



District of Columbia

DC ORA's Annual "Tax Rates and Tax Burdens" Study

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FTA Revenue Estimating Conference

Asbury Park, NJ

October 18, 2016

Disclaimer: The views expressed here are mine and do not represent the DC Government.



District of Columbia

Overview and Context

Statutorily Required Annual Report

- Comparison of state + local tax burdens in largest city in each state and DC
- Four main taxes: Property, Income, Sales, and Auto
- Five income levels: \$25,000, \$50,000, \$75,000, \$100,000, and \$150,000 per year

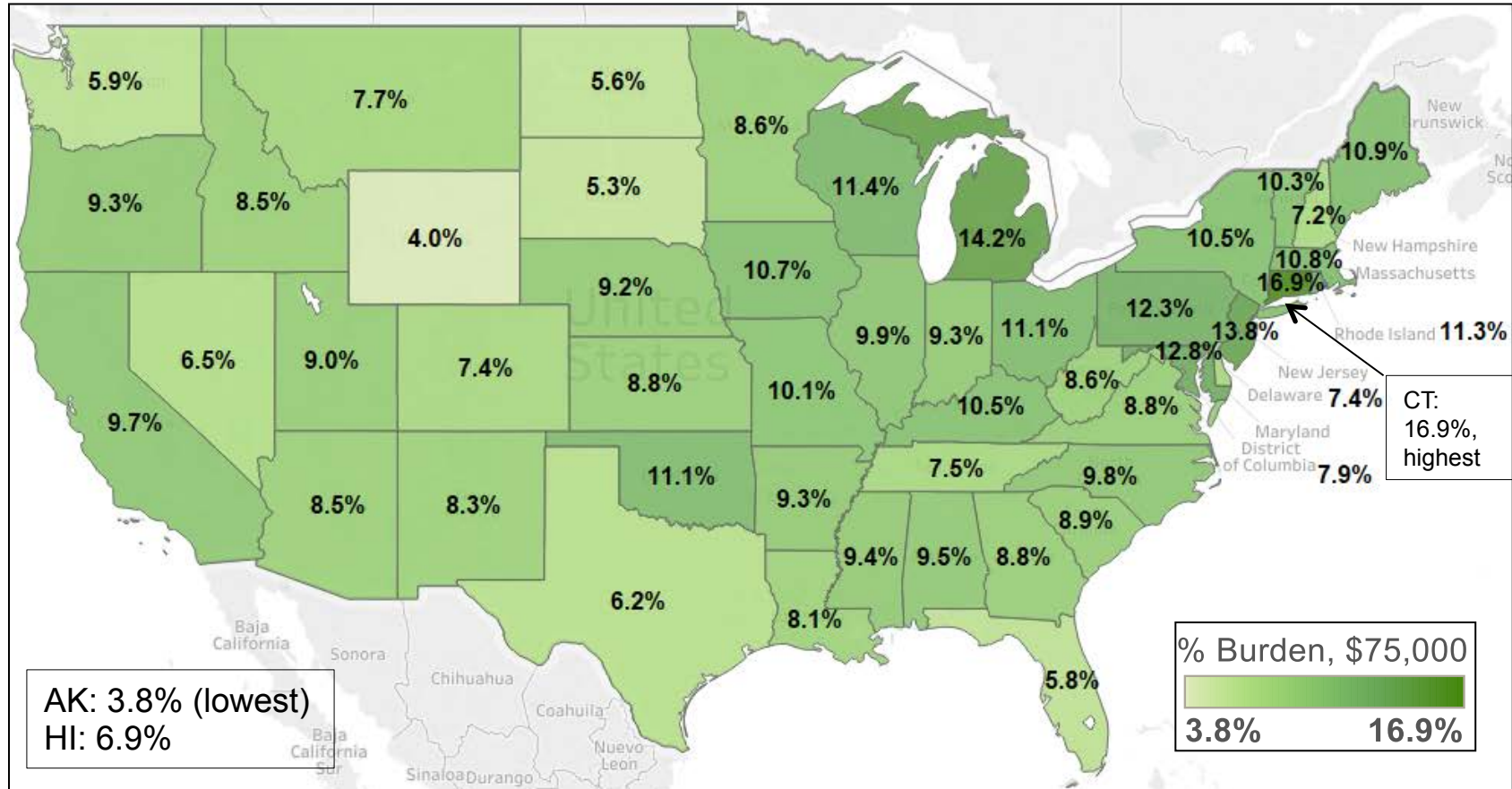
Methodology

- Collection of data on tax rates:
 - Survey to states with follow up calls & emails
 - Online research of state web sites
 - Third-party sources (FTA, CCH, Tax Foundation, etc.)
- Tax burden calculations
 - Various data sources and methodologies for each type of tax
 - Property and auto tax calculations are inputs to income tax calculation



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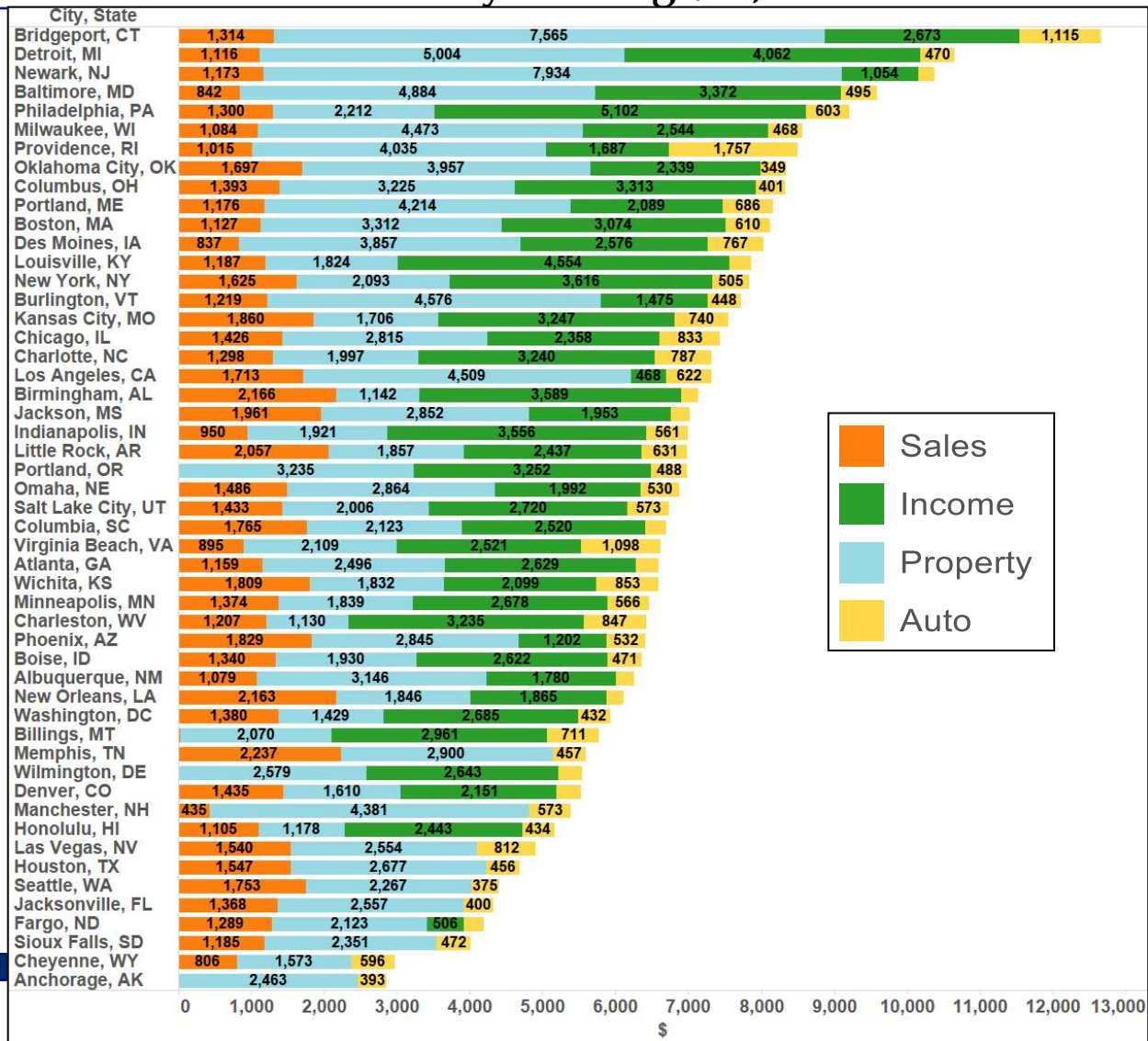
2015 Tax Burdens as a % of Income, All Taxes Combined, Family Earning \$75,000





District of Columbia

2015 Tax Burdens, \$, Family Earning \$75,000





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2015 Estimated Burdens of Major Taxes, Top Five States in Each Income Category

RANK	CITY	ST	TAXES				BURDEN	
			INCOME	PROPERTY	SALES	AUTO	\$	%
\$25,000								
1	Philadelphia	PA	1,378	1,954	810	319	4,461	17.8%
2	Honolulu	HI	428	3,024	746	228	4,427	17.7%
3	Birmingham	AL	987	1,428	1,472	122	4,009	16.0%
4	Seattle	WA	-	2,527	1,056	296	3,879	15.5%
5	Boston	MA	49	2,791	703	280	3,824	15.3%
\$50,000								
1	Bridgeport	CT	538	5,043	950	512	7,043	14.1%
2	Newark	NJ	605	5,290	873	125	6,893	13.8%
3	Detroit	MI	2,411	3,336	830	253	6,830	13.7%
4	Baltimore	MD	2,068	3,256	576	268	6,168	12.3%
5	Philadelphia	PA	3,469	1,341	983	355	6,148	12.3%
\$75,000								
1	Bridgeport	CT	2,673	7,565	1,314	1115	12,667	16.9%
2	Detroit	MI	4,062	5,004	1,116	470	10,652	14.2%
3	Newark	NJ	1,054	7,934	1,173	215	10,376	13.8%
4	Baltimore	MD	3,372	4,884	842	495	9,593	12.8%
5	Philadelphia	PA	5,102	2,212	1,300	603	9,217	12.3%
\$100,000								
1	Bridgeport	CT	4,180	10,086	1,634	1318	17,219	17.2%
2	Detroit	MI	5,753	6,673	1,373	586	14,385	14.4%
3	Newark	NJ	1,892	10,579	1,470	279	14,219	14.2%
4	Baltimore	MD	5,062	6,512	1,035	640	13,248	13.2%
5	Milwaukee	WI	4,500	6,142	1,344	580	12,566	12.6%
\$150,000								
1	Bridgeport	CT	7,567	15,129	2,017	2137	26,851	17.9%
2	Newark	NJ	4,583	15,869	1,733	248	22,432	15.0%
3	Detroit	MI	8,956	10,009	1,663	669	21,296	14.2%
4	Baltimore	MD	8,138	9,768	1,423	622	19,950	13.3%
5	Portland	ME	7,167	8,635	1,772	1681	19,255	12.8%



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Property Tax Calculation

- Compile data on general property tax structure in each location:
 - Nominal property tax rates;
 - Assessment levels;
 - Homestead exemptions available to all homeowners (note: not included in snapshot below)

**Table 4: Residential Property Tax Rates in the Largest City in Each State
2015**

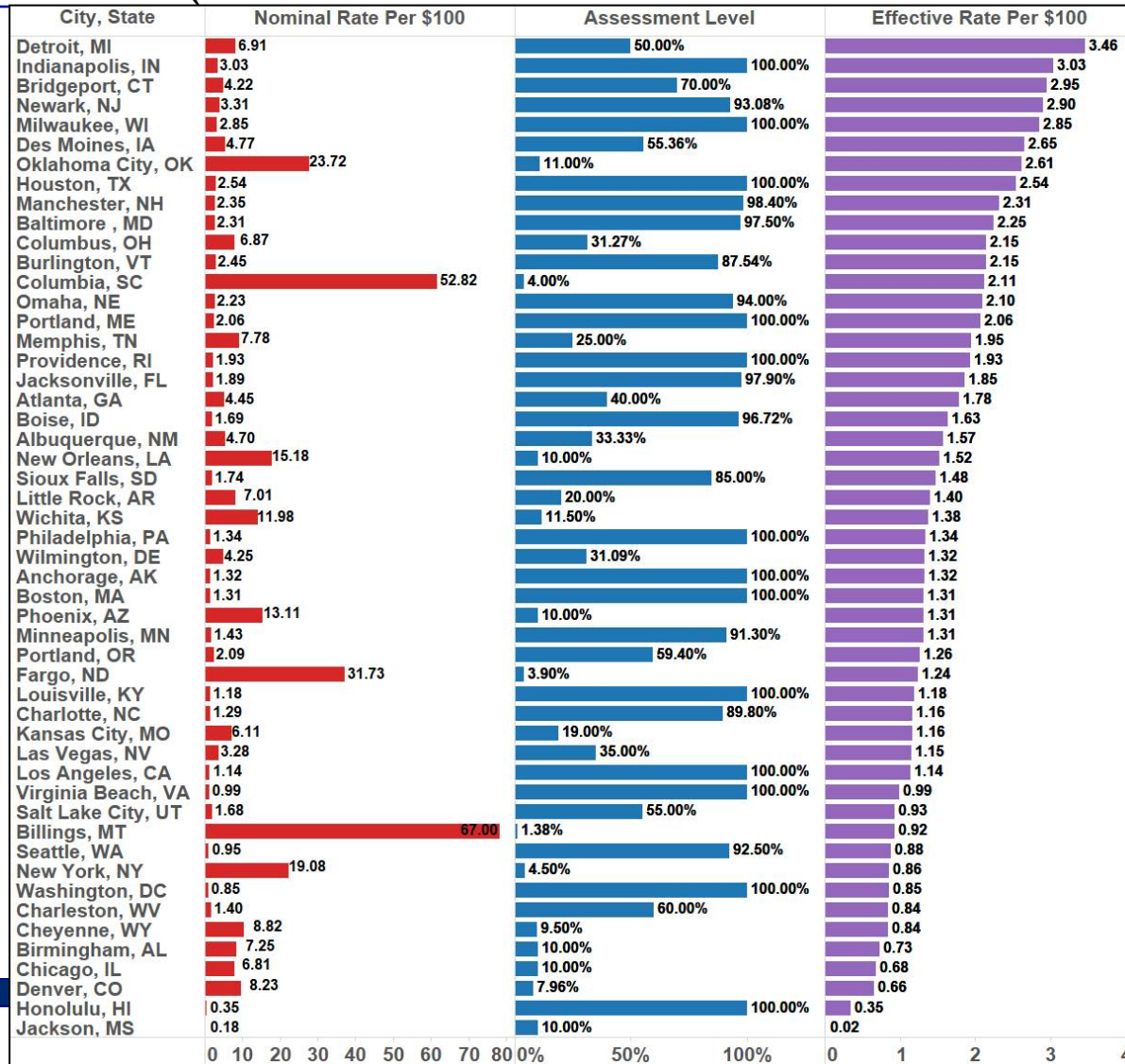
RANK	CITY	ST	NOMINAL RATE PER \$100	ASSESSMENT LEVEL	EFFECTIVE RATE PER \$100
1	Detroit	MI	6.91	50.00%	3.46
2	Indianapolis	IN	3.03	100.00%	3.03
3	Bridgeport	CT	4.22	70.00%	2.95
4	Newark	NJ	3.31	93.08%	2.90
5	Milwaukee	WI	2.85	100.00%	2.85

- Collect data from Census (ACS) on median house values and median incomes
 - Calculate house values for each income level in each city, multiplier created using ACS data.
- Calculate property tax on house value at each income in each city.
 - Taking into account assessment level, and homestead exemptions.



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2015 Property Tax Rate Information (Nominal Rate x Assessment Ratio = Effective Rate)





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2015 Property Tax Burdens, \$, Sorted by Income = \$75,000

City, State	Income= \$25,000	Income= \$50,000	Income= \$75,000	Income= \$100,000	Income= \$150,000
Newark, NJ	2,647	5,290	7,934	10,579	15,869
Bridgeport, CT	2,105	5,043	7,565	10,086	15,129
Detroit, MI	1,315	3,336	5,004	6,673	10,009
Baltimore, MD	1,999	3,256	4,884	6,512	9,768
Burlington, VT	1,997	2,993	4,576	6,159	9,324
Los Angeles, CA	2,383	2,979	4,509	6,038	9,097
Milwaukee, WI	1,390	2,803	4,473	6,142	9,481
Manchester, NH	1,630	2,921	4,381	5,841	8,762
Portland, ME	1,867	2,741	4,214	5,688	8,635
Providence, RI	1,774	2,690	4,035	5,380	8,071
Oklahoma City, OK	1,289	2,630	3,957	5,285	7,941
Des Moines, IA	1,339	2,529	3,857	5,186	7,843
Boston, MA	2,791	2,200	3,312	4,424	6,649
Portland, OR	1,718	2,157	3,235	4,313	6,470
Columbus, OH	1,277	2,150	3,225	4,301	6,451
Albuquerque, NM	1,303	2,087	3,146	4,205	6,323
Memphis, TN	1,582	1,933	2,900	3,867	5,800
Omaha, NE	1,222	1,909	2,864	3,818	5,728
Jackson, MS	1,198	1,857	2,852	3,848	5,839
Phoenix, AZ	1,488	1,897	2,845	3,793	5,690
Chicago, IL	1,949	1,718	2,815	3,913	6,107
Houston, TX	1,536	1,737	2,677	3,618	5,498
Wilmington, DE	1,954	1,719	2,579	3,439	5,158
Jacksonville, FL	1,610	1,455	2,557	3,659	5,863
Las Vegas, NV	1,606	1,702	2,554	3,405	5,107
Atlanta, GA	1,812	1,487	2,496	3,506	5,526
Anchorage, AK	2,078	1,554	2,463	3,372	5,190
Sioux Falls, SD	1,212	1,567	2,351	3,135	4,702
Seattle, WA	2,527	1,511	2,267	3,023	4,534
Philadelphia, PA	1,954	1,341	2,212	3,084	4,827
Columbia, SC	1,553	1,416	2,123	2,831	4,247
Fargo, ND	1,157	1,415	2,123	2,830	4,245
Virginia Beach, VA	2,146	1,406	2,109	2,811	4,217
New York, NY	3,175	1,310	2,093	2,877	4,445
Billings, MT	1,229	1,380	2,070	2,760	4,140
Salt Lake City, UT	1,531	1,337	2,006	2,675	4,012
Charlotte, NC	1,634	1,331	1,997	2,663	3,994
Boise City, ID	1,068	1,130	1,930	3,060	5,319
Indianapolis, IN	1,318	985	1,921	2,857	4,729
Little Rock, AR	1,373	1,122	1,857	2,593	4,065
New Orleans, LA	1,658	877	1,846	2,815	4,752
Minneapolis, MN	1,639	1,123	1,839	2,554	3,986
Wichita, KS	1,130	1,211	1,832	2,453	3,696
Louisville, KY	1,296	1,216	1,824	2,432	3,648
Kansas City, MO	1,342	1,137	1,706	2,274	3,412
Denver, CO	1,735	1,074	1,610	2,147	3,221
Cheyenne, WY	1,250	1,048	1,573	2,097	3,145
Washington, DC	3,024	751	1,429	2,108	3,466
Honolulu, HI	3,024	692	1,178	1,664	2,636
Birmingham, AL	1,428	747	1,142	1,537	2,328
Charleston, WV	1,356	753	1,130	1,506	2,259



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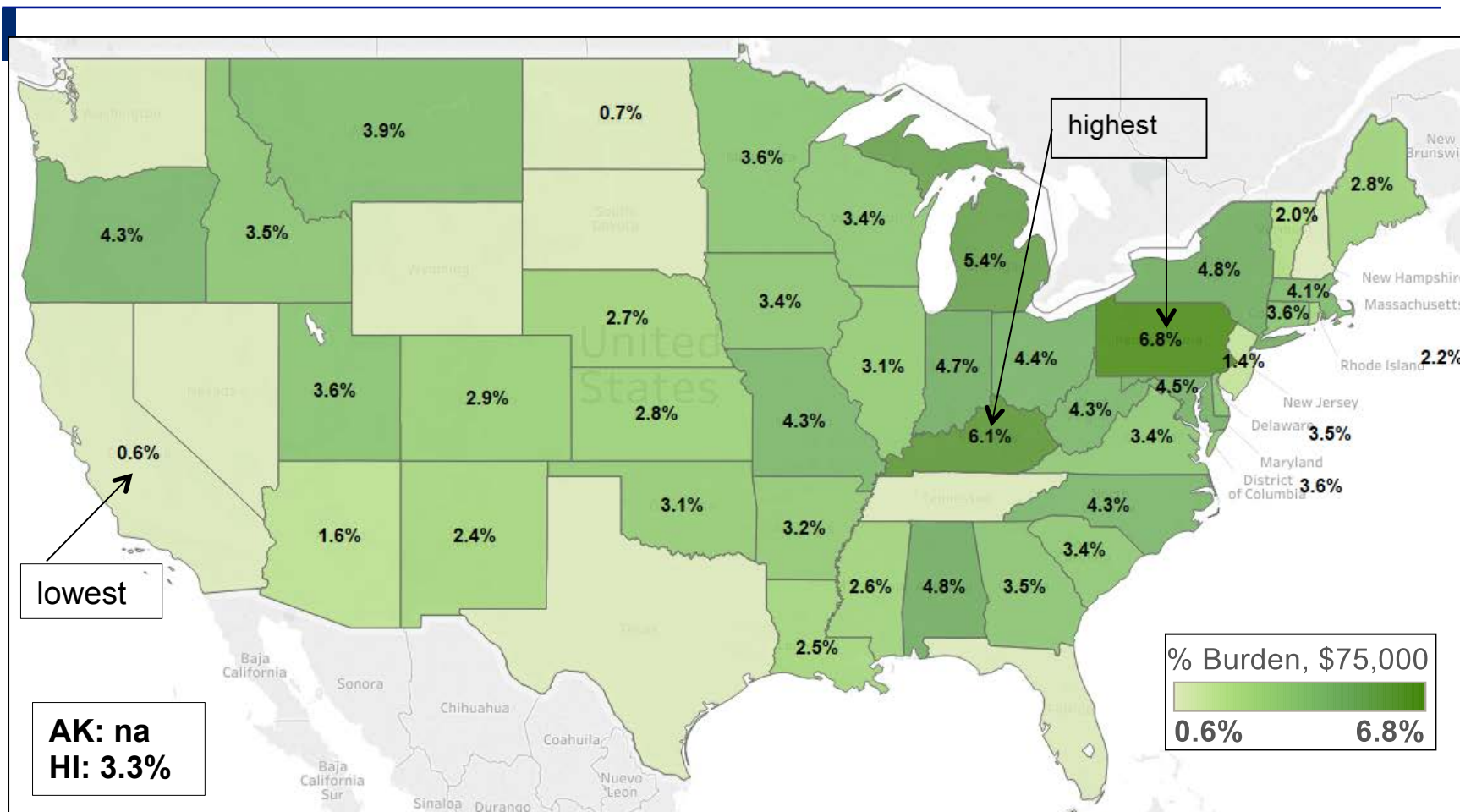
Income Tax Calculation

- Use tax preparation software to calculate income tax burdens for all 50 states and DC.
 - Itemized deduction information is based on IRS income tax data for DC taxpayers, and is based on average deduction amounts at each income level for joint filers.
 - Separate calculation is made of the mortgage interest deduction, based on 5th year of interest of home purchase, value of which calculated from ACS data just like for property tax.
 - Deductions allowed for property taxes or auto taxes paid are taken from burdens calculated for the report.
- After calculating state income tax, any applicable local income tax is added. Eleven of the cities in our report have a local income tax.
- Seven states do not have an income tax; two others don't tax wage income.



2015 Income Tax Burdens as a % of Income, \$75,000

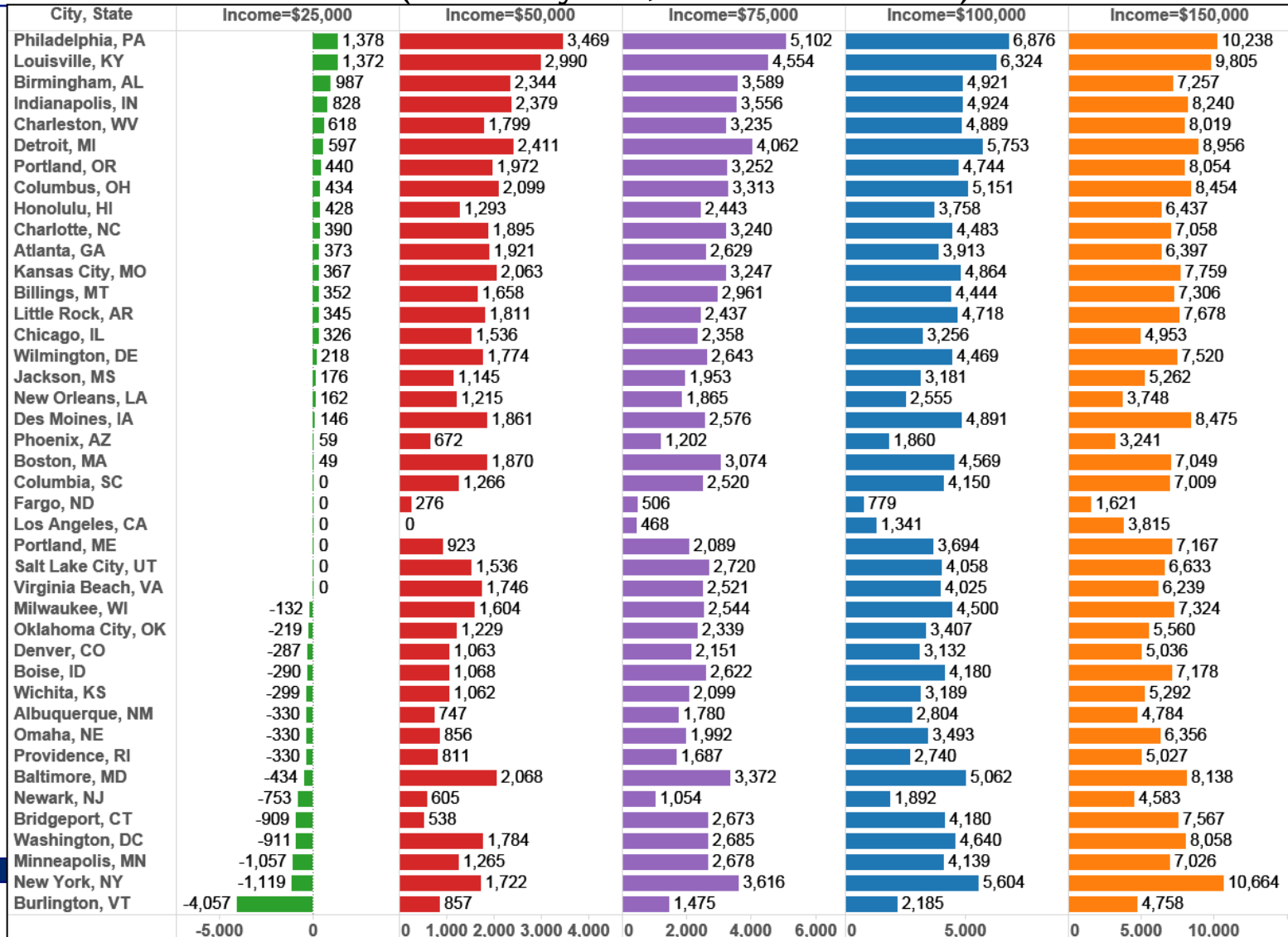
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2015 Income Tax Burdens, \$, (sorted by \$25,000 income level)





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Sales Tax Calculation

- Compile applicable sales tax rates
 - State, city, county, school, and transit tax rates
 - 5 States do not have a general sales tax (AK, DE, MT, NH, OR)

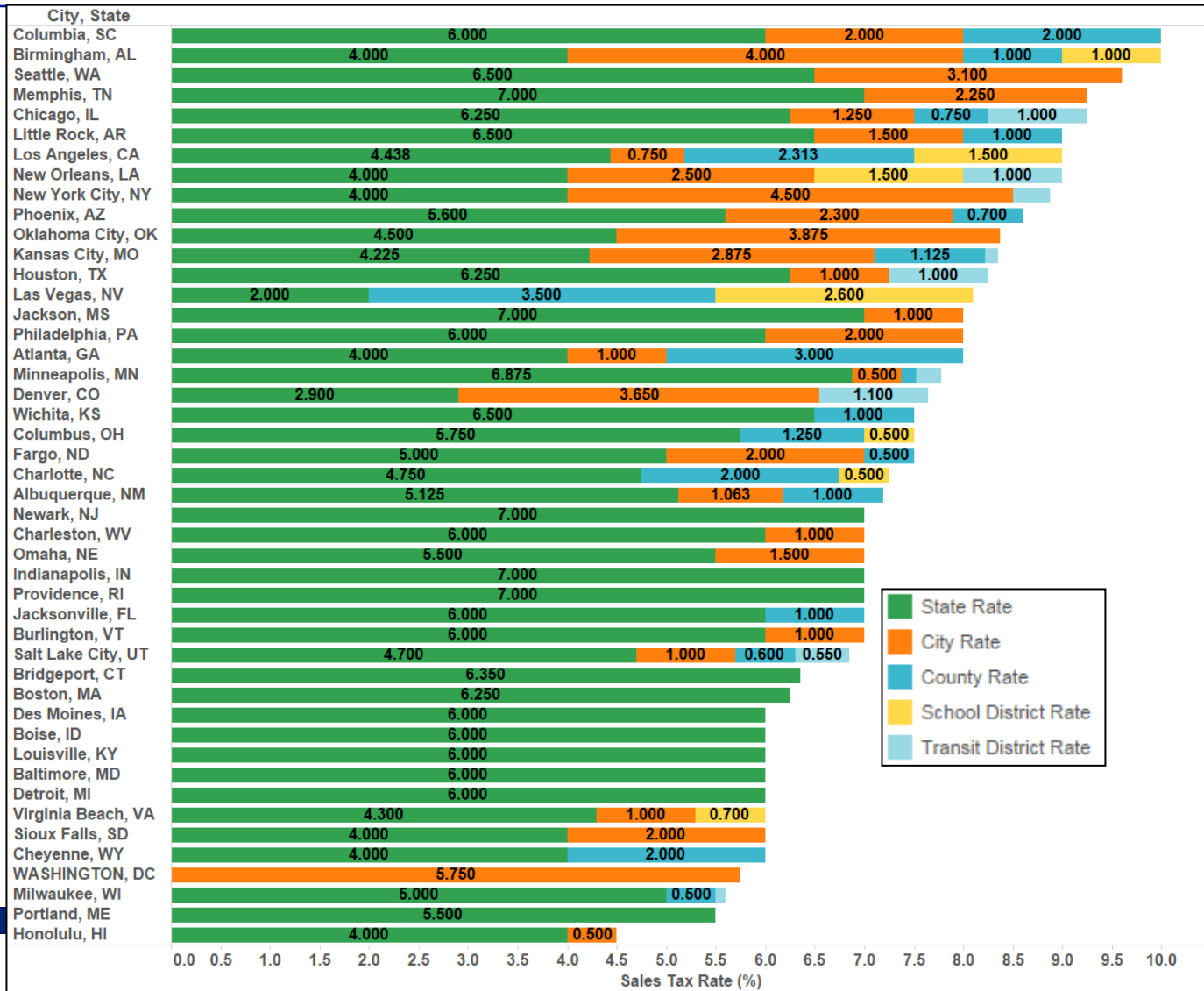
- Download Consumer Expenditure Survey data of average amount spent on various consumer goods (by income level).

- Apply all state and local sales taxes to those amounts.
 - All variation w/in an income level comes from sales tax rates and sales tax bases.



2015 Sales Tax Rates

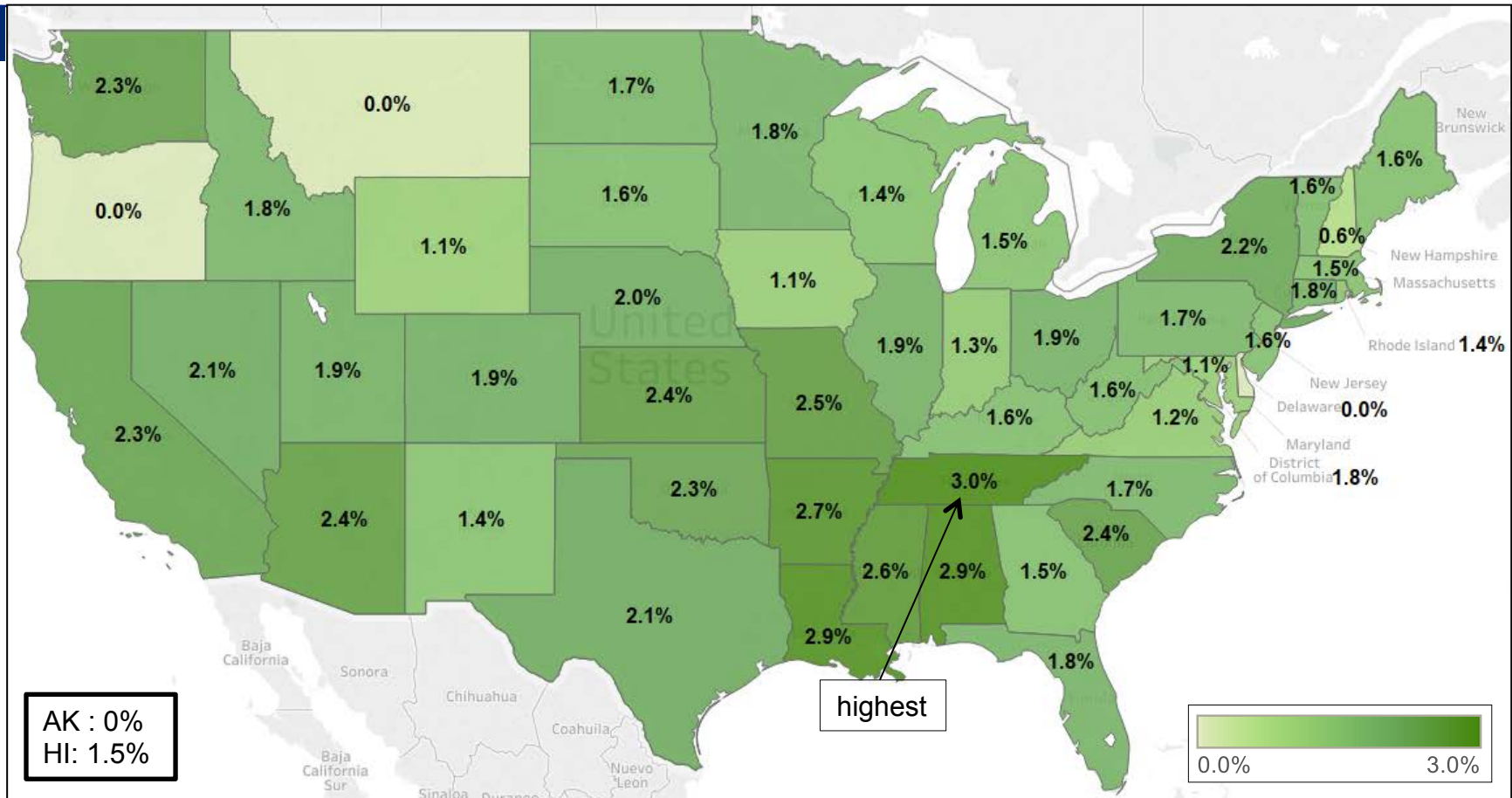
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2015 Sales Tax Burdens as a % of Income, \$75,000





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Auto Tax Calculation

- Applicable personal property taxes, registration and title fees, and auto excise taxes for each city + state

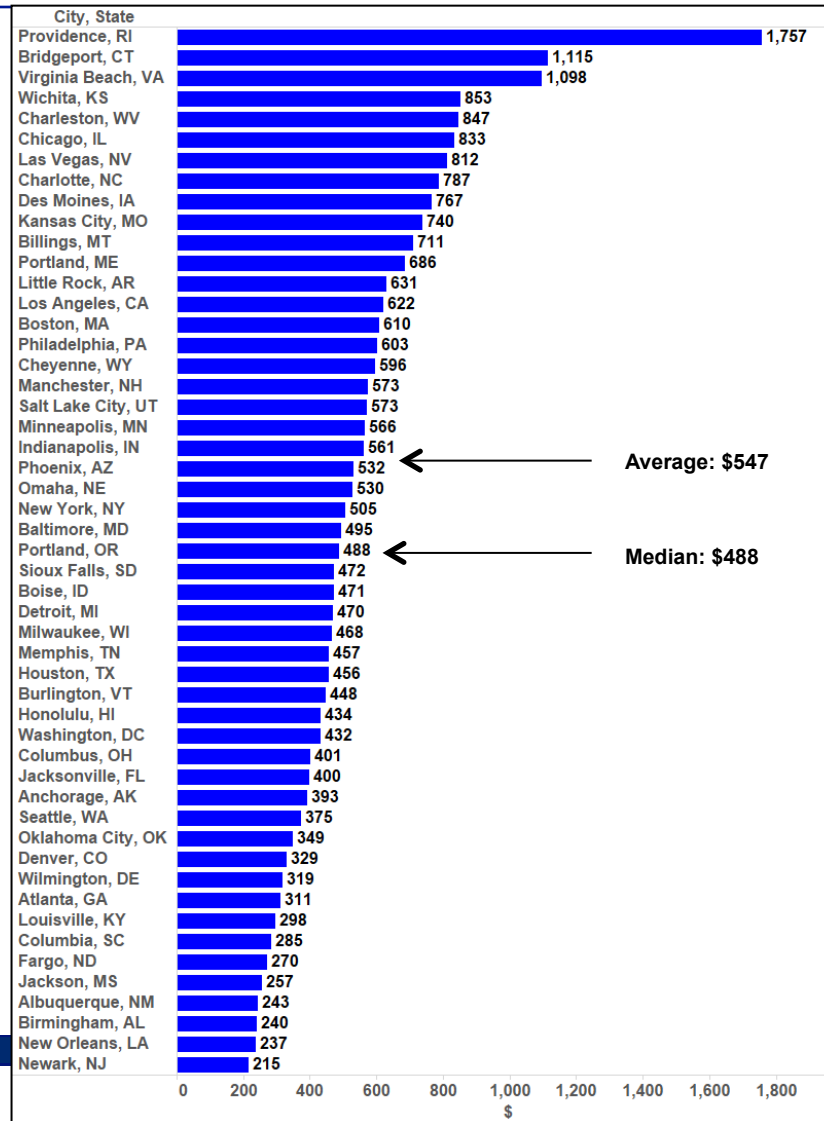
- Assumptions of gasoline usage and applicable taxes for each jurisdiction

- Assumptions of car ownership at each level of income
 - Type of car(s) vary across income level
 - Number of cars owned



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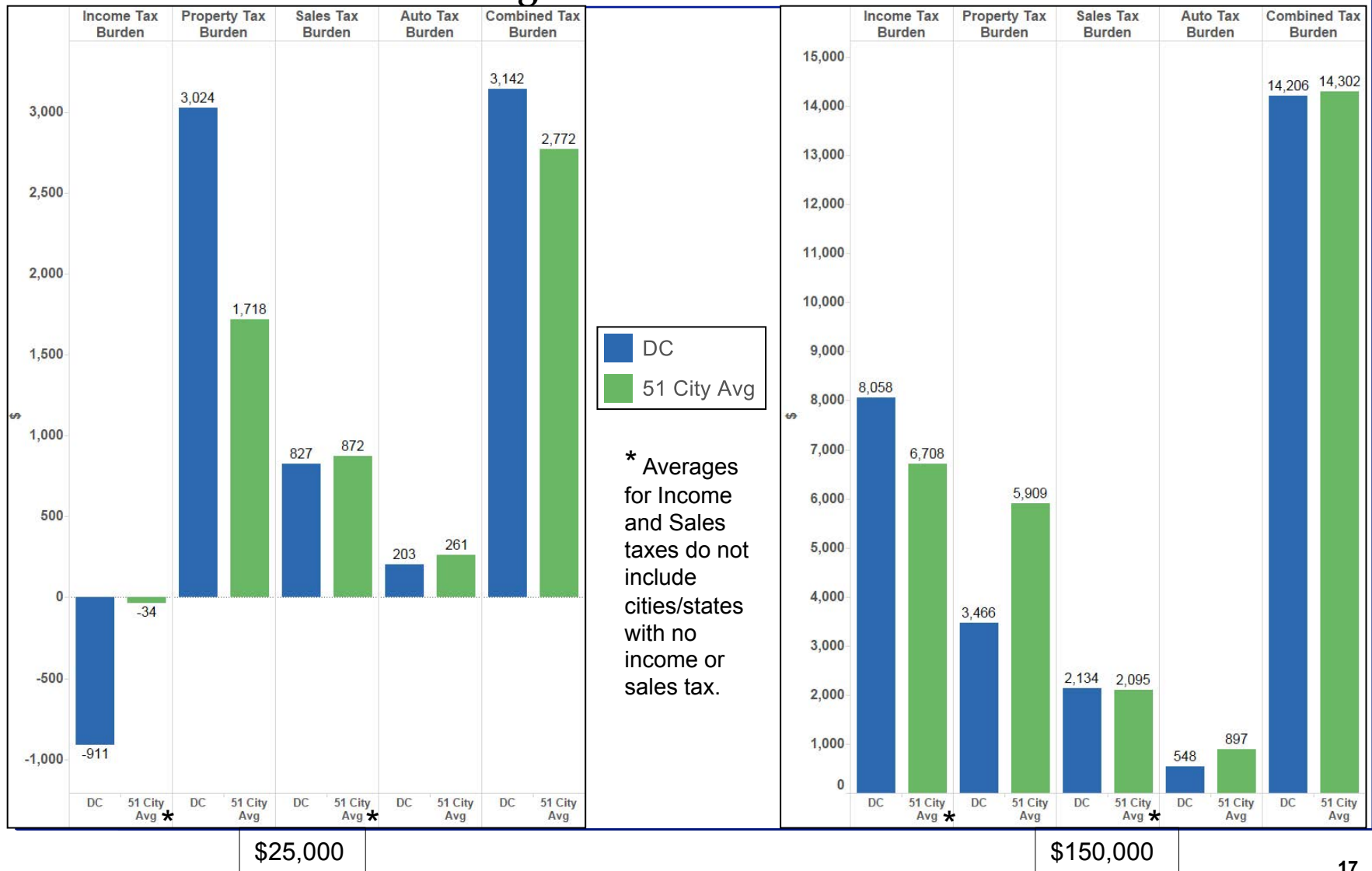
2015 Results: Auto Tax Burden, \$75,000/ year





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DC Compared to 51 City Average, Highest and Lowest Income Levels





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Thank you!

Questions/Comments?



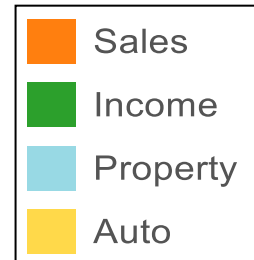
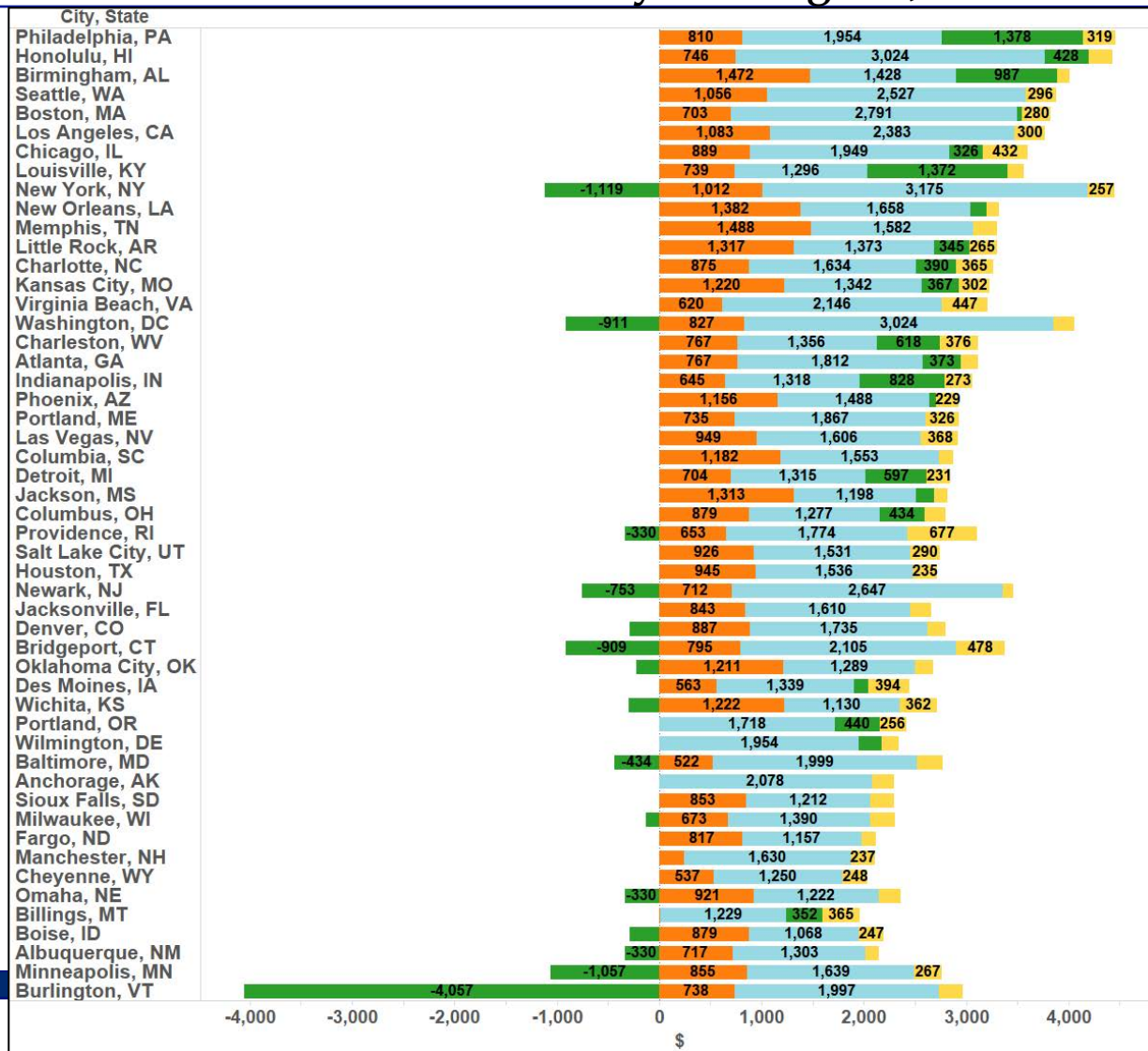
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Extra Slides



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2015 Tax Burdens, \$, Family Earning \$25,000



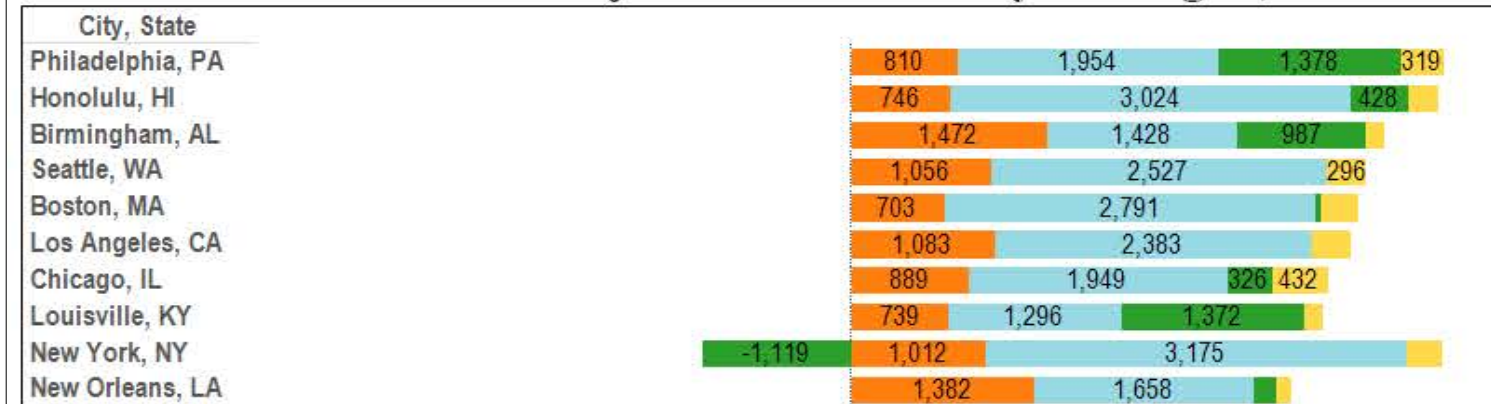


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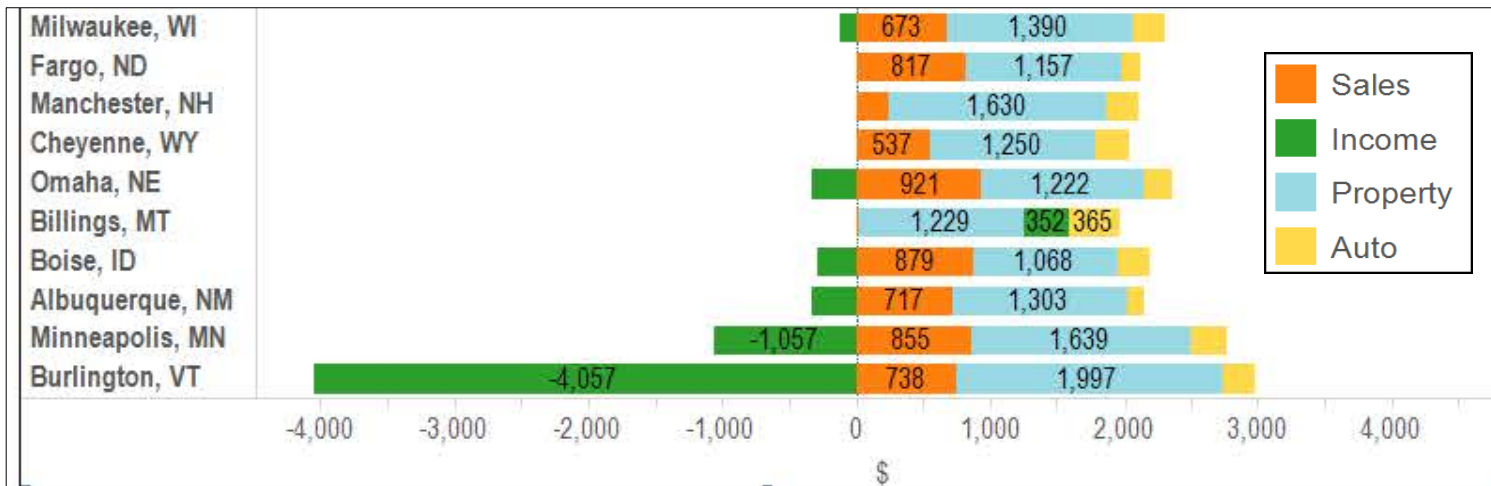
Combined Tax Burdens on a Family Earning \$25,000, \$, Top and Bottom Ten States

2015 Estimated Burdens of Major Taxes for a Family Earning 25,000/Year

Top Ten



Bottom Ten

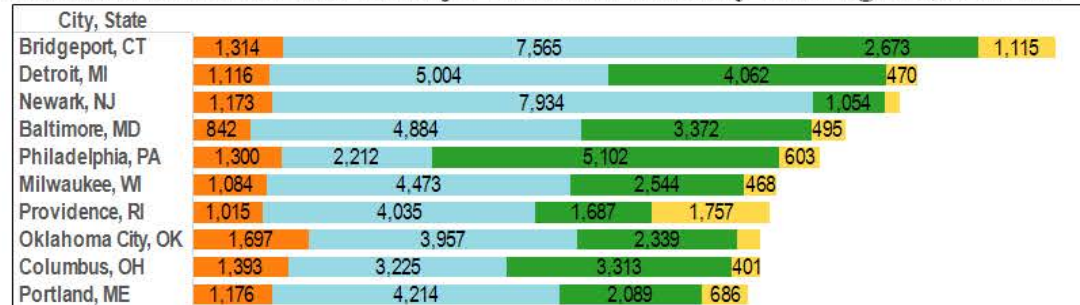




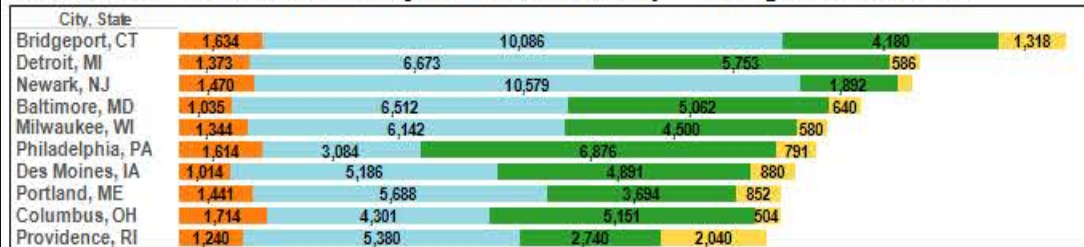
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States With Top Ten Combined Tax Burdens, \$, Families with Incomes of \$75,000, \$100,000, and \$150,000

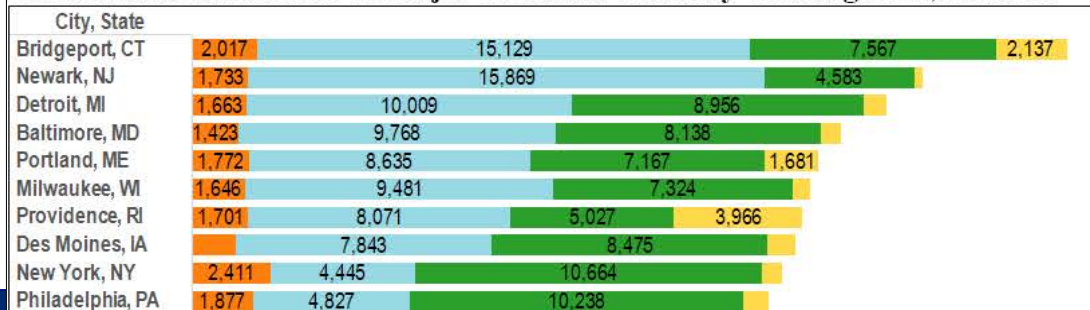
2015 Estimated Burdens of Major Taxes for a Family Earning \$75,000/Year



2015 Estimated Burdens of Major Taxes for Family Earning \$100,000/Year



2015 Estimated Burdens of Major Taxes for a Family Earning \$150,000/Year





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2015 Property Tax Burdens, \$, Sorted by Income = \$25,000 (renters)

City, State	Income=\$25,000	Income=\$50,000	Income=\$75,000	Income=\$100,000	Income=\$150,000
New York, NY	3,175	1,310	2,093	2,877	4,445
Honolulu, HI	3,024	692	1,178	1,664	2,636
Washington, DC	3,024	751	1,429	2,108	3,466
Boston, MA	2,791	2,200	3,312	4,424	6,649
Newark, NJ	2,647	5,290	7,934	10,579	15,869
Seattle, WA	2,527	1,511	2,267	3,023	4,534
Los Angeles, CA	2,383	2,979	4,509	6,038	9,097
Virginia Beach, VA	2,146	1,406	2,109	2,811	4,217
Bridgeport, CT	2,105	5,043	7,565	10,086	15,129
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Burlington, VT	1,997	2,993	4,576	6,159	9,324
Philadelphia, PA	1,954	1,341	2,212	3,084	4,827
Wilmington, DE	1,954	1,719	2,579	3,439	5,158
Chicago, IL	1,949	1,718	2,815	3,913	6,107
Portland, ME	1,867	2,741	4,214	5,688	8,635
Atlanta, GA	1,812	1,487	2,496	3,506	5,526
Providence, RI	1,774	2,690	4,035	5,380	8,071
Denver, CO	1,735	1,074	1,610	2,147	3,221
Portland, OR	1,718	2,157	3,235	4,313	6,470
New Orleans, LA	1,658	877	1,846	2,815	4,752
Minneapolis, MN	1,639	1,123	1,839	2,554	3,986
Charlotte, NC	1,634	1,331	1,997	2,663	3,994
Manchester, NH	1,630	2,921	4,381	5,841	8,762
Jacksonville, FL	1,610	1,455	2,557	3,659	5,863
Las Vegas, NV	1,606	1,702	2,554	3,405	5,107
Memphis, TN	1,582	1,933	2,900	3,867	5,800
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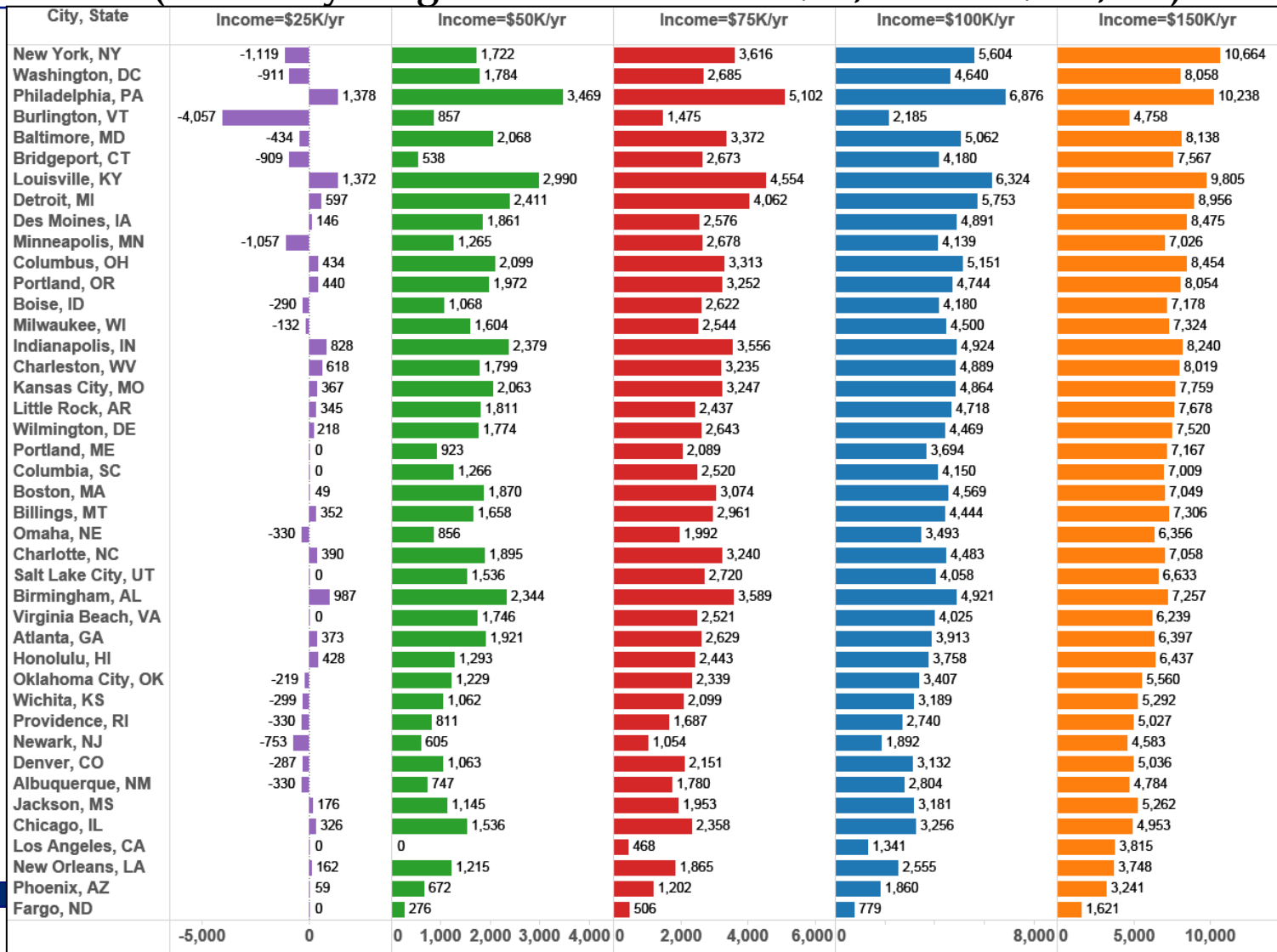
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	0 2,000 4,000	0 4,000	0 5,000 10,000	0 5,000 10,000	0 10,000 20,000
	\$	\$	\$	\$	\$



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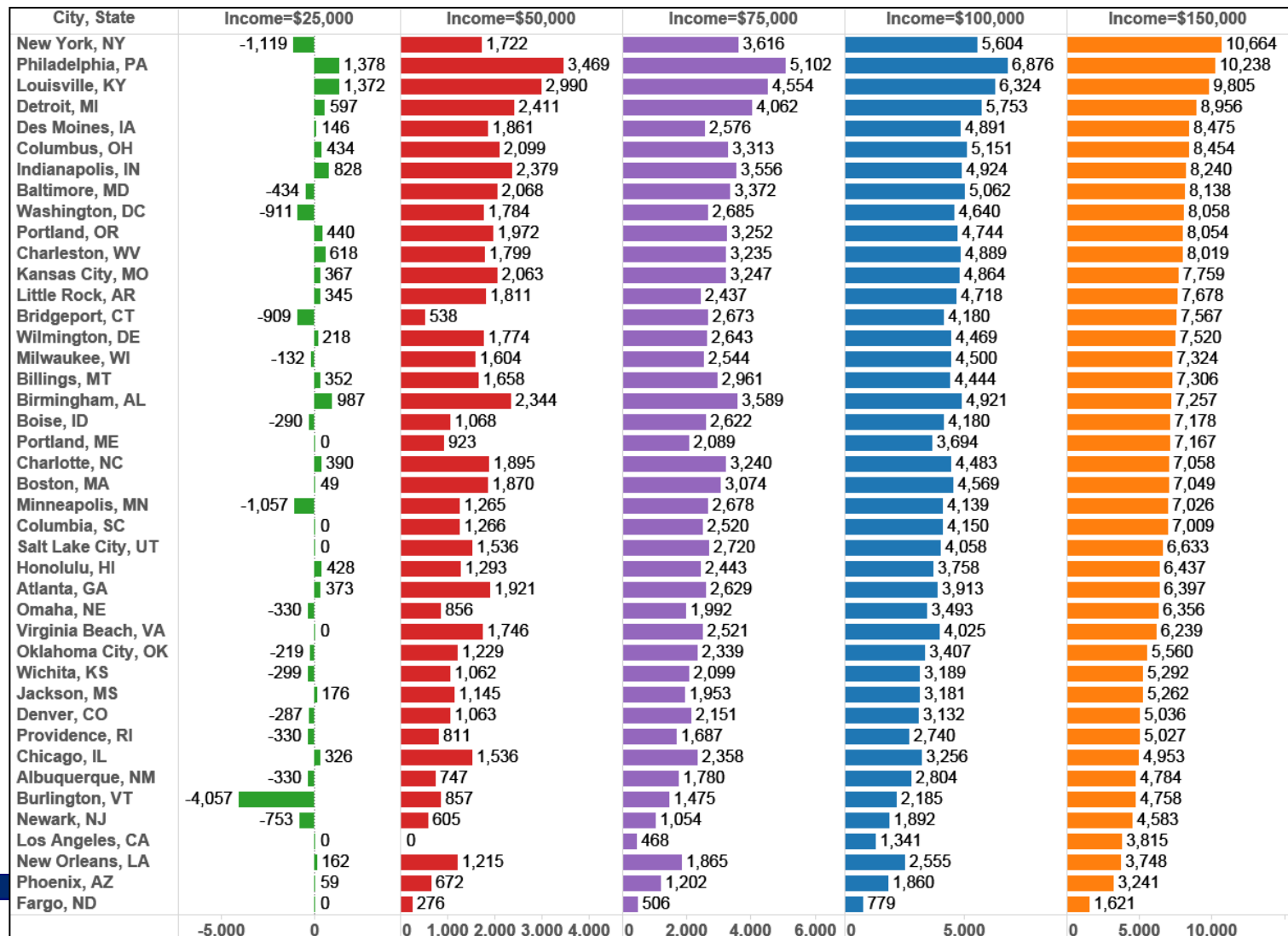
2015 Income Tax Burdens, \$ (Sorted by Largest Difference btw \$25,000 and \$150,000)





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2015 Income Tax Burdens, \$, (sorted by \$150,000 income level)





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2015 Local Income Tax Rates

City	State	Local Income Tax Rate
Birmingham	AL	1.50%
Wilmington	DE	1.25%
Indianapolis	IN	0.31%
Louisville	KY	2.20%
Baltimore	MD	3.20%
Detroit	MI	2.40%
Kansas City	MO	1.00%
New York	NY	2.907%-3.876%
Columbus	OH	2.50%
Philadelphia	PA	3.91%



District of Columbia

2014 and 2015 Car Assumptions

For 2014, car assumptions:	Price	For 2015, car assumptions	Price
2011 Nissan Sentra	\$11,350	2012 Nissan Sentra	11,700
2011 Volkswagen Jetta Sedan	\$11,800	2014 Volkswagen Jetta Sedan 4D I4	11,525
2012 Toyota Camry LE	\$17,475	2014 Toyota Camry Sedan 4D SE Sport 14	17,550
2006 Toyota Highlander Ltd 4WD	\$12,875	2008 Toyota Highlander-V6	13,350
2012 Buick LaCross CXI	\$20,175	2014 Buick Lacrosse Sedan 4D leather V6	20,800
2007 Ford Explorer Ltd	\$12,775	2009 Ford Explorer V6 Eddie Bauer 4wd/Awd	12,975
2013 Cadillac CTS Sedan	\$46,925	2015 Cadillac CTS Sedan 4D V Sport Premium V6 Turbo (closest I could find to price btw 2014 and 15)	49,725
2010 Ford Edge SEL Wagon AWD	\$17,675	2011 Ford Edge V6 Wagon 4D SEL AWD	17,150



District of Columbia

Property Tax

2013 Median Income and Median House Value

