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Parental and Student Time Use Around the Academic Year

Benjamin Cowan
Washington State University

Todd R. Jones
Mississippi State University

Jeffrey Swigert
Southern Utah University

We demonstrate how mothers, fathers, and 15–17-year-old students alter their schedules around the K-12 academic year. Using regression discontinuity (RDD) methods, combined with dates on school year start and end dates by locality, we document several notable results. First, mothers are substantially more affected by the school year than are fathers. When school is in session, mothers sleep less, spend more time caring for family members and driving them around, and spend less time on eating, free time and exercise. Fathers see changes that are generally similar in sign but smaller in magnitude compared to mothers. 15–17-year-olds naturally reduce time spent in educational pursuits when school is out (a decrease of about 5.5 hours per day on weekdays), and most of that time is substituted toward free time (an additional 2+ hours per day) and sleep (1+ hours per day). Our results provide a holistic picture of how families build their days around the K-12 school calendar and have implications for policies targeted toward women's and teenage children's health and well-being.

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Parental and Student Time Use Around the Academic Year

Benjamin Cowan, Todd R. Jones, and Jeffrey Swigert*

April 2023

Abstract

We demonstrate how mothers, fathers, and 15–17-year-old students alter their schedules around the K-12 academic year. Using regression discontinuity (RDD) methods, combined with dates on school year start and end dates by locality, we document several notable results. First, mothers are substantially more affected by the school year than are fathers. When school is in session, mothers sleep less, spend more time caring for family members and driving them around, and spend less time on eating, free time and exercise. Fathers see changes that are generally similar in sign but smaller in magnitude compared to mothers. 15–17-year-olds naturally reduce time spent in educational pursuits when school is out (a decrease of about 5.5 hours per day on weekdays), and most of that time is substituted toward free time (an additional 2+ hours per day) and sleep (1+ hours per day). Our results provide a holistic picture of how families build their days around the K-12 school calendar and have implications for policies targeted toward women's and teenage children's health and well-being.

* Cowan: Washington State University and NBER. Jones: Mississippi State University, CESifo, and IZA. Swigert: Southern Utah University. The authors would like to thank Ezra Karger for the school district calendar data. They would also like to thank Xiaoxiao Bai, Eunsik Chang, Kendall Kennedy, and participants at AEFP for useful feedback.

1. Introduction

How does the school calendar affect the time use of parents and children? School dates are perfectly foreseeable, and individuals have ample opportunity to plan around them. Even so, when school is out, behaviors might change in ways that affect the health and well-being of families with school-age children. In this paper, we seek to understand such changes in behavior and focus especially on differences between mothers, fathers, and older teenage children.

In the United States, roughly 96% of public K-12 schools have a traditional summer break of around 12 weeks.[1] Research into how student and parent outcomes change when school is on summer hiatus includes losses in academic achievement ("summer learning loss"; see Quinn and Polikoff, 2017); decreases in maternal labor supply (Price and Wasserman, 2022); and changes in youth mental health, suicidality, and criminal activity (Hansen and Lang, 2011; Hansen, Sabia, and Schaller, 2022; Jones and Karger, 2022).[2] Another set of studies has examined how parent and student time use differs over traditional summer break months relative to other parts of the year (e.g., Handwerker and Mason, 2017; Gershenson, 2013).[3] To our knowledge, aside from Jones and Karger (2022), none of these previous studies use variation

[1] https://nces.ed.gov/programs/digest/d13/tables/dt13_234.12.asp. Among the school districts in our school calendar data, the average (mean) break is 11.7 weeks. The 5th percentile is 9.9 weeks, the 25th percentile is 10.9 weeks, the 75th percentile is 12.6 weeks, and the 95th percentile is 13.7 weeks.

[2] More generally, there is long-standing interest in how school attendance affects parents' and children's behaviors. Many papers in this literature focus on policies that affect the availability of school in children's pre-K or kindergarten years (see, for example, studies on maternal labor supply in Gelbach, 2002; Cascio, 2009; Fitzpatrick, 2012; and studies on children's academic achievement and long-run outcomes in Heckman et al., 2010; Bailey, Sun, and Timpe, 2021). Another set of studies focus on policies that affect how much time students are in high school, such as those on academic achievement (Liu, Lee, and Gershenson, 2021) and short- and long-term criminal outcomes (e.g., Anderson, 2014 and Bacher-Hicks, Billings, and Deming, 2019). Lastly, there are studies on the effects of the timing of breaks during the school year (Graves, 2013a,b) and the length of the school week (Ward, 2019; Duchini and Van Effenterre, 2022) on maternal labor supply.

[3] There is a large literature on child sleep patterns, some of which compares child sleep between the school year and the summer break (see, for example, Hansen et al., 2005; Crowley et al., 2006; and Stewart, 2014). Hansen et al. (2005) compares average sleep for 37 high school students in August and September across the school start date. It is possible that other teenage sleep studies also make use of exact start and end dates.

stemming from exact school start and end dates combined with regression discontinuity (RD) methods to identify changes in outcomes.

In this paper, we exploit information on school start and end dates around the summer break from across the United States combined with American Time Use Survey (ATUS) data, which contain 24-hour time diaries with exact dates, to measure how behavior changes when school starts and ends. Our approach allows us to avoid confounding effects due to the school year with other factors that change seasonally such as weather, daylight, and economic conditions (Barksy and Miron, 1989; Geremew and Gourio, 2018; Coglianese and Price, 2020). We further contribute to the literature on how school breaks affect families' schedules by examining a comprehensive set of 10 time-use categories—including sleep, self-care, household tasks, caring for others, work, education, free time, eating, physical exercise, and traveling—for parents as well as older teenage students.[4] [5]

We focus on how changes in time allocations surrounding the summer school break affect the health and well-being of individuals. For example, most teenagers report getting less than the nationally recommended amount of sleep on school nights (Bandyopadhyay and Ninotchka, 2019); and sleep deprivation among teenagers has been linked to poorer academic performance and worse mental health (Seton and Fitzgerald, 2021). Lack of sufficient sleep is also a problem for adults (Liu et al., 2016), as is insufficient exercise—less than a quarter of U.S. adults exercise enough to meet federal guidelines (Blackwell and Clarke, 2018). Finally, studies show that mothers engage in more educational childcare such as helping with homework (e.g.,

[4] 15-year-olds are the youngest participants in ATUS, so we cannot examine the time use of younger students in our analysis. A previous study of teenagers' time use examines how activities correlate with family characteristics (such as mother's employment and education) but does not examine how such activities vary with school year dates (Wight, Price, Bianchi, and Hunt, 2009).

[5] We refer to 15-17 year old individuals as students, though it is possible that not all are.

Ronning, 2011) and household tasks (e.g., Parker, Horowitz, and Rohal, 2015) than fathers do. We ask whether the summer school break affects time spent in these and other activities that have implications for the overall well-being of individuals in the household.

In our analysis, we find that many behaviors exhibit sharp changes across the start or end of the academic year. On weekdays when school is in-session, mothers of 6–17-year-old children give up 25-28 minutes each of sleep and free time. They spend an additional 35 minutes caring for others and work 19 more minutes per day. They also spend 4-7 minutes less per day on both eating and physical exercise activities, which is offset by a 5-minute increase in time spent traveling (e.g., driving). Our results are in line with other studies that find that mothers work less when school is out (Ward, 2019; Duchini and Van Effenterre, 2022; Price and Wasserman, 2022). In addition, however, we find that other activities that are likely important to women's well-being (e.g., sleep, free time, exercise) increase during the summer school break.

As a placebo test, we examine women with no children in the household between ages 3 and 17, whose time use patterns should generally be unaffected by school dates.[6] Across the 10 categories of time use, we find no statistically significant effects—with the exception of a marginally significant effect on caring for others—with most being small in magnitude.

We also compare the experience of fathers of school-age children with that of mothers. Fathers are generally affected by the school year in qualitatively similar ways to mothers: sleep, self-care, caring for others, work, free time, and exercise all change in the same direction as they do for mothers. However, with the exceptions of work time and self-care, all effects are smaller in magnitude than they are for mothers, and effects on sleep and caring for others are statistically significantly larger in magnitude for mothers (at the 5% level). In addition, when we drill deeper

[6] Because it is our sense that pre-schools often follow the same academic calendar as K-12 schools in the area, we exclude those with 3-5-year-olds as well.

to look specifically at total time spent actively engaged in activities with children, the effect of the school year is almost three times as large for women as it is for men. Overall, we conclude that mothers are more elastic than fathers in their time use with respect to whether their children are in school.

We also distinguish between mothers who were employed 2-5 months prior to their ATUS interview (i.e., as of the time of their last CPS interview) and those who were not employed. Previously employed and not-employed mothers both see reductions in sleep and free time and increases in care for others when school is in-session, but magnitudes are larger for those who were not employed. On the other hand, previously employed mothers see a reduction in work hours during summer break, while previously not-employed mothers see an increase. The decrease in exercise time during school is concentrated among previously employed mothers. We also divide our sample of women by household income and find that results are largely similar across low- and high-income households, with a notable exception being that higher-income women are the only ones to see a change in exercise.

Lastly, we focus on older teenage (15-17) children since they are old enough to be interviewed in ATUS. These individuals report spending more than 5 and a half fewer hours in educational activities on weekdays when school is on summer hiatus.[7] This time is used in a variety of ways when school is out: notably, free time increases by a little over 2 hours, sleep time increases by 1.4 hours, work time and time spent doing household tasks each increase by 0.7 hours, and physical exercise increases by 0.5 hours. Thus, (older) students themselves are more affected by whether school is in-session than parents when it comes to sleep and exercise.

[7] For a reference point, the length of the average American school day was about 6.6 hours in 2008: https://nces.ed.gov/surveys/sass/tables/sass0708_035_s1s.asp.

We show that despite somewhat later summer bedtimes, teenage students more than compensate with later wake times, on average. This is consistent with research showing that children sleep more when school start times are pushed back even though they could (in principle) undo the benefits with later bedtimes (Dunster et al., 2018). Regarding exercise, just over half of U.S. high-school students attend physical education classes in an average week (and only 30% attend daily), so even though we do not observe time spent in P.E. classes during the school day (such time is counted as taking classes), it is very likely that physical exercise rises during the summer break months for the average youth.[8]

We view our analysis as a first step toward understanding how health and well-being vary around the school calendar. There is a well-known gender gap in mental health measures including depression and anxiety (Churchill et al., 2020; Golin, 2022), but little is known about how this gap varies seasonally or, more particularly, with whether an individual has children in school. Our results suggest that women with school-age children change their behavior much more during the school year than similarly situated men, with larger losses in sleep, free time, and exercise and increases in time spent caring for and driving with children. Some of these factors may contribute to relatively poorer mental health of mothers when school is in session.[9] Because our data cannot directly address this possibility, it is an important topic for future research.

Regarding teenagers, we also find reasons why their mental health may suffer during the school year relative to summer break. Chief among these is our estimate that they sleep over an additional hour per day when school is out. There is strong seasonality in teenage mental

[8] https://www.cdc.gov/healthyschools/physicalactivity/facts.htm.
[9] As it happens, women are four times more likely to experience Seasonal Affective Disorder (SAD) than men are: see https://www.womenshealth.gov/blog/seasonal-affective-disorder-spotlight#:~:text=According%20to%20the%20National%20Institute,often%20in%20women%20than%20men.

healthcare visits with visits falling in the summer (Zhang et al., 2021), and previous studies have linked school breaks with a reduction in youth suicides (Hansen and Lang, 2011; Hansen, Sabia, and Schaller, 2022). Though many factors change when school is out (such as the incidence of bullying), our results suggest that the way teens use their time may contribute to these trends. On the other hand, we find that the majority of the increase in summer free time is spent on video gaming, television, and computer use: in total, they increase by nearly an hour and a half over the summer. The health consequences of these activities are not well understood: in the case of video games, for example, recent study findings indicate certain video games may have therapeutic potential for improving outcomes (see Zayeni et al., 2020, for a review); however, 41% of teenage boys and 11% of girls themselves report that they spend "too much time" playing video games.[10]

2. Data

Our primary data source is the American Time Use Survey (ATUS). We use Multi-Year Microdata Files, obtained from The U.S. Bureau of Labor Statistics (U.S. Bureau of Labor Statistics, 2021). The ATUS is a 24-hour time diary, where the respondent reports the activities they were doing between 4:00am of the first day and 4:00am of the following day. Respondents are randomly sampled from individuals who completed the Current Population Survey (CPS), and they take the ATUS between two and five months after their final CPS interview. We make use of variables from both the ATUS and the final CPS interview. The ATUS contains information on where the respondent lives (where their household is). The state of residence is included for all respondents. County and/or CBSA are only observed for some individuals.

[10] https://www.pewresearch.org/fact-tank/2018/09/17/5-facts-about-americans-and-video-games/

In general, we restrict the sample to use data from 2003-2019.[11] When we split by household income, we use data from 2010-2019 because the income variable is often missing (and not imputed) in prior years.[12] The ATUS contains over 400 activity codes. We collapse these codes into ten main categories: 1) sleep; 2) self-care; 3) household tasks; 4) caring for others; 5) work; 6) education; 7) free time; 8) eating; 9) exercise; and 10) travel. These categories are mutually exclusive and exclude a small amount of time with coding errors, etc. See the Data Appendix to see which activities make up each category.

Our analysis relies on school start dates. We use school calendar information from publicholidays.com, which was used in Jones and Karger (2022). These data contain school calendar information—school start date, summer start date, and various holidays—for over 11,000 US school districts. We focus on school start date and summer start date for the 2019-2020 school year, which we use to proxy for such dates during the 2010-2019 school years as we discuss below.[13] The earliest date in the data is April 24, and more than 99% of districts have a summer start date of May 11 and after.

We first add geographic information to the school calendar data. We then merge these data to the ATUS based on the location of the ATUS respondent. The only identifiers for the school calendar data are state and school district. We use these to match to NCES school district data that contain more detailed geographic information (including county and MCSA, which we use). Specifically, we first remove a number of terms such as "school," "district," and "public." We do this so that the fuzzy matching can rely more on unique information. This results in 76%

[11] While we use the "2003-2020 Multi-Year Microdata Files" version of this data, we do not consider 2020 to avoid complications from the Covid-19 pandemic.
[12] See https://www.bls.gov/tus/atususersguide.pdf.
[13] It appears that the 2020 summer start date corresponds to the scheduled date before Covid-19 affected school schedules.

of the 11,245 school districts with a perfect match to a school district in the NCES data. Less than 1% are not matched at all. Among these matches, there is some degree of mismatching, but this does not appear to be common.[14] After the matching, we aggregate to 1) the county level; 2) the CBSA level; and 3) the state level. With each aggregation, we determine both the most commonly occurring school start week and summer start week. For instance, perhaps a county's most commonly occurring school start week is week 32, and 90% of districts in that county started during this week. We do this because we do not observe an individual's school district in the ATUS data, so we rely on the aforementioned method.

Next, we add the school calendar information to each observation in the ATUS. In general, it is best if we can use the dates which were aggregated to the county level because counties tend to be smaller than CBSAs (and thus the school calendar dates are better measured) and are never larger than the state they are in. As mentioned above, we only observe county for some individuals in the ATUS. For these individuals, we use the most-commonly occurring school (and summer) start date for the county (not accounting for school district size);[15] these make up 39% of the data (before sample restrictions). We then match the CBSA-level dates for individuals for whom we observe CBSA but not county; these make up 30% of the data. For remaining individuals, we use dates aggregated to the state level; these make up 31% of the data.

There are several potential sources of measurement error corresponding to the school calendar information. First, the school calendar information corresponds to the 2019-2020 school year, but we use data going back to 2003. School districts might change their start week over time. Second, to calculate week of the year, we code week 1 as January 1-7, week 2 as January

[14] In rare cases, it does also happen that a single district matches to multiple NCES districts; in these cases, we keep only one of the NCES matches. It also happens, after removing the terms before matching, that there are duplicate districts. For these, we revert back to the district's original name.
[15] This is assuming the school district file also has data for that county.

8-14, and so on; because years start on different days of the week, a given week means something slightly different across years. Third, because we do not observe school district in the ATUS (or home-school status), we cannot match precisely to the school district the respondent lives in, so we rely on the method described above. Finally, while we do observe a large percentage of school districts, we do not observe them all.

Across all samples, we exclude holidays and individuals employed in elementary and secondary schools (as of the last CPS interview), since their schedules are mechanically affected by school and summer start dates (Price and Wasserman, 2022).[16] This yields 197,191 observations. We consider two age groups: 25-55 year olds (many of whom are parents) and 15-17 year olds (many of whom are students). After restricting on age, there are 108,591 25-55 year old respondents and 8,561 15-17 year old respondents. Depending on the sample, we also limit based on one or more of the following criteria: by weekday/weekend; by gender; by whether there is at least one own child of school age in the household; by family income (as of the last CPS interview); and by employment status (as of the last CPS interview). These restrictions tend to greatly reduce sample sizes.

3. Empirical Strategy

We use a regression discontinuity design (RDD) to explore the effects of being in school versus out of school on our constructed time categories for adults and 15-17 year olds. This strategy follows Benson, Fitzpatrick, and Bondurant (2022) and Jones and Karger (2022). We present results both in regression form and graphically. For the regressions, we estimate the following equation around the school start date:

[16] We also drop the very small number of observations (less than 0.1%) that are coded as being in the summer control group but are actually in the very beginning of the school year or in the very end of the school year. This can happen if the summer break is very short.

$$y_i = \alpha + \beta \cdot f(days_i) + \gamma \cdot \mathbf{1}(days_i > cutoff) + X_i\beta + \epsilon_i, with\ |days_i| \leq k \quad (1)$$

where, for individual i, y is hours spent in a particular time category (such as exercise or sleep); the running variable $days$ is days relative to the Wednesday of the first week of school (which is the $cutoff$ date); $f(days)$ is a linear function of the running variable, which we allow to vary on either side of the cutoff; $\mathbf{1}(days > cutoff)$ is an indicator for being over the cutoff; and X is a vector of day of week fixed effects and control variables (metropolitan status, highest level of education attained, Hispanic, race, age, and, where applicable, sex).[17] Because schools start (end) on different days of the week, we estimate a donut hole regression in that we do not consider the days of the school start (end) week. We cluster the standard errors at the level of geography we used for school start date.[18]

One shortcoming of our paper is our sample size, leading us to use of a bandwidth of 9 weeks (65-67 days) to increase statistical power. If we were to use an optimal bandwidth, we would be left with standard errors too large to detect effects.[19] However, for our baseline table we test sensitivity to using smaller bandwidths and generally find similar results until the bandwidth is reduced to about 2-3 weeks.

We run equation 1 for 1) the time around the end of summer/start of school. We also modify equation 1 for 2) the end of the school year/start of summer. We finally run 3) a stacked version of 1) and 2), which is the version we focus on.[20] In order for the coefficients to have similar interpretations across cutoffs, we code the $days$ variable such that negative values

[17] Metropolitan status, education, Hispanic, and race are from the CPS, while age and sex are from the roster file.
[18] We compared the standard errors for Panel A of Table 3 to alternative choices. The standard errors we compute are very close to the "rdrobust" Stata package (Calonico et al., 2017) conventional standard errors (with the "vce(cluster)" option and uniform kernel). The standard errors are smaller than those obtained with the default rdrobust "vce(nn 3)" option.
[19] Using the "rdbwselect" command from the "rdrobust" package in Stata, coupled with the "mserd" optimal bandwidth, for the baseline mother weekday sample, we would be left with a bandwidth between 11 and 19 days.
[20] We include the beginning of school year-specific and beginning of summer-specific results in the Web Appendix.

correspond to summer days and positive values correspond to school days. For the end of summer/start of school cutoff, $days$ is negative for the end of the summer and positive for the start of the school year. In contrast, for the end of the school year/start of summer cutoff, $days$ is positive for the end of the school year and negative for the start of the summer. Thus, a positive value of our coefficient of interest, γ, corresponds to an increase in time usage in the school year relative to the summer.

In Appendix Figure 1 we present density plots (binned at the weekly level) for our four main samples. Statistical tests of manipulation around the school start/end date cutoffs do not yield evidence that it is an issue, with p-values ranging from 0.39 to 0.79.[21]

4. Results

4.1 Effects on specific categories related to time with children

We first consider outcomes that are directly related to time spent with children for mothers and fathers of 6–17-year-old household children in Table 1 (with corresponding plots in Appendix Figure 2). This is to verify that our estimation routine picks up changes in behavior that are most obviously related to the school year for parents. In this table, we focus on weekdays, as we expect differences between the school year and summer break to be largest on such days. We present results for mothers in Panel A and fathers in Panel B. Means of the dependent variables on summer days ("Y means") are given below the regression coefficient and standard error estimates. The first column is a measure of all time spent in the presence of one's own household children; this category includes both activities directly involving the children as well as other activities in which the children were simply present. For women, we find a decrease of 0.7 hours, or 44 minutes, in this variable on school days compared to the summer.

[21] We obtain these p-values using the "rddensity" Stata package (Cattaneo, Jansson, and Ma, 2018).

Interestingly, the decrease in time spent with children on days during the school year is only slightly lower for fathers, though the mean amount of time in the presence of own children is much lower for them in general. The second column measures time spent in secondary childcare, which is taking care of children while engaged in another (primary) activity. For both mothers and fathers, there is much less secondary childcare during the school year (by an hour or more per day), presumably largely because most children are in school during weekdays of the school year.

The first two variables in Table 1 show that parents are present with their children less often during the school year, which is very likely a mechanical effect of children attending school for a large part of the day. The remaining columns consider time parents spend in primary activities that are focused on children. For the most part, we see that participation in these activities *rises* for parents during the school year. As seen in column 3, when school is in session, total time in primary activities with children increases by 34 minutes per weekday for mothers; the corresponding effect for fathers is 12 minutes; this effect is statistically different (at the 1% level) for fathers compared to mothers.

Not surprisingly, as part of the increase in total primary activities with children, there is a large (as a percentage of the mean) increase in helping children with educational pursuits (i.e., homework) in column 4 and a smaller increase in driving children around (column 5) when school is in session. In both cases, the effects are twice as large for mothers as they are for fathers, which is consistent with previous work showing women spend more time helping their children with school-related tasks. In the last column (6) of the table, we see that other primary

activities with children that are not 1) helping with homework, or 2) driving children around, increase during the school year for mothers but not for fathers.[22]

4.2 Effects on general time use categories

We now turn our attention to analyzing a broad set of time categories to gain insight into how different individuals in the household change their time allocations around the school calendar. Table 2 presents the baseline RDD results for the ten main time use categories we consider (see Appendix Figures 3 through 6 for plots). Panel A focuses on mothers with at least one school-age (6-17 years old) child in the household. We find that relative to the summer, this group spends 0.41 hours less on sleep and 0.47 hours less on free time during the school year. On the other hand, they spend 0.58 hours more on caring for others, and an additional 0.32 hours on work (though this latter effect is only significant at the 10% level).[23] We also find smaller decreases in eating, exercise, and self-care and a smaller increase in travel time.

As a kind of placebo test, Panel B limits the sample to women who do not have school-age children in the household or children who are most likely to go to daycare or pre-kindergarten; in other words, they do not have children ages 3-17 in the household. Noting slightly larger standard errors compared to the first panel, we find no statistically significant effects for any categories, with the exception of caring for others, which is significant at the 10% level; furthermore, nearly all effects are smaller in magnitude, often substantially so, than they are for the treatment group. In the cases of sleep, caring for others, free time, and exercise, the effects are statistically distinguishable (at the 1% or 5% level) from those for women with

[22] When we examine how time spent doing homework changes for 15-17 year-olds around school year cutoff dates, we find that they spend almost one additional hour (0.95, s.e.=0.13) per weekday on these tasks when school is in. Time spent doing homework during the summer break is nearly zero, on average.

[23] The ATUS diaries are coded between 4am of the main day and 4am of the following day. Thus, sleep on Friday includes Friday morning 4a.m. and on and Friday night/early Saturday morning until 4a.m. If people go to bed later on Friday night than they would on, say, Thursday night, this will affect the value of the sleep variable on Friday.

school-age children (if we run a difference-in-RDD regression, we also find that effects for eating and travel time are statistically different for the two groups).[24]

Panel C considers fathers with at least one school-age child in the household. Several effects are similar in magnitude to those for mothers: most notably, for exercise and, to a lesser extent, free time and work. Effects on sleep and caring for others are much smaller than the corresponding effects for mothers (these effects are also statistically different across gender at the 5% and 1% level, respectively). The contrast in the results between mothers and fathers suggests that the effects on the mothers are not merely a result of a discontinuity in the likelihood families take vacations together around school year and summer start dates (later, we also show that our results are robust to increasing the "donut hole," or removing more weeks closest to school cutoff dates, in our RD regressions).

We consider students (children ages 15-17) in Panel D and find strong effects on all but two of the outcomes. Not surprisingly, there is a large increase—of around five and a half hours—in education activities in the school year compared to the summer. There is also a small increase in self-care of 9 minutes. Which activities offset these education hours? Students spend 2 fewer hours on free time, 1.4 fewer hours sleeping, and 0.7 fewer hours working. They also spend 0.7 fewer hours on household tasks. In addition, they report 0.5 fewer hours on exercise, though this is likely an overestimate given that time spent in gym class is counted as education time, not as exercise, in ATUS (after-school activities during the school year such as sports are not coded as education time, however).[25] In Appendix Table 1, we recreate this panel, but split

[24] In this difference-in-RDD regression, we allow the slope to vary on either side of the cutoff, but not separately by group (mothers with school-age children vs. mothers with no children 3-17).

[25] As a robustness check, we (probability) weight using the "ATUS final weight" variable and report results in Appendix Table 2. Results are generally very similar, though the effect on work time for women with school-age children is smaller and no longer significant at conventional levels.

by gender. Self-care is statistically significant for girls, but not for boys. However, the only variable that is statistically different across genders is exercise, with boys seeing a decrease of 0.5 hours more than girls during the school year versus summer.

Motivated by the importance of sleep to teenage health, we present additional results for 15-17 year olds. In Figure 1, we show the percentage of children ages 15-17 who are asleep at every minute of the day (between 4am and 3:59am the following day, which is how the time diary is constructed). We consider weekdays excluding Friday as it is the beginning of the weekend. The summer is shown as the solid red line and the school year is shown as the dashed black line. Compared to the school year, 15-17 year wake up much later in the summer. They also go to bed later, but later bedtimes do not fully offset later wake times. As a result, teenagers get less sleep in total during the school year, which is consistent with the RD result in Table 3. The finding that teenagers sleep more during the summer has been used to motivate pushing back high-school start times since sleep has been linked to better performance in school (see, for example, Heissel and Norris, 2018 and Groen and Pabilonia, 2019). Our results suggest there are large potential gains (in terms of teenage sleep) of policies that bring sleep during the school year closer to summer sleep.

We also examine each of the 10 time-use categories from Table 2 at the extensive margin (i.e., whether the activity occurs at all in a given day). The results are contained in Appendix Table 3. Because many activities take place for at least one minute on a given day for nearly everyone, it is unsurprising that effects of the school calendar on those activities is zero or very small (e.g., with respect to sleep). A few findings are notable: both mothers and fathers of school-age children see a significant increase in the probability of caring for others on school days (of 16 and 14 percentage points, respectively) and a smaller increase in the probability of

working a positive amount (of 4 percentage points). Men see a significant decline in the likelihood of exercise (4 percentage points), while both have a lower likelihood of engaging in free time (2 and 3 percentage points, respectively) and traveling (3 and 2 percentage points, respectively). For teenage children, a larger number of extensive margin effects are significant, with, for example, an 8 percentage point decline in the probability of exercise during the school year, a 13 percentage point increase in engaging in self-care, and a 10 percentage point decline in the probability of working.

In Appendix Table 4, we recreate Table 2 but consider weekends instead of weekdays. One of the main insights we glean from this is that for most behaviors for which we find school calendar effects on weekdays, there are no offsetting effects on weekends. In the cases of caring for others and exercise, we actually find that those activities follow the same pattern with respect to the school calendar on weekends as they do on weekdays, and this is true for both men and women. Eating follows the same pattern for women only. On the other hand, there is offsetting behavior for time spent traveling: on weekends during the school year, mothers with school-age children travel less (0.15 hours) than on weekends during the summer break, with fathers traveling 0.17 hours less (noting that for fathers, the coefficient on this variable is insignificant on weekdays). Teenage children see almost no school-year effects on weekends except that they spend about 30 minutes more on educational activities on weekends when school is in session (perhaps due to homework). Importantly, we do not see evidence that teenagers "catch up" on their sleep on weekends when school is in session (relative to when school is out) to offset the effects of sleeping significantly less on weekdays during the school year compared to summer-break weekdays.

In Table 3, we split the sample by employment status and household income, focusing only on women with school-age children during weekdays, the adult group for which we see the largest and most consistent effects across outcomes. Panel A considers women who were not employed as of their last CPS interview, while Panel B considers those who were employed at that time.[26] Both groups see decreases in sleep and free time and increases in caring for others during the school year, though these effects are larger for non-working mothers (the differences in sleep and caring for others are statistically significant at the 10% and 1% level, respectively). One notable difference is that women who are employed increase their working time during the school year by 0.4 hours compared to a decrease for those who were not employed as of the last CPS interview; women who were employed are also the only ones to see a decrease in exercise (of 8 minutes). In contrast, women who were employed increase their travel time substantially more than not-employed women, while not-employed women increase their time on household tasks but employed women do not.

Panels C and D of Table 3 consider women below and above $50,000 household income (as of the last CPS interview). Strikingly, for most outcomes, school-year effects are broadly similar across our income threshold; however, higher-income women are the only ones to change time spent exercising around school start/end dates.[27]

4.3 Robustness

[26] We consider "Employed - at work" and "Employed – absent" as of the last CPS interview to be "employed". We consider the other categories—"Unemployed - on layoff", "Unemployed – looking", "Not in labor force – retired", "Not in labor force – disabled", and "Not in labor force – other"—to be unemployed.

[27] In Appendix Table 5, we show results for Table 1 split by employment status and income. Women who were not previously employed have larger (in magnitude) changes for all outcomes besides time in the presence of household children (column 1). There are smaller differences across the income gradient. All coefficients but the first are statistically different between Panels A and B. None are statistically different between Panels C and D, though we again note the smaller sample size due to missing income information before 2010.

In Appendix Tables A.6-A.9, we consider how changing the bandwidth associated with our RD estimation procedure affects the results (for weekdays). In Appendix Table A.6, we again study women with school-age children, finding that school-year effects for sleep, self-care, caring for others, and free time are robust to shrinking the bandwidth all the way down to 3 weeks before and after school/summer start dates. Effects on eating and exercise remain statistically significant at conventional levels down to 4 weeks; for travel, it is 5 weeks. We find qualitatively similar results for all variables except work up to about 4-5 weeks, and sometimes beyond that. With some exceptions, point estimates are also generally stable to about 3-4 weeks.

In Appendix Table A.7, we see that the vast majority of effects remain small and statistically insignificant for women with no children aged 3-17 in the household. Results for men with school-age children are shown in Appendix Table A.8, where effects on sleep, caring for others, free time, and exercise, for which we find statistically significant effects at 9 weeks, are less robust with a shrinking bandwidth than they are for women. This further underscores our conclusion that women's behavior is more affected by the school calendar than is men's. Lastly, in Appendix Table A.9, we see that effects for teenage children are also generally robust down to bandwidths of 3-5 weeks, though the magnitudes of the coefficients shrink somewhat as the bandwidth becomes tighter. Overall, we view the results in these tables as lending credibility to our (baseline) identification strategy.

We also consider how varying the choice of the donut hole affects results. In Appendix Tables A.10-A.13, we present results for the sample similar to Table 2 but allow the size of the donut hole to vary. We first show the baseline results, then allow the donut hole to exclude one week on either side of the first week of school/first week of summer. We then exclude two weeks on either side of the relevant cutoff. For the most part, results are robust to this test.

4.4 Effects on teenagers' free time behaviors

Other than educational activities, the largest change in teenagers' time use when school lets out or resumes is in the amount of free time they have. This leads us to ask how teenagers are spending such time. We focus specifically on time in front of screens: video games, television, and computer use for leisure (not schoolwork or work).[28] [29] This focus is due to the attention these activities have received in the literature. Video games and screen time have been linked to both negative and positive effects where, on the one hand, video games can improve cognitive function, and, on the other, some papers raise concerns that they are associated with increased mental and physical health risks for youths and young adults (see Granic et al., 2014, for a review).

The results regarding these "screen time" behaviors are contained in Table 4. We find that all three activities decrease during the school year relative to the summer break, with the effect on television being strongest. In total, the time spent on these activities falls by almost 1.5 hours when school is in session, which is two-thirds of the total decline in free time seen in Table 2. Thus, after sleep, the next biggest change in student summertime use is on (leisure) time in front of screens. There is rising concern over increasing media use among teenagers that was accelerated by the COVID-19 pandemic.[30] To the extent that such consumption is habit-forming or addictive (see Seema et al., 2022), our results suggest summer may be a particularly vulnerable time for teens.

5. Conclusion

[28] The activities coded under this category include use of internet and social media. Though it is not specified, it would thus appear that time spent in these activities on smartphones would fall under the same category.
[29] The variable we use to measure video game time is technically time spent in games (not just video games); in doing so, we follow Kimbrough (2020), who argues that most of this time is indeed video gaming.
[30] For example, see https://www.commonsensemedia.org/press-releases/two-years-into-the-pandemic-media-use-has-increased-17-among-tweens-and-teens.

This paper provides a comprehensive look at how parents and children adjust their time use around the academic calendar. By exploiting location-specific information on school year start and end dates and using regression discontinuity methods, we show that mothers of school-age children and 15-17 year-olds (the vast majority of which are high-school students) make substantial changes to their schedules depending on whether school is in session or not. Some of these changes are natural and even obvious: for example, mothers spend less time helping their children with schoolwork during the summer, and 15-17 year-olds spend much less time on educational activities during that time. Other results, however, are more subtle and have important implications for mothers' and teenagers' health: for example, both groups sleep and exercise less when school is in session (with larger effects for teens).

Mothers spend more time caring for others during the school year. Fathers also do, but the change is smaller, which is another indication that the burden of childcare tasks falls disproportionately on women. This burden appears to rise during the school year even though parents generally spend less time with their kids (due to their being in school). This may have implications for mothers' health in the short and long run.

Teenagers' sleep has been shown to be important in their mental health and cognitive development. Our results show that teens sleep substantially more when they do not have to wake up for school. This suggests that continued attention paid to adjusting school start times and other policies that promote teen sleep is warranted. Though teens spend the time they save while not in school in many different ways, the single largest change during summer is in their free time, largely spent in front of screens, with an effect that is over three times the increase in time spent working. The implications of this for teens' health and wellbeing is unclear, given that

a large increase in time spent in front of screens may be deleterious to their mental health and long-term development.

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Table 1: Time with Children

	In Presence of Kids	Secondary Childcare	Total Kids Activities	Help Kids Ed	Drive Kids	Other Activities w/ Kids
Panel A: Women with At Least One Child Age 6-17						
School	-0.73***	-1.47***	0.57***	0.24***	0.05***	0.27***
	(0.14)	(0.16)	(0.06)	(0.02)	(0.01)	(0.06)
Summer Mean	5.65	5.19	1.19	0.04	0.07	1.09
Observations	9,353	8,385	9,353	9,353	9,353	9,353
Panel B: Men with At Least One Child Age 6-17						
	In Presence of Kids	Secondary Childcare	Total Kids Activities	Help Kids Ed	Drive Kids	Other Activities w/ Kids
School	-0.64***	-1.01***	0.20***	0.12***	0.03***	0.05
	(0.14)	(0.16)	(0.06)	(0.02)	(0.01)	(0.05)
Summer Mean	3.43	3.16	0.61	0.02	0.03	0.57
Observations	6,847	6,134	6,847	6,847	6,847	6,847

Notes: This table considers weekdays only. It reports the results of regressions of an outcome on an indicator for being above the cutoff (for school start, this takes value 1 for weeks after the start of school; for summer start, it is reversed and takes value 1 for weeks before the start of summer), and a linear function of the running variable, days away from the Wednesday of the school start (or summer start). The regression also includes a number of controls. The school start and summer start periods are stacked together. Panel A (B) is for women (men) age 25-55 with at least one child age 6-17 in the household. Each coefficient corresponds to a different regression. The week of school start and summer start is excluded, as are days more than 9 weeks away from the week of the school start or summer start. "Y Mean" corresponds to the mean during the school year period. Standard error are clustered at the level at which the school start or summer start date was calculated. *** 0.01; ** 0.05; * 0.1.

Table 2: Baseline: Weekdays

	Sleep	Self Care	Household	Caring	Work	Ed	Free Time	Eating	Exercise	Travel
Panel A: Women with At Least One Child Age 6-17										
School	-0.41***	-0.06*	0.06	0.58***	0.32*	0.05	-0.47***	-0.07***	-0.11***	0.09**
	(0.07)	(0.03)	(0.10)	(0.07)	(0.16)	(0.04)	(0.10)	(0.02)	(0.02)	(0.04)
Summer Mean	8.34	0.83	3.08	1.33	4.10	0.12	3.40	0.98	0.27	1.34
Observations	9,353	9,353	9,353	9,353	9,353	9,353	9,353	9,353	9,353	9,353
Panel B: Women with No Children Age 3-17										
	Sleep	Self Care	Household	Caring	Work	Ed	Free Time	Eating	Exercise	Travel
School	-0.12	-0.00	0.08	0.13*	-0.04	-0.04	0.06	-0.04	-0.03	0.02
	(0.09)	(0.04)	(0.10)	(0.08)	(0.19)	(0.05)	(0.13)	(0.03)	(0.02)	(0.06)
Summer Mean	8.36	0.94	2.27	0.67	5.15	0.17	3.83	0.99	0.24	1.24
Observations	8,173	8,173	8,173	8,173	8,173	8,173	8,173	8,173	8,173	8,173
Panel C: Men with At Least One Child Age 6-17										
	Sleep	Self Care	Household	Caring	Work	Ed	Free Time	Eating	Exercise	Travel
School	-0.18**	-0.07*	0.05	0.16**	0.43**	0.01	-0.35***	-0.02	-0.08*	0.05
	(0.09)	(0.04)	(0.08)	(0.06)	(0.19)	(0.03)	(0.11)	(0.04)	(0.05)	(0.06)
Summer Mean	7.78	0.68	1.46	0.70	7.12	0.05	3.13	1.08	0.37	1.47
Observations	6,847	6,847	6,847	6,847	6,847	6,847	6,847	6,847	6,847	6,847
Panel D: Children Age 15-17										
	Sleep	Self Care	Household	Caring	Work	Ed	Free Time	Eating	Exercise	Travel
School	-1.35***	0.15***	-0.72***	-0.15***	-0.74***	5.59***	-2.03***	-0.07	-0.50***	-0.07
	(0.16)	(0.05)	(0.10)	(0.05)	(0.16)	(0.20)	(0.23)	(0.04)	(0.12)	(0.07)
Summer Mean	10.09	0.74	1.22	0.25	1.38	0.63	6.12	0.93	1.19	1.23
Observations	2,673	2,673	2,673	2,673	2,673	2,673	2,673	2,673	2,673	2,673

Notes: This table considers weekdays only. It reports the results of regressions of an outcome on an indicator for being above the cutoff (for school start, this takes value 1 for weeks after the start of school; for summer start, it is reversed and takes value 1 for weeks before the start of summer), and a linear function of the running variable, days away from the Wednesday of the school start (or summer start). The regression also includes a number of controls. The school start and summer start periods are stacked together. Panel A (C) is for women (men) age 25-55 with at least one child age 6-17 in the household, Panel B is for women age 25-55 with no children age 3-17 in the household, and Panel D is for children age 15-17. Each coefficient corresponds to a different regression. The week of school start and summer start is excluded, as are days more than 9 weeks away from the week of the school start or summer start. "Y Mean" corresponds to the mean during the school year period. Standard error are clustered at the level at which the school start or summer start date was calculated. *** 0.01; ** 0.05; * 0.1.

Table 3: Women with At Least One Child Age 6-17, by Employment and HH Income

	Sleep	Self Care	Household	Caring	Work	Ed	Free Time	Eating	Exercise	Travel
Panel A: Not Employed										
School	-0.57***	-0.10	0.43**	1.01***	-0.31**	0.17*	-0.56***	-0.06	-0.05	0.02
	(0.13)	(0.07)	(0.18)	(0.14)	(0.14)	(0.10)	(0.19)	(0.05)	(0.05)	(0.08)
Summer Mean	8.90	0.72	4.32	1.95	0.78	0.16	4.35	1.01	0.31	1.21
Observations	3,023	3,023	3,023	3,023	3,023	3,023	3,023	3,023	3,023	3,023
Panel B: Employed										
	Sleep	Self Care	Household	Caring	Work	Ed	Free Time	Eating	Exercise	Travel
School	-0.30***	-0.05	-0.03	0.43***	0.40**	0.00	-0.38***	-0.06**	-0.13***	0.10**
	(0.08)	(0.04)	(0.11)	(0.07)	(0.18)	(0.03)	(0.11)	(0.03)	(0.03)	(0.04)
Summer Mean	8.07	0.88	2.48	1.02	5.71	0.10	2.94	0.96	0.25	1.40
Observations	6,330	6,330	6,330	6,330	6,330	6,330	6,330	6,330	6,330	6,330
Panel C: HH Income Below $50,000										
	Sleep	Self Care	Household	Caring	Work	Ed	Free Time	Eating	Exercise	Travel
School	-0.37*	-0.14*	-0.17	0.54***	0.59	0.09	-0.62**	-0.06	0.01	0.11
	(0.20)	(0.07)	(0.23)	(0.18)	(0.36)	(0.10)	(0.24)	(0.05)	(0.06)	(0.09)
Summer Mean	8.75	0.84	3.21	1.43	3.50	0.19	3.57	0.91	0.16	1.17
Observations	2,027	2,027	2,027	2,027	2,027	2,027	2,027	2,027	2,027	2,027
Panel D: HH Income At Least $50,000										
	Sleep	Self Care	Household	Caring	Work	Ed	Free Time	Eating	Exercise	Travel
School	-0.45***	-0.01	0.18	0.57***	0.36	0.04	-0.50***	-0.13**	-0.22***	0.11
	(0.13)	(0.06)	(0.17)	(0.12)	(0.30)	(0.05)	(0.17)	(0.05)	(0.05)	(0.09)
Summer Mean	8.22	0.81	2.82	1.31	4.46	0.09	3.06	1.06	0.38	1.53
Observations	2,571	2,571	2,571	2,571	2,571	2,571	2,571	2,571	2,571	2,571

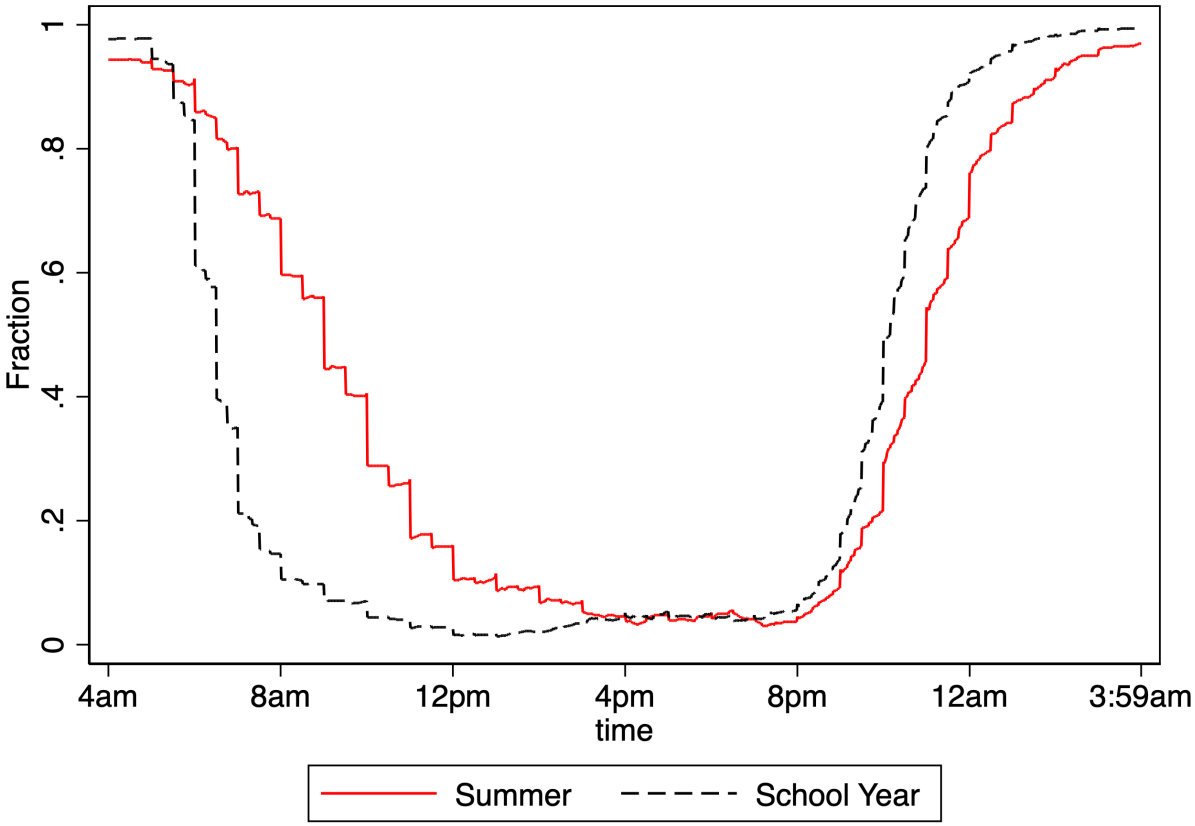
Notes: This table considers women age 25-55 with at least one child age 6-17 in the household. It considers only weekdays. It reports the results of regressions of an outcome on an indicator for being above the cutoff (for school start, this takes value 1 for weeks after the start of school; for summer start, it is reversed and takes value 1 for weeks before the start of summer), and a linear function of the running variable, days away from the Wednesday of the school start (or summer start). The regression also includes a number of controls. The school start and summer start periods are stacked together. Panel A (B) is for women not employed (employed) as of the last CPS interview, and Panel C (D) is for women with a household income below (at least) $50,000 as of the last CPS interview. Each coefficient corresponds to a different regression. The week of school start and summer start is excluded, as are days more than 9 weeks away from the week of the school start or summer start. "Y Mean" corresponds to the mean during the school year period. Standard error are clustered at the level at which the school start or summer start date was calculated. *** 0.01; ** 0.05; * 0.1.

Table 4: Screen Time, Children Age 15-17

	Total	Games	TV	Computer
School	-1.40***	-0.37***	-0.84***	-0.19**
	(0.20)	(0.09)	(0.16)	(0.07)
Summer Mean	3.75	0.69	2.59	0.47
Observations	2,673	2,673	2,673	2,673

Notes: This table considers children age 15-17. The Total Screen Time variable is the sum of the final three columns. The Games column is "Playing games"; the TV column is "Television and movies (not religious)"; and the Computer column is "Computer use for leisure (exc. Games)." It considers only weekdays. It reports the results of regressions of an outcome on an indicator for being above the cutoff (for school start, this takes value 1 for weeks after the start of school; for summer start, it is reversed and takes value 1 for weeks before the start of summer), and a linear function of the running variable, days away from the Wednesday of the school start (or summer start). The regression also includes a number of controls. The school start and summer start periods are stacked together. Each coefficient corresponds to a different regression. The week of school start and summer start is excluded, as are days more than 9 weeks away from the week of the school start or summer start. "Y Mean" corresponds to the mean during the school year period. Standard error are clustered at the level at which the school start or summer start date was calculated. *** 0.01; ** 0.05; * 0.1.

Figure 1: Children Age 15-17, Sleep, Summer vs. School Year



Notes: This graph shows the percentage of children age 15-17 who are asleep for every minute between 4am and 3:59pm the following day. The dashed black line restricts to the nine weeks at the beginning of the school year and the last nine weeks at the end of the school year. The solid red line restricts to the first nine weeks after school ends and the last nine weeks before school begins. The week of school is excluded. We consider only diary days Monday through Thursday.

A Appendix Tables

Table A1: Baseline: Weekdays, 15-17 Year Old, by Gender

	Sleep	Self Care	Household	Caring	Work	Ed	Free Time	Eating	Exercise	Travel
Panel A: Children Age 15-17, Female										
School	-1.26***	0.21**	-0.85***	-0.22**	-0.83***	5.45***	-1.99***	-0.10	-0.26*	0.07
	(0.25)	(0.08)	(0.17)	(0.08)	(0.22)	(0.32)	(0.32)	(0.07)	(0.14)	(0.12)
Summer Mean	10.23	0.93	1.48	0.32	1.28	0.62	5.92	0.90	0.73	1.31
Observations	1,312	1,312	1,312	1,312	1,312	1,312	1,312	1,312	1,312	1,312
Panel A: Children Age 15-17, Male										
	Sleep	Self Care	Household	Caring	Work	Ed	Free Time	Eating	Exercise	Travel
School	-1.46***	0.07	-0.60***	-0.10*	-0.66***	5.84***	-2.14***	-0.03	-0.76***	-0.17*
	(0.23)	(0.05)	(0.12)	(0.06)	(0.23)	(0.31)	(0.31)	(0.06)	(0.17)	(0.09)
Summer Mean	9.96	0.56	0.98	0.19	1.48	0.64	6.31	0.95	1.64	1.16
Observations	1,361	1,361	1,361	1,361	1,361	1,361	1,361	1,361	1,361	1,361

Notes: This table considers weekdays only. It reports the results of regressions of an outcome on an indicator for being above the cutoff (for school start, this takes value 1 for weeks after the start of school; for summer start, it is reversed and takes value 1 for weeks before the start of summer), and a linear function of the running variable, days away from the Wednesday of the school start (or summer start). The regression also includes a number of controls. The school start and summer start periods are stacked together. Panel A (B) is for male (female) children age 15-17. Each coefficient corresponds to a different regression. The week of school start and summer start is excluded, as are days more than 9 weeks away from the week of the school start or summer start. "Y Mean" corresponds to the mean during the school year period. Standard error are clustered at the level at which the school start or summer start date was calculated. *** 0.01; ** 0.05; * 0.1.

Table A2: Weekdays, Weighted Regression

	Sleep	Self Care	Household	Caring	Work	Ed	Free Time	Eating	Exercise	Travel
Panel A: Women with At Least One Child Age 6-17										
School	-0.41***	-0.07*	0.08	0.51***	0.21	0.03	-0.34***	-0.04	-0.08***	0.10**
	(0.09)	(0.04)	(0.11)	(0.07)	(0.18)	(0.03)	(0.11)	(0.03)	(0.03)	(0.05)
Summer Mean	8.34	0.83	3.08	1.33	4.10	0.12	3.40	0.98	0.27	1.34
Observations	9,353	9,353	9,353	9,353	9,353	9,353	9,353	9,353	9,353	9,353
Panel B: Women with No Children Age 3-17										
	Sleep	Self Care	Household	Caring	Work	Ed	Free Time	Eating	Exercise	Travel
School	-0.09	-0.01	0.10	0.06	-0.12	-0.07	0.22	-0.04	-0.04	-0.00
	(0.11)	(0.04)	(0.12)	(0.08)	(0.23)	(0.05)	(0.16)	(0.04)	(0.03)	(0.06)
Summer Mean	8.36	0.94	2.27	0.67	5.15	0.17	3.83	0.99	0.24	1.24
Observations	8,173	8,173	8,173	8,173	8,173	8,173	8,173	8,173	8,173	8,173
Panel C: Men with At Least One Child Age 6-17										
	Sleep	Self Care	Household	Caring	Work	Ed	Free Time	Eating	Exercise	Travel
School	-0.19*	-0.07	0.02	0.13*	0.54**	0.02	-0.41**	-0.03	-0.09**	0.07
	(0.10)	(0.04)	(0.09)	(0.07)	(0.21)	(0.03)	(0.15)	(0.04)	(0.04)	(0.07)
Summer Mean	7.78	0.68	1.46	0.70	7.12	0.05	3.13	1.08	0.37	1.47
Observations	6,847	6,847	6,847	6,847	6,847	6,847	6,847	6,847	6,847	6,847
Panel D: Children Age 15-17										
	Sleep	Self Care	Household	Caring	Work	Ed	Free Time	Eating	Exercise	Travel
School	-1.38***	0.18***	-0.73***	-0.12**	-0.81***	5.66***	-2.25***	-0.03	-0.36**	-0.10
	(0.21)	(0.05)	(0.11)	(0.05)	(0.18)	(0.24)	(0.27)	(0.05)	(0.13)	(0.08)
Summer Mean	10.09	0.74	1.22	0.25	1.38	0.63	6.12	0.93	1.19	1.23
Observations	2,673	2,673	2,673	2,673	2,673	2,673	2,673	2,673	2,673	2,673

Notes: This table considers weekdays only. It reports the results of regressions of an outcome on an indicator for being above the cutoff (for school start, this takes value 1 for weeks after the start of school; for summer start, it is reversed and takes value 1 for weeks before the start of summer), and a linear function of the running variable, days away from the Wednesday of the school start (or summer start). The regression also includes a number of controls. The school start and summer start periods are stacked together. Panel A (C) is for women (men) age 25-55 with at least one child age 6-17 in the household, Panel B is for women age 25-55 with no children age 3-17 in the household, and Panel D is for children age 15-17. Each coefficient corresponds to a different regression. The week of school start and summer start is excluded, as are days more than 9 weeks away from the week of the school start or summer start. "Y Mean" corresponds to the mean during the school year period. Standard error are clustered at the level at which the school start or summer start date was calculated. *** 0.01; ** 0.05; * 0.1.

Table A3: Baseline: Weekdays, Extensive Margin

	Sleep	Self Care	Household	Caring	Work	Ed	Free Time	Eating	Exercise	Travel
Panel A: Women with At Least One Child Age 6-17										
School	-0.00	0.01	0.01	0.16***	0.04**	0.01	-0.02*	-0.00	-0.02	0.03***
	(0.00)	(0.01)	(0.01)	(0.02)	(0.02)	(0.01)	(0.01)	(0.01)	(0.01)	(0.01)
Summer Mean	1.00	0.85	0.95	0.72	0.57	0.03	0.94	0.95	0.20	0.92
Observations	9,353	9,353	9,353	9,353	9,353	9,353	9,353	9,353	9,353	9,353
Panel B: Women with No Children Age 3-17										
	Sleep	Self Care	Household	Caring	Work	Ed	Free Time	Eating	Exercise	Travel
School	0.00	-0.01	-0.02	0.03	0.00	-0.00	0.00	-0.02	-0.01	-0.00
	(0.00)	(0.01)	(0.01)	(0.02)	(0.02)	(0.01)	(0.01)	(0.01)	(0.02)	(0.01)
Summer Mean	1.00	0.88	0.90	0.30	0.66	0.04	0.94	0.93	0.20	0.89
Observations	8,173	8,173	8,173	8,173	8,173	8,173	8,173	8,173	8,173	8,173
Panel C: Men with At Least One Child Age 6-17										
	Sleep	Self Care	Household	Caring	Work	Ed	Free Time	Eating	Exercise	Travel
School	-0.00	0.01	0.03	0.14***	0.04**	0.00	-0.03**	0.00	-0.04**	0.02*
	(0.00)	(0.02)	(0.02)	(0.02)	(0.02)	(0.01)	(0.01)	(0.01)	(0.02)	(0.01)
Summer Mean	1.00	0.85	0.76	0.51	0.82	0.01	0.93	0.95	0.22	0.93
Observations	6,847	6,847	6,847	6,847	6,847	6,847	6,847	6,847	6,847	6,847
Panel D: Children Age 15-17										
	Sleep	Self Care	Household	Caring	Work	Ed	Free Time	Eating	Exercise	Travel
School	0.00	0.13***	-0.18***	-0.03	-0.10***	0.65***	-0.02	-0.02	-0.08**	0.09***
	(0.00)	(0.02)	(0.04)	(0.03)	(0.03)	(0.03)	(0.02)	(0.02)	(0.04)	(0.02)
Summer Mean	1.00	0.81	0.73	0.28	0.26	0.17	0.98	0.94	0.44	0.87
Observations	2,673	2,673	2,673	2,673	2,673	2,673	2,673	2,673	2,673	2,673

Notes: This table considers only the extensive margin. This table considers weekdays only. It reports the results of regressions of an outcome on an indicator for being above the cutoff (for school start, this takes value 1 for weeks after the start of school; for summer start, it is reversed and takes value 1 for weeks before the start of summer), and a linear function of the running variable, days away from the Wednesday of the school start (or summer start). The regression also includes a number of controls. The school start and summer start periods are stacked together. Panel A (C) is for women (men) age 25-55 with at least one child age 6-17 in the household, Panel B is for women age 25-55 with no children age 3-17 in the household, and Panel D is for children age 15-17. Each coefficient corresponds to a different regression. The week of school start and summer start is excluded, as are days more than 9 weeks away from the week of the school start or summer start. "Y Mean" corresponds to the mean during the school year period. Standard error are clustered at the level at which the school start or summer start date was calculated. *** 0.01; ** 0.05; * 0.1.

Table A4: Weekends

	Sleep	Self Care	Household	Caring	Work	Ed	Free Time	Eating	Exercise	Travel
Panel A: Women with At Least One Child Age 6-17										
School	0.05	0.04	0.11	0.23***	-0.14	0.03	0.08	-0.08**	-0.16***	-0.15**
	(0.08)	(0.04)	(0.10)	(0.07)	(0.10)	(0.03)	(0.12)	(0.03)	(0.03)	(0.05)
Summer Mean	9.20	0.79	3.59	1.11	1.14	0.08	4.97	1.17	0.41	1.34
Observations	9,829	9,829	9,829	9,829	9,829	9,829	9,829	9,829	9,829	9,829
Panel B: Women with No Children Age 3-17										
	Sleep	Self Care	Household	Caring	Work	Ed	Free Time	Eating	Exercise	Travel
School	0.00	-0.05	-0.03	-0.02	-0.01	0.00	0.11	0.05	-0.03	-0.00
	(0.11)	(0.04)	(0.12)	(0.07)	(0.13)	(0.04)	(0.14)	(0.04)	(0.04)	(0.06)
Summer Mean	9.32	0.88	3.15	0.66	1.35	0.07	5.58	1.15	0.34	1.33
Observations	8,351	8,351	8,351	8,351	8,351	8,351	8,351	8,351	8,351	8,351
Panel C: Men with At Least One Child Age 6-17										
	Sleep	Self Care	Household	Caring	Work	Ed	Free Time	Eating	Exercise	Travel
School	-0.01	0.05	-0.05	0.25***	0.09	-0.01	0.04	0.01	-0.22***	-0.17**
	(0.10)	(0.04)	(0.13)	(0.07)	(0.17)	(0.02)	(0.15)	(0.04)	(0.06)	(0.07)
Summer Mean	8.89	0.54	2.82	0.83	1.77	0.04	5.32	1.30	0.73	1.56
Observations	6,926	6,926	6,926	6,926	6,926	6,926	6,926	6,926	6,926	6,926
Panel D: Children Age 15-17										
	Sleep	Self Care	Household	Caring	Work	Ed	Free Time	Eating	Exercise	Travel
School	0.02	0.05	-0.14	0.00	-0.10	0.53***	-0.30	-0.02	-0.03	-0.03
	(0.18)	(0.05)	(0.12)	(0.05)	(0.15)	(0.12)	(0.24)	(0.05)	(0.13)	(0.09)
Summer Mean	10.46	0.71	1.26	0.23	1.04	0.25	6.45	0.97	1.13	1.33
Observations	2,888	2,888	2,888	2,888	2,888	2,888	2,888	2,888	2,888	2,888

Notes: This table considers Saturdays and Sundays only. It reports the results of regressions of an outcome on an indicator for being above the cutoff (for school start, this takes value 1 for weeks after the start of school; for summer start, it is reversed and takes value 1 for weeks before the start of summer), and a linear function of the running variable, days away from the Wednesday of the school start (or summer start). The school start and summer start periods are stacked together. Panel A (C) is for women (men) age 25-55 with at least one child age 6-17 in the household, Panel B is for women age 25-55 with no children age 3-17 in the household, and Panel D is for children age 15-17. Each coefficient corresponds to a different regression. The week of school start and summer start is excluded, as are days more than 9 weeks away from the week of the school start or summer start. "Y Mean" corresponds to the mean during the school year period. Standard error are clustered at the level at which the school start or summer start date was calculated. *** 0.01; ** 0.05; * 0.1.

Table A5: Women with At Least One Child Age 6-17, Time with Children, by Employment and HH Income

	In Presence of Kids	Secondary Childcare	Total Kids Activities	Help Kids Ed	Drive Kids	Other Activities w/ Kids
Panel A: Not Employed						
School	-0.53**	-1.89***	0.99***	0.35***	0.08***	0.56***
	(0.25)	(0.31)	(0.13)	(0.04)	(0.01)	(0.13)
Summer Mean	7.94	7.34	1.76	0.07	0.06	1.63
Observations	3,023	2,741	3,023	3,023	3,023	3,023
Panel B: Employed						
	In Presence of Kids	Secondary Childcare	Total Kids Activities	Help Kids Ed	Drive Kids	Other Activities w/ Kids
School	-0.67***	-1.21***	0.41***	0.19***	0.04***	0.18***
	(0.15)	(0.18)	(0.06)	(0.02)	(0.01)	(0.06)
Summer Mean	4.54	4.14	0.92	0.02	0.07	0.82
Observations	6,330	5,644	6,330	6,330	6,330	6,330
Panel C: HH Income Below $50,000						
	In Presence of Kids	Secondary Childcare	Total Kids Activities	Help Kids Ed	Drive Kids	Other Activities w/ Kids
School	-0.84**	-1.47***	0.52***	0.24***	0.07***	0.21
	(0.31)	(0.33)	(0.16)	(0.04)	(0.02)	(0.15)
Summer Mean	5.92	5.45	1.28	0.05	0.06	1.17
Observations	2,027	2,027	2,027	2,027	2,027	2,027
Panel D: HH Income At Least $50,000						
	In Presence of Kids	Secondary Childcare	Total Kids Activities	Help Kids Ed	Drive Kids	Other Activities w/ Kids
School	-0.77***	-1.83***	0.55***	0.21***	0.06***	0.27**
	(0.27)	(0.27)	(0.12)	(0.04)	(0.01)	(0.11)
Summer Mean	5.46	4.98	1.22	0.04	0.07	1.10
Observations	2,571	2,571	2,571	2,571	2,571	2,571

Notes: This table considers women age 25-55 with at least one child age 6-17 in the household. It considers only weekdays. It reports the results of regressions of an outcome on an indicator for being above the cutoff (for school start, this takes value 1 for weeks after the start of school; for summer start, it is reversed and takes value 1 for weeks before the start of summer), and a linear function of the running variable, days away from the Wednesday of the school start (or summer start). The regression also includes a number of controls. The school start and summer start periods are stacked together. Panel A (B) is for women not employed (employed) as of the last CPS interview, and Panel C (D) is for women with a household income below (at least) $50,000 as of the last CPS interview. Each coefficient corresponds to a different regression. The week of school start and summer start is excluded, as are days more than 9 weeks away from the week of the school start or summer start. "Y Mean" corresponds to the mean during the school year period. Standard error are clustered at the level at which the school start or summer start date was calculated. *** 0.01; ** 0.05; * 0.1.

Table A6: Baseline: Weekdays, RDD Bandwidth Sensitivity, Women

	Sleep	Self Care	Household	Caring	Work	Ed	Free Time	Eating	Exercise	Travel
Panel A: Women with At Least One Child Age 6-17										
9 Weeks	-0.41***	-0.06*	0.06	0.58***	0.32*	0.05	-0.47***	-0.07***	-0.11***	0.09**
	(0.07)	(0.03)	(0.10)	(0.07)	(0.16)	(0.04)	(0.10)	(0.02)	(0.02)	(0.04)
Observations	9,353	9,353	9,353	9,353	9,353	9,353	9,353	9,353	9,353	9,353
8 Weeks	-0.41***	-0.08*	0.04	0.54***	0.37**	0.03	-0.46***	-0.06**	-0.10***	0.10**
	(0.08)	(0.04)	(0.11)	(0.07)	(0.18)	(0.04)	(0.11)	(0.03)	(0.03)	(0.05)
Observations	8,258	8,258	8,258	8,258	8,258	8,258	8,258	8,258	8,258	8,258
7 Weeks	-0.35***	-0.10**	0.10	0.58***	0.26	0.01	-0.51***	-0.06*	-0.10***	0.15**
	(0.09)	(0.05)	(0.12)	(0.09)	(0.20)	(0.05)	(0.12)	(0.03)	(0.03)	(0.05)
Observations	7,207	7,207	7,207	7,207	7,207	7,207	7,207	7,207	7,207	7,207
6 Weeks	-0.33***	-0.11**	0.06	0.57***	0.19	0.03	-0.48***	-0.07*	-0.08*	0.16**
	(0.11)	(0.05)	(0.14)	(0.09)	(0.23)	(0.05)	(0.14)	(0.04)	(0.04)	(0.06)
Observations	6,151	6,151	6,151	6,151	6,151	6,151	6,151	6,151	6,151	6,151
5 Weeks	-0.33**	-0.13*	0.20	0.47***	0.18	0.05	-0.48***	-0.08*	-0.10**	0.14*
	(0.13)	(0.06)	(0.16)	(0.11)	(0.25)	(0.06)	(0.16)	(0.04)	(0.04)	(0.07)
Observations	5,163	5,163	5,163	5,163	5,163	5,163	5,163	5,163	5,163	5,163
4 Weeks	-0.36**	-0.22***	0.35*	0.43***	0.23	0.08	-0.50**	-0.09*	-0.09*	0.08
	(0.14)	(0.07)	(0.18)	(0.13)	(0.31)	(0.07)	(0.18)	(0.05)	(0.05)	(0.08)
Observations	4,155	4,155	4,155	4,155	4,155	4,155	4,155	4,155	4,155	4,155
3 Weeks	-0.38**	-0.26***	0.36	0.38**	0.23	0.05	-0.43*	-0.05	-0.06	0.07
	(0.16)	(0.09)	(0.22)	(0.17)	(0.37)	(0.07)	(0.23)	(0.06)	(0.06)	(0.09)
Observations	3,150	3,150	3,150	3,150	3,150	3,150	3,150	3,150	3,150	3,150
2 Weeks	-0.23	-0.22	0.09	0.26	0.43	-0.01	-0.34	-0.03	-0.02	-0.01
	(0.22)	(0.14)	(0.31)	(0.21)	(0.50)	(0.11)	(0.32)	(0.09)	(0.09)	(0.13)
Observations	2,101	2,101	2,101	2,101	2,101	2,101	2,101	2,101	2,101	2,101

Notes: Each row uses a different bandwidth, measured in weeks. The sample is limited to women age 25-55 with at least one child age 6-17 in the household. This table considers weekdays only. It reports the results of regressions of an outcome on an indicator for being above the cutoff (for school start, this takes value 1 for weeks after the start of school; for summer start, it is reversed and takes value 1 for weeks before the start of summer), and a linear function of the running variable, days away from the Wednesday of the school start (or summer start). The regression also includes a number of controls. The school start and summer start periods are stacked together. Each coefficient corresponds to a different regression. The week of school start and summer start is excluded. "Y Mean" corresponds to the mean during the school year period. Standard error are clustered at the level at which the school start or summer start date was calculated. *** 0.01; ** 0.05; * 0.1.

Table A7: Baseline: Weekdays, RDD Bandwidth Sensitivity, Women Control

	Panel B: Women with No Children Age 3-17									
	Sleep	Self Care	Household	Caring	Work	Ed	Free Time	Eating	Exercise	Travel
9 Weeks	-0.12	-0.00	0.08	0.13*	-0.04	-0.04	0.06	-0.04	-0.03	0.02
	(0.09)	(0.04)	(0.10)	(0.08)	(0.19)	(0.05)	(0.13)	(0.03)	(0.02)	(0.06)
Observations	8,173	8,173	8,173	8,173	8,173	8,173	8,173	8,173	8,173	8,173
8 Weeks	-0.12	-0.02	0.04	0.13	0.00	-0.04	0.07	-0.04	-0.02	0.02
	(0.10)	(0.04)	(0.11)	(0.09)	(0.21)	(0.05)	(0.15)	(0.04)	(0.03)	(0.07)
Observations	7,275	7,275	7,275	7,275	7,275	7,275	7,275	7,275	7,275	7,275
7 Weeks	-0.12	-0.06	-0.01	0.18*	0.06	-0.07	0.03	-0.04	0.01	0.04
	(0.12)	(0.05)	(0.12)	(0.09)	(0.23)	(0.06)	(0.16)	(0.04)	(0.03)	(0.07)
Observations	6,338	6,338	6,338	6,338	6,338	6,338	6,338	6,338	6,338	6,338
6 Weeks	-0.18	-0.05	0.04	0.16	0.16	-0.13**	-0.06	0.00	0.00	0.08
	(0.13)	(0.06)	(0.14)	(0.11)	(0.28)	(0.06)	(0.19)	(0.05)	(0.03)	(0.08)
Observations	5,362	5,362	5,362	5,362	5,362	5,362	5,362	5,362	5,362	5,362
5 Weeks	-0.04	-0.11	0.10	0.12	-0.09	-0.09	0.09	-0.07	0.02	0.06
	(0.15)	(0.07)	(0.15)	(0.12)	(0.32)	(0.07)	(0.22)	(0.06)	(0.04)	(0.09)
Observations	4,439	4,439	4,439	4,439	4,439	4,439	4,439	4,439	4,439	4,439
4 Weeks	-0.02	-0.06	0.11	0.03	0.15	-0.06	-0.11	-0.09	0.00	0.07
	(0.18)	(0.08)	(0.18)	(0.15)	(0.37)	(0.08)	(0.25)	(0.07)	(0.05)	(0.12)
Observations	3,506	3,506	3,506	3,506	3,506	3,506	3,506	3,506	3,506	3,506
3 Weeks	-0.14	-0.04	0.15	0.13	-0.21	-0.05	0.21	-0.06	-0.06	0.07
	(0.24)	(0.10)	(0.23)	(0.17)	(0.45)	(0.10)	(0.32)	(0.08)	(0.05)	(0.17)
Observations	2,629	2,629	2,629	2,629	2,629	2,629	2,629	2,629	2,629	2,629
2 Weeks	-0.06	0.24*	0.47	0.09	-0.80	-0.21	0.30	-0.02	-0.08	0.07
	(0.33)	(0.13)	(0.31)	(0.26)	(0.66)	(0.14)	(0.42)	(0.11)	(0.07)	(0.20)
Observations	1,732	1,732	1,732	1,732	1,732	1,732	1,732	1,732	1,732	1,732

Notes: Each row uses a different bandwidth, measured in weeks. The sample is limited to women age 25-55 with no children age 3-17 in the household. This table considers weekdays only. It reports the results of regressions of an outcome on an indicator for being above the cutoff (for school start, this takes value 1 for weeks after the start of school; for summer start, it is reversed and takes value 1 for weeks before the start of summer), and a linear function of the running variable, days away from the Wednesday of the school start (or summer start). The regression also includes a number of controls. The school start and summer start periods are stacked together. Each coefficient corresponds to a different regression. The week of school start and summer start is excluded. "Y Mean" corresponds to the mean during the school year period. Standard error are clustered at the level at which the school start or summer start date was calculated. *** 0.01; ** 0.05; * 0.1.

Table A8: Baseline: Weekdays, RDD Bandwidth Sensitivity, Men

	Panel C: Men with At Least One Child Age 6-17									
	Sleep	Self Care	Household	Caring	Work	Ed	Free Time	Eating	Exercise	Travel
9 Weeks	-0.18**	-0.07*	0.05	0.16**	0.43**	0.01	-0.35***	-0.02	-0.08*	0.05
	(0.09)	(0.04)	(0.08)	(0.06)	(0.19)	(0.03)	(0.11)	(0.04)	(0.05)	(0.06)
Observations	6,847	6,847	6,847	6,847	6,847	6,847	6,847	6,847	6,847	6,847
8 Weeks	-0.20**	-0.07*	-0.00	0.15**	0.55**	0.02	-0.34**	-0.02	-0.10*	0.01
	(0.10)	(0.04)	(0.09)	(0.06)	(0.20)	(0.03)	(0.13)	(0.04)	(0.06)	(0.07)
Observations	6,056	6,056	6,056	6,056	6,056	6,056	6,056	6,056	6,056	6,056
7 Weeks	-0.20*	-0.07	-0.04	0.12	0.61**	0.02	-0.28*	-0.04	-0.12*	-0.02
	(0.11)	(0.05)	(0.12)	(0.07)	(0.25)	(0.04)	(0.15)	(0.05)	(0.07)	(0.08)
Observations	5,295	5,295	5,295	5,295	5,295	5,295	5,295	5,295	5,295	5,295
6 Weeks	-0.18	-0.08	-0.12	0.06	0.66**	0.05	-0.15	-0.06	-0.14*	-0.06
	(0.13)	(0.06)	(0.13)	(0.08)	(0.29)	(0.04)	(0.17)	(0.06)	(0.08)	(0.09)
Observations	4,524	4,524	4,524	4,524	4,524	4,524	4,524	4,524	4,524	4,524
5 Weeks	-0.12	-0.09	-0.09	0.01	0.56*	0.03	-0.20	-0.01	-0.08	-0.01
	(0.15)	(0.07)	(0.15)	(0.09)	(0.32)	(0.04)	(0.19)	(0.06)	(0.08)	(0.10)
Observations	3,764	3,764	3,764	3,764	3,764	3,764	3,764	3,764	3,764	3,764
4 Weeks	-0.07	-0.13*	0.05	0.13	0.47	-0.03	-0.25	0.00	-0.14	-0.01
	(0.16)	(0.07)	(0.16)	(0.11)	(0.35)	(0.04)	(0.23)	(0.07)	(0.09)	(0.11)
Observations	3,011	3,011	3,011	3,011	3,011	3,011	3,011	3,011	3,011	3,011
3 Weeks	-0.14	-0.10	0.28	0.17	0.61	-0.03	-0.47*	-0.04	-0.09	-0.12
	(0.20)	(0.09)	(0.18)	(0.14)	(0.44)	(0.05)	(0.28)	(0.08)	(0.12)	(0.14)
Observations	2,258	2,258	2,258	2,258	2,258	2,258	2,258	2,258	2,258	2,258
2 Weeks	-0.51*	-0.18	0.11	0.33*	0.87	-0.09	-0.06	-0.01	-0.18	-0.14
	(0.30)	(0.15)	(0.29)	(0.20)	(0.62)	(0.06)	(0.37)	(0.12)	(0.17)	(0.23)
Observations	1,476	1,476	1,476	1,476	1,476	1,476	1,476	1,476	1,476	1,476

Notes: Each row uses a different bandwidth, measured in weeks. The sample is limited to men age 25-55 with at least one child age 6-17 in the household. This table considers weekdays only. It reports the results of regressions of an outcome on an indicator for being above the cutoff (for school start, this takes value 1 for weeks after the start of school; for summer start, it is reversed and takes value 1 for weeks before the start of summer), and a linear function of the running variable, days away from the Wednesday of the school start (or summer start). The regression also includes a number of controls. The school start and summer start periods are stacked together. Each coefficient corresponds to a different regression. The week of school start and summer start is excluded. "Y Mean" corresponds to the mean during the school year period. Standard error are clustered at the level at which the school start or summer start date was calculated. *** 0.01; ** 0.05; * 0.1.

Table A9: Baseline: Weekdays, RDD Bandwidth Sensitivity, Kids

	Panel D: Children Age 15-17									
	Sleep	Self Care	Household	Caring	Work	Ed	Free Time	Eating	Exercise	Travel
9 Weeks	-1.35***	0.15***	-0.72***	-0.15***	-0.74***	5.59***	-2.03***	-0.07	-0.50***	-0.07
	(0.16)	(0.05)	(0.10)	(0.05)	(0.16)	(0.20)	(0.23)	(0.04)	(0.12)	(0.07)
Observations	2,673	2,673	2,673	2,673	2,673	2,673	2,673	2,673	2,673	2,673
8 Weeks	-1.33***	0.10*	-0.69***	-0.16***	-0.71***	5.41***	-1.88***	-0.08	-0.52***	-0.09
	(0.17)	(0.06)	(0.12)	(0.05)	(0.17)	(0.23)	(0.26)	(0.05)	(0.15)	(0.07)
Observations	2,354	2,354	2,354	2,354	2,354	2,354	2,354	2,354	2,354	2,354
7 Weeks	-1.31***	0.10	-0.63***	-0.16**	-0.73***	5.18***	-1.69***	-0.07	-0.58***	-0.08
	(0.20)	(0.06)	(0.15)	(0.07)	(0.21)	(0.26)	(0.30)	(0.06)	(0.15)	(0.10)
Observations	2,030	2,030	2,030	2,030	2,030	2,030	2,030	2,030	2,030	2,030
6 Weeks	-1.19***	0.05	-0.53***	-0.11	-0.70***	5.02***	-1.76***	-0.07	-0.58***	-0.13
	(0.23)	(0.07)	(0.17)	(0.08)	(0.25)	(0.29)	(0.35)	(0.07)	(0.18)	(0.11)
Observations	1,743	1,743	1,743	1,743	1,743	1,743	1,743	1,743	1,743	1,743
5 Weeks	-1.05***	0.03	-0.50**	-0.10	-0.77**	4.63***	-1.64***	-0.06	-0.45**	-0.07
	(0.27)	(0.08)	(0.19)	(0.09)	(0.28)	(0.33)	(0.38)	(0.07)	(0.21)	(0.13)
Observations	1,475	1,475	1,475	1,475	1,475	1,475	1,475	1,475	1,475	1,475
4 Weeks	-1.08***	-0.00	-0.52**	-0.14	-0.55	4.11***	-1.34***	-0.10	-0.53**	0.04
	(0.30)	(0.08)	(0.21)	(0.09)	(0.33)	(0.40)	(0.45)	(0.09)	(0.22)	(0.14)
Observations	1,176	1,176	1,176	1,176	1,176	1,176	1,176	1,176	1,176	1,176
3 Weeks	-0.84**	-0.05	-0.51**	-0.16	-0.73*	3.72***	-1.36**	-0.01	-0.51*	0.21
	(0.38)	(0.10)	(0.24)	(0.10)	(0.43)	(0.52)	(0.56)	(0.12)	(0.28)	(0.18)
Observations	899	899	899	899	899	899	899	899	899	899
2 Weeks	-0.77	-0.08	-0.36	-0.27*	-1.17*	3.35***	-0.60	-0.11	-0.58	0.14
	(0.55)	(0.13)	(0.32)	(0.14)	(0.59)	(0.73)	(0.72)	(0.15)	(0.39)	(0.24)
Observations	616	616	616	616	616	616	616	616	616	616

Notes: Each row uses a different bandwidth, measured in weeks. The sample is limited to children age 15-17. This table considers weekdays only. It reports the results of regressions of an outcome on an indicator for being above the cutoff (for school start, this takes value 1 for weeks after the start of school; for summer start, it is reversed and takes value 1 for weeks before the start of summer), and a linear function of the running variable, days away from the Wednesday of the school start (or summer start). The regression also includes a number of controls. The school start and summer start periods are stacked together. Each coefficient corresponds to a different regression. The week of school start and summer start is excluded. "Y Mean" corresponds to the mean during the school year period. Standard error are clustered at the level at which the school start or summer start date was calculated. *** 0.01; ** 0.05; * 0.1.

Table A10: Baseline: Weekdays, RDD Donut Hole Sensitivity, Women

	Sleep	Self Care	Household	Caring	Work	Ed	Free Time	Eating	Exercise	Travel
Panel A: Women with At Least One Child Age 6-17										
Exclude Week 0	-0.41***	-0.06*	0.06	0.58***	0.32*	0.05	-0.47***	-0.07***	-0.11***	0.09**
	(0.07)	(0.03)	(0.10)	(0.07)	(0.16)	(0.04)	(0.10)	(0.02)	(0.02)	(0.04)
Observations	9,353	9,353	9,353	9,353	9,353	9,353	9,353	9,353	9,353	9,353
Exclude Weeks 0-1	-0.44***	-0.00	-0.03	0.68***	0.36*	0.05	-0.50***	-0.08**	-0.12***	0.10*
	(0.09)	(0.04)	(0.14)	(0.09)	(0.21)	(0.05)	(0.13)	(0.03)	(0.03)	(0.05)
Observations	8,292	8,292	8,292	8,292	8,292	8,292	8,292	8,292	8,292	8,292
Exclude Weeks 0-2	-0.43***	0.09	-0.20	0.71***	0.53*	0.03	-0.51***	-0.05	-0.13***	0.03
	(0.14)	(0.06)	(0.17)	(0.12)	(0.29)	(0.06)	(0.17)	(0.04)	(0.04)	(0.08)
Observations	7,252	7,252	7,252	7,252	7,252	7,252	7,252	7,252	7,252	7,252

Notes: Each row excludes a different bandwidth, measured in weeks. The sample is limited to women age 25-55 with at least one child age 6-17 in the household. This table considers weekdays only. It reports the results of regressions of an outcome on an indicator for being above the cutoff (for school start, this takes value 1 for weeks after the start of school; for summer start, it is reversed and takes value 1 for weeks before the start of summer), and a linear function of the running variable, days away from the Wednesday of the school start (or summer start). The regression also includes a number of controls. The school start and summer start periods are stacked together. Each coefficient corresponds to a different regression. The week of school start and summer start is excluded. "Y Mean" corresponds to the mean during the school year period. Standard error are clustered at the level at which the school start or summer start date was calculated. *** 0.01; ** 0.05; * 0.1.

Table A11: Baseline: Weekdays, RDD Donut Hole Sensitivity, Women Control

	Panel B: Women with No Children Age 3-17									
	Sleep	Self Care	Household	Caring	Work	Ed	Free Time	Eating	Exercise	Travel
Exclude Week 0	-0.12	-0.00	0.08	0.13*	-0.04	-0.04	0.06	-0.04	-0.03	0.02
	(0.09)	(0.04)	(0.10)	(0.08)	(0.19)	(0.05)	(0.13)	(0.03)	(0.02)	(0.06)
Observations	8,173	8,173	8,173	8,173	8,173	8,173	8,173	8,173	8,173	8,173
Exclude Weeks 0-1	-0.11	-0.02	0.02	0.16*	0.07	0.00	-0.00	-0.04	-0.04	-0.01
	(0.11)	(0.05)	(0.12)	(0.09)	(0.22)	(0.06)	(0.15)	(0.04)	(0.03)	(0.07)
Observations	7,305	7,305	7,305	7,305	7,305	7,305	7,305	7,305	7,305	7,305
Exclude Weeks 0-2	-0.09	0.14**	0.11	0.17	-0.22	-0.02	0.09	-0.03	-0.06	-0.05
	(0.15)	(0.07)	(0.17)	(0.12)	(0.30)	(0.07)	(0.22)	(0.06)	(0.04)	(0.10)
Observations	6,441	6,441	6,441	6,441	6,441	6,441	6,441	6,441	6,441	6,441

Notes: Each row excludes a different bandwidth, measured in weeks. The sample is limited to women age 25-55 with no children age 3-17 in the household. This table considers weekdays only. It reports the results of regressions of an outcome on an indicator for being above the cutoff (for school start, this takes value 1 for weeks after the start of school; for summer start, it is reversed and takes value 1 for weeks before the start of summer), and a linear function of the running variable, days away from the Wednesday of the school start (or summer start). The regression also includes a number of controls. The school start and summer start periods are stacked together. Each coefficient corresponds to a different regression. The week of school start and summer start is excluded. "Y Mean" corresponds to the mean during the school year period. Standard error are clustered at the level at which the school start or summer start date was calculated. *** 0.01; ** 0.05; * 0.1.

Table A12: Baseline: Weekdays, RDD Donut Hole Sensitivity, Men

	Panel C: Men with At Least One Child Age 6-17									
	Sleep	Self Care	Household	Caring	Work	Ed	Free Time	Eating	Exercise	Travel
Exclude Week 0	-0.18**	-0.07*	0.05	0.16**	0.43**	0.01	-0.35***	-0.02	-0.08*	0.05
	(0.09)	(0.04)	(0.08)	(0.06)	(0.19)	(0.03)	(0.11)	(0.04)	(0.05)	(0.06)
Observations	6,847	6,847	6,847	6,847	6,847	6,847	6,847	6,847	6,847	6,847
Exclude Weeks 0-1	-0.16	-0.04	0.00	0.17**	0.38	0.04	-0.41***	-0.03	-0.05	0.10
	(0.11)	(0.05)	(0.10)	(0.08)	(0.24)	(0.04)	(0.13)	(0.04)	(0.05)	(0.08)
Observations	6,137	6,137	6,137	6,137	6,137	6,137	6,137	6,137	6,137	6,137
Exclude Weeks 0-2	-0.32**	-0.06	0.05	0.25**	0.35	-0.00	-0.26	-0.03	-0.06	0.12
	(0.14)	(0.06)	(0.13)	(0.10)	(0.31)	(0.05)	(0.18)	(0.05)	(0.06)	(0.09)
Observations	5,371	5,371	5,371	5,371	5,371	5,371	5,371	5,371	5,371	5,371

Notes: Each row excludes a different bandwidth, measured in weeks. The sample is limited to men age 25-55 with at least one child age 6-17 in the household. This table considers weekdays only. It reports the results of regressions of an outcome on an indicator for being above the cutoff (for school start, this takes value 1 for weeks after the start of school; for summer start, it is reversed and takes value 1 for weeks before the start of summer), and a linear function of the running variable, days away from the Wednesday of the school start (or summer start). The regression also includes a number of controls. The school start and summer start periods are stacked together. Each coefficient corresponds to a different regression. The week of school start and summer start is excluded. "Y Mean" corresponds to the mean during the school year period. Standard error are clustered at the level at which the school start or summer start date was calculated. *** 0.01; ** 0.05; * 0.1.

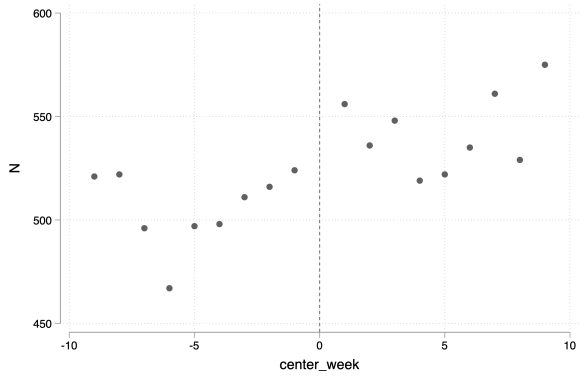
Table A13: Baseline: Weekdays, RDD Donut Hole Sensitivity, Kids

	Panel D: Children Age 15-17									
	Sleep	Self Care	Household	Caring	Work	Ed	Free Time	Eating	Exercise	Travel
Exclude Week 0	-1.35***	0.15***	-0.72***	-0.15***	-0.74***	5.59***	-2.03***	-0.07	-0.50***	-0.07
	(0.16)	(0.05)	(0.10)	(0.05)	(0.16)	(0.20)	(0.23)	(0.04)	(0.12)	(0.07)
Observations	2,673	2,673	2,673	2,673	2,673	2,673	2,673	2,673	2,673	2,673
Exclude Weeks 0-1	-1.56***	0.21***	-0.85***	-0.15**	-0.68***	6.51***	-2.48***	-0.06	-0.52***	-0.18*
	(0.22)	(0.07)	(0.11)	(0.07)	(0.21)	(0.25)	(0.26)	(0.05)	(0.14)	(0.10)
Observations	2,342	2,342	2,342	2,342	2,342	2,342	2,342	2,342	2,342	2,342
Exclude Weeks 0-2	-1.61***	0.25**	-0.96***	-0.21**	-0.83**	6.89***	-2.48***	-0.11	-0.57**	-0.15
	(0.29)	(0.09)	(0.15)	(0.09)	(0.30)	(0.32)	(0.36)	(0.08)	(0.20)	(0.14)
Observations	2,057	2,057	2,057	2,057	2,057	2,057	2,057	2,057	2,057	2,057

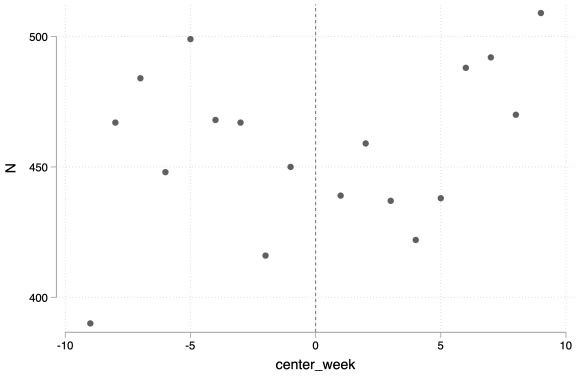
Notes: Each row excludes a different bandwidth, measured in weeks. The sample is limited to children age 15-17. This table considers weekdays only. It reports the results of regressions of an outcome on an indicator for being above the cutoff (for school start, this takes value 1 for weeks after the start of school; for summer start, it is reversed and takes value 1 for weeks before the start of summer), and a linear function of the running variable, days away from the Wednesday of the school start (or summer start). The regression also includes a number of controls. The school start and summer start periods are stacked together. Each coefficient corresponds to a different regression. The week of school start and summer start is excluded. "Y Mean" corresponds to the mean during the school year period. Standard error are clustered at the level at which the school start or summer start date was calculated. *** 0.01; ** 0.05; * 0.1.

B Appendix Figures

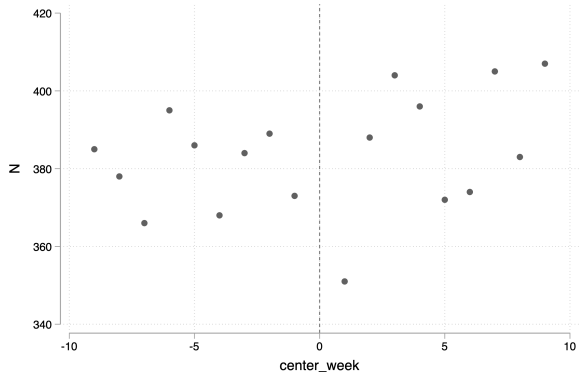
Figure A1: Density Plots



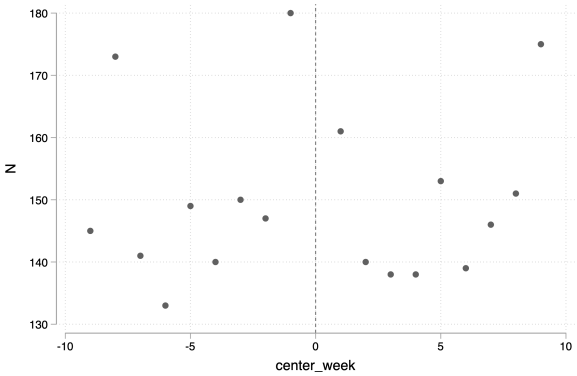
(a) Women with At Least One Child Age 6-17



(b) Women with No Children Age 3-17



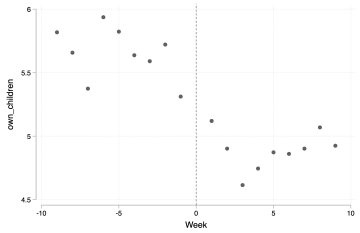
(c) Men with At Least One Child Age 6-17



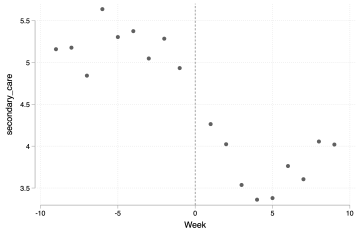
(d) Children Age 15-17

Notes: These graphs show the number of observations, binned at the weekly level. All observations are for weekdays. Panels a, b, c, and d are The Women with At Least One Child Age 6-17 sample, the Women with No Children Age 3-17 sample, the Men with At Least One Child Age 6-17 sample, and the Children Age 15-17 sample, respectively. The week of school start/summer start is omitted and is indicated with the dashed vertical line.

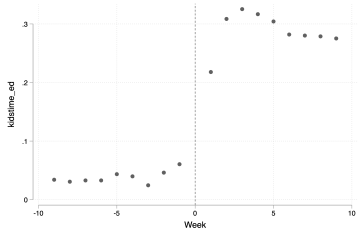
Figure A2: Women and Men, Time with Children, Weekdays



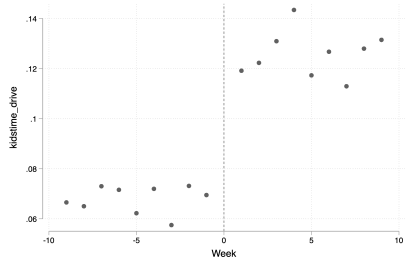
(a) Women, Time in Presence of Own Children



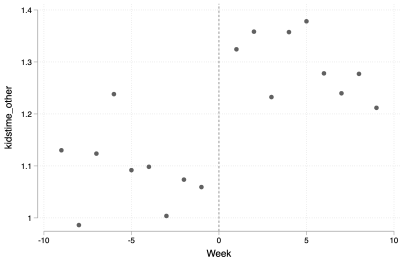
(b) Women, Secondary Childcare



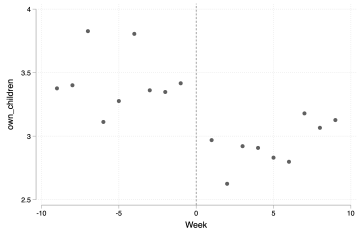
(c) Women, Education w/ HH Children



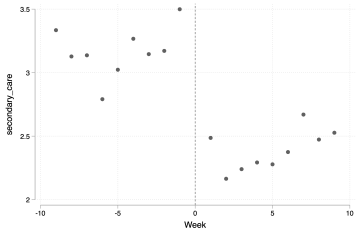
(d) Women, Driving Children



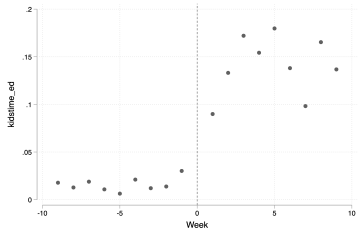
(e) Women, Other Time w/ Children



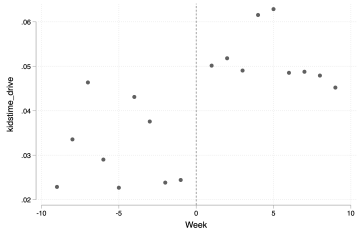
(f) Men, Time in Presence of Own Children



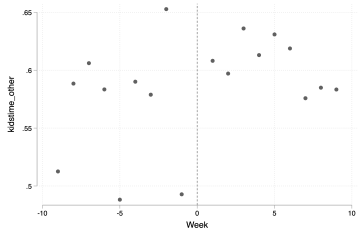
(g) Men, Secondary Childcare



(h) Men, Education w/ HH Children



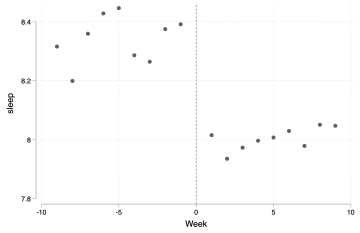
(i) Men, Driving Children



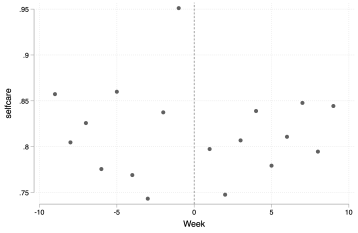
(j) Men, Other Time w/ Children

Notes: These graphs are for weekdays for the Women with At Least One Child Age 6-17 sample (panels a-e) and or the Men with At Least One Child Age 6-17 sample (panels f-j). Each graph is a different outcome. The data is the stacked version. Daily observations are binned at the weekly level. The week of school start/summer start is omitted and is indicated with the dashed vertical line.

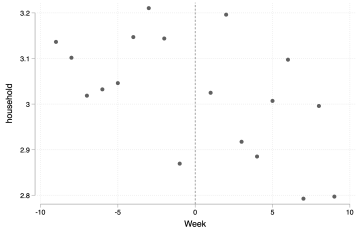
Figure A3: Women with At Least One Child Age 6-17, Weekdays



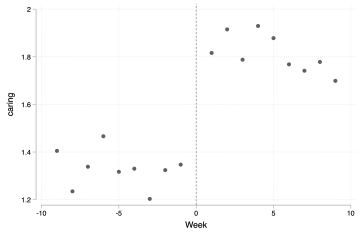
(a) Sleep



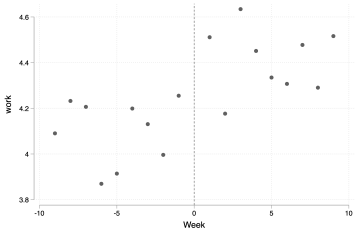
(b) Self-care



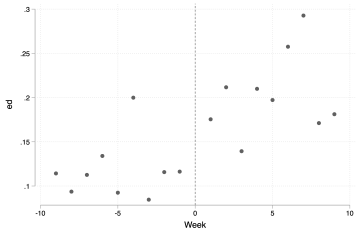
(c) Household



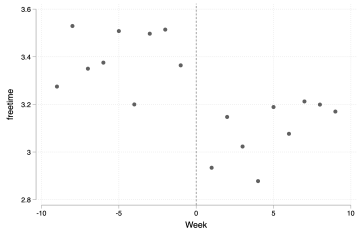
(d) Caring for Others



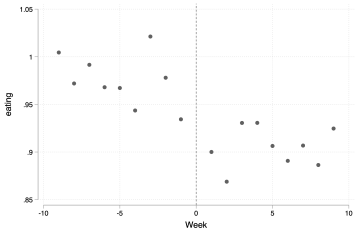
(e) Work



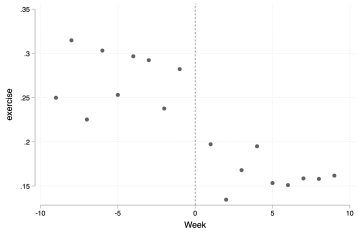
(f) Education



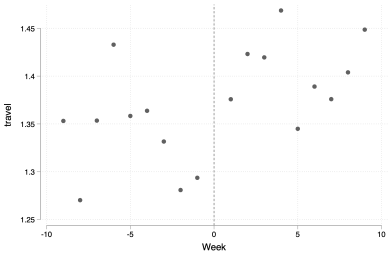
(g) Free Time



(h) Eating



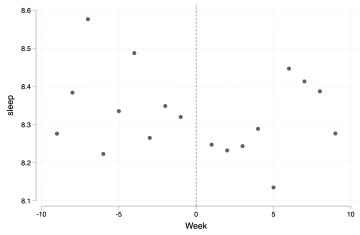
(i) Exercise



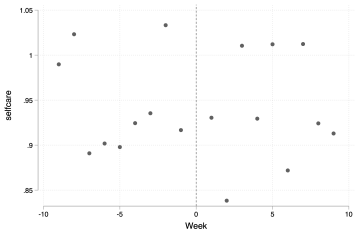
(j) Travel

Notes: These graphs are for weekdays for the Women with At Least One Child Age 6-17 sample. Each graph is a different outcome. The data is the stacked version. Daily observations are binned at the weekly level. The week of school start/summer start is omitted and is indicated with the dashed vertical line.

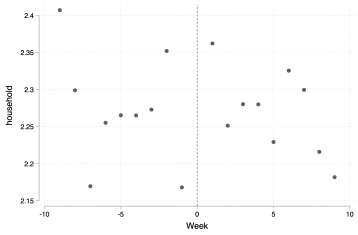
Figure A4: Women with No Children Age 3-17, Weekdays



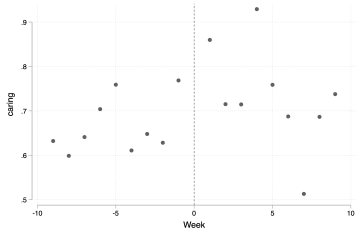
(a) Sleep



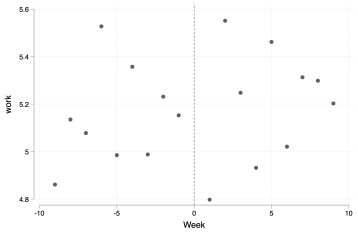
(b) Self-care



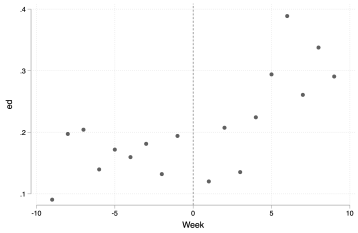
(c) Household



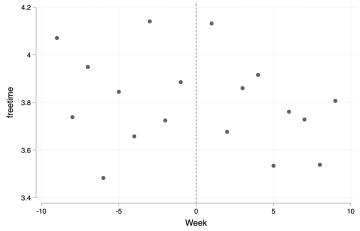
(d) Caring for Others



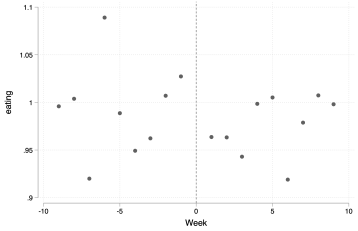
(e) Work



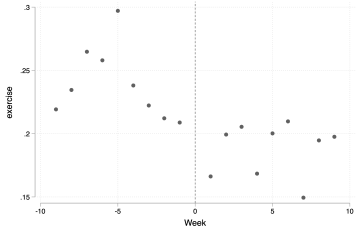
(f) Education



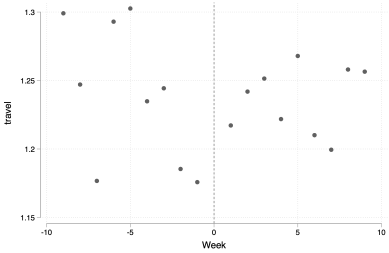
(g) Free Time



(h) Eating



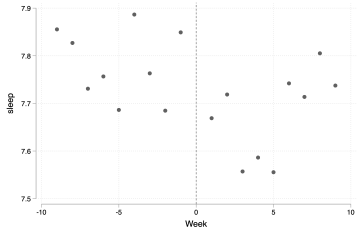
(i) Exercise



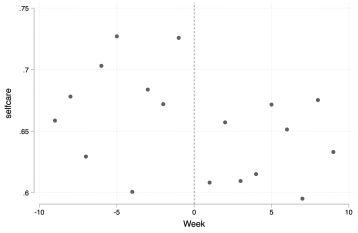
(j) Travel

Notes: These graphs are for weekdays for the Women with No Child Age 3-17 sample. Each graph is a different outcome. The data is the stacked version. Daily observations are binned at the weekly level. The week of school start/summer start is omitted and is indicated with the dashed vertical line.

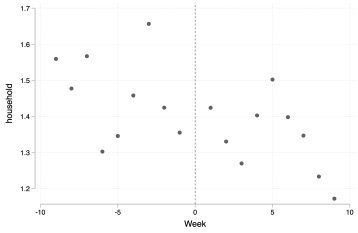
Figure A5: Men with At Least One Child Age 6-17, Weekdays



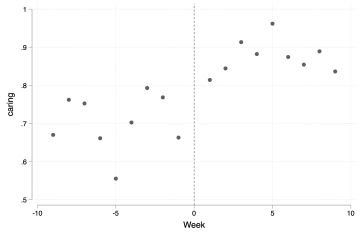
(a) Sleep



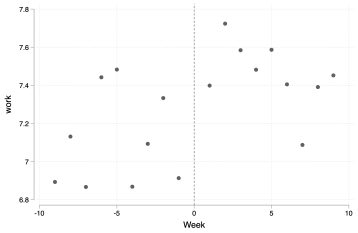
(b) Self-care



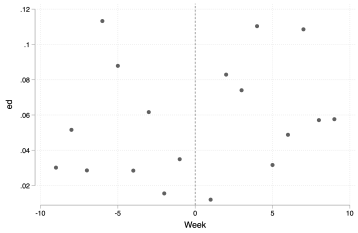
(c) Household



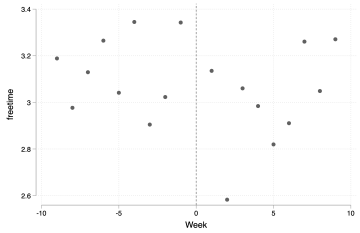
(d) Caring for Others



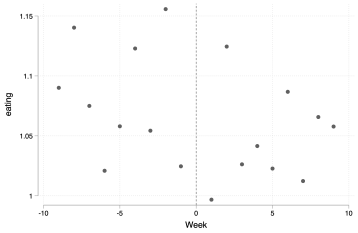
(e) Work



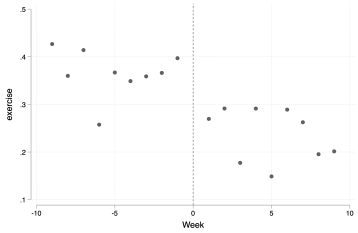
(f) Education



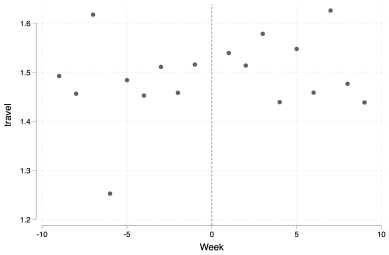
(g) Free Time



(h) Eating



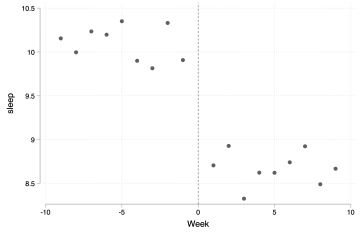
(i) Exercise



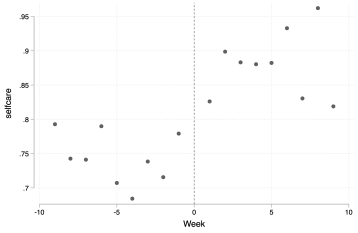
(j) Travel

Notes: These graphs are for weekdays for the Men with At Least One Child Age 6-17 sample. Each graph is a different outcome. The data is the stacked version. Daily observations are binned at the weekly level. The week of school start/summer start is omitted and is indicated with the dashed vertical line.

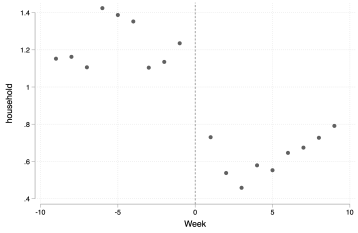
Figure A6: Children Age 15-17, Weekdays



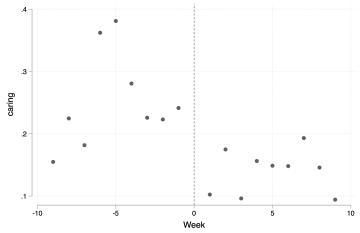
(a) Sleep



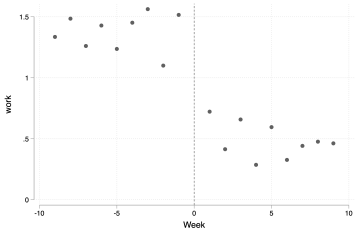
(b) Self-care



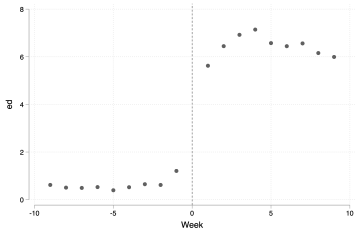
(c) Household



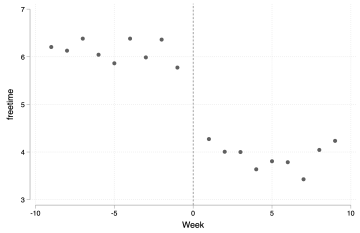
(d) Caring for Others



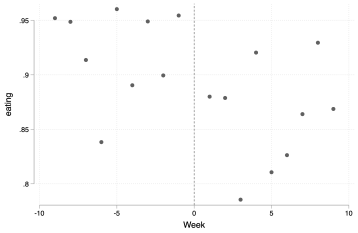
(e) Work



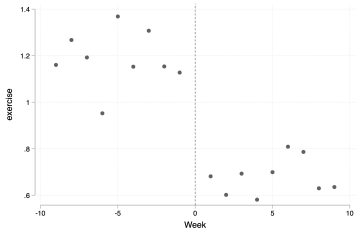
(f) Education



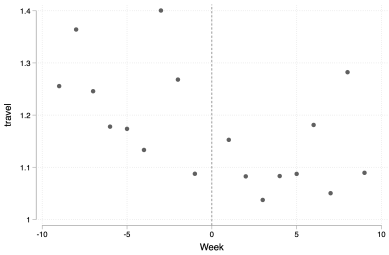
(g) Free Time



(h) Eating



(i) Exercise



(j) Travel

Notes: These graphs are for weekdays for the Children Age 15-17 sample. Each graph is a different outcome. The data is the stacked version. Daily observations are binned at the weekly level. The week of school start/summer start is omitted and is indicated with the dashed vertical line.

Data Appendix: Time Use Categorization

Here we detail how we created the ten broad categories of time use. The ten categories are mutually exclusive and nearly comprehensive (meaning that they overall nearly add up to 24 hours). The exception is that there is an "other" category that includes situations such as coding errors. We do not include "other" in the paper. All of the below come from the "Summary" file, which totals the amount spent for each of the individual categories. We report both the variable name and label.

1) Sleep:
t010101 Sleeping
t010102 Sleeplessness
t010199 Sleeping, n.e.c.* [Here and elsewhere, "n.e.c." means not elsewhere classified.]

2) Self Care
t010201 Washing, dressing and grooming oneself
t010299 Grooming, n.e.c.*
t010301 Health-related self care
t010399 Self care, n.e.c.*
t010401 Personal/Private activities
t010499 Personal activities, n.e.c.*
t010501 Personal emergencies
t010599 Personal care emergencies, n.e.c.*
t019999 Personal care, n.e.c.*

3) Household Tasks, Shopping, and Civic
t020101 Interior cleaning
t020102 Laundry
t020103 Sewing, repairing, & maintaining textiles
t020104 Storing interior hh items, inc. food
t020199 Housework, n.e.c.*
t020201 Food and drink preparation
t020202 Food presentation
t020203 Kitchen and food clean-up
t020299 Food & drink prep, presentation, & clean-up, n.e.c.*
t020301 Interior arrangement, decoration, & repairs
t020302 Building and repairing furniture
t020303 Heating and cooling
t020399 Interior maintenance, repair, & decoration, n.e.c.*
t020401 Exterior cleaning
t020402 Exterior repair, improvements, & decoration
t020499 Exterior maintenance, repair & decoration, n.e.c.*
t020501 Lawn, garden, and houseplant care
t020502 Ponds, pools, and hot tubs
t020599 Lawn and garden, n.e.c.*
t020681 Care for animals and pets (not veterinary care)
t020699 Pet and animal care, n.e.c.*
t020701 Vehicle repair and maintenance (by self)

t020799 Vehicles, n.e.c.*
t020801 Appliance, tool, and toy set-up, repair, & maintenance (by self)
t020899 Appliances and tools, n.e.c.*
t020901 Financial management
t020902 Household & personal organization and planning
t020903 HH & personal mail & messages (except e-mail)
t020904 HH & personal e-mail and messages
t020905 Home security
t020999 Household management, n.e.c.*
t029999 Household activities, n.e.c.*
t070101 Grocery shopping
t070102 Purchasing gas
t070103 Purchasing food (not groceries)
t070104 Shopping, except groceries, food and gas
t070105 Waiting associated with shopping
t070199 Shopping, n.e.c.*
t070201 Comparison shopping
t070299 Researching purchases, n.e.c.*
t070301 Security procedures rel. to consumer purchases
t070399 Security procedures rel. to consumer purchases, n.e.c.*
t079999 Consumer purchases, n.e.c.*
t080101 Using paid childcare services
t080102 Waiting associated w/purchasing childcare svcs
t080199 Using paid childcare services, n.e.c.*
t080201 Banking
t080202 Using other financial services
t080203 Waiting associated w/banking/financial services
t080299 Using financial services and banking, n.e.c.*
t080301 Using legal services
t080302 Waiting associated with legal services
t080399 Using legal services, n.e.c.*
t080401 Using health and care services outside the home
t080402 Using in-home health and care services
t080403 Waiting associated with medical services
t080499 Using medical services, n.e.c.*
t080501 Using personal care services
t080502 Waiting associated w/personal care services
t080599 Using personal care services, n.e.c.*
t080601 Activities rel. to purchasing/selling real estate
t080602 Waiting associated w/purchasing/selling real estate
t080699 Using real estate services, n.e.c.*
t080701 Using veterinary services
t080702 Waiting associated with veterinary services
t080799 Using veterinary services, n.e.c.*
t080801 Security procedures rel. to professional/personal svcs.
t080899 Security procedures rel. to professional/personal svcs n.e.c.*
t089999 Professional and personal services, n.e.c.*
t090101 Using interior cleaning services
t090102 Using meal preparation services
t090103 Using clothing repair and cleaning services
t090104 Waiting associated with using household services
t090199 Using household services, n.e.c.*
t090201 Using home maint/repair/decor/construction svcs
t090202 Waiting associated w/ home main/repair/decor/constr
t090299 Using home maint/repair/decor/constr services, n.e.c.*
t090301 Using pet services

t090302 Waiting associated with pet services
t090399 Using pet services, n.e.c.*
t090401 Using lawn and garden services
t090402 Waiting associated with using lawn & garden services
t090499 Using lawn and garden services, n.e.c.*
t090501 Using vehicle maintenance or repair services
t090502 Waiting associated with vehicle main. or repair svcs
t090599 Using vehicle maint. & repair svcs, n.e.c.*
t099999 Using household services, n.e.c.*
t100101 Using police and fire services
t100102 Using social services
t100103 Obtaining licenses & paying fines, fees, taxes
t100199 Using government services, n.e.c.*
t100201 Civic obligations & participation
t100299 Civic obligations & participation, n.e.c.*
t100381 Waiting associated w/ using government services
t100383 Waiting associated w/civic obligations & participation
t100399 Waiting assoc. w/govt svcs or civic obligations, n.e.c.*
t100401 Security procedures rel. to govt svcs/civic obligations
t100499 Security procedures rel. to govt svcs/civic obligations, n.e.c.*
t109999 Government services, n.e.c.*

4) Caring for others
t030101 Physical care for hh children
t030102 Reading to/with hh children
t030103 Playing with hh children, not sports
t030104 Arts and crafts with hh children
t030105 Playing sports with hh children
t030108 Organization & planning for hh children
t030109 Looking after hh children (as a primary activity)
t030110 Attending hh children's events
t030111 Waiting for/with hh children
t030112 Picking up/dropping off hh children
t030186 Talking with/listening to hh children
t030199 Caring for & helping hh children, n.e.c.*
t030201 Homework (hh children)
t030202 Meetings and school conferences (hh children)
t030203 Home schooling of hh children
t030204 Waiting associated with hh children's education
t030299 Activities related to hh child's education, n.e.c.*
t030301 Providing medical care to hh children
t030302 Obtaining medical care for hh children
t030303 Waiting associated with hh children's health
t030399 Activities related to hh child's health, n.e.c.*
t030401 Physical care for hh adults
t030402 Looking after hh adult (as a primary activity)
t030403 Providing medical care to hh adult
t030404 Obtaining medical and care services for hh adult
t030405 Waiting associated with caring for household adults
t030499 Caring for household adults, n.e.c.*
t030501 Helping hh adults
t030502 Organization & planning for hh adults
t030503 Picking up/dropping off hh adult
t030504 Waiting associated with helping hh adults
t030599 Helping household adults, n.e.c.*
t039999 Caring for & helping hh members, n.e.c.*

t040101 Physical care for nonhh children
t040102 Reading to/with nonhh children
t040103 Playing with nonhh children, not sports
t040104 Arts and crafts with nonhh children
t040105 Playing sports with nonhh children
t040108 Organization & planning for nonhh children
t040109 Looking after nonhh children (as primary activity)
t040110 Attending nonhh children's events
t040111 Waiting for/with nonhh children
t040112 Dropping off/picking up nonhh children
t040186 Talking with/listening to nonhh children
t040199 Caring for and helping nonhh children, n.e.c.*
t040201 Homework (nonhh children)
t040202 Meetings and school conferences (nonhh children)
t040203 Home schooling of nonhh children
t040204 Waiting associated with nonhh children's education
t040299 Activities related to nonhh child's educ., n.e.c.*
t040301 Providing medical care to nonhh children
t040302 Obtaining medical care for nonhh children
t040303 Waiting associated with nonhh children's health
t040399 Activities related to nonhh child's health, n.e.c.*
t040401 Physical care for nonhh adults
t040402 Looking after nonhh adult (as a primary activity)
t040403 Providing medical care to nonhh adult
t040404 Obtaining medical and care services for nonhh adult
t040405 Waiting associated with caring for nonhh adults
t040499 Caring for nonhh adults, n.e.c.*
t040501 Housework, cooking, & shopping assistance for nonhh adults
t040502 House & lawn maintenance & repair assistance for nonhh adults
t040503 Animal & pet care assistance for nonhh adults
t040504 Vehicle & appliance maintenance/repair assistance for nonhh adults
t040505 Financial management assistance for nonhh adults
t040506 Household management & paperwork assistance for nonhh adults
t040507 Picking up/dropping off nonhh adult
t040508 Waiting associated with helping nonhh adults
t040599 Helping nonhh adults, n.e.c.*
t049999 Caring for & helping nonhh members, n.e.c.*

5) Work
t050101 Work, main job
t050102 Work, other job(s)
t050103 Security procedures related to work
t050189 Working, n.e.c.*
t050201 Socializing, relaxing, and leisure as part of job
t050202 Eating and drinking as part of job
t050203 Sports and exercise as part of job
t050204 Security procedures as part of job
t050289 Work-related activities, n.e.c.*
t050301 Income-generating hobbies, crafts, and food
t050302 Income-generating performances
t050303 Income-generating services
t050304 Income-generating rental property activities
t050389 Other income-generating activities, n.e.c.*
t050403 Job interviewing
t050404 Waiting associated with job search or interview
t050405 Security procedures rel. to job search/interviewing

t050481 Job search activities
t050499 Job search and Interviewing, n.e.c.*
t059999 Work and work-related activities, n.e.c.*

6) Education
t060101 Taking class for degree, certification, or licensure
t060102 Taking class for personal interest
t060103 Waiting associated with taking classes
t060104 Security procedures rel. to taking classes
t060199 Taking class, n.e.c.*
t060201 Extracurricular club activities
t060202 Extracurricular music & performance activities
t060203 Extracurricular student government activities
t060289 Education-related extracurricular activities, n.e.c.*
t060301 Research/homework for class for degree, certification, or licensure
t060302 Research/homework for class for pers. interest
t060303 Waiting associated with research/homework
t060399 Research/homework n.e.c.*
t060401 Administrative activities: class for degree, certification, or licensure
t060402 Administrative activities: class for personal interest
t060403 Waiting associated w/admin. activities (education)
t060499 Administrative for education, n.e.c.*
t069999 Education, n.e.c.*

7) Free time
t120101 Socializing and communicating with others
t120199 Socializing and communicating, n.e.c.*
t120201 Attending or hosting parties/receptions/ceremonies
t120202 Attending meetings for personal interest (not volunteering)
t120299 Attending/hosting social events, n.e.c.*
t120301 Relaxing, thinking
t120302 Tobacco and drug use
t120303 Television and movies (not religious)
t120304 Television (religious)
t120305 Listening to the radio
t120306 Listening to/playing music (not radio)
t120307 Playing games
t120308 Computer use for leisure (exc. Games)
t120309 Arts and crafts as a hobby
t120310 Collecting as a hobby
t120311 Hobbies, except arts & crafts and collecting
t120312 Reading for personal interest
t120313 Writing for personal interest
t120399 Relaxing and leisure, n.e.c.*
t120401 Attending performing arts
t120402 Attending museums
t120403 Attending movies/film
t120404 Attending gambling establishments
t120405 Security procedures rel. to arts & entertainment
t120499 Arts and entertainment, n.e.c.*
t120501 Waiting assoc. w/socializing & communicating
t120502 Waiting assoc. w/attending/hosting social events
t120503 Waiting associated with relaxing/leisure
t120504 Waiting associated with arts & entertainment
t120599 Waiting associated with socializing, n.e.c.*
t129999 Socializing, relaxing, and leisure, n.e.c.*

t130201 Watching aerobics
t130202 Watching baseball
t130203 Watching basketball
t130204 Watching biking
t130205 Watching billiards
t130206 Watching boating
t130207 Watching bowling
t130208 Watching climbing, spelunking, caving
t130209 Watching dancing
t130210 Watching equestrian sports
t130211 Watching fencing
t130212 Watching fishing
t130213 Watching football
t130214 Watching golfing
t130215 Watching gymnastics
t130216 Watching hockey
t130217 Watching martial arts
t130218 Watching racquet sports
t130219 Watching rodeo competitions
t130220 Watching rollerblading
t130221 Watching rugby
t130222 Watching running
t130223 Watching skiing, ice skating, snowboarding
t130224 Watching soccer
t130225 Watching softball
t130226 Watching vehicle touring/racing
t130227 Watching volleyball
t130228 Watching walking
t130229 Watching water sports
t130230 Watching weightlifting/strength training
t130231 Watching people working out, unspecified
t130232 Watching wrestling
t130299 Attending sporting events, n.e.c.*
t130302 Waiting related to attending sporting events
t130402 Security related to attending sporting events
t140101 Attending religious services
t140102 Participation in religious practices
t140103 Waiting associated w/religious & spiritual activities
t140104 Security procedures rel. to religious & spiritual activities
t140105 Religious education activities
t149999 Religious and spiritual activities, n.e.c.*
t150101 Computer use
t150102 Organizing and preparing
t150103 Reading
t150104 Telephone calls (except hotline counseling)
t150105 Writing
t150106 Fundraising
t150199 Administrative & support activities, n.e.c.*
t150201 Food preparation, presentation, clean-up
t150202 Collecting & delivering clothing & other goods
t150203 Providing care
t150204 Teaching, leading, counseling, mentoring
t150299 Social service & care activities, n.e.c.*
t150301 Building houses, wildlife sites, & other structures
t150302 Indoor & outdoor maintenance, repair, & clean-up
t150399 Indoor & outdoor maintenance, building & clean-up activities, n.e.c.*

t150401 Performing
t150402 Serving at volunteer events & cultural activities
t150499 Participating in performance & cultural activities, n.e.c.*
t150501 Attending meetings, conferences, & training
t150599 Attending meetings, conferences, & training, n.e.c.*
t150601 Public health activities
t150602 Public safety activities
t150699 Public health & safety activities, n.e.c.*
t159989 Volunteer activities, n.e.c.*
t160101 Telephone calls to/from family members
t160102 Telephone calls to/from friends, neighbors, or acquaintances
t160103 Telephone calls to/from education services providers
t160104 Telephone calls to/from salespeople
t160105 Telephone calls to/from professional or personal care svcs providers
t160106 Telephone calls to/from household services providers
t160107 Telephone calls to/from paid child or adult care providers
t160108 Telephone calls to/from government officials
t169989 Telephone calls, n.e.c.*

8) Eating
t110101 Eating and drinking
t110199 Eating and drinking, n.e.c.*
t110281 Waiting associated w/eating & drinking
t110289 Waiting associated with eating & drinking, n.e.c.*
t119999 Eating and drinking, n.e.c.*

9) Exercise
t130101 Doing aerobics
t130102 Playing baseball
t130103 Playing basketball
t130104 Biking
t130105 Playing billiards
t130106 Boating
t130107 Bowling
t130108 Climbing, spelunking, caving
t130109 Dancing
t130110 Participating in equestrian sports
t130111 Fencing
t130112 Fishing
t130113 Playing football
t130114 Golfing
t130115 Doing gymnastics
t130116 Hiking
t130117 Playing hockey
t130118 Hunting
t130119 Participating in martial arts
t130120 Playing racquet sports
t130121 Participating in rodeo competitions
t130122 Rollerblading
t130123 Playing rugby
t130124 Running
t130125 Skiing, ice skating, snowboarding
t130126 Playing soccer
t130127 Softball
t130128 Using cardiovascular equipment
t130129 Vehicle touring/racing

t130130 Playing volleyball
t130131 Walking
t130132 Participating in water sports
t130133 Weightlifting/strength training
t130134 Working out, unspecified
t130135 Wrestling
t130136 Doing yoga
t130199 Playing sports n.e.c.*
t130301 Waiting related to playing sports or exercising
t130399 Waiting associated with sports, exercise, & recreation, n.e.c.*
t130401 Security related to playing sports or exercising
t130499 Security related to sports, exercise, & recreation, n.e.c.*
t139999 Sports, exercise, & recreation, n.e.c.*

10) Travel

t180101 Travel related to personal care
t180199 Travel related to personal care, n.e.c.*
t180280 Travel related to household activities
t180381 Travel related to caring for and helping hh children
t180382 Travel related to caring for and helping hh adults
t180399 Travel rel. to caring for & helping hh members, n.e.c.*
t180481 Travel related to caring for and helping nonhh children
t180482 Travel related to caring for and helping nonhh adults
t180499 Travel rel. to caring for & helping nonhh members, n.e.c.*
t180501 Travel related to working
t180502 Travel related to work-related activities
t180589 Travel related to work, n.e.c.*
t180601 Travel related to taking class
t180682 Travel related to education (except taking class)
t180699 Travel related to education, n.e.c.*
t180701 Travel related to grocery shopping
t180782 Travel related to shopping (except grocery shopping)
t180801 Travel related to using childcare services
t180802 Travel related to using financial services and banking
t180803 Travel related to using legal services
t180804 Travel related to using medical services
t180805 Travel related to using personal care services
t180806 Travel related to using real estate services
t180807 Travel related to using veterinary services
t180899 Travel rel. to using prof. & personal care services, n.e.c.*
t180901 Travel related to using household services
t180902 Travel related to using home main./repair/decor./construction svcs
t180903 Travel related to using pet services (not vet)
t180904 Travel related to using lawn and garden services
t180905 Travel related to using vehicle maintenance & repair services
t180999 Travel related to using household services, n.e.c.*
t181002 Travel related to civic obligations & participation
t181081 Travel related to using government services
t181099 Travel rel. to govt svcs & civic obligations, n.e.c.*
t181101 Travel related to eating and drinking
t181199 Travel related to eating and drinking, n.e.c.*
t181201 Travel related to socializing and communicating
t181202 Travel related to attending or hosting social events
t181204 Travel related to arts and entertainment
t181283 Travel related to relaxing and leisure
t181299 Travel rel. to socializing, relaxing, & leisure, n.e.c.*

t181301 Travel related to participating in sports/exercise/recreation
t181302 Travel related to attending sporting/recreational events
t181399 Travel related to sports, exercise, & recreation, n.e.c.*
t181401 Travel related to religious/spiritual practices
t181499 Travel rel. to religious/spiritual activities, n.e.c.*
t181501 Travel related to volunteering
t181599 Travel related to volunteer activities, n.e.c.*
t181601 Travel related to phone calls
t181699 Travel rel. to phone calls, n.e.c.*
t181801 Security procedures related to traveling
t181899 Security procedures related to traveling, n.e.c.*
t189999 Traveling, n.e.c.*

11) Other
t500101 Insufficient detail in verbatim
t500103 Missing travel or destination
t500104 Recorded simultaneous activities incorrectly
t500105 Respondent refused to provide information/none of your business
t500106 Gap/can't remember
t500107 Unable to code activity at 1st tier
t509989 Data codes, n.e.c.*

A Web Appendix Tables

Table W1: Women, 25-55, at least one child 6-17 in HH, weekdays

	Sleep	Self Care	Household	Caring	Work	Ed	Free Time	Eating	Exercise	Travel
Panel A: School Start										
School	-0.32**	-0.10	-0.04	0.62***	0.39	0.04	-0.52***	-0.02	-0.09**	0.05
	(0.12)	(0.06)	(0.14)	(0.11)	(0.26)	(0.04)	(0.17)	(0.04)	(0.04)	(0.08)
Summer Mean	8.34	0.83	3.08	1.34	4.11	0.11	3.39	0.98	0.27	1.34
Observations	4,582	4,582	4,582	4,582	4,582	4,582	4,582	4,582	4,582	4,582
Panel B: Summer Start										
	Sleep	Self Care	Household	Caring	Work	Ed	Free Time	Eating	Exercise	Travel
School	-0.51***	-0.03	0.15	0.56***	0.29	0.07	-0.43**	-0.10**	-0.13***	0.13**
	(0.11)	(0.05)	(0.16)	(0.12)	(0.26)	(0.06)	(0.16)	(0.04)	(0.04)	(0.06)
Summer Mean	8.34	0.82	3.08	1.32	4.09	0.13	3.42	0.97	0.27	1.33
Observations	4,771	4,771	4,771	4,771	4,771	4,771	4,771	4,771	4,771	4,771
Panel C: Stacked										
	Sleep	Self Care	Household	Caring	Work	Ed	Free Time	Eating	Exercise	Travel
School	-0.41***	-0.06*	0.06	0.58***	0.32*	0.05	-0.47***	-0.07***	-0.11***	0.09**
	(0.07)	(0.03)	(0.10)	(0.07)	(0.16)	(0.04)	(0.10)	(0.02)	(0.02)	(0.04)
Summer Mean	8.34	0.83	3.08	1.33	4.10	0.12	3.40	0.98	0.27	1.34
Observations	9,353	9,353	9,353	9,353	9,353	9,353	9,353	9,353	9,353	9,353

Women, 25-55, at least one child 6-17 in HH. This table reports the results of regressions of an outcome (indicated in the column header) on an indicator for being above the cutoff (for school start, this takes value 1 for weeks after the start of school; for summer start, it is reversed and takes value 1 for weeks before the start of summer), and a linear function of the running variable, days away from the Wednesday of the school start (or summer start). Panel A is for school start, Panel B is for summer start, and Panel C is a version that combines the samples from the first two panels. Each coefficient corresponds to a different regression. The week of school start (summer start) is excluded, as are weeks more than 9 weeks away from the week of the school start (summer start). "Y Mean" corresponds to the mean during the school year period. Robust standard errors are reported. *** 0.01; ** 0.05; * 0.1.

Table W2: Women, 25-55, no child 3-17 in HH, weekdays

	Sleep	Self Care	Household	Caring	Work	Ed	Free Time	Eating	Exercise	Travel
Panel A: School Start										
School	-0.07	0.00	0.03	0.15	0.06	-0.08	-0.06	-0.10*	-0.03	0.15
	(0.17)	(0.07)	(0.15)	(0.12)	(0.29)	(0.06)	(0.21)	(0.05)	(0.04)	(0.09)
Summer Mean	8.35	0.94	2.27	0.67	5.11	0.16	3.86	1.00	0.24	1.24
Observations	4,025	4,025	4,025	4,025	4,025	4,025	4,025	4,025	4,025	4,025
Panel B: Summer Start										
	Sleep	Self Care	Household	Caring	Work	Ed	Free Time	Eating	Exercise	Travel
School	-0.15	-0.02	0.08	0.11	-0.16	0.01	0.23	0.00	-0.04	-0.08
	(0.15)	(0.07)	(0.17)	(0.13)	(0.30)	(0.08)	(0.21)	(0.05)	(0.04)	(0.09)
Summer Mean	8.37	0.95	2.27	0.66	5.18	0.17	3.80	0.99	0.24	1.24
Observations	4,148	4,148	4,148	4,148	4,148	4,148	4,148	4,148	4,148	4,148
Panel C: Stacked										
	Sleep	Self Care	Household	Caring	Work	Ed	Free Time	Eating	Exercise	Travel
School	-0.12	-0.00	0.08	0.13*	-0.04	-0.04	0.06	-0.04	-0.03	0.02
	(0.09)	(0.04)	(0.10)	(0.08)	(0.19)	(0.05)	(0.13)	(0.03)	(0.02)	(0.06)
Summer Mean	8.36	0.94	2.27	0.67	5.15	0.17	3.83	0.99	0.24	1.24
Observations	8,173	8,173	8,173	8,173	8,173	8,173	8,173	8,173	8,173	8,173

Women, no child 3-17 in HH, only weekdays.

Table W3: Men, 25-55, at least one child 6-17 in HH, weekdays

	Sleep	Self Care	Household	Caring	Work	Ed	Free Time	Eating	Exercise	Travel
Panel A: School Start										
School	-0.04	-0.08	0.09	0.28**	0.16	0.04	-0.42**	-0.10*	-0.07	0.10
	(0.15)	(0.06)	(0.14)	(0.10)	(0.32)	(0.05)	(0.19)	(0.06)	(0.08)	(0.11)
Summer Mean	7.80	0.67	1.47	0.70	7.12	0.05	3.13	1.08	0.35	1.47
Observations	3,388	3,388	3,388	3,388	3,388	3,388	3,388	3,388	3,388	3,388
Panel B: Summer Start										
	Sleep	Self Care	Household	Caring	Work	Ed	Free Time	Eating	Exercise	Travel
School	-0.28**	-0.04	-0.01	0.02	0.72**	-0.02	-0.29*	0.06	-0.10	-0.01
	(0.13)	(0.06)	(0.14)	(0.10)	(0.32)	(0.03)	(0.17)	(0.06)	(0.08)	(0.09)
Summer Mean	7.77	0.69	1.45	0.71	7.12	0.05	3.14	1.08	0.38	1.47
Observations	3,459	3,459	3,459	3,459	3,459	3,459	3,459	3,459	3,459	3,459
Panel C: Stacked										
	Sleep	Self Care	Household	Caring	Work	Ed	Free Time	Eating	Exercise	Travel
School	-0.18**	-0.07*	0.05	0.16**	0.43**	0.01	-0.35***	-0.02	-0.08*	0.05
	(0.09)	(0.04)	(0.08)	(0.06)	(0.19)	(0.03)	(0.11)	(0.04)	(0.05)	(0.06)
Summer Mean	7.78	0.68	1.46	0.70	7.12	0.05	3.13	1.08	0.37	1.47
Observations	6,847	6,847	6,847	6,847	6,847	6,847	6,847	6,847	6,847	6,847

Same as main table, but for men

Table W4: 15-17 Year Olds, Weekdays

	Sleep	Self Care	Household	Caring	Work	Ed	Free Time	Eating	Exercise	Travel
Panel A: School Start										
School	-1.53***	0.20**	-0.65***	-0.05	-0.46*	5.59***	-2.32***	-0.11	-0.54**	-0.05
	(0.29)	(0.07)	(0.15)	(0.06)	(0.26)	(0.34)	(0.37)	(0.08)	(0.20)	(0.14)
Summer Mean	10.12	0.74	1.21	0.24	1.38	0.59	6.13	0.92	1.21	1.24
Observations	1,307	1,307	1,307	1,307	1,307	1,307	1,307	1,307	1,307	1,307
Panel B: Summer Start										
	Sleep	Self Care	Household	Caring	Work	Ed	Free Time	Eating	Exercise	Travel
School	-1.22***	0.09	-0.83***	-0.27***	-0.97***	5.58***	-1.72***	-0.02	-0.47**	-0.08
	(0.23)	(0.07)	(0.17)	(0.09)	(0.26)	(0.33)	(0.38)	(0.08)	(0.18)	(0.12)
Summer Mean	10.06	0.75	1.23	0.26	1.38	0.67	6.11	0.93	1.17	1.23
Observations	1,366	1,366	1,366	1,366	1,366	1,366	1,366	1,366	1,366	1,366
Panel C: Stacked										
	Sleep	Self Care	Household	Caring	Work	Ed	Free Time	Eating	Exercise	Travel
School	-1.35***	0.15***	-0.72***	-0.15***	-0.74***	5.59***	-2.03***	-0.07	-0.50***	-0.07
	(0.16)	(0.05)	(0.10)	(0.05)	(0.16)	(0.20)	(0.23)	(0.04)	(0.12)	(0.07)
Summer Mean	10.09	0.74	1.22	0.25	1.38	0.63	6.12	0.93	1.19	1.23
Observations	2,673	2,673	2,673	2,673	2,673	2,673	2,673	2,673	2,673	2,673

15-17 year olds (both male and female), only weekdays.

Table W5: Difference-in-RDD

	Sleep	Self Care	Household	Caring	Work	Ed	Free Time	Eating	Exercise	Travel
Panel A: School Start										
SchoolXBaseline	-0.29***	-0.01	-0.10	0.41***	0.26	-0.01	-0.23**	-0.05**	-0.06**	0.08*
	(0.08)	(0.03)	(0.08)	(0.06)	(0.16)	(0.03)	(0.11)	(0.03)	(0.02)	(0.04)
Summer Mean	8.35	0.88	2.70	1.01	4.60	0.14	3.61	0.98	0.26	1.29
Observations	17,526	17,526	17,526	17,526	17,526	17,526	17,526	17,526	17,526	17,526

Difference-in-RDD - Women, 25-55, at least one child 6-17 in HH vs. Women, 25-55, no child 3-17 in HH. Weekends.

Table W6: Women, 25-55, at least one child 6-17 in HH, weekends

	Sleep	Self Care	Household	Caring	Work	Ed	Free Time	Eating	Exercise	Travel
Panel A: School Start										
School	0.12	0.04	0.23	0.33***	-0.22	0.02	-0.15	-0.06	-0.12**	-0.18**
	(0.13)	(0.06)	(0.17)	(0.10)	(0.16)	(0.05)	(0.18)	(0.05)	(0.06)	(0.08)
Summer Mean	9.21	0.78	3.58	1.11	1.13	0.07	4.98	1.17	0.42	1.33
Observations	4,921	4,921	4,921	4,921	4,921	4,921	4,921	4,921	4,921	4,921
Panel B: Summer Start										
	Sleep	Self Care	Household	Caring	Work	Ed	Free Time	Eating	Exercise	Travel
School	-0.00	0.03	0.03	0.07	-0.05	0.03	0.29	-0.10*	-0.16**	-0.15*
	(0.13)	(0.06)	(0.18)	(0.11)	(0.18)	(0.06)	(0.20)	(0.05)	(0.06)	(0.09)
Summer Mean	9.18	0.79	3.59	1.12	1.16	0.08	4.95	1.17	0.40	1.35
Observations	4,908	4,908	4,908	4,908	4,908	4,908	4,908	4,908	4,908	4,908
Panel C: Stacked										
	Sleep	Self Care	Household	Caring	Work	Ed	Free Time	Eating	Exercise	Travel
School	0.05	0.04	0.11	0.23***	-0.14	0.03	0.08	-0.08**	-0.16***	-0.15**
	(0.08)	(0.04)	(0.10)	(0.07)	(0.10)	(0.03)	(0.12)	(0.03)	(0.03)	(0.05)
Summer Mean	9.20	0.79	3.59	1.11	1.14	0.08	4.97	1.17	0.41	1.34
Observations	9,829	9,829	9,829	9,829	9,829	9,829	9,829	9,829	9,829	9,829

Same as main table, but only consider weekends.

Table W7: Women, 25-55, no child 3-17 in HH, weekends

	Sleep	Self Care	Household	Caring	Work	Ed	Free Time	Eating	Exercise	Travel
Panel A: School Start										
School	-0.01	-0.01	-0.14	0.11	0.06	-0.01	0.37	-0.03	-0.29**	-0.08
	(0.17)	(0.05)	(0.19)	(0.10)	(0.29)	(0.04)	(0.25)	(0.07)	(0.11)	(0.12)
Summer Mean	8.87	0.55	2.81	0.84	1.77	0.04	5.33	1.31	0.73	1.55
Observations	3,543	3,543	3,543	3,543	3,543	3,543	3,543	3,543	3,543	3,543
Panel B: Summer Start										
	Sleep	Self Care	Household	Caring	Work	Ed	Free Time	Eating	Exercise	Travel
School	-0.02	0.10	-0.10	0.33**	0.13	0.00	-0.16	0.07	-0.11	-0.28**
	(0.16)	(0.07)	(0.23)	(0.13)	(0.27)	(0.03)	(0.23)	(0.06)	(0.11)	(0.14)
Summer Mean	8.91	0.54	2.83	0.82	1.78	0.04	5.32	1.28	0.72	1.56
Observations	3,383	3,383	3,383	3,383	3,383	3,383	3,383	3,383	3,383	3,383
Panel C: Stacked										
	Sleep	Self Care	Household	Caring	Work	Ed	Free Time	Eating	Exercise	Travel
School	-0.01	0.05	-0.05	0.25***	0.09	-0.01	0.04	0.01	-0.22***	-0.17**
	(0.10)	(0.04)	(0.13)	(0.07)	(0.17)	(0.02)	(0.15)	(0.04)	(0.06)	(0.07)
Summer Mean	8.89	0.54	2.82	0.83	1.77	0.04	5.32	1.30	0.73	1.56
Observations	6,926	6,926	6,926	6,926	6,926	6,926	6,926	6,926	6,926	6,926

Same as main table, but for men and only consider weekends.

Table W8: 15-17 Year Olds, Weekends

	Sleep	Self Care	Household	Caring	Work	Ed	Free Time	Eating	Exercise	Travel
Panel A: School Start										
School	0.32	-0.01	-0.17	0.01	-0.05	0.42**	-0.21	-0.01	-0.13	-0.21
	(0.30)	(0.08)	(0.21)	(0.09)	(0.26)	(0.16)	(0.39)	(0.08)	(0.24)	(0.16)
Summer Mean	10.49	0.71	1.29	0.22	1.00	0.25	6.41	0.97	1.13	1.34
Observations	1,469	1,469	1,469	1,469	1,469	1,469	1,469	1,469	1,469	1,469
Panel B: Summer Start										
	Sleep	Self Care	Household	Caring	Work	Ed	Free Time	Eating	Exercise	Travel
School	-0.40	0.10	-0.08	-0.01	-0.12	0.68***	-0.42	-0.06	0.05	0.24
	(0.28)	(0.07)	(0.21)	(0.09)	(0.27)	(0.18)	(0.39)	(0.08)	(0.24)	(0.16)
Summer Mean	10.42	0.71	1.22	0.24	1.08	0.24	6.49	0.97	1.14	1.31
Observations	1,419	1,419	1,419	1,419	1,419	1,419	1,419	1,419	1,419	1,419
Panel C: Stacked										
	Sleep	Self Care	Household	Caring	Work	Ed	Free Time	Eating	Exercise	Travel
School	0.02	0.05	-0.14	0.00	-0.10	0.53***	-0.30	-0.02	-0.03	-0.03
	(0.18)	(0.05)	(0.12)	(0.05)	(0.15)	(0.12)	(0.24)	(0.05)	(0.13)	(0.09)
Summer Mean	10.46	0.71	1.26	0.23	1.04	0.25	6.45	0.97	1.13	1.33
Observations	2,888	2,888	2,888	2,888	2,888	2,888	2,888	2,888	2,888	2,888

Same as baseline 15-17 year old table, but only consider weekends.

Table W9: Women, 25-55, at least one child 6-17 in HH, Not Employed

	Sleep	Self Care	Household	Caring	Work	Ed	Free Time	Eating	Exercise	Travel
Panel A: School Start										
School	-0.41*	-0.21	0.52*	0.86***	-0.11	0.20	-0.74**	-0.08	-0.07	-0.06
	(0.23)	(0.13)	(0.27)	(0.23)	(0.24)	(0.12)	(0.31)	(0.08)	(0.07)	(0.13)
Summer Mean	8.89	0.71	4.34	2.01	0.76	0.13	4.33	1.02	0.31	1.22
Observations	1,481	1,481	1,481	1,481	1,481	1,481	1,481	1,481	1,481	1,481
Panel B: Summer Start										
	Sleep	Self Care	Household	Caring	Work	Ed	Free Time	Eating	Exercise	Travel
School	-0.75***	0.04	0.34	1.12***	-0.46*	0.17	-0.37	-0.04	-0.05	0.08
	(0.20)	(0.11)	(0.32)	(0.24)	(0.23)	(0.17)	(0.32)	(0.08)	(0.09)	(0.13)
Summer Mean	8.92	0.73	4.29	1.90	0.79	0.19	4.38	0.99	0.31	1.20
Observations	1,542	1,542	1,542	1,542	1,542	1,542	1,542	1,542	1,542	1,542
Panel C: Stacked										
	Sleep	Self Care	Household	Caring	Work	Ed	Free Time	Eating	Exercise	Travel
School	-0.57***	-0.10	0.43**	1.01***	-0.31**	0.17*	-0.56***	-0.06	-0.05	0.02
	(0.13)	(0.07)	(0.18)	(0.14)	(0.14)	(0.10)	(0.19)	(0.05)	(0.05)	(0.08)
Summer Mean	8.90	0.72	4.32	1.95	0.78	0.16	4.35	1.01	0.31	1.21
Observations	3,023	3,023	3,023	3,023	3,023	3,023	3,023	3,023	3,023	3,023

Same as main table, but only consider those who were coded as not being employed as of the last CPS interview.

Table W10: Women, 25-55, at least one child 6-17 in HH, Employed

	Sleep	Self Care	Household	Caring	Work	Ed	Free Time	Eating	Exercise	Travel
Panel A: School Start										
School	-0.27**	-0.05	-0.25	0.52***	0.47	-0.03	-0.35*	0.00	-0.08*	0.07
	(0.13)	(0.06)	(0.17)	(0.10)	(0.30)	(0.04)	(0.18)	(0.05)	(0.05)	(0.09)
Summer Mean	8.08	0.88	2.47	1.02	5.71	0.10	2.93	0.96	0.26	1.40
Observations	3,101	3,101	3,101	3,101	3,101	3,101	3,101	3,101	3,101	3,101
Panel B: Summer Start										
	Sleep	Self Care	Household	Caring	Work	Ed	Free Time	Eating	Exercise	Travel
School	-0.37**	-0.05	0.19	0.37**	0.38	0.04	-0.45**	-0.12**	-0.17***	0.13*
	(0.14)	(0.06)	(0.19)	(0.14)	(0.30)	(0.05)	(0.17)	(0.05)	(0.05)	(0.07)
Summer Mean	8.06	0.87	2.48	1.03	5.72	0.10	2.95	0.96	0.25	1.39
Observations	3,229	3,229	3,229	3,229	3,229	3,229	3,229	3,229	3,229	3,229
Panel C: Stacked										
	Sleep	Self Care	Household	Caring	Work	Ed	Free Time	Eating	Exercise	Travel
School	-0.30***	-0.05	-0.03	0.43***	0.40**	0.00	-0.38***	-0.06**	-0.13***	0.10**
	(0.08)	(0.04)	(0.11)	(0.07)	(0.18)	(0.03)	(0.11)	(0.03)	(0.03)	(0.04)
Summer Mean	8.07	0.88	2.48	1.02	5.71	0.10	2.94	0.96	0.25	1.40
Observations	6,330	6,330	6,330	6,330	6,330	6,330	6,330	6,330	6,330	6,330

Same as main table, but only consider those who were coded as being employed as of the last CPS interview.

Table W11: Women, 25-55, at least one child 6-17 in HH, Under $50,000 HH Income

	Sleep	Self Care	Household	Caring	Work	Ed	Free Time	Eating	Exercise	Travel
Panel A: School Start										
School	-0.00	-0.21	-0.14	0.73**	-0.40	0.21	-0.34	0.01	-0.05	0.02
	(0.28)	(0.14)	(0.35)	(0.28)	(0.55)	(0.14)	(0.37)	(0.08)	(0.07)	(0.15)
Summer Mean	8.74	0.84	3.25	1.42	3.52	0.18	3.55	0.91	0.16	1.18
Observations	983	983	983	983	983	983	983	983	983	983
Panel B: Summer Start										
	Sleep	Self Care	Household	Caring	Work	Ed	Free Time	Eating	Exercise	Travel
School	-0.71**	-0.08	-0.04	0.34	1.40**	-0.04	-0.94**	-0.08	0.05	0.22
	(0.31)	(0.13)	(0.38)	(0.29)	(0.61)	(0.14)	(0.40)	(0.09)	(0.10)	(0.14)
Summer Mean	8.76	0.84	3.18	1.43	3.48	0.21	3.58	0.91	0.16	1.17
Observations	1,044	1,044	1,044	1,044	1,044	1,044	1,044	1,044	1,044	1,044
Panel C: Stacked										
	Sleep	Self Care	Household	Caring	Work	Ed	Free Time	Eating	Exercise	Travel
School	-0.37*	-0.14*	-0.17	0.54***	0.59	0.09	-0.62**	-0.06	0.01	0.11
	(0.20)	(0.07)	(0.23)	(0.18)	(0.36)	(0.10)	(0.24)	(0.05)	(0.06)	(0.09)
Summer Mean	8.75	0.84	3.21	1.43	3.50	0.19	3.57	0.91	0.16	1.17
Observations	2,027	2,027	2,027	2,027	2,027	2,027	2,027	2,027	2,027	2,027

Same as main table, but only consider women with under $50k household earnings.

Table W12: Women, 25-55, at least one child 6-17 in HH, At Least $50,000 HH Income

	Sleep	Self Care	Household	Caring	Work	Ed	Free Time	Eating	Exercise	Travel
Panel A: School Start										
School	-0.36	0.00	0.30	0.59***	0.24	-0.00	-0.43	-0.06	-0.18*	-0.01
	(0.21)	(0.10)	(0.28)	(0.20)	(0.50)	(0.09)	(0.28)	(0.09)	(0.10)	(0.16)
Summer Mean	8.23	0.81	2.83	1.31	4.42	0.09	3.06	1.06	0.39	1.53
Observations	1,253	1,253	1,253	1,253	1,253	1,253	1,253	1,253	1,253	1,253
Panel B: Summer Start										
	Sleep	Self Care	Household	Caring	Work	Ed	Free Time	Eating	Exercise	Travel
School	-0.51**	-0.03	0.08	0.49**	0.53	0.10	-0.58**	-0.18*	-0.25***	0.16
	(0.20)	(0.09)	(0.27)	(0.21)	(0.50)	(0.10)	(0.26)	(0.09)	(0.08)	(0.13)
Summer Mean	8.21	0.82	2.80	1.31	4.51	0.09	3.06	1.05	0.37	1.52
Observations	1,318	1,318	1,318	1,318	1,318	1,318	1,318	1,318	1,318	1,318
Panel C: Stacked										
	Sleep	Self Care	Household	Caring	Work	Ed	Free Time	Eating	Exercise	Travel
School	-0.45***	-0.01	0.18	0.57***	0.36	0.04	-0.50***	-0.13**	-0.22***	0.11
	(0.13)	(0.06)	(0.17)	(0.12)	(0.30)	(0.05)	(0.17)	(0.05)	(0.05)	(0.09)
Summer Mean	8.22	0.81	2.82	1.31	4.46	0.09	3.06	1.06	0.38	1.53
Observations	2,571	2,571	2,571	2,571	2,571	2,571	2,571	2,571	2,571	2,571

Same as main table, but only consider women with at least $50k household earnings.