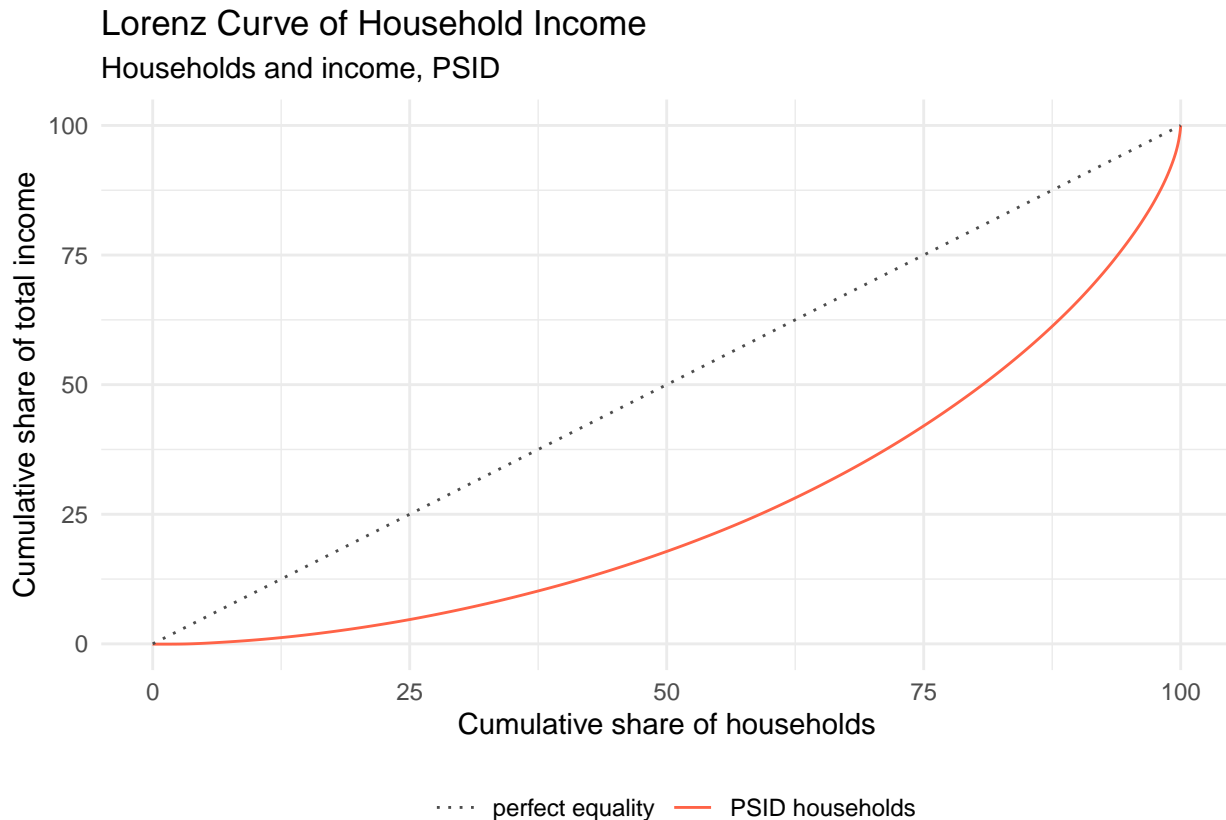
### Distribution of household incomes, PSID

Binwidth = \$5000, outliers above 99th percentile removed



### Question 2: household income Lorenz curve

The following Lorenz curve visualizes the cumulative share of households (x) against the cumulative share of income (y). The dotted line is what the curve would look like at perfect equality, where the bottom 50% of households possess 50% of total household income. The solid red line represents the relationship between cumulative household share and cumulative income share in reality.



We see on this curve that the lowest earning 50% of households in the PSID account for only 18% of total household income, and that the bottom 75% of households account for 42% of income. By contrast, the top 10% of highest earning households account for about a third of all household income, and the top 1% of households make around 8%. In this dataset, we can tell that high-earning households account for more than their proportional share of household income, indicating income inequality within the sample.

### Question 3: total household income coefficient of variation

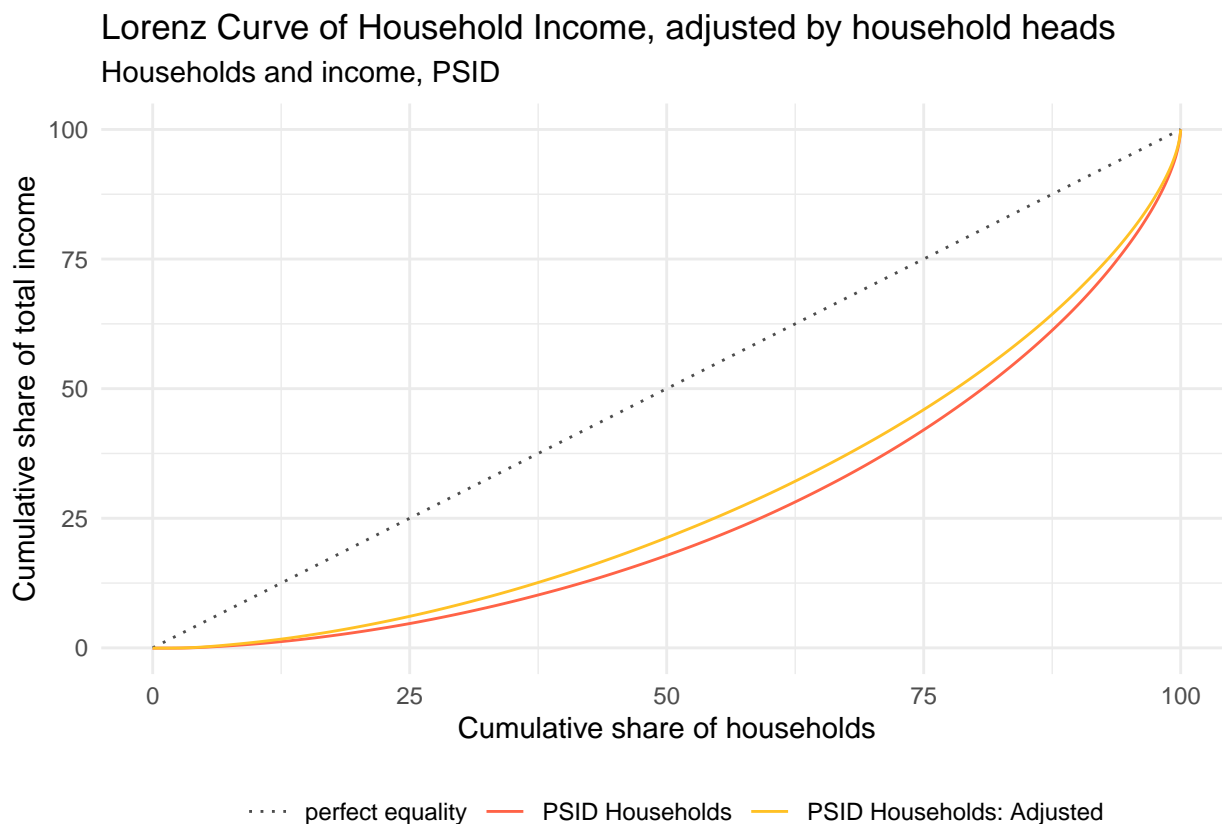
To further quantify the level of income inequality in the dataset, we can calculate the coefficient of variation by dividing the standard deviation in household income by the mean household income. This produces a coefficient of variation of 1.15, which is lower compared to the SCF. Based on slide 14 of Section 1.2 in the lecture slides, the coefficient of variation derived from the SCF was 5.31 in 2022. By this measure, there is less income inequality in the PSID sample than in the SCF sample.

```
## [1] "Coefficient of variation of household income: 1.152"
```

### Question 4: adjusted total household income Lorenz curve

When we adjust household income based on the number of household heads present, our Lorenz curve moves closer to the line of perfect equality, meaning that adjusting household income by the number of household heads decreases income inequality. This is intuitive: we are now adjusting for the number of potential earners in a household, allowing for a more fair comparison between households with one and two heads.

On the yellow curve representing the relationship between adjusted income share and household share, we see that the bottom 50% of households account for 21% of income, compared to the 18% on the non-adjusted curve. This indicates that some of the inequality among households may be attributed to differences in household size and the number of earners.



### Question 5: household income percentile ratios

The table below displays the 30th, 50th, 90th, and 99th percentiles of household income in the dataset. Based on these percentile, we know that 30% of the sampled households earn \$33,107.50 or less per year; 50% earn \$55,090 or less; 90% earn \$161,188 or less; and 99% earn \$396,420 or less. The wide gap between the 50th and the 90th percentile is a clear marker of income inequality.

Table 3: PSID Household Income Percentiles

percentile	value
30th	\$33,107.50
50th	\$55,090.00
90th	\$161,188
99th	\$396,420

The percentile ratios in the following table further illustrate an unequal income distribution, where households at the top earn several times more than those in the middle or bottom. The 90-30 ratio is 4.87, meaning households at the top earn 4.87 times what households at the bottom earn. The 90-50 ratio is 2.93, meaning households at the top earn 2.93 times what households in the middle earn. The 30-10 ratio is 2.67, meaning there is income inequality within the bottom as well, with those at the 30th percentile earning 2.67 times what those at the 10th percentile earn. The 99-50 ratio is 7.2, meaning that households at the very top of the distribution earn 7.2 times what households in the middle earn, indicating extreme concentration of income at the very top.

The numbers in the SCF are even more drastic: in 2022, the 90-50 ratio was 3.54 and the 99-50 ratio was 17.05. This may be due to SCF's sampling again: by over-sampling the ultra-wealthy, the SCF likely captures much higher incomes in the upper end of its distribution than the PSID does.

Table 4: PSID Household Income Percentile Ratios

percentile_ratio	value
90-30	4.87
90-50	2.93
30-10	2.67
99-50	7.2

### Question 6: mean household income and share by quintile

The following table further illustrates the income inequality among PSID households: the highest disparities between consecutive quintiles are between quintiles 1 and 2 and quintiles 4 and 5. Quintile 2 has a mean income of \$33,188, 2.76 times the first quintile's mean income of \$12,003. The second quintile's income share of 8.5% is 2.74 times that of the first quintile (3.1%). The fifth quintile's income of \$199,894 is 2.21 times that of the fourth quintile (\$90,408). The fifth quintile's income share of 51.1% is 2.21 times that of the fourth quintile. It's also notable that the income share of the top quintile is greater than that of the 4 lower quintiles combined, visualized in the plot below. Taken together, this shows the high overall income inequality among PSID households, as well as the heightened inequality at the two ends of the distribution.

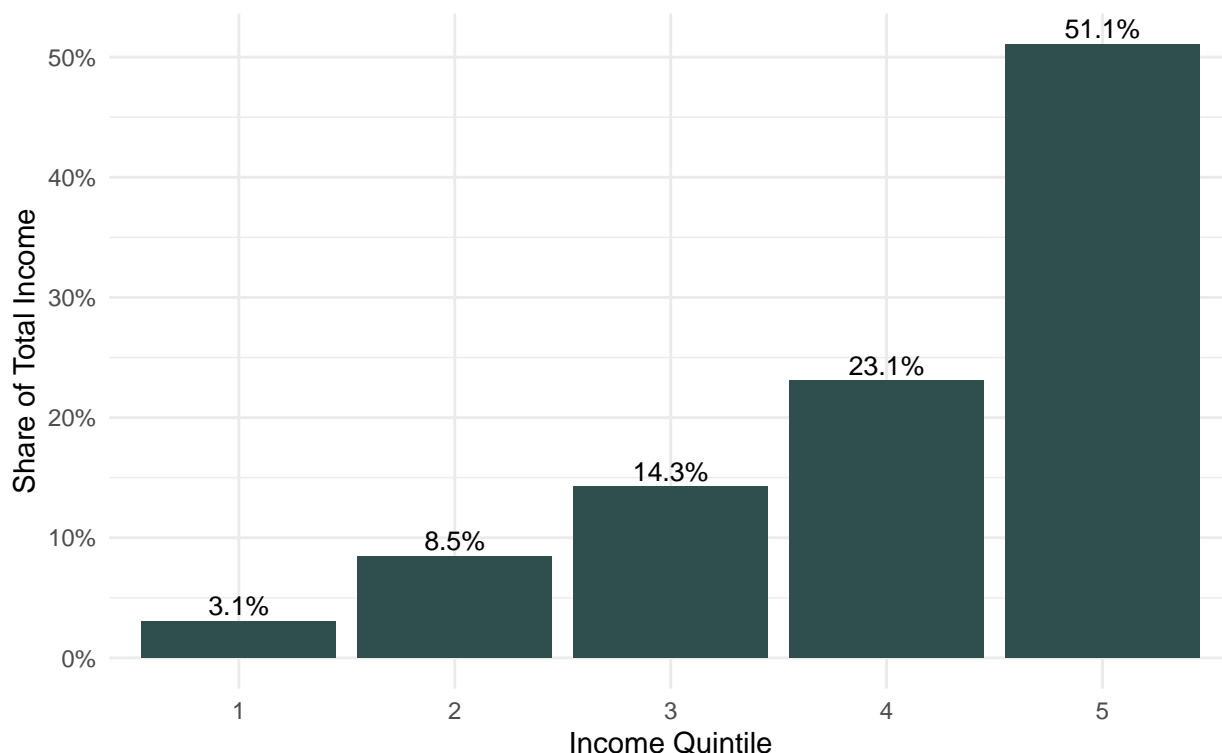
Compared to SCF (Section 1.2, slide 9), the average income is lower for all quintiles in the PSID. The first four quintiles have a higher income share in the PSID, while the fifth quintile has a higher income share in the SCF. This pattern once again speaks to the difference in sampling across the two surveys.

Table 5: Share of total household income and mean income by quintile

quintile	income_share	mean_income
1	3.1%	\$12,003
2	8.5%	\$33,188
3	14.3%	\$55,883
4	23.1%	\$90,408
5	51.1%	\$199,894

## Top 20% of PSID households earns larger share of income than bottom 80

### Share of total household income by quintile



### Question 7: mean total household income and share for the top 1%

As discussed in class, looking at mean incomes and income shares by quintiles can obscure the inequality within the top of the distribution. Looking at the top 1% of households, we see that their mean income (\$639,974) is 8.81 times that of the bottom 99% (\$72,570), and 3.2 times that of the top quintile (\$199,894). In terms of income share, the top 1% accounts for 8% of all household income, making up nearly one-sixth of the top quintile's share. Even within the top quintile, there is drastic inequality between the highest and lowest earners.

Compared to the SCF (based on Section 1.2 Slide 9), the top 1% has a lower income share and mean income in the PSID (SCF reported 22.4% and \$3.18 million in 2022).

Table 6: Share of total household income and mean income held by the top 1%

group	income_share	mean_income
bottom 99%	92%	\$72,570
top 1%	8%	\$639,974

## Part 3: Labor Income

### Question 1: household earnings share and mean by quintile

We can create a variable for the total labor income by adding the LABOR\_HEAD and LABOR\_SPOUSE. Looking at total labor earnings of households, the inequality within the bottom of the distribution is much higher. The table below lists the mean household earnings and share of household earnings by quintile. The

second quintile of households (\$14,946) earns more than 500 times the labor income of the first quintile (\$26). The earnings inequality at the top of the distribution is lower: the ratio between the mean labor income of the fifth and fourth quintiles is 2.36.

Table 7: Share of total household labor income and mean labor income by quintile

quintile	labor_income_share	mean_labor_income
1	0.0%	\$26
2	5.0%	\$14,946
3	13.2%	\$39,141
4	24.3%	\$72,045
5	57.4%	\$170,314

## Question 2: total household income vs household earnings by quintile

Side by side, we can see that the distribution of earnings share is more unequal. The bottom quintile's share of earnings rounds to zero, while the bottom quintile's share of total household income is 3.1%. Quintiles 2 and 3 also hold smaller shares of earnings than they do total income. Quintile 4 has a slightly higher share of earnings than total income, and quintile 5's share of earnings is higher than total income by 6.3 percentage points. Compared to the distribution of total income, earnings is more unevenly distributed, with higher percentage shares in the top 2 quintiles.

Table 8: Total income vs earnings quintile shares

quintile	total_income_share	earnings_share
1	3.1%	0.0%
2	8.5%	5.0%
3	14.3%	13.2%
4	23.1%	24.3%
5	51.1%	57.4%

Calculating the coefficient of variation for both metrics confirms this: earnings have a coefficient of variation of 1.36, compared to 1.15 for household income. This indicates that there is more inequality in earnings than in income.

Table 9: Coefficient of Variation: Household Income and Earnings

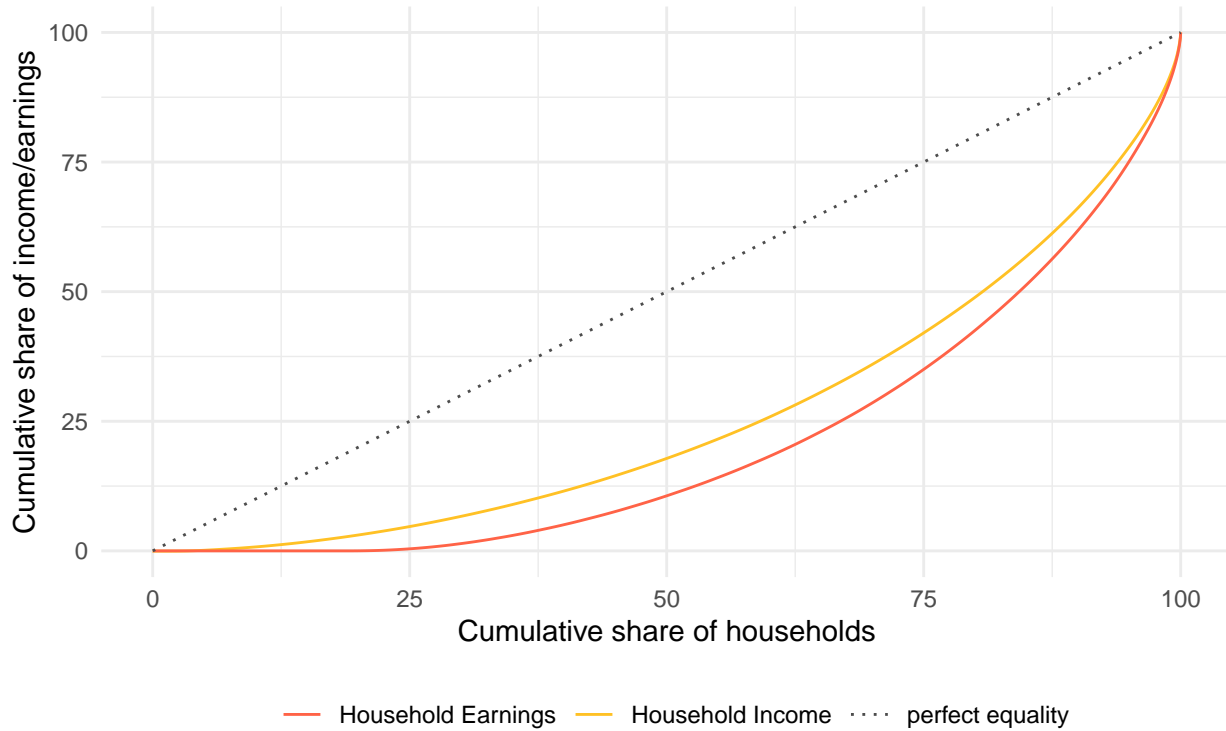
metric	cv
Household Income	1.15
Household Earnings	1.36

This trend is seen when plotted on a Lorenz curve, as well. The curve representing cumulative households against cumulative earnings is more far away from the line of perfect equality, indicating that its distribution is more unequal than that of household income. As discussed in class, redistributive policies like social insurance and means-tested transfers may be contributing to the household income of households at the bottom of the income distribution who do not have labor income. Consequently, the bottom quintile can have a higher share of total household income than household earnings.



## Household earnings is more unequal than household income

Lorenz curve of total household income and household earnings, PSID



### Question 3: average share of total household income from earnings

The average share of earnings in household income is 68.51%, indicating that households typically receive just over two-thirds of their income from labor income. This figure is excluding the 137 households with incomes of 0, as their share would be undefined.

```
## [1] "Mean share of earnings in total household income: 68.51"
```

### Question 4: mean and share of labor earnings by quintile

In the dataset, higher income households derive a larger share of their income from labor earnings. The most stark difference is between quintile 1 and 2: the mean share of labor is 46.6% in the former, and increases by 18.9 percentage points in quintile 2. The difference in the earnings share between the remaining quintiles is modest: between quintile 2 and 5, the total increase is less than that between quintile 1 and 2.

Compared to the SCF (based on Section 1.2, Slide 11),

Table 10: Share of total household income from labor earnings by quintile, PSID

quintile	mean_labor_share
1	46.6%
2	65.5%
3	71.9%
4	76.8%
5	80.2%

When we separate the top 1% of households, we see that they get 77.1% of their income from labor earnings, higher than the overall mean.

These shares are all higher than SCF (according to Section 1.2, Slide 11). The subset with the most dramatic difference between PSID and SCF is the top 1%: in 2022, the SCF reported that 34.5% of household income in the top 1% came from labor, less than half of the PSID's estimate. The reason for this difference may be that SCF's wealthier sample relies more heavily on capital income, while PSID's sample captures a more representative breakdown of income sources.

Table 11: Share of total household income from labor earnings, top 1%, PSID

group	mean_labor_share
bottom 99%	68.4%
top 1%	77.1%

### Question 5: weekly wage, contribution of hours and wages to labor earnings inequality

In the dataset, there are 6,971 households where the household head has positive labor earnings and weeks of work. The mean weekly wage for these household heads is \$1,117.74.

```
## [1] "Positive weeks worked and labor earnings: 6971"
```

```
## [1] "Mean weekly wage of household head: 1117.74"
```

A variance decomposition shows that most earnings inequality arises from wage dispersion: the variance of log wages (0.87) is much larger than the variance of log weeks worked (0.17). The positive covariance indicates that individuals with higher wages also tend to work more weeks, further amplifying overall earnings inequality. These results suggest that differences in log wages contribute much more to log earnings inequality than differences in log weeks worked.

However, a caveat to this decomposition is that it assumes a covariance of zero when this is not the case. We cannot fully separate out the link between earnings and weeks worked vs weekly wages. Additionally, this analysis is restricted to household heads with positive weeks worked and positive labor earnings. By excluding those who did not work or earn, the approach may understate the role of weeks worked in earnings inequality, as those at the bottom of the earnings distribution could be working very few weeks or not at all due to limited employment opportunities.

Table 12: Weekly wages log decomposition results

component	value
Var(log wage)	0.8741
Var(log weeks)	0.1674
Cov(log wage, log weeks)	0.07425
Var(log earnings)	1.19

### Question 6: regression of log-weekly wages

A linear regression of the log-transformed wage of the household head on the head's age, age-squared, education, and occupation provides further information about the drivers of wage inequality. The observables in this regression explain 44% of the variation in log-transformed wages, while the residuals (residual standard error = 0.7243, variance = 0.4883) explain 56%.

```
## [1] "Share of inequality explained by observables: 0.44"
```

## [1] "Share of inequality explained by residuals: 0.56"

	Estimate	Std. Error	t value	Pr(> t )
(Intercept)	5.57	0.2915	19.11	3.309e-79
AGE_HEAD	0.08667	0.004385	19.77	1.706e-84
AGE_HEAD_SQ	-0.0009439	4.743e-05	-19.9	1.426e-85
EDU_HEAD_CAT1	0.9103	0.7634	1.192	0.2332
EDU_HEAD_CAT2	-0.5371	0.3407	-1.576	0.115
EDU_HEAD_CAT3	-0.4021	0.309	-1.301	0.1933
EDU_HEAD_CAT4	0.13	0.3316	0.3921	0.695
EDU_HEAD_CAT5	-0.00903	0.3792	-0.02381	0.981
EDU_HEAD_CAT6	-0.1086	0.2524	-0.4304	0.6669
EDU_HEAD_CAT7	-0.05192	0.2917	-0.178	0.8587
EDU_HEAD_CAT8	-0.2889	0.2648	-1.091	0.2753
EDU_HEAD_CAT9	-0.02506	0.2466	-0.1016	0.9191
EDU_HEAD_CAT10	-0.148	0.2409	-0.6144	0.5389
EDU_HEAD_CAT11	-0.1938	0.2372	-0.8172	0.4138
EDU_HEAD_CAT12	0.02601	0.2351	0.1107	0.9119
EDU_HEAD_CAT13	0.07139	0.2365	0.3019	0.7627
EDU_HEAD_CAT14	0.1365	0.2358	0.579	0.5626
EDU_HEAD_CAT15	0.0939	0.2381	0.3944	0.6933
EDU_HEAD_CAT16	0.3268	0.2362	1.384	0.1665
EDU_HEAD_CAT17	0.371	0.2369	1.566	0.1173
OCC_HEAD_CAT20	-0.07642	0.1869	-0.4089	0.6826
OCC_HEAD_CAT30	-1.457	0.5311	-2.743	0.006109
OCC_HEAD_CAT40	-0.0127	0.2593	-0.04897	0.9609
OCC_HEAD_CAT50	-0.121	0.1789	-0.6767	0.4986
OCC_HEAD_CAT60	0.02192	0.3272	0.06697	0.9466
OCC_HEAD_CAT100	-0.105	0.3075	-0.3416	0.7327
OCC_HEAD_CAT110	0.07053	0.1869	0.3774	0.7059
OCC_HEAD_CAT120	-0.01643	0.1779	-0.09233	0.9264
OCC_HEAD_CAT136	-0.3377	0.2515	-1.343	0.1794
OCC_HEAD_CAT137	0.8559	0.738	1.16	0.2462
OCC_HEAD_CAT140	-0.4616	0.2056	-2.245	0.02481
OCC_HEAD_CAT150	-0.4286	0.4409	-0.9721	0.3311
OCC_HEAD_CAT160	-0.2947	0.2208	-1.335	0.182
OCC_HEAD_CAT205	-0.4332	0.2337	-1.854	0.06385
OCC_HEAD_CAT220	-0.2318	0.1695	-1.367	0.1717
OCC_HEAD_CAT230	-0.7736	0.1924	-4.021	5.873e-05
OCC_HEAD_CAT300	-0.1214	0.2082	-0.583	0.5599
OCC_HEAD_CAT310	-0.5331	0.2111	-2.525	0.01159
OCC_HEAD_CAT325	-0.4435	0.4408	-1.006	0.3145
OCC_HEAD_CAT340	-1.125	0.3528	-3.189	0.001432
OCC_HEAD_CAT350	-0.4059	0.2245	-1.808	0.07059
OCC_HEAD_CAT360	-0.6892	0.5309	-1.298	0.1943
OCC_HEAD_CAT400	-0.7394	0.7384	-1.001	0.3167
OCC_HEAD_CAT410	-0.4439	0.1994	-2.226	0.02603
OCC_HEAD_CAT420	-0.8092	0.2592	-3.122	0.001802
OCC_HEAD_CAT425	-0.2802	0.7378	-0.3798	0.7041
OCC_HEAD_CAT430	-0.573	0.1567	-3.656	0.0002578
OCC_HEAD_CAT500	0.08418	0.738	0.1141	0.9092
OCC_HEAD_CAT510	-0.2021	0.5312	-0.3805	0.7036
OCC_HEAD_CAT520	-0.839	0.2686	-3.124	0.001792

	Estimate	Std. Error	t value	Pr(> t )
OCC_HEAD_CAT530	-0.2025	0.2592	-0.7815	0.4345
OCC_HEAD_CAT540	-0.7085	0.2336	-3.034	0.002425
OCC_HEAD_CAT565	-0.4529	0.2243	-2.019	0.04349
OCC_HEAD_CAT600	-0.6734	0.3076	-2.189	0.02863
OCC_HEAD_CAT630	-0.6187	0.2515	-2.46	0.01393
OCC_HEAD_CAT640	-0.5007	0.3884	-1.289	0.1974
OCC_HEAD_CAT650	-0.2707	0.2333	-1.16	0.246
OCC_HEAD_CAT700	-0.7466	0.2919	-2.558	0.01056
OCC_HEAD_CAT710	-0.1549	0.1972	-0.7857	0.4321
OCC_HEAD_CAT725	-0.9012	0.3271	-2.755	0.005892
OCC_HEAD_CAT726	-1.03	0.4411	-2.336	0.01953
OCC_HEAD_CAT735	-0.5008	0.2141	-2.339	0.01938
OCC_HEAD_CAT740	-0.2902	0.2333	-1.244	0.2135
OCC_HEAD_CAT800	-0.5381	0.1737	-3.097	0.001963
OCC_HEAD_CAT810	-0.3904	0.2916	-1.339	0.1807
OCC_HEAD_CAT820	-0.5838	0.4409	-1.324	0.1855
OCC_HEAD_CAT830	-0.064	0.5308	-0.1206	0.904
OCC_HEAD_CAT840	0.1456	0.2247	0.6477	0.5172
OCC_HEAD_CAT850	0.05137	0.2171	0.2366	0.813
OCC_HEAD_CAT860	-0.3256	0.4411	-0.7381	0.4605
OCC_HEAD_CAT910	-0.3537	0.2059	-1.717	0.08597
OCC_HEAD_CAT930	-0.9789	0.7381	-1.326	0.1848
OCC_HEAD_CAT940	-0.7022	0.292	-2.405	0.0162
OCC_HEAD_CAT950	-1.086	0.531	-2.045	0.0409
OCC_HEAD_CAT1005	-0.1892	0.738	-0.2564	0.7976
OCC_HEAD_CAT1006	-0.3064	0.2387	-1.284	0.1993
OCC_HEAD_CAT1007	-0.1401	0.2683	-0.522	0.6017
OCC_HEAD_CAT1010	-0.2241	0.2137	-1.048	0.2945
OCC_HEAD_CAT1020	-0.1364	0.169	-0.8071	0.4197
OCC_HEAD_CAT1030	-0.4881	0.2684	-1.819	0.06902
OCC_HEAD_CAT1050	-0.5649	0.179	-3.156	0.001607
OCC_HEAD_CAT1060	-0.2999	0.2448	-1.225	0.2206
OCC_HEAD_CAT1105	-0.3974	0.2171	-1.831	0.06722
OCC_HEAD_CAT1106	-0.3595	0.3074	-1.169	0.2423
OCC_HEAD_CAT1107	-0.7487	0.3272	-2.288	0.02218
OCC_HEAD_CAT1200	0.2906	0.5311	0.5472	0.5843
OCC_HEAD_CAT1220	-0.6992	0.5311	-1.317	0.188
OCC_HEAD_CAT1300	-0.6996	0.3272	-2.138	0.03256
OCC_HEAD_CAT1320	-0.05466	0.327	-0.1672	0.8672
OCC_HEAD_CAT1340	-1.567	0.4411	-3.553	0.0003832
OCC_HEAD_CAT1350	-0.07021	0.3527	-0.1991	0.8422
OCC_HEAD_CAT1360	-0.1613	0.2446	-0.6596	0.5095
OCC_HEAD_CAT1400	0.1954	0.4409	0.4433	0.6576
OCC_HEAD_CAT1410	-0.1053	0.2245	-0.4692	0.639
OCC_HEAD_CAT1420	-0.1494	0.3527	-0.4237	0.6718
OCC_HEAD_CAT1430	-0.1424	0.3073	-0.4632	0.6432
OCC_HEAD_CAT1440	0.09549	0.7378	0.1294	0.897
OCC_HEAD_CAT1450	-0.5655	0.5311	-1.065	0.2871
OCC_HEAD_CAT1460	-0.11	0.2108	-0.5219	0.6017
OCC_HEAD_CAT1500	-0.3086	0.7379	-0.4182	0.6758
OCC_HEAD_CAT1520	-0.5361	0.4413	-1.215	0.2245
OCC_HEAD_CAT1530	0.3534	0.7382	0.4788	0.6321

	Estimate	Std. Error	t value	Pr(> t )
OCC_HEAD_CAT1540	-0.4929	0.2923	-1.686	0.09185
OCC_HEAD_CAT1550	-0.6119	0.1941	-3.153	0.001625
OCC_HEAD_CAT1560	-0.8314	0.441	-1.885	0.05943
OCC_HEAD_CAT1600	-0.7522	0.7399	-1.017	0.3094
OCC_HEAD_CAT1610	-0.7483	0.2449	-3.056	0.002253
OCC_HEAD_CAT1650	-0.7081	0.4413	-1.605	0.1086
OCC_HEAD_CAT1700	-0.09414	0.3886	-0.2423	0.8086
OCC_HEAD_CAT1710	-1.458	0.7381	-1.976	0.04824
OCC_HEAD_CAT1720	-0.7938	0.327	-2.427	0.01524
OCC_HEAD_CAT1740	-1.042	0.279	-3.735	0.000189
OCC_HEAD_CAT1760	-0.6741	0.738	-0.9134	0.3611
OCC_HEAD_CAT1800	0.07684	0.5312	0.1447	0.885
OCC_HEAD_CAT1815	-0.4607	0.3883	-1.187	0.2354
OCC_HEAD_CAT1820	-1.024	0.3077	-3.326	0.0008864
OCC_HEAD_CAT1840	-0.7697	0.4409	-1.746	0.08092
OCC_HEAD_CAT1860	-1.171	0.3884	-3.016	0.002571
OCC_HEAD_CAT1900	-0.3691	0.5334	-0.6919	0.489
OCC_HEAD_CAT1920	-0.5888	0.3886	-1.515	0.1297
OCC_HEAD_CAT1930	-0.235	0.5313	-0.4423	0.6583
OCC_HEAD_CAT1950	-0.2927	0.738	-0.3967	0.6916
OCC_HEAD_CAT1965	-0.7116	0.3075	-2.314	0.02068
OCC_HEAD_CAT2000	-1.059	0.1758	-6.025	1.781e-09
OCC_HEAD_CAT2010	-0.9793	0.1909	-5.131	2.969e-07
OCC_HEAD_CAT2015	-0.8714	0.3885	-2.243	0.02493
OCC_HEAD_CAT2016	-1.215	0.2686	-4.522	6.241e-06
OCC_HEAD_CAT2025	-1.157	0.2082	-5.557	2.846e-08
OCC_HEAD_CAT2040	-1.265	0.2081	-6.08	1.268e-09
OCC_HEAD_CAT2050	-0.7994	0.531	-1.505	0.1323
OCC_HEAD_CAT2100	-0.01861	0.1862	-0.09994	0.9204
OCC_HEAD_CAT2105	-1.059	0.7381	-1.434	0.1516
OCC_HEAD_CAT2110	-0.06135	0.3274	-0.1874	0.8513
OCC_HEAD_CAT2145	-0.6873	0.279	-2.464	0.01377
OCC_HEAD_CAT2160	-0.7087	0.3883	-1.825	0.06799
OCC_HEAD_CAT2200	-0.8297	0.18	-4.61	4.107e-06
OCC_HEAD_CAT2300	-1.398	0.221	-6.326	2.676e-10
OCC_HEAD_CAT2310	-1.116	0.1629	-6.851	8.024e-12
OCC_HEAD_CAT2320	-0.867	0.1693	-5.123	3.097e-07
OCC_HEAD_CAT2330	-0.9993	0.2516	-3.972	7.211e-05
OCC_HEAD_CAT2340	-1.689	0.2293	-7.367	1.96e-13
OCC_HEAD_CAT2400	-0.7589	0.5314	-1.428	0.1533
OCC_HEAD_CAT2430	-0.982	0.3076	-3.192	0.001419
OCC_HEAD_CAT2440	-0.9972	0.738	-1.351	0.1767
OCC_HEAD_CAT2540	-1.446	0.1825	-7.92	2.764e-15
OCC_HEAD_CAT2550	-0.8743	0.2387	-3.663	0.0002516
OCC_HEAD_CAT2600	-2.669	0.2521	-10.59	5.526e-26
OCC_HEAD_CAT2630	-0.8489	0.1974	-4.3	1.729e-05
OCC_HEAD_CAT2700	-0.7866	0.389	-2.022	0.04321
OCC_HEAD_CAT2710	-0.4807	0.3076	-1.562	0.1182
OCC_HEAD_CAT2720	-1.467	0.2205	-6.652	3.134e-11
OCC_HEAD_CAT2740	-1.94	0.7384	-2.627	0.008628
OCC_HEAD_CAT2750	-1.623	0.2209	-7.349	2.242e-13
OCC_HEAD_CAT2760	-1.82	0.3885	-4.685	2.856e-06

	Estimate	Std. Error	t value	Pr(> t )
OCC_HEAD_CAT2800	-1.425	0.4414	-3.228	0.001251
OCC_HEAD_CAT2810	-0.005063	0.4409	-0.01148	0.9908
OCC_HEAD_CAT2825	-0.5049	0.3532	-1.43	0.1529
OCC_HEAD_CAT2830	-1.026	0.3271	-3.135	0.001723
OCC_HEAD_CAT2840	-0.6048	0.3528	-1.714	0.08652
OCC_HEAD_CAT2850	-0.8386	0.2916	-2.876	0.004047
OCC_HEAD_CAT2860	-1.166	0.5311	-2.195	0.02818
OCC_HEAD_CAT2900	-0.4972	0.3527	-1.41	0.1587
OCC_HEAD_CAT2910	-0.647	0.3273	-1.977	0.0481
OCC_HEAD_CAT2920	-1.021	0.3277	-3.114	0.001853
OCC_HEAD_CAT2960	-1.045	0.7381	-1.416	0.1569
OCC_HEAD_CAT3000	-1.016	0.5309	-1.915	0.05558
OCC_HEAD_CAT3010	0.2784	0.3079	0.9043	0.3659
OCC_HEAD_CAT3030	-1.238	0.738	-1.678	0.09346
OCC_HEAD_CAT3050	0.0657	0.2796	0.235	0.8142
OCC_HEAD_CAT3060	0.09229	0.1873	0.4927	0.6223
OCC_HEAD_CAT3110	-0.6136	0.4411	-1.391	0.1643
OCC_HEAD_CAT3150	-0.3296	0.531	-0.6208	0.5348
OCC_HEAD_CAT3160	-0.4318	0.3887	-1.111	0.2667
OCC_HEAD_CAT3220	-0.7307	0.5313	-1.375	0.1691
OCC_HEAD_CAT3230	-0.7748	0.441	-1.757	0.07894
OCC_HEAD_CAT3245	-1.58	0.5314	-2.973	0.002959
OCC_HEAD_CAT3250	0.2142	0.5312	0.4032	0.6868
OCC_HEAD_CAT3255	-0.4977	0.1676	-2.97	0.002989
OCC_HEAD_CAT3257	-0.6697	0.7381	-0.9073	0.3643
OCC_HEAD_CAT3258	-0.5607	0.292	-1.92	0.05487
OCC_HEAD_CAT3260	-0.9934	0.5312	-1.87	0.06153
OCC_HEAD_CAT3300	-1.11	0.2334	-4.754	2.036e-06
OCC_HEAD_CAT3310	-1.071	0.4417	-2.425	0.01533
OCC_HEAD_CAT3320	-0.7051	0.2918	-2.417	0.01569
OCC_HEAD_CAT3400	-0.7703	0.2685	-2.869	0.004135
OCC_HEAD_CAT3420	-1.135	0.245	-4.63	3.729e-06
OCC_HEAD_CAT3500	-0.9196	0.2	-4.598	4.347e-06
OCC_HEAD_CAT3510	-0.898	0.3076	-2.92	0.003516
OCC_HEAD_CAT3520	-1.265	0.5312	-2.382	0.01726
OCC_HEAD_CAT3535	-1.007	0.2793	-3.606	0.0003137
OCC_HEAD_CAT3540	-0.6553	0.3882	-1.688	0.09149
OCC_HEAD_CAT3600	-1.324	0.1533	-8.637	7.207e-18
OCC_HEAD_CAT3610	-0.5423	0.7381	-0.7348	0.4625
OCC_HEAD_CAT3620	-0.9643	0.3533	-2.73	0.00636
OCC_HEAD_CAT3630	-1.654	0.3888	-4.254	2.126e-05
OCC_HEAD_CAT3640	-1.021	0.3538	-2.887	0.003897
OCC_HEAD_CAT3645	-1.075	0.2293	-4.691	2.777e-06
OCC_HEAD_CAT3646	-0.2737	0.7378	-0.371	0.7106
OCC_HEAD_CAT3647	-1.308	0.5315	-2.461	0.01386
OCC_HEAD_CAT3649	-0.8238	0.3882	-2.122	0.03388
OCC_HEAD_CAT3655	-1.066	0.26	-4.102	4.142e-05
OCC_HEAD_CAT3700	-0.4956	0.4414	-1.123	0.2616
OCC_HEAD_CAT3710	-0.2984	0.2333	-1.279	0.201
OCC_HEAD_CAT3720	-0.08934	0.2792	-0.3201	0.7489
OCC_HEAD_CAT3730	-0.7268	0.2449	-2.967	0.003015
OCC_HEAD_CAT3740	-0.3663	0.234	-1.565	0.1175

	Estimate	Std. Error	t value	Pr(> t )
OCC_HEAD_CAT3800	-0.5777	0.196	-2.948	0.00321
OCC_HEAD_CAT3820	-0.2742	0.2387	-1.149	0.2508
OCC_HEAD_CAT3840	-1.022	0.5315	-1.922	0.05464
OCC_HEAD_CAT3850	-0.4686	0.1763	-2.658	0.007881
OCC_HEAD_CAT3860	-0.5708	0.7384	-0.773	0.4395
OCC_HEAD_CAT3910	-0.6769	0.3272	-2.069	0.03858
OCC_HEAD_CAT3930	-1.19	0.1666	-7.145	1.001e-12
OCC_HEAD_CAT3940	-3.16	0.738	-4.282	1.875e-05
OCC_HEAD_CAT3945	-0.4242	0.7391	-0.574	0.566
OCC_HEAD_CAT3955	-0.5696	0.4416	-1.29	0.1972
OCC_HEAD_CAT4000	-1.01	0.2177	-4.641	3.544e-06
OCC_HEAD_CAT4010	-1.142	0.1588	-7.191	7.139e-13
OCC_HEAD_CAT4020	-1.529	0.1625	-9.412	6.612e-21
OCC_HEAD_CAT4030	-1.397	0.1918	-7.287	3.536e-13
OCC_HEAD_CAT4040	-1.308	0.2342	-5.584	2.447e-08
OCC_HEAD_CAT4050	-1.625	0.172	-9.447	4.754e-21
OCC_HEAD_CAT4060	-1.85	0.2405	-7.693	1.651e-14
OCC_HEAD_CAT4110	-1.168	0.1782	-6.554	6.019e-11
OCC_HEAD_CAT4120	-1.024	0.7386	-1.386	0.1657
OCC_HEAD_CAT4130	-0.9188	0.3534	-2.6	0.00935
OCC_HEAD_CAT4140	-1.485	0.2458	-6.042	1.604e-09
OCC_HEAD_CAT4150	-1.499	0.3891	-3.851	0.0001186
OCC_HEAD_CAT4160	-1.336	0.5322	-2.51	0.01209
OCC_HEAD_CAT4200	-0.9276	0.1757	-5.279	1.338e-07
OCC_HEAD_CAT4210	-0.9241	0.1998	-4.624	3.832e-06
OCC_HEAD_CAT4220	-1.346	0.156	-8.631	7.555e-18
OCC_HEAD_CAT4230	-1.779	0.1667	-10.68	2.171e-26
OCC_HEAD_CAT4240	-0.615	0.5352	-1.149	0.2505
OCC_HEAD_CAT4250	-1.787	0.1603	-11.15	1.336e-28
OCC_HEAD_CAT4320	-0.6196	0.239	-2.593	0.009533
OCC_HEAD_CAT4350	-1.82	0.2684	-6.779	1.317e-11
OCC_HEAD_CAT4400	-0.9847	0.4412	-2.232	0.02564
OCC_HEAD_CAT4420	-3.684	0.74	-4.979	6.558e-07
OCC_HEAD_CAT4430	-1.38	0.4417	-3.125	0.001788
OCC_HEAD_CAT4460	-2.079	0.5315	-3.911	9.271e-05
OCC_HEAD_CAT4465	-0.9334	0.4409	-2.117	0.03429
OCC_HEAD_CAT4500	-1.377	0.2297	-5.995	2.14e-09
OCC_HEAD_CAT4510	-1.655	0.1861	-8.897	7.332e-19
OCC_HEAD_CAT4520	-1.474	0.3274	-4.501	6.874e-06
OCC_HEAD_CAT4530	-1.307	0.5315	-2.459	0.01396
OCC_HEAD_CAT4540	-1.282	0.3882	-3.303	0.0009601
OCC_HEAD_CAT4600	-2.085	0.1651	-12.63	3.685e-36
OCC_HEAD_CAT4610	-1.599	0.1651	-9.684	4.966e-22
OCC_HEAD_CAT4620	-1.419	0.2918	-4.862	1.188e-06
OCC_HEAD_CAT4640	-0.8281	0.5311	-1.559	0.119
OCC_HEAD_CAT4650	-1.602	0.3886	-4.123	3.782e-05
OCC_HEAD_CAT4700	-0.7333	0.1551	-4.729	2.306e-06
OCC_HEAD_CAT4710	0.01683	0.1857	0.0906	0.9278
OCC_HEAD_CAT4720	-1.62	0.1641	-9.873	7.916e-23
OCC_HEAD_CAT4740	-0.6522	0.3532	-1.847	0.06485
OCC_HEAD_CAT4750	-0.7527	0.308	-2.444	0.01456
OCC_HEAD_CAT4760	-1.026	0.1577	-6.507	8.26e-11

	Estimate	Std. Error	t value	Pr(> t )
OCC_HEAD_CAT4800	-0.6471	0.292	-2.216	0.02673
OCC_HEAD_CAT4810	-0.4802	0.1909	-2.516	0.0119
OCC_HEAD_CAT4820	0.2689	0.2919	0.9211	0.357
OCC_HEAD_CAT4830	-1.141	0.4413	-2.586	0.00974
OCC_HEAD_CAT4840	-0.5371	0.1885	-2.849	0.004394
OCC_HEAD_CAT4850	-0.3647	0.1715	-2.127	0.03345
OCC_HEAD_CAT4900	-1.588	0.2918	-5.443	5.423e-08
OCC_HEAD_CAT4920	-0.8009	0.1994	-4.017	5.953e-05
OCC_HEAD_CAT4930	-0.1093	0.531	-0.2059	0.8369
OCC_HEAD_CAT4940	-0.5353	0.3532	-1.515	0.1297
OCC_HEAD_CAT4950	-1.424	0.2699	-5.275	1.371e-07
OCC_HEAD_CAT4965	-1.517	0.246	-6.165	7.461e-10
OCC_HEAD_CAT5000	-0.701	0.1579	-4.44	9.15e-06
OCC_HEAD_CAT5010	-1.281	0.531	-2.413	0.01584
OCC_HEAD_CAT5100	-1.027	0.3076	-3.339	0.0008441
OCC_HEAD_CAT5110	-1.027	0.2207	-4.653	3.336e-06
OCC_HEAD_CAT5120	-0.9336	0.1884	-4.956	7.396e-07
OCC_HEAD_CAT5130	-1.194	0.7383	-1.617	0.1059
OCC_HEAD_CAT5140	-0.9471	0.3272	-2.895	0.00381
OCC_HEAD_CAT5150	-0.873	0.4415	-1.977	0.04803
OCC_HEAD_CAT5160	-0.9351	0.2522	-3.708	0.0002103
OCC_HEAD_CAT5165	-0.8093	0.4411	-1.835	0.06662
OCC_HEAD_CAT5200	-0.6619	0.4412	-1.5	0.1336
OCC_HEAD_CAT5220	-0.5421	0.3276	-1.655	0.09802
OCC_HEAD_CAT5230	-1.374	0.3887	-3.535	0.0004111
OCC_HEAD_CAT5240	-1.033	0.1612	-6.406	1.595e-10
OCC_HEAD_CAT5260	-0.9706	0.3534	-2.747	0.006039
OCC_HEAD_CAT5300	-1.759	0.2599	-6.768	1.416e-11
OCC_HEAD_CAT5310	-1.519	0.3077	-4.935	8.202e-07
OCC_HEAD_CAT5320	-1.266	0.3077	-4.115	3.913e-05
OCC_HEAD_CAT5330	-0.7769	0.3076	-2.526	0.01156
OCC_HEAD_CAT5340	-0.7652	0.3272	-2.338	0.0194
OCC_HEAD_CAT5350	-0.3792	0.738	-0.5138	0.6074
OCC_HEAD_CAT5360	-0.7572	0.3882	-1.95	0.05119
OCC_HEAD_CAT5400	-1.482	0.2021	-7.331	2.559e-13
OCC_HEAD_CAT5410	-0.8822	0.3533	-2.497	0.01255
OCC_HEAD_CAT5420	-1.823	0.2921	-6.242	4.586e-10
OCC_HEAD_CAT5500	-0.9099	0.5314	-1.712	0.08689
OCC_HEAD_CAT5510	-1.26	0.1844	-6.834	9.008e-12
OCC_HEAD_CAT5520	-0.7945	0.2213	-3.591	0.0003319
OCC_HEAD_CAT5530	-0.9529	0.7379	-1.291	0.1966
OCC_HEAD_CAT5540	-0.5565	0.3275	-1.699	0.0893
OCC_HEAD_CAT5550	-0.6211	0.2019	-3.077	0.002103
OCC_HEAD_CAT5560	-0.3728	0.3887	-0.959	0.3376
OCC_HEAD_CAT5600	-0.8252	0.2517	-3.279	0.001047
OCC_HEAD_CAT5610	-1.029	0.1999	-5.147	2.727e-07
OCC_HEAD_CAT5620	-1.207	0.1597	-7.557	4.685e-14
OCC_HEAD_CAT5630	-0.5669	0.531	-1.068	0.2857
OCC_HEAD_CAT5700	-1.133	0.1654	-6.852	7.943e-12
OCC_HEAD_CAT5810	-1.084	0.2685	-4.036	5.488e-05
OCC_HEAD_CAT5820	-2.257	0.7378	-3.06	0.002225
OCC_HEAD_CAT5840	-1.019	0.2252	-4.523	6.212e-06



	Estimate	Std. Error	t value	Pr(> t )
OCC_HEAD_CAT5850	-0.8806	0.3535	-2.491	0.01275
OCC_HEAD_CAT5860	-1.163	0.2211	-5.262	1.474e-07
OCC_HEAD_CAT5910	-1.555	0.5315	-2.927	0.00344
OCC_HEAD_CAT5940	-1.477	0.2685	-5.501	3.916e-08
OCC_HEAD_CAT6005	-0.7686	0.2399	-3.204	0.001363
OCC_HEAD_CAT6010	-0.1172	0.738	-0.1588	0.8738
OCC_HEAD_CAT6020	-1.496	0.7385	-2.026	0.04286
OCC_HEAD_CAT6050	-1.383	0.1915	-7.222	5.725e-13
OCC_HEAD_CAT6100	0.13	0.389	0.3341	0.7383
OCC_HEAD_CAT6130	-1.1	0.328	-3.353	0.0008027
OCC_HEAD_CAT6200	-0.3795	0.1594	-2.381	0.01729
OCC_HEAD_CAT6220	-1.312	0.3305	-3.97	7.257e-05
OCC_HEAD_CAT6230	-0.8731	0.1731	-5.043	4.704e-07
OCC_HEAD_CAT6240	-1.175	0.2343	-5.014	5.483e-07
OCC_HEAD_CAT6250	-0.9537	0.2824	-3.377	0.0007369
OCC_HEAD_CAT6260	-0.9973	0.16	-6.234	4.845e-10
OCC_HEAD_CAT6300	-0.9767	0.5332	-1.832	0.06701
OCC_HEAD_CAT6310	-0.2594	0.738	-0.3515	0.7253
OCC_HEAD_CAT6320	-0.564	0.2118	-2.663	0.007762
OCC_HEAD_CAT6330	-1.943	0.3333	-5.83	5.794e-09
OCC_HEAD_CAT6355	-0.5933	0.1902	-3.119	0.001821
OCC_HEAD_CAT6360	-0.4837	0.5314	-0.9102	0.3627
OCC_HEAD_CAT6400	-0.6649	0.33	-2.015	0.04396
OCC_HEAD_CAT6420	-1.245	0.1953	-6.378	1.922e-10
OCC_HEAD_CAT6430	-0.6886	0.7388	-0.932	0.3513
OCC_HEAD_CAT6440	-0.508	0.1933	-2.628	0.008596
OCC_HEAD_CAT6460	-0.9317	0.738	-1.262	0.2068
OCC_HEAD_CAT6500	-0.3352	0.738	-0.4542	0.6497
OCC_HEAD_CAT6515	-1.135	0.2613	-4.345	1.416e-05
OCC_HEAD_CAT6520	-0.4164	0.3888	-1.071	0.2843
OCC_HEAD_CAT6530	-0.5942	0.7387	-0.8044	0.4212
OCC_HEAD_CAT6540	-0.7754	0.5315	-1.459	0.1446
OCC_HEAD_CAT6600	-1.078	0.4427	-2.436	0.01489
OCC_HEAD_CAT6660	-0.4965	0.3533	-1.405	0.16
OCC_HEAD_CAT6700	0.3946	0.5324	0.7412	0.4586
OCC_HEAD_CAT6710	-0.3046	0.4421	-0.6889	0.4909
OCC_HEAD_CAT6730	-0.9334	0.2687	-3.473	0.0005175
OCC_HEAD_CAT6740	-0.4214	0.74	-0.5695	0.569
OCC_HEAD_CAT6750	-0.5845	0.5329	-1.097	0.2728
OCC_HEAD_CAT6765	-0.8098	0.5318	-1.523	0.1279
OCC_HEAD_CAT6800	-0.5114	0.7381	-0.6929	0.4884
OCC_HEAD_CAT6820	-2.537	0.4413	-5.75	9.337e-09
OCC_HEAD_CAT6830	-0.5208	0.7384	-0.7053	0.4806
OCC_HEAD_CAT6840	-0.3294	0.738	-0.4463	0.6554
OCC_HEAD_CAT6920	0.2002	0.7382	0.2712	0.7863
OCC_HEAD_CAT6940	0.1903	0.5314	0.3582	0.7202
OCC_HEAD_CAT7000	-0.5154	0.1822	-2.829	0.004678
OCC_HEAD_CAT7010	-1.49	0.2595	-5.742	9.775e-09
OCC_HEAD_CAT7020	-0.6527	0.2518	-2.593	0.009548
OCC_HEAD_CAT7030	-0.52	0.738	-0.7046	0.4811
OCC_HEAD_CAT7040	-0.5654	0.7384	-0.7657	0.4439
OCC_HEAD_CAT7050	-0.2772	0.738	-0.3755	0.7073

	Estimate	Std. Error	t value	Pr(> t )
OCC_HEAD_CAT7100	-0.3327	0.3533	-0.9418	0.3463
OCC_HEAD_CAT7110	-0.5533	0.4415	-1.253	0.2102
OCC_HEAD_CAT7120	-1.452	0.7384	-1.967	0.04926
OCC_HEAD_CAT7130	-0.8145	0.4413	-1.845	0.06502
OCC_HEAD_CAT7140	-0.4914	0.2685	-1.83	0.06734
OCC_HEAD_CAT7150	-0.375	0.2797	-1.341	0.18
OCC_HEAD_CAT7200	-0.9077	0.1716	-5.289	1.27e-07
OCC_HEAD_CAT7210	-0.774	0.2253	-3.436	0.000594
OCC_HEAD_CAT7220	-0.5897	0.2117	-2.785	0.005367
OCC_HEAD_CAT7240	-1.156	0.738	-1.567	0.1172
OCC_HEAD_CAT7260	-0.967	0.3078	-3.141	0.001691
OCC_HEAD_CAT7300	-1.002	0.5311	-1.886	0.05939
OCC_HEAD_CAT7315	-0.5031	0.2148	-2.342	0.01923
OCC_HEAD_CAT7320	-0.709	0.4413	-1.606	0.1082
OCC_HEAD_CAT7330	-0.6973	0.2145	-3.251	0.001156
OCC_HEAD_CAT7340	-0.8377	0.2395	-3.497	0.0004731
OCC_HEAD_CAT7350	-0.6009	0.3276	-1.834	0.06669
OCC_HEAD_CAT7410	-0.4631	0.3079	-1.504	0.1326
OCC_HEAD_CAT7420	-0.4222	0.2454	-1.721	0.08536
OCC_HEAD_CAT7430	-0.1191	0.5311	-0.2243	0.8225
OCC_HEAD_CAT7440	-0.1299	0.7388	-0.1759	0.8604
OCC_HEAD_CAT7510	-1.034	0.4414	-2.342	0.01923
OCC_HEAD_CAT7540	-0.8786	0.5311	-1.654	0.09811
OCC_HEAD_CAT7550	-1.007	0.7388	-1.364	0.1728
OCC_HEAD_CAT7560	-1.027	0.7381	-1.391	0.1643
OCC_HEAD_CAT7610	-0.4685	0.4417	-1.061	0.2888
OCC_HEAD_CAT7630	-0.8645	0.3531	-2.448	0.01439
OCC_HEAD_CAT7700	-0.5672	0.1608	-3.527	0.0004231
OCC_HEAD_CAT7710	-0.5478	0.5316	-1.03	0.3029
OCC_HEAD_CAT7720	-1.092	0.2599	-4.201	2.695e-05
OCC_HEAD_CAT7730	-0.4881	0.3081	-1.584	0.1132
OCC_HEAD_CAT7740	-0.8063	0.4424	-1.822	0.06844
OCC_HEAD_CAT7750	-1.044	0.1725	-6.053	1.503e-09
OCC_HEAD_CAT7800	-1.585	0.3297	-4.807	1.563e-06
OCC_HEAD_CAT7810	-1.01	0.2107	-4.795	1.663e-06
OCC_HEAD_CAT7840	-0.9548	0.3093	-3.087	0.002028
OCC_HEAD_CAT7850	-1.417	0.5319	-2.665	0.007726
OCC_HEAD_CAT7855	-1.135	0.2924	-3.881	0.0001052
OCC_HEAD_CAT7900	-0.4594	0.2522	-1.822	0.06851
OCC_HEAD_CAT7920	-0.1363	0.5312	-0.2566	0.7975
OCC_HEAD_CAT7930	-0.3591	0.5314	-0.6758	0.4992
OCC_HEAD_CAT7950	-0.7667	0.3276	-2.341	0.01928
OCC_HEAD_CAT8000	-1.027	0.3079	-3.337	0.0008526
OCC_HEAD_CAT8010	-1.052	0.3532	-2.979	0.002902
OCC_HEAD_CAT8030	-0.5823	0.252	-2.311	0.02086
OCC_HEAD_CAT8040	-0.5201	0.4415	-1.178	0.2388
OCC_HEAD_CAT8100	-0.5299	0.3278	-1.616	0.106
OCC_HEAD_CAT8120	-0.3762	0.7386	-0.5093	0.6106
OCC_HEAD_CAT8130	-0.723	0.5314	-1.361	0.1737
OCC_HEAD_CAT8140	-0.6587	0.1845	-3.57	0.0003593
OCC_HEAD_CAT8200	-1.121	0.4418	-2.538	0.01119
OCC_HEAD_CAT8210	-0.2204	0.5342	-0.4126	0.6799

	Estimate	Std. Error	t value	Pr(> t )
OCC_HEAD_CAT8220	-0.7656	0.2342	-3.269	0.001086
OCC_HEAD_CAT8255	-1.152	0.328	-3.512	0.0004481
OCC_HEAD_CAT8300	-1.294	0.2693	-4.807	1.566e-06
OCC_HEAD_CAT8310	-0.6589	0.7401	-0.8902	0.3734
OCC_HEAD_CAT8320	-1.026	0.2925	-3.506	0.0004574
OCC_HEAD_CAT8350	-1.457	0.5315	-2.741	0.006148
OCC_HEAD_CAT8360	-0.9967	0.5408	-1.843	0.06535
OCC_HEAD_CAT8410	-1.172	0.4415	-2.654	0.007978
OCC_HEAD_CAT8420	-0.8605	0.7381	-1.166	0.2437
OCC_HEAD_CAT8430	-1.018	0.532	-1.914	0.05565
OCC_HEAD_CAT8440	-0.9722	0.744	-1.307	0.1913
OCC_HEAD_CAT8450	-0.5443	0.3897	-1.397	0.1626
OCC_HEAD_CAT8500	-0.7227	0.3532	-2.046	0.0408
OCC_HEAD_CAT8520	-0.1298	0.7378	-0.1759	0.8604
OCC_HEAD_CAT8530	-1.105	0.3913	-2.823	0.004778
OCC_HEAD_CAT8540	-0.6584	0.389	-1.692	0.09064
OCC_HEAD_CAT8550	-1.204	0.738	-1.631	0.1029
OCC_HEAD_CAT8600	0.09393	0.5316	0.1767	0.8597
OCC_HEAD_CAT8610	-0.2442	0.7381	-0.3308	0.7408
OCC_HEAD_CAT8620	-0.5935	0.2921	-2.032	0.04223
OCC_HEAD_CAT8630	-0.6653	0.7378	-0.9018	0.3672
OCC_HEAD_CAT8640	-0.05712	0.3535	-0.1616	0.8716
OCC_HEAD_CAT8650	-0.7846	0.2522	-3.111	0.001872
OCC_HEAD_CAT8710	-1.172	0.3578	-3.275	0.001062
OCC_HEAD_CAT8720	-0.6421	0.3534	-1.817	0.06923
OCC_HEAD_CAT8730	-0.4185	0.5314	-0.7877	0.4309
OCC_HEAD_CAT8740	-0.701	0.1812	-3.868	0.0001108
OCC_HEAD_CAT8760	-0.5435	0.7385	-0.7359	0.4618
OCC_HEAD_CAT8800	-1.155	0.2019	-5.722	1.1e-08
OCC_HEAD_CAT8810	-0.9967	0.2692	-3.703	0.0002148
OCC_HEAD_CAT8830	-1.15	0.5314	-2.163	0.03055
OCC_HEAD_CAT8860	-0.5068	0.5336	-0.9497	0.3423
OCC_HEAD_CAT8920	-1.189	0.4412	-2.695	0.007057
OCC_HEAD_CAT8940	-0.3897	0.5312	-0.7337	0.4632
OCC_HEAD_CAT8950	-0.8867	0.4415	-2.009	0.04462
OCC_HEAD_CAT8965	-0.8513	0.1906	-4.466	8.117e-06
OCC_HEAD_CAT9000	-0.781	0.1717	-4.549	5.494e-06
OCC_HEAD_CAT9030	-0.03004	0.2592	-0.1159	0.9077
OCC_HEAD_CAT9040	0.1098	0.4413	0.2488	0.8036
OCC_HEAD_CAT9050	-0.8158	0.5309	-1.537	0.1245
OCC_HEAD_CAT9110	-0.4231	0.5312	-0.7965	0.4258
OCC_HEAD_CAT9120	-0.992	0.1786	-5.553	2.919e-08
OCC_HEAD_CAT9130	-0.6918	0.1478	-4.68	2.933e-06
OCC_HEAD_CAT9140	-1.289	0.1724	-7.48	8.401e-14
OCC_HEAD_CAT9150	-1.135	0.3281	-3.46	0.0005436
OCC_HEAD_CAT9200	0.03541	0.4414	0.08021	0.9361
OCC_HEAD_CAT9230	0.02376	0.7381	0.03219	0.9743
OCC_HEAD_CAT9240	-0.6261	0.3889	-1.61	0.1075
OCC_HEAD_CAT9260	-0.4724	0.531	-0.8896	0.3737
OCC_HEAD_CAT9310	-4.973	0.7381	-6.738	1.748e-11
OCC_HEAD_CAT9350	-1.878	0.3277	-5.732	1.038e-08
OCC_HEAD_CAT9360	-1.732	0.2797	-6.193	6.245e-10

	Estimate	Std. Error	t value	Pr(> t )
OCC_HEAD_CAT9410	-0.6822	0.3884	-1.757	0.07905
OCC_HEAD_CAT9420	-0.4126	0.7388	-0.5585	0.5765
OCC_HEAD_CAT9500	-0.2593	0.5313	-0.4881	0.6255
OCC_HEAD_CAT9510	-0.5231	0.3275	-1.597	0.1102
OCC_HEAD_CAT9520	-0.9587	0.7382	-1.299	0.1941
OCC_HEAD_CAT9600	-0.7225	0.1585	-4.557	5.274e-06
OCC_HEAD_CAT9610	-1.422	0.212	-6.707	2.15e-11
OCC_HEAD_CAT9620	-1.182	0.1593	-7.42	1.316e-13
OCC_HEAD_CAT9630	-0.7199	0.5313	-1.355	0.1755
OCC_HEAD_CAT9640	-1.158	0.1972	-5.875	4.436e-09
OCC_HEAD_CAT9720	-1.074	0.3537	-3.037	0.002399
OCC_HEAD_CAT9740	0.2408	0.7381	0.3263	0.7442
OCC_HEAD_CAT9750	-0.8879	0.5314	-1.671	0.0948
OCC_HEAD_CAT9800	-0.2023	0.2171	-0.9322	0.3513
OCC_HEAD_CAT9810	-0.6493	0.1861	-3.489	0.0004881
OCC_HEAD_CAT9820	-0.6497	0.2921	-2.224	0.02618
OCC_HEAD_CAT9830	-0.6934	0.225	-3.082	0.002063

Table 14: Log wages regression results

Observations	Residual Std. Error	$R^2$	Adjusted $R^2$
6971	0.7243	0.4413	0.3998