THE NELSON A. ROCKEFELLER INSTITUTE OF GOVERNMENT



Changing Demographics and State Tax Collections*

NCSL Atlantic States Fiscal Leaders Meeting Boston, MA

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* And selected other fiscal issues

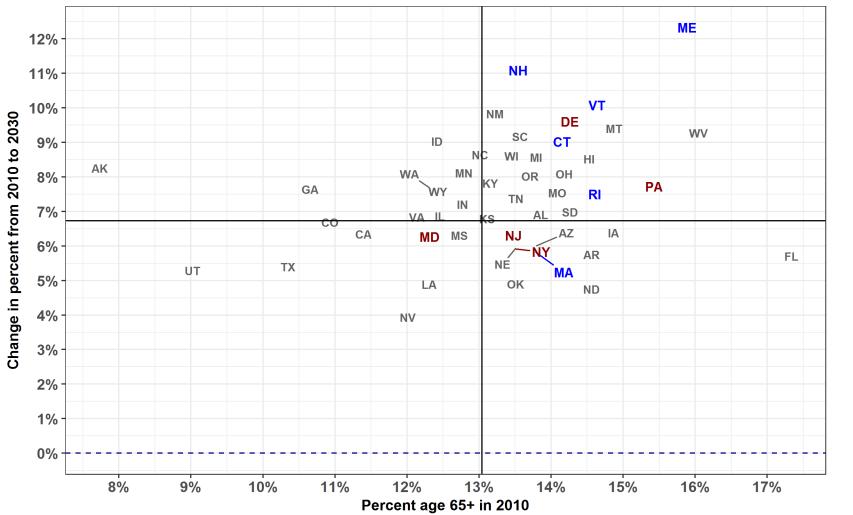
Outline

- Aging population
- Income tax
- Sales tax
- Selected other issues
- Conclusions

Most New England and Mid-Atlantic states are older than the U.S. average, and many are aging more rapidly

Projected percent of population age 65 or older in 2010, and change to 2030





- Mid-Atlantic
- New England
- a Other

Income tax

Two main reasons income tax is lower for older individuals

- Total income falls for older individuals retirement income usually less than preretirement earnings. (Aggregate retirement income is growing rapidly, but total income of retirees is lower than before retirement.)
- Tax breaks! For example:
 - Exclusion of Social Security income, public pensions, private pensions, IRA/401(k) withdrawals.
 - Additional personal exemptions and credits for the elderly

5

Federally taxable retirement income is growing rapidly and will continue to do so

Retirement Income in Federal Adjusted Gross Income

Billions of dollars

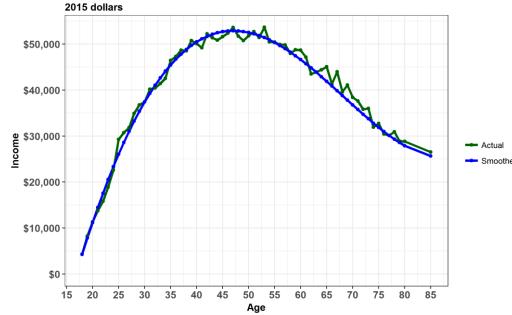
				Change from 2009 to 2014	
			% share of	Dollar	Percent
	2009	2014	AGI in 2014	change	change
Adjusted gross income	\$ 7,801.0	\$ 9,706.0	100.0%	\$1,905.0	24.4%
Salaries and wages	5,710.9	6,729.6	69.3%	1,018.7	17.8%
Net capital gains less loss	224.1	696.6	7.2%	472.5	210.9%
Taxable pensions	516.5	659.6	6.8%	143.2	27.7%
Taxable Social Security	171.3	260.4	2.7%	89.1	52.0%
Taxable IRA distributions	133.9	236.4	2.4%	102.5	76.6%
Retirement income	821.7	1,156.5	11.9%	334.8	40.8%
All other non-retirement income	1,044.4	1,123.4	11.6%	79.0	7.6%

Source: IRS Statistics of Income, 09in54cm.xls and 14in54cm.xls

- In the U.S., and in most states, average incomes fall in cohorts older than about age 50. ("Average" in all of these graphs is the mean.)
- State income taxes fall, too, but much more sharply

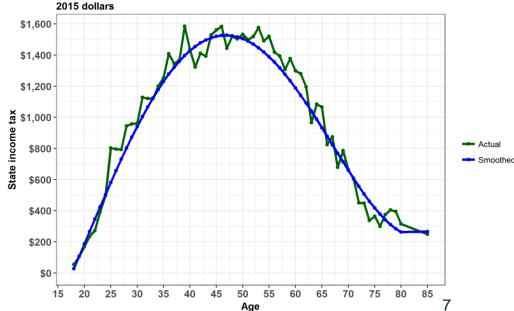
Note: I show "smoothed" values in addition to the raw data because they will make comparisons across states easier in later slides.

Average income by age in the United States



Source: Annual Social and Economic (ASEC) supplement to the Current Population Survey, pooled 2015 and 2016 Smoothed values estimated as a 4th degree polynomial of age

Average state income tax by age in the United States

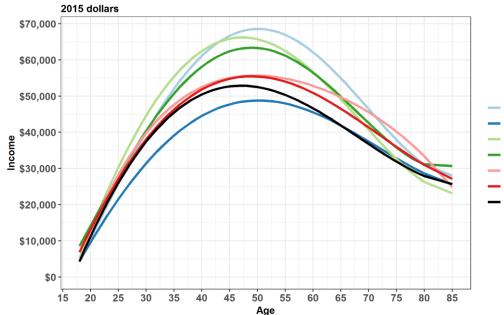


Source: Annual Social and Economic (ASEC) supplement to the Current Population Survey, pooled 2015 and 2016 Smoothed values estimated as a 4th degree polynomial of age

New England states

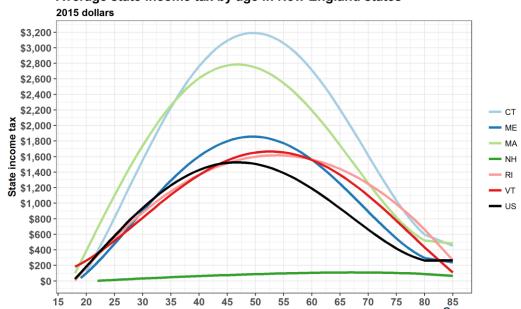
- Most New England states have aboveaverage income. All have a substantial post-50 drop-off
- State income taxes in most New England states are higher than U.S., and fall especially sharply after age 50 in CT and MA

Average income by age in New England states



Source: Annual Social and Economic (ASEC) supplement to the Current Population Survey, pooled 2015 and 2016 Smoothed values estimated as a 4th degree polynomial of age

Average state income tax by age in New England states

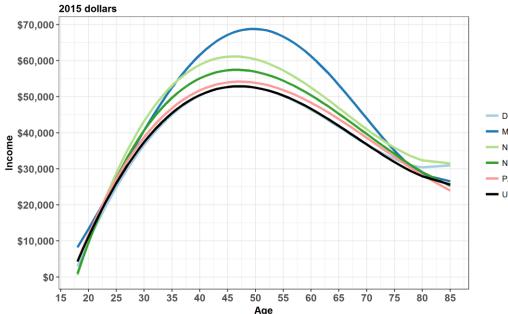


Source: Annual Social and Economic (ASEC) supplement to the Current Population Survey, pooled 2015 and 2016 Smoothed values estimated as a 4th degree polynomial of age

Mid-Atlantic states

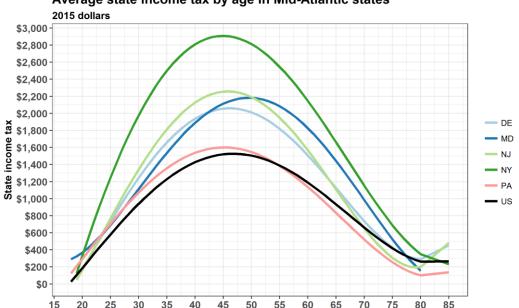
- Mid-Atlantic states have above-average income and a substantial post-50 drop-off
- State income taxes in Mid-Atlantic states are higher than U.S., and fall sharply after age 50, especially in NY

Average income by age in Mid-Atlantic states



Source: Annual Social and Economic (ASEC) supplement to the Current Population Survey, pooled 2015 and 2016 Smoothed values estimated as a 4th degree polynomial of age

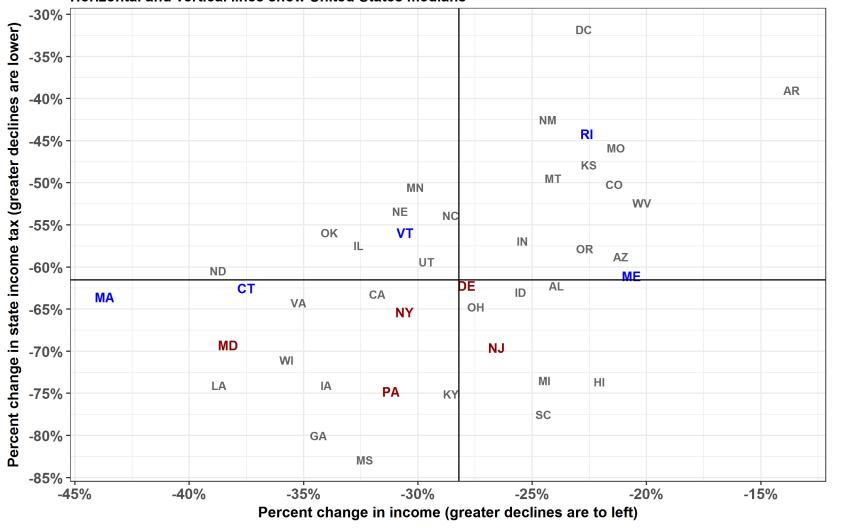
Average state income tax by age in Mid-Atlantic states



Source: Annual Social and Economic (ASEC) supplement to the Current Population Survey, pooled 2015 and 2016 Smoothed values estimated as a 4th degree polynomial of age

All states show a drop in income between age 45-64 and age 65+. State income tax drops are even larger.

Decline in income and in state income tax, age 65+ cohort relative to age 45-64 cohort Horizontal and vertical lines show United States medians



10

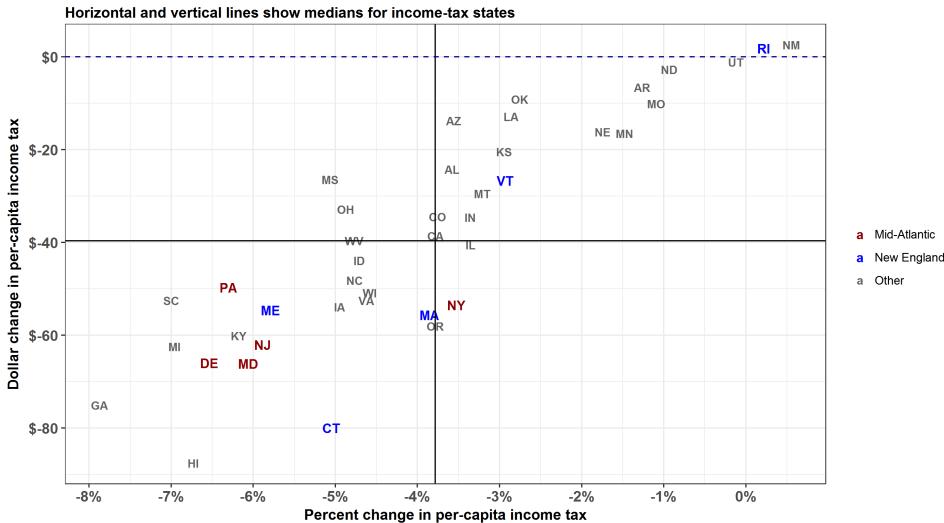
Mid-Atlantic

Other

New England

Income-tax impact of population-aging is larger than U.S. median for most states in region, especially Connecticut

Impact of projected 2030 age distribution on 2010 per-capita income tax



In the scheme of things, these potential changes (prior slide) don't seem that large

- They reflect changes in age distribution only, (what taxes would be if 2010 population had 2030 age distribution). They do not reflect population growth that will occur and may make revenue erosion less noticeable.
- Changes would happen gradually a median decline of 3.5% to 4% over 20 years; about 5.5% to 7% in harder-hit states. Compare to single-year median PIT declines in last recession: 10.7% in 2009 followed by 5.4% in 2010.
- The numbers could be affected, one direction or the other, by unexpected changes in retirement ages and mortality.
- States make the situation more difficult by taxing fastgrowing income sources (retirement income) very lightly – forgoing substantial revenue and reducing horizontal equity.

State retirement income tax policies

- •36 of 41 states with broad-based income tax provide exclusion for some retirement income (beyond Social Security), or elderly tax credit.
- •NOT: CA, NE, ND, RI, VT

Most Mid-Atlantic and New England states exclude much retirement income (x RI, VT)

State	Social Security	Federal Civil Service	Military Pension	State/Local Pension	Private			
		Pension Exclusion	Exclusion	Exclusion	Pension Exclusion			
СТ	Full exclusion if AGI is below \$50,000 for single filers or \$60,000 for joint filers.	No exclusion	50% exclusion	No exclusion	No exclusion			
DE	Full exclusion	Age 60+, \$12,500 Under age 60, \$2,000 Amounts are for each taxpayer. Married taxpayers must individually qualify. Limits are for all qualifying sources combined						
ME	Full exclusion	\$10,000 for taxpayer plus \$10,000 for spouse, or survivor of a pension beneficiary; reduced by SS and RR benefits. Pension income, IRA withdrawals, and other similar amounts may be excluded, up to the limit.						
MD	Full exclusion	Taxpayers aged 65 and over are entitled to an exemption of \$29,000 per person minus SS/RR benefits. Not applicable to IRA, Roth IRA, SEP or Keogh plans.						
MA	Full exclusion	Full exclusion	Full exclusion	Full for MA pensions; out- of-state are exempt if the state extends reciprocal treatment to MA pensions.	No exclusion			
NH	No personal income tax. Resi	sidents over the age of 65 are entitled to exempt \$1,200 in income subject to the interest and dividends tax.						
NJ	Full exclusion	62+, \$20,000 joint; \$15,000 single, subject to an income ceiling of \$100,000	Full exclusion	62+, \$20,000 joint; \$15,000 single, subject to an income ceiling of \$100,000	62+, \$20,000 joint; \$15,000 single, subject to an income ceiling of \$100,000			
NY	Full exclusion	Full exclusion	Full exclusion	Full for NY and DC pensions; out-of-state treated like private pensions.	\$20,000 for taxpayers aged 59 years, six months and older.			
PA	Full exclusion	Full exclusion	Full exclusion	Full exclusion	Full exclusion			
RI	Same as federal	No exclusion	No exclusion	No exclusion	No exclusion			
VT	Same as federal	No exclusion	No exclusion	No exclusion	No exclusion			
					14			

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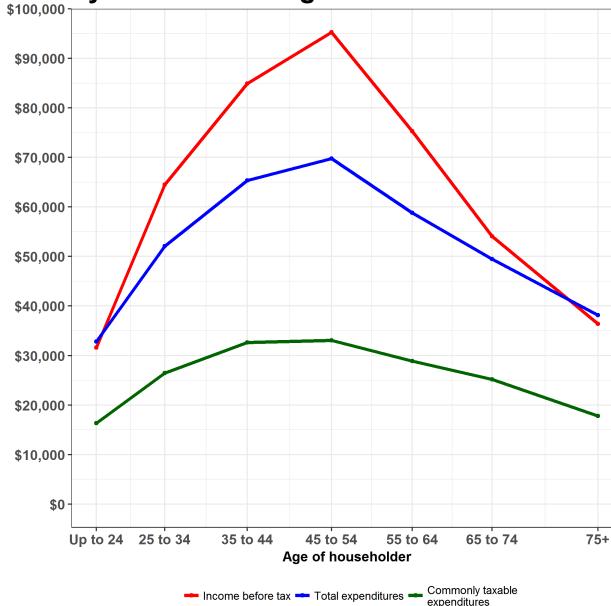
Taxing retirement income...

- Improves horizontal equity and efficiency treats different income sources the same
- Could raise substantial revenue or allow rate reductions
- Not likely to cause elderly to flee
 - Migration by elderly is small and stable over time (Conway & Rork, 2010)
 - Research so far has found no consistent effect on elderly interstate migration (Conway & Rork, 2012)
- Rather unpopular

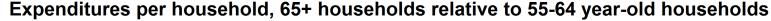
Sales tax

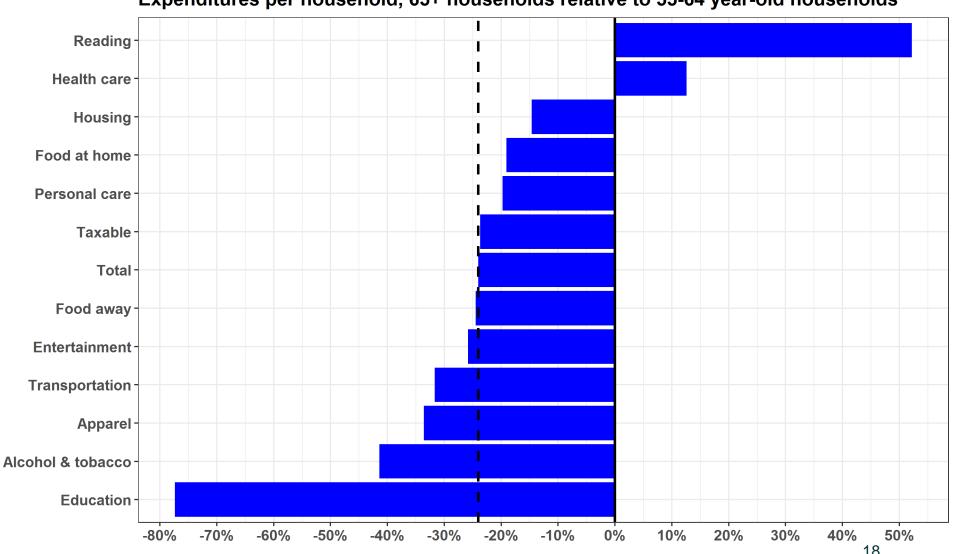
- Expenditures fall in older cohorts of households, but not as sharply as income falls
- Expenditures commonly taxed by states do not fall as sharply across cohorts as do total expenditures.
- Research that follows people over time suggests that people do reduce expenditures after they retire – they do not fully "smooth" consumption over their lives. (e.g., Hurd and Rohwedder 2006, Banerjee 2015)

Household income and expenditures by householder age



Age 65+ cohort spends less per household than age 55-64 households on most expenditure categories





Source: U.S. Bureau of the Census, Consumer Expenditure Survey 2015 Table 1300, plus author's calculations

Potential sales tax impact

- Felix & Watkins (2013) calc'd change in per-capita salestaxable spending*, comparing projected 2030 age distrib to 2011 distribution. Assumed spending within age cohorts per 2011 Consumer Expenditure Survey (CEX). They found declines in 49 states, ranging from -3.3% in HI to +0.2% in ID. Average -0.5%.
- I updated with newer pop projections and with 2015 CEX.** Declines in 49 states, ranging from -2.1% in NC to +0.3% in ND. Average -1.3%.
- These impacts seem pretty small, given that they would occur over ~20 years.

^{*} Apparel, transportation, entertainment, personal care products, food away from home, alcohol, tobacco products, reading material, housing costs except shelter and miscellaneous expenditures

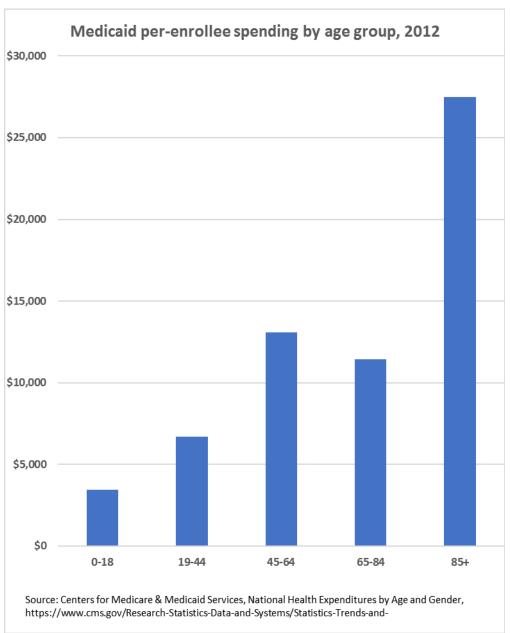
^{**} Slight difference: I compared 2030 to 2010, not 2011.

Selected other issues

Medicaid

We know:

- Spending per enrollee on nearelderly and elderly is much higher than other groups
- 2. Elderly enrollees will grow rapidly so there will be pressure
- 3. Federal policy is a wild card



Pensions & retiree health care

- Workforce aging is taken into account by actuaries, but all forecasts of the far future potentially are subject to significant error
- Potential longevity (mortality) improvements often taken into account by actuaries, again, subject to error
- Pension contributions as % of payroll become more volatile as # of retirees rises relative to # workers on payroll
- Retiree health care generally a smaller fiscal concern than pensions: (a) numbers not as large (Lutz & Sheiner, 2014), and (b) generally weaker legal protections.

Conclusions (1)

- Impact of population-aging on state taxes generally appears negative -- lower taxable incomes and lower taxable consumption would reduce income and sales taxes, all else equal.
- Income-tax impact is larger than sales-tax impact. Big differences across states.
- States have a (politically dangerous) opportunity to make income taxes more efficient, and raise revenue, by taxing more retirement income – or they could tax this income and lower rates. The revenue potential is large in some states and is growing rapidly.

Conclusions (2)

- Impacts of changing age distribution do not appear very large – <7% of PIT over 20 years in the most hard-hit states, about 3-4% in typical state. Small compared to a single bad PIT year (e.g., either of last 2 recessions).
- I wouldn't say, "don't worry about the tax impact." But you probably should worry more about other aspects of population aging.

Bibliography (1)

Banerjee, Sudipto. "Change in Household Spending After Retirement: Results from a Longitudinal Sample," 2015. https://papers.ssrn.com/sol3/papers.cfm?abstract_id=2694747.

Brewer, B., K. S. Conway, and J. C. Rork. "Protecting the Vulnerable or Ripe for Reform? State Income Tax Breaks for the Elderly--Then and Now." *Public Finance Review*, September 9, 2016. doi:10.1177/1091142116665903.

Brown, Jeffrey R. "Including Retirement Income in the Illinois Income Tax Base." Illinois Budget Policy Toolbox. University of Illinois Institute of Government and Public Affairs, February 27, 2014.

Conway, Karen Smith, and Jonathan C. Rork. "No Country for Old Men (or Women)—Do State Tax Policies Drive Away the Elderly?" *National Tax Journal* 65, no. 2 (2012): 313–356.

http://ntj.tax.org/wwtax/ntjrec.nsf/175d710dffc186a385256a31007cb40f/de93ed23981659d685257a1e004d2ded/\$FILE/A03_Conway.pdf.

- ———. "State Income Tax Preferences for the Elderly." *Andrew Young School of Policy Studies Research Paper Series*, no. 07-20 (2007). http://papers.ssrn.com/sol3/papers.cfm?abstract_id=989660.
- ———. "The Genesis of Senior Income Tax Breaks." *National Tax Journal* 65, no. 4 (December 2012).

Conway, Karen Smith, Jonathan C. Rork, J. Slemrod, and R. Avi-Novah. "'The Consequences of State Tax Preferential Treatment of the Elderly." *Taxation and Migration, Edited by J. Slemrod and R. Avi-Novah*, 2015, 151–86. https://www.ntanet.org/wp-content/uploads/proceedings/2014/131-conway-rork-consequences-state-tax-preferential-treatment.pdf.

Edwards, B., and S. Wallace. "State Income Tax Treatment of the Elderly." *Public Budgeting & Finance* 24, no. 2 (2004): 1–20.

Felix, Alison, and Kate Watkins. "The Impact of an Aging US Population on State Tax Revenues." *Economic Review-Federal Reserve Bank of Kansas City*, 2013, 5.

http://search.proquest.com/openview/3767a8970c3b5ad823b7711b72a4ff72/1?pq-origsite=gscholar&cbl=47211.

Bibliography (2)

Franzel, Joshua, and Alexander Brown. "Understanding Finances and Changes in Retiree Health Care." *Government Finance Review*, February 2012. http://slge.org/wp-

content/uploads/2012/03/Understanding_Finances_Franzel_Brown_Feb_2012.pdf.

Hurd, Michael D., and Susann Rohwedder. "Some Answers to the Retirement-Consumption Puzzle." National Bureau of Economic Research, 2006. http://www.nber.org/papers/w12057.

Lehner, Josh. "Aging Revenues." *Oregon Office of Economic Analysis*, March 19, 2014. https://oregoneconomicanalysis.com/2014/03/19/aging-revenues/.

Lutz, Byron, and Louise Sheiner. "The Fiscal Stress Arising from State and Local Retiree Health Obligations." National Bureau of Economic Research, 2014. http://www.nber.org/papers/w19779.

"National Population Projections: Projections for the 50 States and D.C." Weldon Cooper Center for Public Service, University of Virginia, May 2016.

 $http://demographics.coopercenter.org/Demographics_2/files/2016/12/National Projections_Projected Age Distribution_2020-2040_Updated 06-2016.xls.$

O'Hara, Amy. "Tax Variable Imputation in the Current Population Survey." *Department of the Treasury Internal Revenue Service*, 2006, 169.

Sheiner, Louise, Daniel Sichel, and Lawrence Slifman. "A Primer on the Macroeconomic Implications of Population Aging." Accessed February 22, 2014. http://www.federalreserve.gov/pubs/feds/2007/200701/200701abs.html.

Sjoquist, David L. "Selected Fiscal and Economic Implications of Aging." Georgia State University, 2007.

"State and National Projections Methodology." Weldon Cooper Center for Public Service, University of Virginia, September 21, 2016.

"State Personal Income Taxes on Pensions and Retirement Income: Tax Year 2014." Denver, Colorado: National Conference of State Legislatures, April 3, 2015.

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