



Determining the Return on Investment:

Supportive Policies for
Employee Caregivers

A collaboration between AARP and ReACT

AARP[®]
Real Possibilities

ReACT
Respect A Caregiver's Time
Corporate Leadership for Employee Caregivers



About AARP

AARP is a nonprofit, nonpartisan organization, with a membership of nearly 38 million, that helps people turn their goals and dreams into real possibilities, strengthens communities and fights for the issues that matter most to families such as healthcare, employment and income security, retirement planning, affordable utilities and protection from financial abuse. We advocate for individuals in the marketplace by selecting products and services of high quality and value to carry the AARP name as well as help our members obtain discounts on a wide range of products, travel, and services. A trusted source for lifestyle tips, news and educational information, AARP produces AARP The Magazine, the world's largest circulation magazine; AARP Bulletin; www.aarp.org; AARP TV & Radio; AARP Books; and AARP en Español, a Spanish-language website addressing the interests and needs of Hispanics. AARP does not endorse candidates for public office or make contributions to political campaigns or candidates. The AARP Foundation is an affiliated charity that provides security, protection, and empowerment to older persons in need with support from thousands of volunteers, donors, and sponsors. AARP has staffed offices in all 50 states, the District of Columbia, Puerto Rico, and the U.S. Virgin Islands. Learn more at www.aarp.org.



About ReACT

ReACT is an employer-focused coalition dedicated to addressing the challenges faced by employee caregivers and reducing the impact on the companies that employ them. ReACT represents nearly 1 million employees through its membership of more than 40 companies and non-profit organizations. ReACT seeks to create a supportive business environment where the challenges faced by caregivers juggling the demands of both work and caregiving for an adult with a chronic age-related disease are understood and recognized by employers so that employees can better meet their personal and professional responsibilities. Please visit www.respectcaregivers.org for more information.

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For more information or interest in this report, please contact Drew Holzapfel, Convener, ReACT.
dholzapfel@highlanterngroup.com



The Business Case for Family Caregiver Policies

SUMMARY

Population aging combined with limited publicly funded and provided elder care in the U.S. means that family caregivers play an increasingly important role. Those added responsibilities represent significant challenges for caregivers, especially for women, who still shoulder the lion's share of the work. At a time when women increasingly participate in the formal workforce, they find themselves "sandwiched" between the simultaneous responsibilities of caring for children and parents. As a result, there is great interest in having more workplace flexibility and support to help juggle the conflicting demands of the workplace and home.

At the moment, legal mandates on employers to accommodate family caregivers are still evolving. With the exception of the federal Family and Medical Leave Act (FMLA), most decisions on scope and scale of family caregiver benefits are left to individual employers. To make those decisions, employers need objective and actionable information on the costs and benefits of different policies. This report attempts to give employers much-needed data by organizing and summarizing the available evidence on the costs and benefits of family caregiver support policies, and providing a calculation of return on investment (ROI) on those policies from an employer perspective where sufficient data were available to make such a calculation.

Overall, the evidence supports the business case for offering such benefits that allow caregivers to balance their jobs with other responsibilities, such as flextime and telework. For every dollar invested in flextime, businesses can expect a return of between \$1.70 and \$4.34, and for every dollar invested in telecommuting option of between \$2.46 and \$4.45.

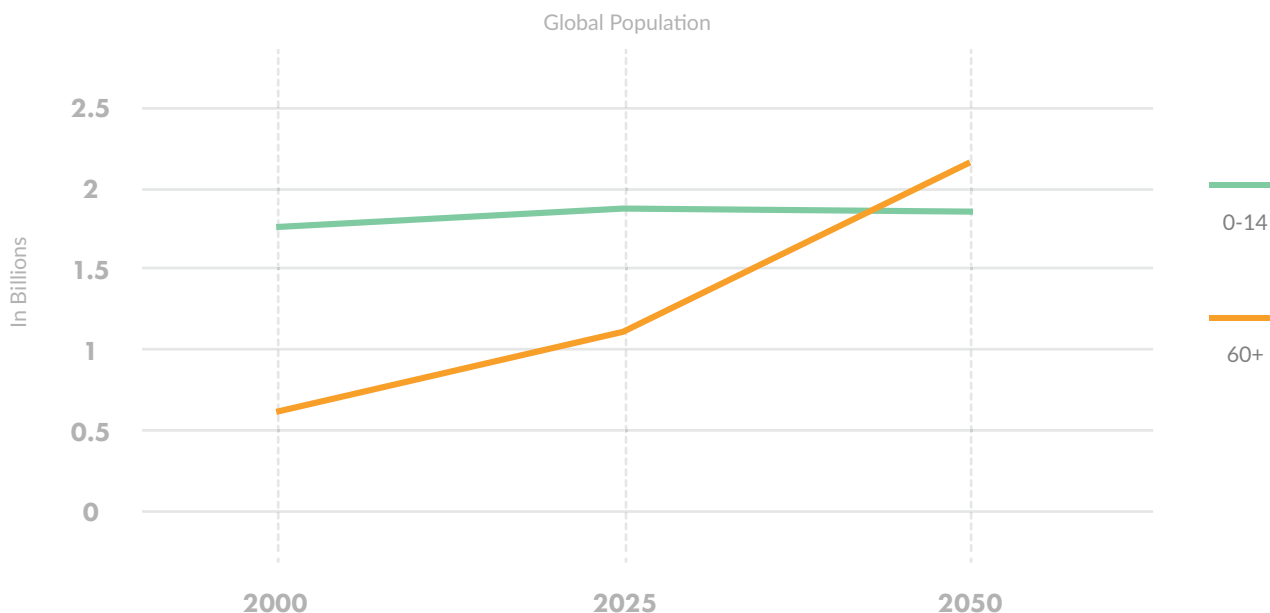
There are a limited number of studies that document the results of such program implementation that also have the required level of detail to calculate ROI. In addition, there is only limited data available that quantify the cost of implementing and maintaining family-friendly policies. The benefits not identified by this report as having a positive return on investment does not imply that they do not have return on investment. Simply, the existing data are not sufficient for us to calculate a return with this methodology. Future research should strive to address these gaps and provide evidence for employers' decision making on offering family-friendly policies.

But overall this first integrative study of the business case for caregiver-friendly policies shows encouraging findings and should stimulate employers to offer more flexible working arrangements to reduce the impact of caregiving responsibilities on family caregivers.

INTRODUCTION

With advances in living conditions and health care, Americans enjoy an increasing lifespan. From 1980 to 2013, average life expectancy improved from 78 to 81 for women and 70 to 77 for men.^{1,2} As of 2010, there were more than 40 million people over the age of 65 and 5.5 million over 85 in the United States, and this will grow to over 54.5 million and 8.5 million by 2030.³ Older people also continue to live longer than ever, as in 1972 American life expectancy at age 65 was 15.2 years and at 85 was 5.5, but it had risen to 19.1 and 6.5 by 2010.⁴ The flip side of this remarkable progress is that more and more Americans age into chronic diseases, and live longer once they have those diseases. As our population ages, the pool of those most at risk for chronic disease grows, with 92 percent of older adults having at least one chronic disease, while 77 percent have two.⁵ By 2025, chronic diseases will affect an estimated 164 million Americans, or nearly half the population, compared to an estimated 149 million, or 48 percent in 2015.⁶ Chronic disease impacts life expectancy, but the outlook continues to improve. As of 2005, a person who reaches age 65 without a chronic condition has a life expectancy of 22 years, compared to 20 years for those with one or two and 16 for those with three or more.⁷

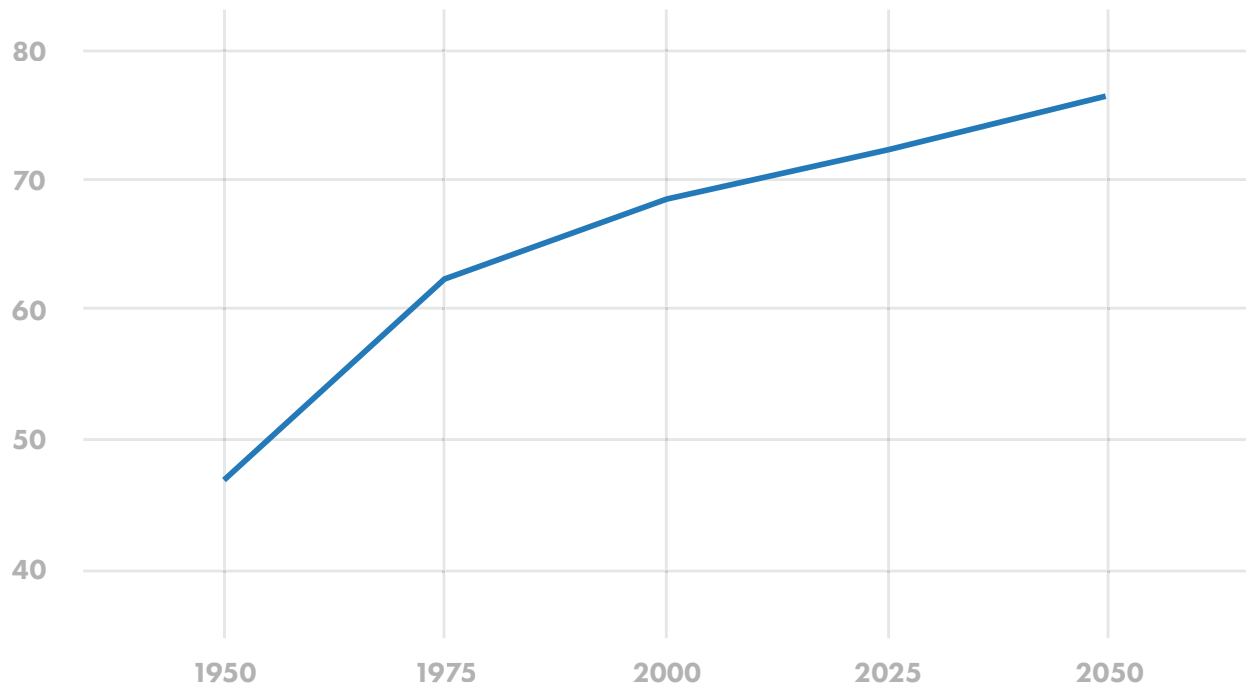
Soon, there will be more people **over 60** than **under 14**.



The need for eldercare will continue to grow.

Source: UN Population Division

The average global life span has increased by three decades.



Source: UN Population Division

A 2015 study estimated that, in 2013, approximately 40 million family caregivers in the United States provided 37 billion hours of care to an adult with limitations in daily activities, translating into approximately \$470 billion of unpaid contributions.⁹

As a society, the United States has great interest in helping its growing older population to age in place. According to a 2010 AARP survey, nearly 90 percent of older adults want to stay in their own homes as they age.⁸ At the same time, the U. S. has substantially more limited public provisions and financing of social care as compared to other

developed countries and regions such as Europe, which means that family caregivers assume much of the responsibility.

Family caregivers create substantial economic value for society. A 2015 study estimated that in 2013 alone, approximately 40 million family caregivers in the United States provided 37 billion hours of

Several forward-thinking employers have already decided that caregiver benefits must become an integral part of their benefits package.¹⁶

care to an adult with limitations in daily activities, translating into approximately \$470 billion of unpaid contributions.⁹ Research suggests that 45 percent of employed caregivers substitute for formal medical and nursing care by managing multiple medications, caring for wounds, preparing special diets, using monitors, operating medical equipment, conducting care coordination, and hiring paid help for family members with multiple chronic physical, cognitive, and behavioral conditions.¹⁰

At the same time, those added tasks put substantial responsibilities on caregivers, a majority of whom are still in the workforce.¹¹ This is especially challenging for women, who still shoulder the lion's share of the work, in particular for older women whose workforce participation rates have steadily increased in the last two decades.¹² They find themselves "sandwiched" between the simultaneous responsibilities for children and parents at a time when they increasingly participate in the formal workforce and have great interest in getting flexibility and support to juggle conflicting demands at the workplace.¹³ At any point, about 17 percent of the workforce are providing care for an elderly person and nearly half of them also have children under 18 at home.¹⁴

Unlike many other wealthy countries, the U.S. lacks a generous, publicly mandated and funded system to support family caregivers and, outside of FMLA, legal mandates for employers to offer such benefits (see textbox, pg. 7). As a result, the decisions on scope and scale of family caregiver-friendly policies are largely left to individual employers. On the one hand, they want to attract and retain a qualified, motivated and diverse workforce with a competitive benefits package. Such a consideration is even more important with the Millennial generation entering the workforce, which values work-life balance greatly and accounts for one-quarter of family caregivers.¹⁵ On the other, employers need to balance cost of benefits packages with business objectives and require objective and actionable data to make prudent decisions.

Several forward-thinking employers have already decided that family caregiver benefits must become an integral part of their benefits package,¹⁶ but many lack information on the costs and benefits of policies¹⁷ and need guidance as they make their decisions. To fill this knowledge gap, this report organizes and summarizes the available evidence published in the last two decades on the costs and



benefits of family caregiver support policies, and provides a ROI calculation on those policies from an employer perspective. The analysis summarizes the peer-reviewed literature and technical reports by government agencies or industry associations and is

restricted to studies with a robust design that allows quantifying the impact of a policy from a business perspective. In addition, we summarize the existing gap in the literature and recommend study topics for future research.



Publicly Mandated Family Leave Policies in the U.S.

The federal Family and Medical Leave Act (FMLA) of 1993 ensures eligible employees can take up to 12 weeks of unpaid leave per year for qualifying reasons including an employee's own sickness, the care of a newborn, or the care of a parent with a serious health condition as well as a spouse. Currently, about 60 percent of workers are covered under the FMLA. However, about half of the employees who were eligible for it did not take family leave because they could not afford it.¹⁸ Three states (California, New Jersey and Rhode Island) have passed laws that guarantee between four and six weeks of partially paid family leave through an insurance program with employee contributions. Some states

expanded the federal FMLA provisions to include the care of grandparents or parents-in-law, siblings and other relatives.¹⁹ Connecticut is the first state that guarantees up to 5 days of paid sick leave per year, and California, Massachusetts, Oregon and Vermont have also enacted such laws. Washington D.C. recently introduced legislation that would ensure workers up to 16 weeks of paid family leave financed by an employer tax, which, if passed, would become the most generous paid family leave program in the country.²⁰ Nationwide, only 13 percent of employees are currently eligible for paid family leave either through their employers or state programs.²¹

APPROACH: DETERMINING THE BUSINESS CASE FOR SUPPORTING CAREGIVERS - AN EMPLOYER'S PERSPECTIVE

The goal of this report is to give employers objective and actionable information to make informed decisions on family-friendly policies. Family-friendly policies are typically thought of as benefits for new parents, but these can also be the cornerstone of human resources support for employees providing elder care. The focus in this analysis is on the narrow business case for such policies rather than the broader economic value questions. In other words, the question is whether offering family care benefits makes financial sense for a company.

Figure 1: Typology of Workplace Family Care Benefits

Benefits with cash value							Benefits without cash value		
Facilitation of family care		Subsidies for family care					Family leave	Flexible working arrangements	
Employee-funded programs	Coordination	In-kind benefits	Pre-tax employer funds	Post-tax funds	Loans	Paid leave	Unpaid leave	Time	Location
FSA, state-mandated insurance schemes	EAP, family care referrals	Transportation of care dependent elders to medical appointments	Vouchers		Benefit if below market rates	Personal and family leave	Unpaid time off	Flextime, compressed work weeks, job sharing	Telework, remote work

Note: Net cash value of subsidies to employee depends on the tax/income bracket for pre-tax funds and paid leave. EAP denotes Employee Assistance Plan, FSA Flexible Spending Account

The first step of this report is the creation of a framework to categorize the different family caregiver support policies (Figure 1). The second is to develop a similar categorization scheme for the costs and benefits of the policies from an employer perspective (Figure 2). Those two schemes allow for organizing the identified evidence.

Those two frameworks informed the design of a literature search strategy with which suitable publications were identified. The literature review included peer-reviewed publications and reports

from industry associations as well as government agencies. We searched various citation databases on economics, social sciences, and medicine. The database search included articles, reports, conference proceedings, and books, covering the publications in the United States dated between 1995 and 2015 (please see Appendix for search terms and covered databases).

In addition to the database search, we manually searched references citing or cited by expert-nominated publications. We retrieved 670

publications from the database search, of which 42 were selected for data extraction. Manual citation search resulted in an additional 53 publications and 29 of those were selected for data extraction, resulting in a total of 71 studies that are covered in this report.

Titles and abstracts of the identified publications were reviewed for suitability, followed by full-text review of promising papers. Those papers that provided actual estimates for the costs and benefits of caregiver-friendly policies were abstracted into a database.

Figure 2: Benefits and Cost of Family-friendly Policies – Employer Perspective

Benefits						
Human Capital		Productivity <ul style="list-style-type: none"> • Less distraction • Better health 		Finances		
Recruitment	Retention/turnover	Absenteeism (lost work time)	Reduced performance at work	Health care cost	Profit	Share price/enterprise value
Costs						
Direct Cost		Indirect Cost				
Cost of payouts		Benefit set-up <ul style="list-style-type: none"> • Updating payroll system • Educating employees • Handbooks, materials, equipment (e.g., for telecommuting) 		Benefit administration <ul style="list-style-type: none"> • Determine eligibility • Handling requests and appeals • Friction cost <ul style="list-style-type: none"> - Complexity of scheduling - Cost of adding backup capacity 		

PREVALENCE OF FAMILY-FRIENDLY BENEFITS

The 2011-2015 annual surveys conducted by the Society for Human Resource Management (SHRM) show that the proportion of employers that offer telecommuting increased from 53 percent to 60 percent.²² The increase is due primarily to the increase in telecommuting on an ad-hoc basis (from 42 to 56 percent), whereas telecommuting on a part-time or full-time basis did not change much.

According to the SHRM data, no significant changes were observed for flextime, compressed workweek, or job sharing, but the proportion of employers offering paid sick leave grew from 37 percent in 2011 to 42 percent in 2015. Benefits that are specifically designed for elder care including leave beyond the federal or state mandates, elder care referral services, on-site elder care fairs, elder care assisted living assessments, elder care in-home assessments, and

on-ramping programs for family members dealing with elder care responsibilities, remain uncommon, ranging from less than one percent to about 10 percent.²³

The perception of value of supporting employee caregivers has always been widely held. Increased understanding of the ROI is key to moving businesses forward and increasing the support they provide.

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FINDINGS

The majority of studies analyzed the effect of family caregiver benefits without direct cash transfer to the employee, i.e., benefits that increase workplace flexibility to accommodate the needs of family caregivers, but do not provide or subsidize care. Of those, the use of flexible work hours or flextime is the best studied.

There was a variety of studies that looked into baskets of family-friendly policies without breaking out the effect of individual components, and only very few analyses of unpaid family leave. We found several studies that assessed the effect of telework benefits and of paid family leave. There are important and widely-cited studies, including the Department of Labor’s “The Cost of Doing Nothing: The Price We Pay without Paid Leave

Policies to Support America’s 21st Century Working Families” and the Department’s National Compensation Survey, but these studies and other similar studies did not provide an analysis of the effect of benefits. Overall, no studies were suitable for abstraction that evaluated direct provision of free or subsidized elder care by employers, which is reportedly still quite rare compared to childcare.

RESULTS FOR BASKETS OF FAMILY-FRIENDLY POLICIES

As pointed out in the preceding section, several authors determined the overall impact of family-friendly workplace policies. They often asked which specific benefits were offered but then formed indices or asked about employee perceptions of the overall generosity.

Retention

More generous benefits were consistently associated with a 10 percent lower inclination to change jobs. In a 2006 publication, Kossek et al. showed that family-friendly policies, including adoption benefits, family leave use, personal days, vacation days, dependent

care and health care accounts, bereavement policies, car repair center on site, sick days, counseling programs, time off, maternity leave, domestic partner benefits, and tuition reimbursement, were associated with a reduction in turnover intention

by 7.7 percent.²⁴ Thompson and Prottas came to a similar conclusion that the intention to quit decreases by 5.9 percent for each additional family benefit offered including childcare or elder care resource or subsidies, and health insurance for family members.²⁵

An analysis of the 2010 Federal Employee Viewpoint Survey that covered over 500,000 employees suggested that satisfaction with telework, health programs, childcare, and older adult care were positively related to organizational commitment. One unit increase in satisfaction with elder care translated into 1.11 units of higher commitment.²⁶ Butts and colleagues conducted a meta-analysis of the effect of family support policies on employee outcomes in 2013. They concluded that availability and use of those policies had modest positive relationships with job satisfaction, affective commitment, and intentions to stay. Interestingly, policy availability was more strongly related to job satisfaction, affective commitment, and intentions to stay than was actual policy use, suggesting that having access to benefits when needed is highly valued by workers. They also found that women, married workers and workers with dependents responded more strongly to policy availability.²⁷

Productivity

Eaton measured that family-friendly policies, as captured by an index including flextime, part-time jobs, telecommuting, job sharing, compressed work weeks, unpaid personal leave, sick leave to care for

children, increased employee-reported productivity by about 1.4 to 2.4 percent.²⁸ Konrad and Mangel used a similar approach and assessed the effect of an index combining 19 family-friendly policies on productivity as measured by sales.²⁹ While the index was not associated with sales overall, the association was statistically significant for firms with a larger share percent of female employees, mirroring their greater need for workplace support as primary caregivers.

Similarly, Perry-Smith and Blum demonstrated that family-friendly policies had a larger effect on organizational performance for firms with a greater share of women employees.³⁰ They classified companies into four clusters based on leave policies and access to dependent care benefits and compared organizational performance, such as quality of products, ability to attract essential employees, relations between management and employees, market performance and profit/sales growth, between those clusters. Based on two surveys of employers (732 and 450 companies), Bloom and colleagues concluded that there is a positive and significant correlation of productivity with family-friendly workplace policies but the association disappears when controlled for management practices.^{31, 32} In other words, well-managed companies tend to have family-friendly policies and higher productivity, but there is no higher productivity with more generous policies. This conclusion was challenged by Whitehouse et al.,

A work-family human resources policy announcement is associated with a significant share price increase of 0.32 percent on the day of the announcement. Interesting, the effect on share price was almost three times as large (0.94 percent) for pioneering firms, i.e., those that were the first in their industry to announce the policy.²⁹

who demonstrated that the relationship persists even after taking into account management practices.³³ A survey of 188 Fortune 500 firms, which are members of the Family and Work Institute, had similar findings: A range of family-supportive policies was expressed by an index, and a 10 percent increase in this index is expected to increase productivity by about one percent or a little less.³⁴

Financial performance

Arthur and Cook made an important contribution to the literature by studying share price reactions to 231 work-family human resource policies announcements

by Fortune 500 companies in the Wall Street Journal between 1971 and 1996. The analysis, published in 2004, when stripping out confounding events on share prices, estimated that an announcement is associated with a significant share price increase of 0.32 percent on the day of the announcement. Interestingly, the effect on share price was almost three times as large (0.94 percent) for pioneering firms, i.e., those that were the first in their industry to announce the policy.³⁵

RESULTS FOR UNPAID FAMILY LEAVE

While there have been recent studies providing important overviews of the current status of paid/unpaid family leave, few studies looked at the effect of unpaid family leave. The “effect” is the evidence needed to determine an ROI calculation (we did not consider the large body of research on maternity and child care leave). Mulvaney surveyed 1,708 local government professionals and found that those with access to family leave programs reported a higher level of organization commitment.³⁶

Similarly, a survey of 120 employers in an upstate New York county showed flexible sick leave and care referral services are associated with lower turnover.³⁷ Pavalko and Henderson looked at longitudinal data from the National Longitudinal Survey of Young Women and identified women who newly took

on care responsibilities for ill or disabled family members.³⁸ They found those responsibilities resulted in psychological distress and a 50 percent reduction in remaining in the labor force. Caregivers with access to unpaid family leave were more likely to remain employed than caregivers without that benefit.

RESULTS FOR FLEXTIME

Recruitment

The effect of flexible work hours on recruitment was investigated by those studies that tested hypothetical job offers that varied the level of flexibility. Thompson and Aspinwall gave 125 college students such hypothetical job offers and determined that availability of flextime influenced the job choices of 33 percent of the sample.³⁹ A study of 263 MBA students with hypothetical recruitment brochures yielded a similar result in that organizations with flexible career paths and policies were perceived as more attractive.⁴⁰

Retention

Giving employees greater control over work hours appears to have beneficial effects for companies. Masuda and co-authors conducted a survey of managers in four country clusters and asked them about the effect of flexible working arrangements on their staff’s job satisfaction, turnover intentions, and work-to-family conflict. Managers in the “Anglo” cluster reported a positive relationship between flextime availability and job satisfaction/turnover intention.⁴¹ Workers share that perspective. For example, findings from the 1991 General Social

Survey of 745 randomly selected workers showed a significant positive correlation of access to flextime and affective commitment and turnover intention.⁴² In the same vein, 1,901 men and 1,651 women who responded to a work-related phone survey for the 1997 National Study of the Changing Workforce (a nationally representative sample of working adults) stated that flextime has positive effects on stress, loyalty, and missed work.⁴³ An analysis of the 2002 wave of the National Study of the Changing Workforce by Thompson and Prottas, however, suggested that the association of formal worktime flexibility and intention to quit disappears, once they controlled for informal support by colleagues and supervisors.⁴⁴

Wadsworth and colleagues surveyed human resources directors of 151 U.S. cities with populations more than 25,000 specifically about compressed work weeks.⁴⁵ More than half (56.3%) of the respondents reported offering some type of alternative work schedules and stated they were associated with improved employee morale (63.5%), improved customer service (45.9%) and increased productivity (41.2%).

Absenteeism

Dalton and Mesch took advantage of a so-called natural experiment to provide convincing evidence for the effect of flextime on absenteeism. They used data from a utility company that had tested a flexible scheduling program for one year in a large subunit.⁴⁶ In that year, the employees in the intervention group had a 20 percent reduction of unexcused absences or two days per employee-year, compared to employees without access to that benefit. Absenteeism reverted to baseline when the experiment ended. As mentioned above, data from the 1997 National Study of the Changing Workforce also suggest that flextime has positive effects on missed work.⁴⁷

A meta-analysis of 27 studies found significant effects of the introduction of flextime on various work-related outcomes, and absenteeism showed the largest change.⁴⁸ The possibility of working a compressed week, however, was not systematically related to outcomes.

Productivity

The aforementioned meta-analysis also found that flextime is related to increased productivity as measured objectively by employee or unit output.⁴⁹ Shepard et al. confirmed these results when they analyzed the relationship between flexible work hours and revenue per employee at the manufacturing operations of 50 pharmaceutical companies.⁵⁰ Their statistical models suggest that flexible work schedules increase productivity by about 10 percent.

Results from surveys of employers and employees paint a consistent picture. As mentioned earlier, 41 percent of human resources directors stated flextime was associated with increased productivity, but 39 percent and 23 percent, respectively, cautioned that drawbacks are scheduling difficulties and less face time with employees.⁵¹ In a survey of 174 city employees, over 80% stated that they regard a compressed workweek as positive and over 60% reported greater productivity.⁵²

Yang and Zheng contributed an important analysis for implementation of flextime policies: They used data from two national surveys and found that workers, who have informal access to flexible working arrangements report higher productivity, whereas workers with formal access, who cannot take advantage of the benefit in practice, report lower productivity.⁵³ Perceived flexibility related to better self-reported health but not healthcare use.⁵⁴

RESULTS FOR TELECOMMUTING

Recruitment and retention

Overall, only a few studies looked at the benefits of offering remote work or telecommuting options. When college students were exposed to hypothetical job offers with varying benefits packages, telecommuting influenced the job choices of 26 percent of the sample.⁵⁵ Rau and Hyland used a similar approach in 151 MBA students and found that a telecommuting option increased the probability to apply by over 12 percent.⁵⁶ Yet no significant effect of telecommuting on turnover intention was found in a survey of 245 professionals in two Fortune 500 companies.⁵⁷

Productivity

Vega, Anderson and Kaplan studied 192 federal employees with a telework agreement by comparing data on self-reported performance and job satisfaction as well as objective performance on a sample task on office days and telework days. On average, participants worked 2.13 days per week remotely. Self-rated and objective performance as well as job satisfaction were significantly higher on telework days.⁵⁸ A 2001 economic modeling study estimated that a company's profit margin would increase by 0.6 percent, if the proportion of employees allowed to work from home went up one percent.⁵⁹ A survey of a random sample of 800 telecommuters at a single firm showed telework can moderate work exhaustion due to work-family conflict.⁶⁰

RESULTS FOR PAID FAMILY LEAVE

Recruitment and retention

The above-mentioned study of testing hypothetical job offers on college students suggested that elder care benefits and paid leave would influence the job choices of 33 percent of the sample.⁶¹

Productivity

Colla et al. used data from 727 firms included in the 2009 Bay Area Employer Health Benefits to examine the effect of a 2007 ordinance that introduced mandatory paid sick leave in San Francisco. Employers who made changes to comply



Approach To ROI Estimation

Return on investment (ROI) was calculated as the ratio of incremental changes in productivity or the summation of the changes in recruitment, retention (or turnover), and absenteeism. To facilitate the ROI calculation, we leveraged the existing literature and converted both the effects and the costs of family-friendly policies into proportional changes measured by an employee's annual compensation. For example, if flextime reduces employee turnover by 10%, the average turnover rate is 20%, and the average cost associated with turnover is 30% of an employee's annual compensation, we consider the savings to the employer as 0.6-percent ($=10\% \times 20\% \times 30\%$) of an employee's annual salary.

Because the effect size of family-friendly policies on turnover rates depends on the average compensation of an employee population, we constructed two scenarios for the ROI calculation: one for a workforce with an average annual compensation of \$50,000 and the other \$100,000.

The costs of family-friendly policies were derived from the published literature and converted into the percentage of an employee's annual compensation by denominating the costs using \$50,000 or \$100,000 as appropriate. Due to lack of published data, we assumed administrative and maintenance costs of a flextime program and a telework program to range from 0.1 to 0.3 percent of an employee's annual compensation.

with this new mandate reported improved morale.⁶² A 2001 economic modeling study that estimated the relationship of changes in family-friendly policies over time and company profitability estimated that offering paid family leave was associated with an increase in operating profit margin by 2.5 percentage points or 12.3 percent.⁶³ The authors also concluded that companies could yield higher profits by making family-friendly policies generally more accessible, as overall availability of benefits was associated with higher margins.

Estimating return on investment

The vast majority of the identified studies presented their results in a form that did not allow generating actual estimates for the magnitudes of the impact of family caregiver policies, such as regression coefficients or odds ratio. A subset of nine studies provided enough detail to back out such estimates, and we combined the estimates with data from other studies and assumptions to generate estimates of the cost of programs to employers and then ROI estimates (for details see text box).

We had sufficient data to estimate an indicative ROI for flextime and for offering part-time telework. We did not attempt to estimate the ROI of converting

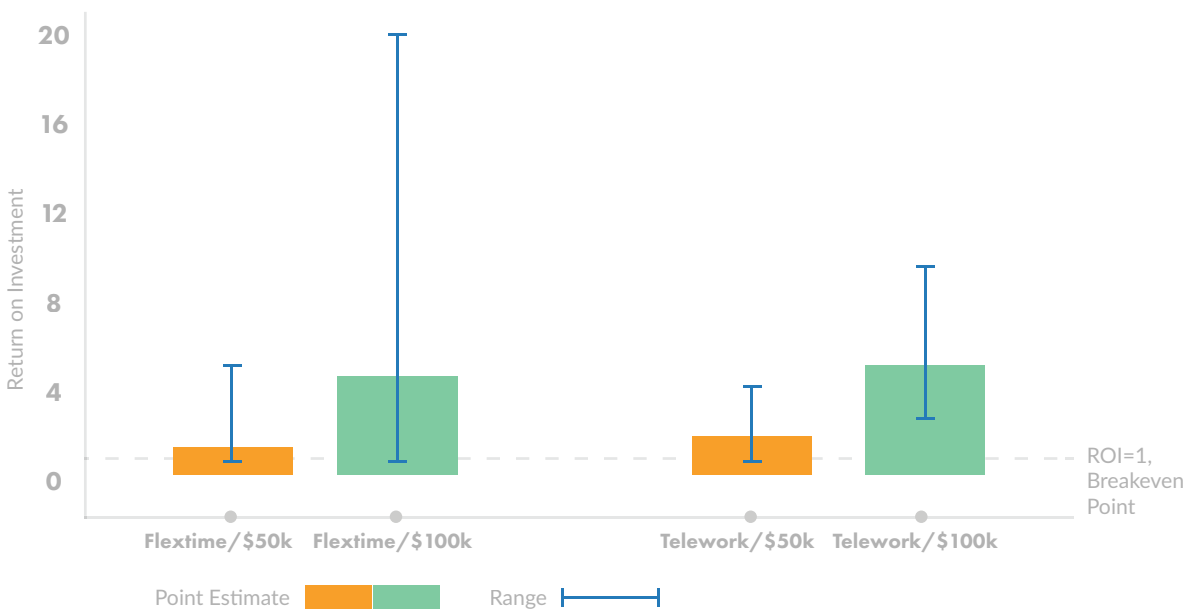
employees to full-time teleworkers, as a prior simulation study had already yielded a conclusive answer that employers will realize net savings if they can reduce the cost of parking and office space correspondingly.⁶⁴ We could not identify any data that would allow generating an ROI estimate for unpaid family leave.⁶⁵

We estimate a midpoint ROI for offering flexible work hours between 1.70 (assuming average annual salary of \$50,000) and 4.34 (assuming average annual salary of \$100,000). About half of the ROI is explained by lower absenteeism, about 30 percent by increased retention and about 20 percent by better recruitment.

Midpoint ROI for offering a telecommuting option on a part-time basis is estimated between 2.46 (assuming average annual salary of \$50,000) and 4.45 (assuming average annual salary of \$100,000). As there was limited information on the specific effect size of retention, recruitment and absenteeism, the estimates rely on global ratings of productivity by employees and employers.

Figure 3 illustrates the uncertainty in our ROI estimates that represent the midpoint in the estimated range.

Figure 3: Uncertainty in ROI estimates



Note: The ROI estimates are presented by family-friendly policies (flextime and telework) and by employee compensation level (\$50,000 and \$100,000 per year). The lower ranges of flextime ROI are below one, 0.6 and 0.9, respectively. A ROI of one means costs are equal to benefits and therefore an employer breaks even when implementing such a policy.

Estimated Midpoint ROI:

FLEXIBLE WORK HOURS

Between
1.70
 (av. salary = 50k)
 and
4.34
 (av. salary = 100k)

ROI Explanation:

50%
 lower absenteeism
30%
 increased retention
20%
 better recruitment

Estimated Midpoint ROI:

TELECOMMUTING PART-TIME

Between
2.46
 (av. salary = 50k)
 and
4.45
 (av. salary = 100k)

ROI Explanation:

Global ratings of productivity by employees and employers

CONCLUSIONS

This study shows that a substantial body of literature on the business case for family caregiver-friendly policies has accumulated. Overall, the evidence supports a business case for offering such benefits to allow caregivers to balance their jobs with other responsibilities.

The most extensive work to date has been done on flextime and telework, and studies consistently support the positive effects on workplace outcomes, like recruitment, retention and productivity. Published research allows estimating an ROI of greater than one for those two benefits. For every dollar invested in flextime, businesses can expect a return of between \$1.70 and \$4.34, and for every dollar invested in telecommuting a return of between \$2.46 and \$4.45. Those results are plausible as costs of those benefits to employers are low: The same staff will work the same number of hours, which means that greater flexibility causes little disruption to businesses.

At this point, based on our study requirements, there is not enough evidence to judge policies that involve employer subsidies for family caregivers. But it should be kept in mind that absence of evidence does not mean evidence of absence. In fact, there are studies that reference a positive ROI for paid leave. Our analysis of the data encourages us to believe that further study is warranted.⁶⁶

As with any attempt to integrate evidence, several limitations have to be kept in mind. The majority of studies are done from an academic perspective. In addition, there is a paucity of evidence on the implementation and maintenance costs of family-friendly policies. As a consequence, the ROI calculations had to be based on a small subset of studies and required several assumptions. A second limitation is that most studies relied on employee and employer perceptions of the impact of benefits rather than direct measurement.

Our analysis focuses on the published evidence and therefore does not address the emerging workplace benefits or technologies that may facilitate care for an aging loved one. We did not find sufficient studies specifically addressing the effectiveness of family-friendly policies designed for elder care, such as providing transportation for an employee's parent for a doctor's appointment, elder care referral services, and on-ramping programs for family members dealing with elder care responsibilities. Nor did we find studies on the impact of emerging technologies, such as remote monitoring equipment, which could ensure peace of mind and reduce work disruptions.

Future research should strive to close those gaps. Employers are more likely to embrace additional support mechanisms with a clearer view of costs and benefits. Similarly, measuring results, such as lost work days and turnover directly, would give employers greater confidence in the value of caregiver benefits.

But overall this first integrative study of the business case for caregiver-friendly policies shows encouraging findings and should stimulate employers to offer more arrangements and researchers to provide more and better data.



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APPENDIX

Search terms

Setting	Policies	Specific policies	Outcomes	Costs
a. Workplace OR employer OR business OR firm OR organization OR company	b. (Family friendly OR work life balance) AND (program OR policy OR benefit)	c. Family and medical leave (Family OR medical OR sick OR personal OR maternity OR paternity OR parental OR dependent) AND (leave) d. Flexible schedule ((Flexible OR alternative) AND work schedule) OR (flexitime) OR (flexitime) OR (compressed AND (week OR hours)) OR (part-time) OR (job-sharing) e. Flexible location (Flexible work location) OR (telecommuting) OR (telework) OR (remote work) OR (working AND home) f. Financial resources (Paid AND leave) OR ((subsidy OR cash OR pre-tax OR flexible spending OR voucher) AND (adult OR elder OR dependent) AND care)	g. Absenteeism OR absence OR productivity OR performance OR efficiency OR recruitment OR retention OR turnover OR profit OR profitability	h. Investment OR cost OR resource OR payment OR reimbursement OR cash OR subsidy OR business case OR return

Note: We searched the databases using the plural form for some terms as appropriate, e.g., subsidies, policies, and absences. Our search did not focus on policies related to childcare, and such publications were dropped. The terms were searched in the fields of key words, topics, title, and abstract. We used the following search logic: a AND (b OR c OR d OR e OR f) AND (g OR h).

Searched databases

- Science Citation Index
- Social Sciences Citation Index
- Arts & Humanities Citation Index
- Conference Proceedings Citation Index- Science
- Conference Proceedings Citation Index- Social Science & Humanities
- Book Citation Index– Science
- Book Citation Index– Social Sciences & Humanities
- PubMed
- Econlit
- Google Scholar

Assumptions for ROI calculation

Assumptions for cost calculation

Costs to employers	Flextime	Telework⁶⁷
Upfront investment	Assume minimal: 1% ~ 3% of an employee's annual compensation, spread over 5 years	One-time equipment installation \$85~91/employee, one-time employee training \$300/employee
Equipment/maintenance cost	N/A	\$250/employee/year
Software/service cost	N/A	\$360~500/employee/year
Administration cost	Assume minimal: 0.1% ~ 0.3% of an employee's annual compensation	Assume minimal: 0.1% ~0.3% of annual compensation for part-time telework
Savings in office space	N/A	\$0~780/employee/year
Savings in parking expenses	N/A	\$3.5~9.5/employee/day x 236 days = \$826 ~ 2,242 /year; assume 1.2 days per week for part-time telework

Note: All costs related to telework were adjusted for inflation to 2014 dollars using the Consumer Price Index.⁶⁸ Baughman showed that flextime was associated with lower wages but we were not able to convert such results to costs or benefits due to the limited information reported by the authors.⁶⁹ Family-friendly policies were also shown in the UK to be associated with 21% lower wages.⁷⁰

Assumptions for benefits calculation

Increase in recruitment intention	Increase in retention (or decrease in turnover)	Decrease in absenteeism	Increase in productivity
3% of an employee's annual compensation ⁷¹	Overall, turnover replacement costs account for 21% an employee's annual compensation; for low/moderate income positions (\$50k or less) 10-30% of annual compensation; for higher-income positions, 50-200% of annual compensation ⁷²	Assume 100% salary	Assume 100% salary
Baseline rates	22.0% ⁷³	2.9% ⁷⁴	

Contact

Drew Holzapfel
dholzapfel@highlanterngroup.com

respectcaregivers.org