Snapshot of California's SANDWICH GENERATION CAREGIVERS

The Impact of Caring for Children and Elderly Parents on Health, Finances and Employment

Prepared by the University of California, Berkeley's Division of Health Policy and Management • November 2014

April Falconi, MPH, MA, Health Services & Policy Analysis

William H. Dow, Ph.D., Henry J. Kaiser Professor of Health Economics



OVERVIEW

With couples having children later in life and California's aging population growing, the demand for sandwich generation caregivers—those caring for their children and elderly parents at the same time—is expected to grow rapidly in the coming decades.

Sandwich generation caregivers face significant time and financial pressures, particularly for the majority of those who also strive to balance a full-time or part-time job. Although caregiving provides personal gratification to many caregivers, it comes at a well-documented cost to caregivers and their employers. Most sandwich generation caregivers are not paid for the time they spend providing care, yet they spend thousands of dollars each year on caregiving. These costs come in addition to the losses in wages and benefits they face if they need to cut back on the number of hours they work or if they need to leave their jobs altogether.



Providing care for an elderly family member while concurrently managing their responsibilities as parents places sandwich generation caregivers at greater risk for poor health. Sandwich generation caregivers in California report poorer mental, physical and emotional health than non-caregivers or those who care only for children, which often impacts their personal relationships and their work. California employers are also impacted by the negative effects associated with sandwich caregiving, facing significant financial losses from absenteeism, workday interruptions and caregivers' higher health care costs.

CALIFORNIA'S INFORMAL CAREGIVERS

Informal caregiving is the most common source of care and support provided for individuals with long-term illnesses or disabilities. Although enrollment in caregiving programs such as home-and-community-based services has rapidly increased over the past decade, more than 80 percent of long-term care is still provided by family and friends who give care without compensation. Providing care to an elderly individual includes a wide range of tasks, from assisting with bathing and driving the caregiving recipient to and from doctor's appointments to managing medications and nursing procedures (e.g., urinary catheters, ventilators, tube feedings).

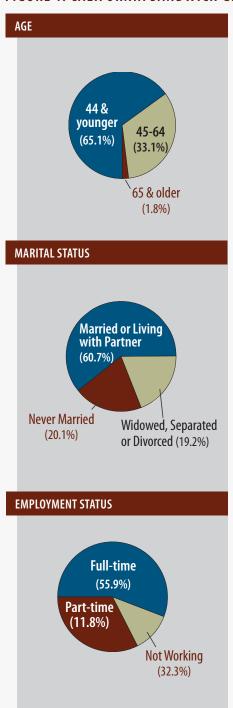
Nearly two million Californians (approximately 10 percent of the population) provided care for elderly parents or relatives while also taking care of children in 2009. The competing demands on these sandwich generation caregivers put them at great risk of burnout, with adverse implications for their caregiving, their employers and their own health. Demographic trends—including greater life expectancy and women delaying having children—suggest a growing sandwich generation, especially among women, who strive to balance the demands of child rearing and elder care while simultaneously working outside the home. 3.4

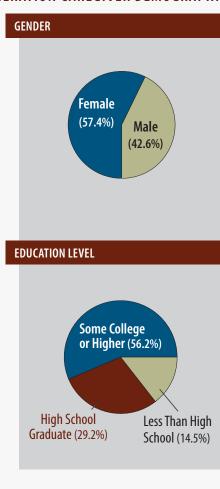
WHO ARE CALIFORNIA'S SANDWICH GENERATION CAREGIVERS?

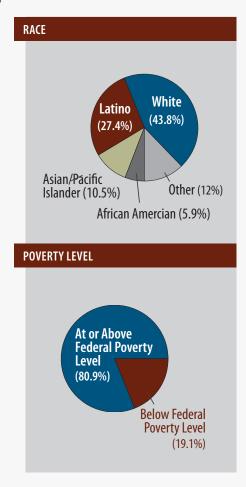
The typical sandwich generation caregiver in California is a middle-aged woman, relatively well-educated, employed full time with an income below the California median (see Figure 1 below). A growing proportion of male caregivers over the past two decades suggests that more men may be assuming the role of sandwich generation caregivers as well.⁵ Family composition is also

changing, as divorce is increasingly common and the number of single-parent families has skyrocketed.⁶ Consequently, more caregivers are providing care singlehandedly without the support (i.e. financial, emotional) of a partner.

FIGURE 1: CALIFORNIA SANDWICH GENERATION CAREGIVER DEMOGRAPHICS







Source: 2009 California Health Interview Survey

CAREGIVING ACTIVITIES: TIME AND MONEY SPENT

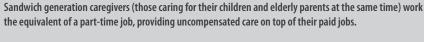
Sandwich generation caregivers work the equivalent of a part-time job, providing uncompensated care on top of their paid jobs (among the two-thirds of them who currently or usually work). Female sandwich generation caregivers work in their formal jobs an average of 2.5 hours per week less than female non-caregivers but provide on average 25.5 hours of informal care per week to an elderly loved one (Figure 2). Male sandwich generation caregivers work in their formal jobs about the same number of hours per week as male non-caregivers but provide an additional 15.9 hours of care per week to an elderly loved one. Most sandwich generation caregivers (76 percent) have provided care for a sustained period of time (at least three months), with 40 percent reporting they have provided care for two years or longer.

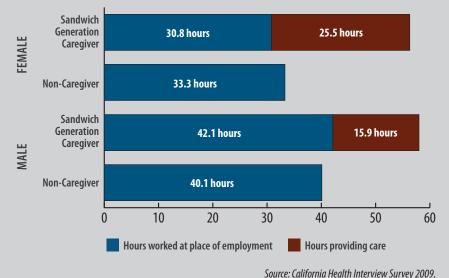
Although these caregiving statistics describe the average sandwich generation caregiver, many caregivers spend even more time each week providing care. For example, research indicates that those caring for individuals with cognitive illnesses, such as Alzheimer's disease, provide substantially more hours of care than other informal caregivers.⁷ In the next two decades, the number of Californians living with Alzheimer's disease is expected to double, suggesting that a growing number of Californians may be involved in this type of high-intensity caregiving.8

Another important factor affecting the amount of time individuals spend providing care is where the care recipient lives. One-third (34 percent) of care recipients live with their sandwich generation caregiver, and sandwich generation caregivers whose care recipients live with them spend an average of 35 hours per week—almost as much as a full-time job—providing care.9

Sandwich generation caregivers whose care recipients live with them also spend more of their own money on caregiving than sandwich generation caregivers whose care recipients do not live with them. Among sandwich generation

FIGURE 2: HOURS SPENT WORKING OR PROVIDING CARE





Source: California Health Interview Survey 2009.

caregivers whose care recipient lives with them, nearly a quarter (24 percent) spend \$250 or less each month on caregiving, and another one-third (33 percent) spend more than \$250 each month on caregiving.

Among sandwich generation caregivers whose care recipients do not live with them, 29 percent of female caregivers spend \$250 or less each month on caregiving, and nearly another quarter (23 percent) of female caregivers spend more than \$250 each month on caregiving. Male sandwich generation caregivers spend slightly less than their female counterparts on caregiving, with 27 percent spending \$250 or less each month, and another 22 percent spending more than \$250 each month.

These expenditures come at a bargain compared to the monthly private pay rate for a nursing facility (\$6,400), assisted living (\$3,500) or adult day care (\$2,300). More than half of (54 percent) care recipients in California do not receive support from the state via Medi-Cal for their long-term care needs, and this may be exacerbated by increasing pressure on the Medi-Cal program to further reduce eligibility for state support.10 Nearly half (47 percent) of California voters who are likely to need paid longterm care services in the next five years say they will not be able to afford one month of care, and the majority (75 percent) report they could not afford more than three months of nursing home care.11

Most caregivers (93 percent) are not paid for the time they spend providing care, 12 and the thousands of dollars they spend out-of-pocket on caregiving annually often result in significant decreases in their ability to save for retirement or spend money on their own health care, home ownership or home maintenance. 13 Sandwich generation caregivers are consequently more likely to report living "paycheck to paycheck" as well as being "very concerned" about affording college for their children compared to non-caregivers with children.14

More than one-quarter (27 percent) of caregivers in the country reported a moderate to high degree of financial hardship from caregiving in 2009.15 In California, sandwich generation caregivers report greater financial hardship than non-caregivers, as they more frequently report not being able to afford to eat balanced meals (21 percent vs. 14 percent), as well as going hungry due to a lack of money (10 percent vs. five percent).

EFFECTS OF CAREGIVING ON HEALTH AND WELL-BEING

Taking care of an elderly loved one while raising children often negatively impacts sandwich generation caregivers' health and well-being. In California, sandwich generation caregivers report poorer mental and emotional health than non-caregivers and non-caregivers with children. Both male and female sandwich generation caregivers are more likely to report feeling nervous, hopeless and depressed, compared to non-caregivers (Figure 3), and are more likely to report that that their emotions interfere with their work and their relationships, as compared to non-caregivers and non-caregivers with children (see Figure 3).

Sandwich generation caregivers are also more likely to neglect their own health, often delaying seeking medical care and getting prescriptions filled. Compared with male non-caregivers, male sandwich generation caregivers are significantly more likely to delay getting a prescription (11.7 percent vs. 6.9 percent) or other medical care (22.1 percent vs. 12 percent). Among female sandwich generation caregivers, 15.2 percent report delaying getting a prescription (compared to 9.7

percent of female non-caregivers) and 23.8 percent report delaying getting medical care (compared with 14.1 percent of female non-caregivers).

Perhaps as a consequence of neglecting their own health, sandwich generation caregivers in California are more likely to require emergency care for themselves compared with non-caregivers.

Male sandwich generation caregivers are approximately 65 percent more likely and female sandwich generation caregivers are approximately 14 percent more likely to require emergency care than their non-caregiver counterparts.

The prolonged stress of caring for a loved one for a lengthy period of time is also associated with accelerated aging and earlier death among caregivers. ¹⁶

Some of the most vulnerable caregivers in California are those caring for someone with mental health, memory or behavioral problems (see *Lisa's Story* below and *Candace's Story* on page 6). These types of caregivers are more likely to experience physical strain, emotional stress and financial hardship.¹⁷

TAKING CARE OF AN ELDERLY
LOVED ONE WHILE RAISING
CHILDREN OFTEN NEGATIVELY IMPACTS
SANDWICH GENERATION CAREGIVERS'
HEALTH AND WELL-BEING.

Other types of caregivers vulnerable to negative health effects of caregiving include those in high-intensity caregiving situations, including those whose care recipient lives with them, those who provide care for more than 21 hours per week and those who have provided care for five years or more. ¹⁸

The poorer health of sandwich generation caregivers is particularly striking given that they have higher average education than non-caregivers, which typically equates to better health. 19 Research strongly suggests that it is the stress of caregiving that is associated with poorer health among this sandwich generation than if there were alternate caregiving arrangements. 20,21

LISA'S STORY: CAREGIVING TAKES ITS TOLL

Lisa* knew she would have to care for her mom someday, but she always thought it would be after her children were grown—not while they were still in elementary school. Lisa was in her late 30s when her mom was diagnosed with Alzheimer's disease and came to live in her home.

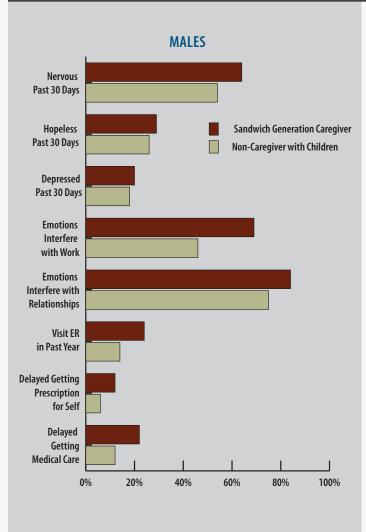
At first, Lisa provided minimal assistance to her mom—dispensing medications, preparing meals, managing bills and taking her to doctor's appointments. But Lisa's mother's condition rapidly deteriorated, and it wasn't long before Lisa was helping her mom to dress, shower, eat and use the toilet.

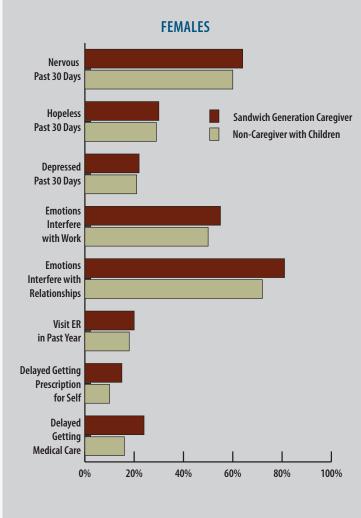
Day-to-day life was challenging for Lisa, as she juggled helping her children with homework, managing the household and caring for her mom. She tried to give her children 100 percent of what they needed, but she often missed their school performances and other events because of her caregiving duties.

Caring for both her mother and children took a toll on Lisa's physical and emotional health. She gained a significant amount of weight and had difficulty sleeping. She soon began taking anti-depressants, and after seven years of care, she felt on the verge of a nervous breakdown. Caregiving also took its toll on her finances. When she first began caring for her mom, she was on the path to a promotion. She ultimately quit her job for another job with greater flexibility but less pay. Lisa's mom is now in assisted living but only has enough money to pay for one more month of care. Afterwards, Lisa will need to pay nearly \$2,000 per month to keep her mom from being forced to move to a public nursing home.

*All names have been changed to protect the identity of caregivers and their families.

FIGURE 3: HEALTH OF SANDWICH GENERATION CAREGIVERS VS. NON-CAREGIVERS WITH CHILDREN





Source: California Health Interview Survey 2009.

Notes: Among males, differences between sandwich generation caregivers and non-caregivers with children are significant.

With the exception of "visited ER in past year" and "felt depressed in past 30 days" among females, differences between sandwich generation caregivers and non-caregivers with children are also significant (p<0.01).

EFFECTS OF CAREGIVING ON EMPLOYMENT

The majority (67 percent) of California's sandwich generation caregivers are employed—56 percent work full time, and 12 percent work part time. Most (69 percent) male sandwich generation caregivers and nearly half (46 percent) of female sandwich generation caregivers hold full-time jobs. Caregiving can impact a person's job performance in many ways, including increased absenteeism, greater likelihood of quitting and decreased job satisfaction (see *Ted's Story* on page 7). Many national studies report higher levels of stress and negative attitudes among sandwich generation caregivers as well.^{23,24}

Balancing caregiving with work also comes at a price in terms of lower work productivity, with most (70 percent) caregivers nationwide reporting having to make changes due to caregiving, such as cutting back on work hours, taking a leave of abscence, changing jobs or stopping work entirely.25 Once individuals commence caregiving, more than half (62 percent) of caregivers in the country report making some sort of workplace accommodation, such as changing their work schedule (i.e. arriving late, leaving early or taking time during the day) to provide care.26 It is not unusual for working caregivers to report missed opportunities for promotions, business travel, relocation, training and education.²⁷ Sandwich generation caregivers, especially those whose care recipient lives with them, have to make these accommodations even more frequently.²⁸

CAREGIVERS FACE THE
POTENTIAL LOSS OF INCOME,
AS WELL AS RETIREMENT AND
HEALTH BENEFITS, IF THEY NEED
TO REDUCE WORK HOURS OR
LEAVE THEIR JOBS ALTOGETHER

CANDACE'S STORY: CAREGIVING CHANGES RELATIONSHIPS

Candace* was in her late 40s with two teenage children at home when her mother was diagnosed with Alzheimer's disease. The diagnosis was difficult for the entire family, with lots of disagreement over how to best care for mom. Arguments ensued about whether she should move into assisted living or if she should remain at home under supervised care.

Candace's mom ultimately remained at home with her husband for the three remaining years of her life. Despite hiring caregivers, Candace still spent at least five to 10 hours per week caring for her mom—transporting her to doctor's appointments, managing and supervising her care and dispensing medications.

Caring for her mom was stressful and exhausting for Candace and led to depression and weight gain. Since Candace was self-employed, her career did not suffer significantly during the three years she cared for her mom. Caregiving did, however, impinge on her social life and placed a strain on her marriage. Candace was also frustrated that she could not be as emotionally or physically available to her teenage children, who were preparing for college. The only positive aspect to come from the experience was that it brought Candace and her father closer, changing their relationship forever.

*All names have been changed to protect the identity of caregivers and their families.

In addition to the out-of-pocket caregiving expenses previously discussed, caregivers face the potential loss of income, as well as retirement and health benefits, if they need to reduce work hours or leave their jobs altogether.²⁹ Nationally, female caregivers who leave the workforce early lose an estimated \$274,044 dollars annually and male caregivers who leave the workforce early lose \$233,714 annually in lost wages and Social Security benefits.

Employers of caregivers also potentially face significant financial losses. Nationally, an estimated \$33.6 billion, or \$2,110 per full-time employee, is lost annually due to caregiving, primarily from absenteeism (\$5.1 billion), shifts from full-time to part-time work (\$4.8 billion), replacing employees (\$6.6 billion) and workday interruptions (\$6.3 billion). These estimates do not take into account the costs incurred due to the poorer health of employed caregivers.³⁰ Employer's health care costs are estimated to be eight percent higher for employees with elderly caregiving responsibilities, costing U.S. employers an estimated \$13.4 billion dollars annually. Additionally, health care costs are

11 percent higher for blue-collar caregivers and 18 percent higher for male caregivers.³¹

INCREASING CHALLENGES FOR EMPLOYERS AND WORKERS

The need for caregivers will rise as California's population continues to age. Californians are living longer and currently enjoy the third longest life expectancy in the country—an average life span of 80.4 years—surpassed only by Hawaii and Minnesota.³² This increased longevity, combined with the aging baby boomer generation (those born from 1946 to 1964), will cause California's elderly population to grow by 60 percent between 2010 and 2023.³³

Increasing disability rates among the aging population will also contribute to the growing demand for caregivers in the near future. While it once appeared that disability was declining among the elderly, evidence suggests that the baby boomer generation is in worse health than those

TED'S STORY: A FAMILY AFFAIR

It wasn't until Ted's mother-in-law passed that Ted* and his wife realized how reliant his father-in-law, John, had been upon his wife's assistance. John's arthritis made him highly unstable and at high risk for falls. John consequently moved into an assisted living facility.

Ted and his wife visited John regularly to provide emotional support and to help with cleaning the house, managing bills, managing medications, driving him to doctor's appointments, shopping, dressing and bathing. Ted's business suffered as a result of the caregiving, because he was often forced to reschedule or cancel meetings at the last minute. When Ted was at work, he felt distracted and exhausted, and was unable to expand his business as he had been planning. Ted's wife also took periods of unpaid leave to care for her father.

Caregiving was stressful for Ted's children as well. While they once enjoyed visiting with their grandfather, they were frustrated when his condition worsened because they felt like they were babysitting him. John also struggled with feelings of loss of self-reliance and dignity.

The height of the stress occurred when Ted's wife broke her leg while she was rushing to respond to her father, who had fallen and broken some ribs. Both she and John were hospitalized, and caring for them was emotionally and financially taxing on Ted. Although Ted's wife recovered, Ted became exhausted and he contracted pneumonia and a blood infection, which led to six weeks of hospitalization. The family was overwhelmed with stress and emotions with Ted recovering in the hospital and John dying in a nursing home.

John passed away a few months later. While caregiving was one of the most difficult experiences in Ted's life, he gained a more intimate knowledge of his father-in-law during the four years that he cared for him than he had ever been able to gain during the 25-plus years he had known him.

*All names have been changed to protect the identity of caregivers and their families.

born before them. Trends indicate that more individuals in their fifties require help with personal care than those born before them.³⁴

Rising health care costs may also contribute to the increasing demand for informal caregivers. States are required to pay for institutional care under Medicaid, and evidence suggests that informal care reduces long-term care expenditures for formal care substantially.³⁵ The economic value of family caregiving in California was estimated at \$47 billion in 2009, which far exceeds the \$12.8 billion in Medicaid spending for long-term care in the same year.³⁶

As California's population ages and demand for long-term care services rises, the state may increasingly turn to families as a potentially cost-effective source of long-term care, particularly given that informal caregivers already provide the majority of long-term care services and support.³⁷ Although demand for long-term care is expected to rise rapidly over the coming decades, the supply of available informal caregivers is anticipated to shrink.^{38,39} Couples are having fewer children and having them later in life. These trends suggest fewer available caregivers, as well as a growing proportion of sandwich generation caregivers.

Another trend leading to fewer informal caregivers is the increasing number of women in the paid workforce. The female workforce has grown by 44.2 percent in the past 25 years. 40 This growth in labor force participation equates to a decline in the number of women who can devote their full attention to caregiving.

A significant number of women, consequently, strive to balance caregiving with paid employment, often at the expense of absenteeism from work, lost income and benefits, and reduced productivity. 41

In sum, these aging, disability, health care, family and workforce trends suggest a growing number of people who will face the challenge of juggling dual demands of work and caregiving. Matters are further complicated for those caregivers who also must balance providing care to their own children while caring for an elderly loved one. Although caregiving provides personal gratification to many, it comes at a well-documented cost to caregivers with respect to their finances, health and employment.⁴² The implication of these trends is an increasingly common conflict between work and family, which is of concern to both employers and workers.⁴³

AUTHOR INFORMATION

This issue brief was prepared by the University of California, Berkeley's Division of Health Policy and Management in the School of Public Health:

April Falconi, MPH, MA Health Services & Policy Analysis University of California, Berkeley

William H. Dow, Ph.D.

Henry J. Kaiser Professor of Health Economics Head, Division of Health Policy & Management, School of Public Health Associate Director, Berkeley Population Center

The Health Policy and Management (HPM) Division addresses the rapid changes occurring in the organization, financing and administration of public health and medical care systems. The division trains creative leaders and policy analysts to understand the complexity and dynamics of the health system and its impact on the health of the population. The dissemination of new knowledge contributes to efforts to improve the availability, affordability and effectiveness of health services and develop policies that reinforce these objectives.

FUNDING

This issue brief was funded by the California Partnership for Long-Term Care, an educational program of the State of California's Department of Health Care Services (DHCS). The purpose of the program is to make sure Californians are ready for their future long-term care needs. Established in 1994, the Partnership is dedicated to educating Californians on the need to plan ahead and to consider private insurance as a way to fund that care. The Partnership offers an honest, straightforward look at the facts, the costs and the emotional challenges of long-term care.

www.RUReadyCA.org (916) 552-8990



SUGGESTED CITATION

Falconi, April and Dow, William H. "Snapshot of California's Sandwich Generation Caregivers." University of California, Berkeley's Division of Health and Policy Management, November 2014.

SOURCES

- Spillman B, & Black K. "Staying the Course: Trends in Family Caregiving," Research Report, November 2005. < http://assets.aarp. org/rgcenter/fil/2005_17_caregiving.pdf>
- United States Department of Labor. "Report of the Working Group on Long-Term Care." November 2000. < www.dol.gov/ebsa/publications/report2.htm>
- Spillman B, Pezzin L. "Potential and Active Family Caregivers: Changing Networks and the "Sandwich Generation." The Milbank Quarterly, 78:3, 2000.
- Malach-Pines, A., Hammer, L., and Neal, M. "Sandwiched Generation' Couples: A Cross-Cultural, Cross-Gender Comparison," Pratiques Psychologiques, 15:2, June 2009.
- Wagner, D. & Takagi, É. "Informal Caregiving By and For Older Adults," Health Affairs Blog, February 16, 2010, http://healthaffairs.org/blog/2010/02/16/informal-caregiving-by-and-for-older-adults/
- Teachman J., Tedrow, L., & Crowder, K. "The Changing Demography of America's Families," Journal of Marriage and Family, 62:4, November 2000.
- MetLife. "The MetLife Study of Alzheimer's Disease: The Caregiving Experience," August 2006 https://www.metlife.com/assets/cao/mmi/publications/studies/mmi-alzheimers-disease-caregiving-experience-study.pdf.
- Ross, L. et al. "Alzheimer's Disease Facts and Figures in California: Current Status and Future Projections," February 2009, <www. chhs.ca.gov/initiatives/Documents/CADataReport-3-9.pdf>.
- California Health Interview Survey 2009.
- MetLife, "8th Annual Study of Employee Benefits Trends: Findings from the National Survey of Employers and Employees," 2010
 http://www.healthblansonline.com/docs/articles/metlife/MetLife_8th_Annual_Trend_Study.pdf>
- 11. The Scan Foundation, UCLA Center for Health Policy Research, Lake Research Partners, "Findings from a New Survey Among California Voters 40 and Older on Long-Term Care." September 13, 2012. www.healthpolicy.uda.edu/pubs/files/scansurvevfindings-sep2012.pdf
- Hoffman, G. & Mendez-Luck, C. "Stressed and Strapped: Caregivers in California," UCLA Center for Health Policy Research Health Policy Brief, September 2011.
- Evercare in collaboration with the National Alliance for Caregiving. "Family Caregivers What they Spend, What they Sacrifice: Findings from a National Survey." 2007 < http://www.caregiving.org/data/Evercare_NAC_CaregiverCostStudyFINAL20111907. pdf>
- MetLife, "8th Annual Study of Employee Benefits Trends: Findings from the National Survey of Employers and Employees," 2010 http://www.healthplansonline.com/docs/articles/metlife/MetLife_8th_Annual_Trend_Study.pdf>
- Feinberg, L. et al. "Valuing the Invaluable: 2011 Update The Growing Contributions and Costs of Family Caregiving," AARP Public Policy Institute Insight on the Issues, 2011, https://assets.aarp.org/rgcenter/ppi/ltc/i51-caregiving.pdf>.
- 16. Epel, E. et al. "Accelerated Telomere Shortening in Response to Life Stress," PNAS 101:49, 2004.
- Center for the Advanced Study of Aging Services, "Caregiving in California: Final Report of the University of California Family Caregiver Support Project," September 29, 2006, http://cssr.berkeley.edu/pdfs/FCSPFinalReport.pdf.
- National Alliance for Caregiving in Collaboration with AARP, "Caregiving in the U.S. 2009," http://www.caregiving.org/data/caregiving_in_the_US_2009_full_report.pdf>.
- Cuttler, D. & Lleras-Muney, A. "Education and Health: Evaluating Theories and Evidence," NBER Working Paper No. 12352. July 2006 http://www.nber.org/papers/w12352.pdf?new_window=1.
- Son, J. et al. "The Caregiver Stress Process and Health Outcomes," Journal of Aging and Health, 19:6, December 2007.
- Pinquart, M. & Sorenson, S. "Differences Between Caregivers and Non-Caregivers in Psychological Health and Physical Health." Psychology and Aging, 18:2, June 2003.
- Riley, L & Bowen, C. "The Sandwich Generation: Challenges and Coping Strategies of Multigenerational Families," The Family Journal. 13:1. January 2005.
- 23. Neal, M. & Wagner, D. "Working Caregivers: Issues, Challenges, and Opportunities for the Aging Network," 2002, <a href="http://www.

- care givers library. or g/Portals/0/Working %20 Care givers %20-%20 lssues%20 for %20 the %20 Aging %20 Network %20 Fin-Neal-Wagner, pdf>.
- 24. Malach-Pines, A., Hammer, L., and Neal, M. "'Sandwiched Generation' Couples: A Cross-Cultural, Cross-Gender Comparison," Pratiques Psychologiques, 15:2, June 2009.
- National Alliance for Caregiving in Collaboration with AARP, "Caregiving in the U.S. 2009," http://www.caregiving.org/data/caregiving_in_the_US_2009_full_report.pdf>.
- MetLife, "The MetLife Study on Working Caregivers and Employer Health Care Costs," February 2010, <www.metlife.com/ assets/cao/mmi/publications/studies/2010/mmi-working-caregivers-employers-health-care-costs.pdf>.
- MetLife, "The MetLife Study of Caregiving Costs to Working Caregivers," June 2011, < https://www.metlife.com/assets/cao/mmi/publications/studies/2011/mmi-caregiving-costs-working-caregivers.pdf>.
- MetLife, "The MetLife Study on Working Caregivers and Employer Health Care Costs," February 2010, <www.metlife.com/assets/cao/mmi/publications/studies/2010/mmi-working-caregivers-employers-health-care-costs.pdf>.
 Feinberg, L. et al. "Valuing the Invaluable: 2011 Update The Growing Contributions and Costs of Family Caregiving," AARP
- Public Policy Institute Insight on the Issues, 2011, http://assets.aarp.org/rgcenter/ppi/ltc/i51-caregiving.pdf.

 30. MetLife, "The MetLife Study on Working Caregivers and Employer Health Care Costs," February 2010, www.metlife.com/
- assets/cao/mmi/publications/studies/2010/mmi-working-caregivers-employers-health-care-costs.pdf>.
 31. MetLife, "The MetLife Study on Working Caregivers and Employer Health Care Costs," February 2010, https://www.metlife.com/assets/cao/mmi/publications/studies/2010/mmi-working-caregivers-employers-health-care-costs.pdf>.
- Statehealthfacts.org, "Life Expectancy at Birth, 2007," < www.statehealthfacts.org/comparemaptable.jsp?ind=784&cat=2&su b=206&yr=18&typ=1&rgnhl=6>. Accessed July 30, 2012.
- Administration on Aging, U.S. Department of Human Services, "A Profile of Older Americans: 2011." < http://www.hcbs.org/files/211/10508/2011profile.pdf>.
- Martin, L. et al. "Health and Functioning Among Baby Boomers Approaching 60," Journals of Gerontology Series B-Psychological Sciences and Social Sciences. 64:3, 2009.
 Van Houtven, CH & Norton, E. "Informal Care and Medicare Expenditures: Testing for Heterogenous Treatment Effects," Journal of
- 33. Val nouveri, Chia notation, E. Iniorinal care and medicare experiorities. Testing for neterogenous nearment effects, Journal of Health Economics, 21:1, 2008.

 26. House, A. Env. Chia, M. and Illinai, V. "Access the States Deplice of Long Tarm Springer and Supports (the Edition." AADD 201.
- 36. Houser, A., Fox-Grage, W., and Ujvari, K. "Across the States: Profiles of Long-Term Services and Supports, 9th Edition," AARP, 2012 http://www.aarp.org/content/dam/aarp/research/public_policy_institute/ltc/2012/across-the-states-2012-full-report-AARP-ppi-ltc.pdf.
- Spillman B, & Black K. "Staying the Course: Trends in Family Caregiving," Research Report, November 2005. < http://assets.aarp. org/rgcenter/fil/2005_17_caregiving.pdf>
- Super, N. "Who Will Be There to Care? The Growing Gap Between Caregiver Supply and Demand." National Health Policy Forum Background Paper, January 23, 2002, < www.nhpf.org/library/background-papers/BP_Caregivers_1-02.pdf>.
- Greenlee, J. & Scharlach, A. "Caregivers' Characteristics and Needs," 2003 < http://cssr-pw01.berkeley.edu/pdfs/famcare_03.pdf>.
 U.S. Congress Joint Economic Committee, "Women and the Economy 2010: 25 Years of Progress But Challenges Remain," August
- 2010, http://www.jec.senate.gov/public/?a=Files.Serve&File_id=8be22cb0-8ed0-4a1a-841b-aa91dc55fa81
 41. MetLife, "The MetLife Study of Careqiving Costs to Working Careqivers," June 2011, https://www.metlife.com/assets/cao/
- MetLife, "The MetLife Study of Caregiving Costs to Working Caregivers," June 2011, https://www.metlife.com/assets/cao/mmi/publications/studies/2011/mmi-caregiving-costs-working-caregivers.pdf.
- 42. Arno, P., Levine, C., Memmott, M. "The Economic Value of Informal Caregiving," Health Affairs, 18:2, 1999.
- Neal, M. & Wagner, D. "Working Caregivers: Issues, Challenges, and Opportunities for the Aging Network," 2002, http://www.caregiverslibrary.org/Portals/0/Working%20Caregivers%20-%20Issues%20for%20the%20Aging%20Network%20Fin-Neal-Wagner.pdf.