ONLINE APPENDIX

for

"Bargaining with Grandma: The Impact of the South African Pension on Household Decision Making"

By: Kate Ambler, IFPRI

Appendix A: Comparison of NIDS Waves 1, 2, and 3

NIDS is a panel study that revisits participants every two to three years. At this time, the first three waves of the NIDS data are publicly available; however this paper principally uses the Wave 1 data due to a change in data collection protocol between Wave 1 and Waves 2 and 3. Although the questions used to derive the main decision making variables used in the paper are identical in all three waves, the changes in protocol affect the comparability of these variables. In Wave 1, the survey protocol called for the household survey to be administered to the resident household head. In Waves 2 and 3, surveyors were instructed to interview the oldest female in the household. This change in protocol led to a much higher percent of older women being listed as household head in Waves 2 and 3 compared to Wave 1. While this could have been due both to surveyors being more likely to list the interviewee as the household head and to the interviewee being more likely to identify herself as the household head, it seems likely that the method employed in Wave 1 more likely led to the identification of the true head.

There are several ways to illustrate this change, but as an example, in Appendix Table 4, I show the percentages of women aged 50 to 55 (who therefore would not have experienced a change in pension status between Waves 1 and 3) who are identified as the household head in Wave 1, Wave 2, and Wave 3. This is shown overall and by whether or not the woman lived with an elderly male. The percentage of women identified as the household head jumps significantly after Wave 1, from 53 percent to 61 percent and 59 percent in Waves 2 and 3 respectively). This is particularly pronounced in households with an elderly male, where the percentage increases from 15 to 29 in Wave 2 and 36 in Wave 3.

This household head variable is highly correlated with the decision making variables in all waves. This is to be expected because characteristics of the household head are similar to the

characteristics of the decision maker. However, the correlation is also likely partly due to measurement error in the decision making variables that occurs when surveyors or respondents simply indicate the first name on the roster (the household head). Consequently, there is a similar pattern between Wave 1 and Waves 2 and 3 in the decision making variables: women are much more likely to be named the decision maker in Waves 2 and 3, compared to Wave 1. For example, 31 percent of women aged 50 to 55 living with older men are the decision makers for day to day purchases in Wave 1 and that figure jumps to 42 and 45 percent in Waves 2 and 3. Because only two years pass between each wave, it is unlikely that this increase is due to actual changes, but rather to the change in survey protocols.

It seems clear that Wave 1 contains the more accurate data for the analyses to be conducted in this paper. Unfortunately, these large increases in percentages of *non-pension eligible* elderly women who are reported to be the household head and the decision maker in Waves 2 and 3 are such that the patterns found with the regression discontinuity analysis in Wave 1 are not robustly apparent in Waves 2 and 3 (results shown and discussed in the main text).[1] However, the analysis presented here makes a strong argument that the inconsistency in results is an artifact of the changes in the survey. Additionally, the income share analysis presented in Section V is consistent across the three waves.[2] Income share is a more objectively

[1] The household head variable in Wave 1 exhibits a similar pattern to the decision making variables: increases with female pension eligibility at age 60.

[2] The correlation between decision making and income share is also twice as strong in Wave 1 as it is in Waves 2 and 3, further supporting the argument that decision making is more accurately measured in Wave 1.

measured variable than the decision making variables, and its consistency across the three surveys is strong evidence the pension does result in a robust increase in women's bargaining power.

Appendix B: Household Outcomes

The analysis presenting in this paper of how pension eligibility affects decision making and income share in the household is interesting in part because we expect these changes to translate into changes in measures of well-being in the household. Although early impacts of the pension have been extensively documented, it is important to document that they still exist in 2008, 15 years after the expansion of benefits. Here I examine impacts on child nutrition and ownership of consumer durables, measures that are associated with the main decision-making categories that I have addressed in this paper, decisions about day-to-day purchases such as groceries and about large, unusual purchases such as many consumer durables.

A. Child nutrition

One of the most well-known results in the pension literature is Duflo's finding that female pension eligibility results in higher values of anthropometric indicators, including weight for height, for young girls but not boys (Duflo, 2003). Weight for height is a flow measure of nutrition, a marker that responds quickly when a child's conditions changes. [1] In her main results using data collected in 1993, Duflo finds a 0.61 standard deviation increase in the weight for height measure for young girls with the presence of a pension eligible woman but a small and insignificant effect with the presence of a pension eligible man. There are no statistically significant impacts for boys.

The NIDS survey collects anthropometric data from children, allowing for the construction

[1] Weight for height Z-scores are calculated by subtracting the median and dividing by the standard error for the child's height and sex in a standard reference population. Duflo uses the reference group of well-nourished US children provided by the U.S. National Center for Health Statistics, standard prior to 2006.

of standardized weight for height z-scores using the WHO international child growth standards for children up to age five as the reference population (WHO, 2006). In all analyses, I drop observations with z-scores deemed biologically impossible (absolute z-scores greater than 5 for weight for height). Because standardized weight for height measures are defined only for young children, my sample is limited to children aged 6 to 60 months. I also limit the sample to black children who live with a person aged 50 to 75. This results in a sample of 593 boys and 572 girls. Unfortunately, a significant amount of the sample is lost to missing or unfeasible anthropometric data, leaving 413 boys and 389 girls for analysis purposes.[2]

In this sample I estimate the following equation:

$$(2) \quad WeightforHeight_{ij} = \alpha_f EligibleFemale_j + \alpha_m EligibleMale_j + \theta_f OlderFemale + \theta_m OlderMale_j + \gamma(AgeMale_j, AgeFemale_j) + \beta AgeChild_{ij} + \delta Controls_{ij} + \varepsilon_{ij}$$

where $EligibleFemale$ and $EligibleMale$ are indicators for the presence of an age-eligible man or woman in the household. $OlderFemale$ and $OlderMale$ are indicators for whether or not there is a woman or man aged 50 to 75 in the household. Following Edmonds (2006) $(AgeFemale_j, AgeMale_j)$ are polynomials in the age of the oldest woman and the oldest man in the household. In all specifications I include a set of indicators for child's age and mother's educational attainment and further include controls for the number of household members who are

[2] A comparison of children with valid anthropometric data and those without shows few differences across a variety of relevant household characteristics. The exception is that children with missing data are more likely to live in an urban area.

0-5, 6-14, 15-24, and 25-49, and the presence of mother and father in the household. [3] α_f and α_m can then be interpreted as the difference in weight for height between a child living with a pension eligible woman (man) and a child living with a woman (man) who is almost eligible. This specification is similar to those used to estimate the impacts on decision making, but because the level of observation is the child, not the older adult, it controls for age trends in the age of the oldest man and woman in the household.

Appendix Table 7 shows the results of estimating this equation with girls in Panel 1 and boys in Panel 2. Columns 1, 2, and 3 include linear, quadratic, and cubic age polynomials respectively. Column 4 adds control variables to the cubic specification. The coefficient on woman eligible is large and relatively stable across specifications for girls. The presence of a pension eligible woman increases weight for height of girls by about 0.5 standard deviations. However the effect is only statistically significant in the linear and quadratic specifications and only at the 10% level. The coefficients for eligible man are small and have large standard errors, however I lack the power to reject that the male and female coefficients are equal. In the boys sample all coefficients are imprecisely estimated, although it should be noted that the coefficients for eligible woman are positive. The pattern that emerges from these results is similar to the main results reported by Duflo (2003). The presence of a pension eligible woman (but not a pension eligible man) increases the weight for height of girls. There is no detectable effect of pension eligibility of either gender for boys. However, given the selected sample, small sample size, and borderline statistical significance of the results, they should not be over interpreted.

[3] I do not include controls for father's educational attainment because of the large number of missing values.

B. Ownership of consumer durables

The significant increase in income provided by the pension provides the opportunity not only to improve the quality of day-to-day purchases on food, but also to invest in larger household items that have the ability to improve quality of life. The NIDS survey collects information on 27 separate durable goods that may be owned by households. Here I consider the total number of what I term "household" durable goods, which are the 16 goods listed on the survey excluding ownership of vehicles, bikes, and agricultural tools. The household durable goods include radios, televisions, cell phones, appliances, and living room furniture.[4] I observe only whether or not a household possesses each type of good and do not know if they have more than one of each type. Consequently, I can detect if pension eligible households buy types of goods that they did not previously own, but not if they buy more of or replace goods that they already had.

I estimate the same household level model that I use in Section IV to examine changes in decision making by other members of the household; the dependent variable is the number of household durable goods. Appendix Table 8 presents the results. Panel 1 shows results for households with an older woman aged 50 to 75 and Panel 2 for households with an older man. Columns 1, 2, and 3 include linear, quadratic, and cubic age trends respectively and column 4 adds control variables to the cubic specification.

[4] The full list of included durable goods is: radio; Hi-Fi stereo; CD player; MP3 player; television; satellite dish; VCR or DVD player; computer; camera; cell phone; electric stove; gas stove; paraffin stove; microwave; fridge/freezer; washing machine; sewing/knitting machine; lounge suite.

The results for households with an older woman are stable across specifications. Focusing on columns 3 and 4, female eligibility results, on average, in ownership of 1.2 more types of household durable goods, a 24% increase in the sample mean of 4.9. Women do appear to be channeling some of their pension income into the purchase of consumer durables, a complement to the fact that they were found to be significantly more likely to be the primary decision maker for large, unusual purchases in the household. The coefficient on male eligibility is marginally significant in the linear specification but is very sensitive to specification choice and much smaller and insignificant in all other specifications. However, I cannot reject that the coefficients on male and female eligibility are the same. Despite this, the evidence is overall suggest that male pension eligibility does not lead to the purchase of more consumer durables.

Appendix C: Household Composition

As detailed in Section VII the main threat to the validity of the results in this paper is that household reorganization associated with the pension eligibility of a household member is the true driver of the observed results. Given the importance of this issue, in this appendix I provide additional analyses to complement those in the main text.

Although the NIDS Wave 1 survey does not contain detailed information on non-resident family members, I can use the data to perform several checks that will help understand whether household reorganization is a threat to my results. First, NIDS collects information on remittances sent to and from the household for or by anyone who is not a household resident. In fewer than 30% of households containing older men and women has anyone in the household sent or received remittances in the past year, and this does not vary by pension eligibility (results not shown). Although sending remittances is not a prerequisite for family decision making responsibilities to be divided across non co-resident households, it is difficult to imagine the existence of a large fraction of households where non-resident members dominate decision making for the entire family but do not contribute economically to the family members with whom they are not living.

It is also possible to examine whether household composition changes with eligibility by separately examining the number of prime age (18 to 49) adults and children (up to age 14) in the household. The results are presented in Appendix Table 10. There is no evidence of any change in the number of prime age adults (those whose departure could obfuscate the main results in the paper) in households with older men or women. There is evidence of increases in the number of children with both male and female eligibility, but flexibly controlling for the number of children (or adults) in the household does not affect the female decision making results.

While persuasive, these results related to household size are not conclusive because they

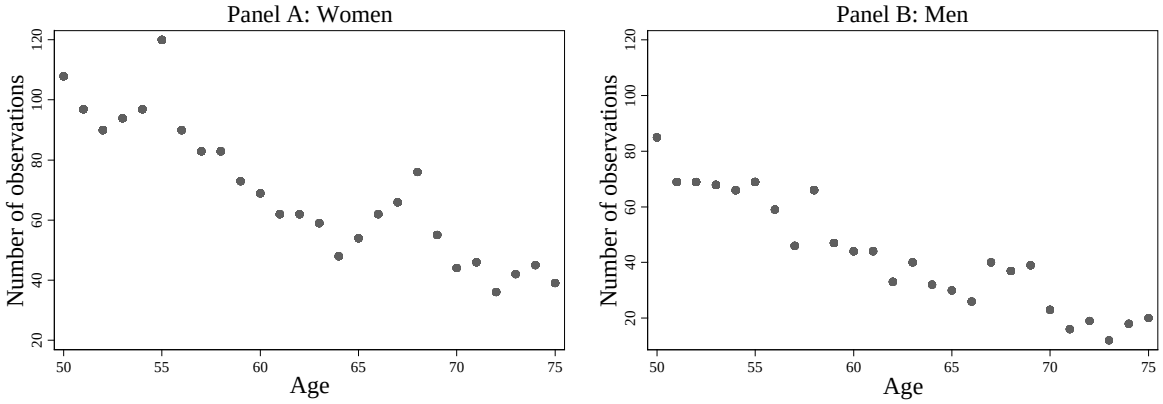
could be masking changes in the types of the adults that live with pensioners, even if there is no change in the overall number of adults. As noted in the main text, one of the benefits of the NIDS survey is that because it is a panel study, individuals are tracked from wave to wave. I can use the second wave of the survey to analyze changes from Wave 1 to Wave 2, under the assumption that household reorganization patterns for individuals who are pension eligible in Wave 1 are similar to the patterns for those are eligible in Wave 2. Using the sample of older adults aged 50 to 75 in Wave 2, I identify those who left the older adults' households between waves. First, I show that those who were pension eligible in Wave 2 were not more likely to have had a household member leave between waves (Appendix Table 11, columns 1 to 3). Additionally, because one of the principal concerns in my analysis is whether the departure of likely candidates for decision making led to a reduction in disagreement over the identity of the decision maker, I can specifically address whether pension eligibility in Wave 2 is associated with those that left the pensioner's household between Wave 1 and Wave 2 being more likely to have been named by someone as the decision maker in Wave 1.

I construct a variable for each person in Wave 1 that is equal to one if anyone in the household named them as the decision maker for day to day purchases and zero otherwise. I then identify, for each older adult in Wave 2, which individuals left their household between waves, and take the average of the decision making variable just described for each older person across individuals that left the household. I then test whether this variable differs with pension eligibility. In other words, were those who left households with a person who was pension eligible more likely to have been named by someone as the decision maker in Wave 1 than those who left households with a person who was not pension eligible? The results are presented in Appendix Table 11 (columns 4 to 6). In short, there is no evidence that the decision making power of leavers varies

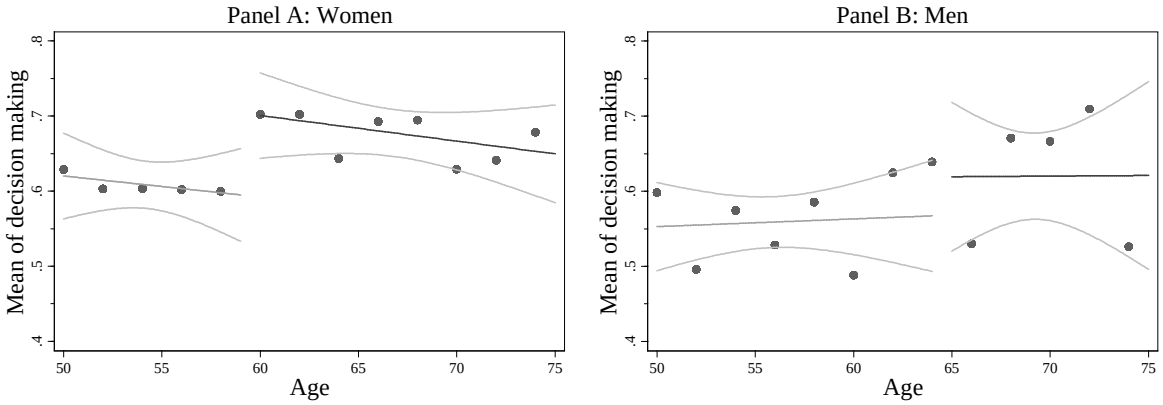
with eligibility, making it unlikely that this is what could have driven increases in female decision making power in Wave 1.

Appendix D: Appendix Figures and Tables

Appendix Figure 1: Number of Observations per Age



Appendix Figure 2: Primary Decision Making for Day to Day Purchases by Age, Two Year Age Bins



Appendix Figure 3: Personal Income Share of Oldest Male by Age

Notes: Sample is individuals aged 50 to 75. Appendix Figure 1: Scatterplot is number of observations per age. Appendix Figures 2 & 3: Scatterplots are unweighted means of y-axis variable by age in years. Unweighted OLS regression lines of y-axis variable on age are estimated on either side of the discontinuity. 95% confidence intervals are shown around the regression lines. Y-axis variables are dummy variable for whether or not everyone in household agrees that individual is the primary decision maker for where household lives (Appendix Figure 2) and personal income share of oldest male in household (Appendix Figure 3). In Appendix Figure 3 the top half percent of male and female household income earners are trimmed and sample is limited to women 50 to 75 living with an older male.

Appendix Table 1

Effect of Pension Eligibility on Pension Receipt

	(1)	(2)	(3)	(4)
	Dependent variable: Pension receipt			
	Polynomial in age of person is…			
	linear	quadratic	cubic	
Panel 1: Women				
Pension eligible	0.620***	0.625***	0.572***	0.578***
	[0.0454]	[0.0445]	[0.0653]	[0.0635]
Observations	1,763	1,763	1,763	1,763
R-squared	0.668	0.668	0.670	0.674
Sample mean	0.484			
Panel 2: Men				
Pension eligible	0.485***	0.361***	0.328***	0.339***
	[0.0650]	[0.0836]	[0.0915]	[0.0888]
Observations	1,039	1,039	1,039	1,039
R-squared	0.569	0.579	0.580	0.593
Sample mean	0.278			
P-value for equality of female and male eligibility coefficients	0.093	0.005	0.031	0.028
Controls for opposite gender person aged 50+ and opposite gender pension eligible person in household	YES	YES	YES	YES
Demographic control variables	NO	NO	NO	YES

Notes: Robust standard errors in brackets are clustered at the household level. Regressions are weighted with survey post-stratification weights. Sample is restricted to black men and women aged 50-75. Control variables are number of household members who are 0-5, 6-14, 15-24, and 25-49, educational attainment category, and rural/urban status.

*** p<0.01, ** p<0.05, * p<0.1

Appendix Table 2

Effect of Pension Eligibility on Household Decision Making: Other Decision Making Categories

	(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	(9)	(10)	(11)	(12)
	Dependent variable: Primary decision maker for large, unusual purchases				Dependent variable: Primary decision maker for where household lives				Dependent variable: Primary decision maker for who can live in household			
					Polynomial in age of person is…							
	linear	quadratic	cubic		linear	quadratic	cubic		linear	quadratic	cubic	
Panel 1: Women												
Pension eligible	0.121***	0.133***	0.154**	0.137**	0.126***	0.137***	0.174***	0.159***	0.123***	0.133***	0.148***	0.132***
	[0.0462]	[0.0485]	[0.0603]	[0.0590]	[0.0400]	[0.0423]	[0.0500]	[0.0498]	[0.0401]	[0.0435]	[0.0499]	[0.0499]
Presence of man 50+	-0.627***	-0.628***	-0.629***	-0.627***	-0.671***	-0.671***	-0.672***	-0.673***	-0.648***	-0.649***	-0.649***	-0.649***
	[0.0318]	[0.0317]	[0.0319]	[0.0329]	[0.0287]	[0.0287]	[0.0287]	[0.0289]	[0.0304]	[0.0305]	[0.0305]	[0.0310]
	-0.0165	-0.0125	-0.0117	-0.00550	-0.0472	-0.0437	-0.0419	-0.0274	-0.0796**	-0.0765**	-0.0759**	-0.0617
Presence of pension eligible man	[0.0453]	[0.0453]	[0.0456]	[0.0466]	[0.0371]	[0.0372]	[0.0375]	[0.0382]	[0.0369]	[0.0373]	[0.0375]	[0.0387]
Observations	1,769	1,769	1,769	1,769	1,787	1,787	1,787	1,787	1,787	1,787	1,787	1,787
R-squared	0.369	0.370	0.370	0.379	0.435	0.435	0.436	0.450	0.426	0.427	0.427	0.441
Sample mean	0.641				0.641				0.600			
Panel 2: Men												
Pension eligible	-0.0456	-0.0676	-0.145	-0.117	-0.129*	-0.157*	-0.258***	-0.249***	-0.114	-0.0991	-0.183*	-0.161*
	[0.0803]	[0.0997]	[0.108]	[0.0959]	[0.0742]	[0.0908]	[0.0999]	[0.0890]	[0.0756]	[0.0939]	[0.103]	[0.0899]
Presence of woman 50+	-0.158***	-0.156***	-0.153***	-0.127***	-0.0898**	-0.0872**	-0.0835*	-0.0746*	-0.119***	-0.120***	-0.117***	-0.104**
	[0.0469]	[0.0471]	[0.0470]	[0.0455]	[0.0442]	[0.0443]	[0.0443]	[0.0448]	[0.0449]	[0.0450]	[0.0449]	[0.0444]
Presence of pension eligible	-0.0482	-0.0505	-0.0595	-0.0388	-0.0769	-0.0801	-0.0907	-0.0652	-0.0697	-0.0679	-0.0768	-0.0554
woman	[0.0604]	[0.0606]	[0.0601]	[0.0587]	[0.0577]	[0.0584]	[0.0576]	[0.0572]	[0.0585]	[0.0591]	[0.0585]	[0.0579]
Observations	1,094	1,094	1,094	1,094	1,106	1,106	1,106	1,106	1,106	1,106	1,106	1,106
R-squared	0.030	0.030	0.034	0.131	0.021	0.021	0.027	0.125	0.026	0.026	0.030	0.128
Sample mean	0.646				0.699				0.693			
P-value for equality of female and male eligibility coefficients	0.067	0.061	0.013	0.021	0.002	0.003	0.000	0.000	0.004	0.025	0.004	0.005
Control variables	NO	NO	NO	YES	NO	NO	NO	YES	NO	NO	NO	YES

Notes: Robust standard errors in brackets are clustered at the household level. Regressions are weighted with survey post-stratification weights. Sample is restricted to black men and women aged 50-75. Control variables are number of household members who are 0-5, 6-14, 15-24, and 25-49, educational attainment category, and rural/urban status.

*** p<0.01, ** p<0.05, * p<0.1

Appendix Table 3

Effect of Pension Eligibility on Household Decision Making: Flexible Polynomials

	(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)
	Dependent variable: Primary decision maker for day-to-day purchases				Dependent variable: Primary decision maker for all categories			
	Polynomial in age of person is…							
	linear	quadratic	cubic		linear	quadratic	cubic	
Panel 1: Women								
Pension eligible	0.156***	0.120	0.170	0.129	0.143***	0.159**	0.146	0.112
	[0.0474]	[0.0777]	[0.121]	[0.118]	[0.0448]	[0.0747]	[0.125]	[0.123]
Presence of man 50+	-0.555***	-0.555***	-0.554***	-0.562***	-0.656***	-0.657***	-0.656***	-0.655***
	[0.0357]	[0.0357]	[0.0357]	[0.0348]	[0.0282]	[0.0283]	[0.0283]	[0.0288]
Presence of pension	-0.055	-0.055	-0.057	-0.037	-0.0318	-0.0302	-0.0308	-0.0133
eligible man	[0.0497]	[0.0503]	[0.0502]	[0.0497]	[0.0346]	[0.0352]	[0.0352]	[0.0363]
Observations	1,794	1,794	1,794	1,794	1,764	1,764	1,764	1,764
R-squared	0.321	0.321	0.323	0.347	0.401	0.402	0.403	0.420
Sample mean	0.642				0.572			
Panel 2: Men								
Pension eligible	-0.044	-0.129	-0.094	-0.078	-0.0570	-0.204	-0.178	-0.156
	[0.0879]	[0.128]	[0.180]	[0.160]	[0.0898]	[0.129]	[0.178]	[0.160]
Presence of woman 50+	-0.236***	-0.233***	-0.233***	-0.203***	-0.238***	-0.235***	-0.235***	-0.217***
	[0.0470]	[0.0473]	[0.0472]	[0.0452]	[0.0474]	[0.0476]	[0.0476]	[0.0453]
Presence of pension	-0.047	-0.053	-0.049	-0.029	-0.0538	-0.0601	-0.0584	-0.0320
eligible woman	[0.0585]	[0.0590]	[0.0589]	[0.0576]	[0.0580]	[0.0584]	[0.0584]	[0.0569]
Observations	1,109	1,109	1,109	1,109	1,091	1,091	1,091	1,091
R-squared	0.056	0.057	0.058	0.163	0.058	0.061	0.061	0.174
Sample mean	0.574				0.548			
Control variables	NO	NO	NO	YES	NO	NO	NO	YES

Notes: Robust standard errors in brackets are clustered at the household level. Regressions are weighted with survey post-stratification weights. Sample is restricted to black men and women aged 50-75. Control variables are number of household members who are 0-5, 6-14, 15-24, and 25-49, educational attainment category, and rural/urban status.

*** p<0.01, ** p<0.05, * p<0.1

Appendix Table 4

Comparison of NIDS Wave 1, Wave 2, and Wave 3

	Women 50 - 55		
	All	No man 50+ in hh	Man 50+ in hh
Household head			
Wave 1	53.1	79.6	15.3
Wave 2	60.7	83.0	29.1
Wave 3	59.3	74.6	35.8
Primary decision maker for day to day purchases			
Wave 1	60.1	80.6	30.8
Wave 2	63.3	78.2	42.0
Wave 3	64.6	77.7	44.7

Notes: Author's calculations from NIDS Waves 1, 2, and 3.

Appendix Table 5

Effect of Pension Eligibility on Income Variables

	(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)
	Dependent variable: Personal income share				Dependent variable: Labor income as percent of household non-pension income			
	Polynomial in age of person is…				*Polynomial in age of person is…*			
	linear	quadratic	cubic		linear	quadratic	cubic	
Panel 1: Women								
Pension eligible	14.58***	16.35***	18.54***	16.21***	-5.709***	-4.320*	-3.616	-5.454**
	[3.330]	[3.605]	[4.181]	[3.724]	[2.077]	[2.595]	[2.718]	[2.713]
Observations	1,790	1,790	1,790	1,790	1,785	1,785	1,785	1,785
R-squared	0.184	0.186	0.186	0.325	0.108	0.110	0.111	0.210
Sample mean	44.07				8.195			
Panel 2: Men								
Pension eligible	-1.422	-1.274	-3.773	-0.411	-13.07**	-12.30***	-9.671	-6.931
	[5.367]	[5.078]	[7.120]	[6.470]	[5.530]	[4.588]	[7.072]	[6.688]
Observations	1,111	1,111	1,111	1,111	1,110	1,110	1,110	1,110
R-squared	0.122	0.122	0.122	0.277	0.159	0.159	0.160	0.282
Sample mean	39.63				20.71			
P-value for equality of female and male eligibility coefficients	0.010	0.004	0.006	0.024	0.217	0.135	0.429	0.839
Controls for opposite gender person aged 50+ and opposite gender pension eligible person in household	YES	YES	YES	YES	YES	YES	YES	YES
Demographic control variables	NO	NO	NO	YES	NO	NO	NO	YES

Notes: Robust standard errors in brackets are clustered at the household level. Regressions are weighted with survey post-stratification weights. Sample is restricted to black men and women aged 50-75. Control variables are number of household members who are 0-5, 6-14, 15-24, and 25-49, educational attainment category, and rural/urban status.

*** p<0.01, ** p<0.05, * p<0.1

Appendix Table 6

Effect of Pension Eligibility on Household Income

	(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)
	Dependent variable: Household income				Dependent variable: Log household income			
	Polynomial in age of person is…				*Polynomial in age of person is…*			
	linear	quadratic	cubic		linear	quadratic	cubic	
Panel 1: Women								
Pension eligible	316.9	425.6	239.3	164.2	0.215**	0.238**	0.172	0.149
	[372.8]	[424.9]	[494.7]	[419.6]	[0.0947]	[0.107]	[0.119]	[0.0988]
Observations	1,746	1,746	1,746	1,746	1,746	1,746	1,746	1,746
R-squared	0.039	0.040	0.040	0.313	0.052	0.053	0.053	0.368
Sample mean	2731							
Panel 2: Men								
Pension eligible	742.4	764.5	1,538	1,852*	0.264	0.206	0.368	0.423**
	[957.7]	[1,239]	[1,361]	[963.8]	[0.170]	[0.187]	[0.239]	[0.181]
Observations	1,082	1,082	1,082	1,082	1,082	1,082	1,082	1,082
R-squared	0.004	0.004	0.007	0.323	0.027	0.028	0.031	0.361
Sample mean	3231							
P-value for equality of female and male eligibility coefficients	0.669	0.780	0.362	0.112	0.802	0.883	0.457	0.189
Controls for opposite gender person aged 50+ and opposite gender pension eligible person in household	YES	YES	YES	YES	YES	YES	YES	YES
Demographic control variables	NO	NO	NO	YES	NO	NO	NO	YES

Notes: Robust standard errors in brackets are clustered at the household level. Regressions are weighted with survey post-stratification weights. Sample is restricted to black men and women aged 50-75. Control variables are number of household members who are 0-5, 6-14, 15-24, and 25-49, educational attainment category, and rural/urban status.

*** p<0.01, ** p<0.05, * p<0.1

Appendix Table 7

Effect of Pension Eligibility on Weight for Height Z-scores

	(1)	(2)	(3)	(4)
	Polynomial in age of oldest man and oldest woman is…			
	linear	quadratic	cubic	
Panel 1: Girls				
Eligible woman	0.480*	0.482*	0.478	0.400
	[0.290]	[0.280]	[0.340]	[0.324]
Eligible man	0.025	0.250	0.203	0.104
	[0.296]	[0.391]	[0.395]	[0.398]
P-value for equality of eligible woman and eligible man	0.221	0.154	0.245	0.393
Observations	399	399	399	399
R-squared	0.086	0.090	0.104	0.150
Panel 2: Boys				
Eligible woman	0.332	0.358	0.247	0.179
	[0.291]	[0.293]	[0.350]	[0.350]
Eligible man	-0.188	-0.113	-0.347	-0.305
	[0.295]	[0.423]	[0.426]	[0.446]
P-value for equality of eligible woman and eligible man	0.450	0.463	0.647	0.755
Observations	413	413	413	413
R-squared	0.052	0.053	0.062	0.090
Control variables	NO	NO	NO	YES

Notes: Robust standard errors in brackets are clustered at the household level. Regressions are weighted with survey post-stratification weights. Sample is restricted to black boys and girls aged 6 to 60 months who live with a person aged 50-75 and have non-missing, valid anthropometric data. All regressions control for age of child. Control variables are number of household members who are 0-5, 6-14, 15-24, and 25-49, mother's educational attainment category, and presence of mother and father in the household.

*** p<0.01, ** p<0.05, * p<0.1

Appendix Table 8

Effect of Pension Eligibility on Number of Household Consumer Durables

	(1)	(2)	(3)	(4)
	Polynomial in age of oldest man or oldest woman is…			
	linear	quadratic	cubic	
Panel 1: Households with a woman 50 - 75				
Eligible woman	0.946**	1.175***	1.213***	1.202***
	[0.392]	[0.421]	[0.437]	[0.432]
Presence of man 50+	0.673**	0.655**	0.654**	0.578*
	[0.328]	[0.330]	[0.329]	[0.296]
Eligible man	-0.106	-0.039	-0.037	0.299
	[0.453]	[0.459]	[0.459]	[0.394]
Observations	1,750	1,750	1,750	1,750
R-squared	0.028	0.030	0.030	0.171
Sample mean	4.918			
Panel 2: Households with a man 50 - 75				
Eligible man	1.168*	0.587	0.413	0.705
	[0.639]	[0.700]	[0.796]	[0.698]
Presence of woman 50+	1.273***	1.329***	1.336***	1.525***
	[0.383]	[0.383]	[0.383]	[0.336]
Eligible woman	0.099	0.026	0.007	-0.204
	[0.434]	[0.446]	[0.443]	[0.383]
Observations	1,082	1,082	1,082	1,082
R-squared	0.039	0.042	0.042	0.230
Sample mean	4.936			
P-value for equality of female and male eligibility coefficients	0.769	0.468	0.376	0.736
Control variables	NO	NO	NO	YES

Notes: Robust standard errors in brackets are clustered at the survey cluster level. Regressions are weighted with survey post-stratification weights. Sample is restricted to households with a black woman (man) aged 50 -75. Control variables are number of household members who are 0-5, 6-14, 15-24, and 25-49. Household durable goods include radio; Hi-Fi stereo, CD player, MP3 player; television; satellite dish; VCR or DVD player; computer; camera; cell phone; electric stove; gas stove; paraffin stove; microwave; fridge/freezer; washing machine; sewing/knitting machine; lounge suite.

*** p<0.01, ** p<0.05, * p<0.1

Appendix Table 9

Effect of Pension Eligiblity in 1993: PSLSD Data

	(1)	(2)	(3)	(4)	(5)	(6)
	Dependent variable: Pension receipt			Dependent variable: Personal income share		
	Polynomial in age of person is…			*Polynomial in age of person is…*		
	linear	quadratic	cubic	linear	quadratic	cubic
Panel 1: Women						
Pension eligible	0.388***	0.382***	0.255***	13.49***	12.22***	4.648
	[0.0484]	[0.0496]	[0.0610]	[3.617]	[3.835]	[4.524]
Observations	1,082	1,082	1,082	1,079	1,079	1,079
R-squared	0.476	0.476	0.488	0.170	0.170	0.179
Sample mean	0.476			32.40		
Panel 2: Men						
Pension eligible	0.206***	0.142*	0.0562	7.141	6.313	4.307
	[0.0626]	[0.0754]	[0.0824]	[5.052]	[5.458]	[6.447]
Observations	764	764	764	763	763	763
R-squared	0.354	0.360	0.365	0.048	0.048	0.049
Sample mean	0.251			34.92		
P-value for equality of female and male eligibility coefficients	0.021	0.008	0.051	0.307	0.376	0.966
Controls for opposite gender person aged 50+ and opposite gender pension eligible person in household	YES	YES	YES	YES	YES	YES
Demographic control variables	NO	NO	NO	NO	NO	NO

Notes: Robust standard errors in brackets are clustered at the household level. Sample is restricted to black men and women aged 50-75 in households with a child 6 to 60 months.

*** p<0.01, ** p<0.05, * p<0.1

Appendix Table 10

Effect of Pension Eligibility on Household Size

	(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)
	Dependent variable: Number of adults aged 18-49				Dependent variable: Number of children aged 0-14			
	Polynomial in age of person is…				*Polynomial in age of person is…*			
	linear	quadratic	cubic		linear	quadratic	cubic	
Panel 1: Women								
Eligible woman	0.117	0.00641	-0.196	-0.195	0.501**	0.434*	0.482*	0.583**
	[0.228]	[0.227]	[0.274]	[0.265]	[0.235]	[0.235]	[0.292]	[0.291]
Observations	1,756	1,756	1,756	1,756	1,800	1,800	1,800	1,800
R-squared	0.003	0.005	0.007	0.017	0.022	0.023	0.023	0.069
Sample mean	1.481				1.844			
Panel 2: Men								
Eligible man	0.212	0.137	0.254	0.217	0.815***	0.666**	0.889**	0.822**
	[0.294]	[0.304]	[0.401]	[0.401]	[0.253]	[0.325]	[0.348]	[0.343]
Observations	1,088	1,088	1,088	1,088	1,117	1,117	1,117	1,117
R-squared	0.025	0.025	0.026	0.042	0.077	0.078	0.080	0.125
Sample mean	1.401				1.500			
P-value for equality of female and male eligibility coefficients	0.796	0.726	0.340	0.746	0.300	0.509	0.307	0.000
Controls for opposite gender person aged 50+ and opposite gender pension eligible person in household	YES	YES	YES	YES	YES	YES	YES	YES
Demographic control variables	NO	NO	NO	YES	NO	NO	NO	YES

Notes: Robust standard errors in brackets are clustered at the household level. Regressions are weighted with survey post-stratification weights. Sample is restricted to households with black men and women aged 50-75. Control variables are educational attainment category, and rural/urban status.

*** p<0.01, ** p<0.05, * p<0.1

Appendix Table 11

Pension Eligibility and Household Leavers

	(1)	(2)	(3)	(4)	(5)	(6)
	Dependent variable: Total number of those leaving household between W1 and W2			Dependent variable: Average value of day-to-day decision making variable for those leaving household between W1 and W2		
	Polynomial in Wave 2 age of person is…					
	linear	quadratic	cubic	linear	quadratic	cubic
Panel 1: Women						
Wave 2 pension eligible	-0.155	-0.157	-0.0900	-0.00678	-0.000102	0.0321
	[0.137]	[0.130]	[0.158]	[0.0773]	[0.0761]	[0.0994]
Observations	1,721	1,721	1,721	470	470	470
R-squared	0.005	0.005	0.005	0.066	0.066	0.067
Sample mean	0.442			0.162		
Panel 2: Men						
Wave 2 pension eligible	0.230	0.239	0.249	0.0257	-0.00278	0.0429
	[0.150]	[0.152]	[0.194]	[0.0802]	[0.0792]	[0.0800]
Observations	982	982	982	242	242	242
R-squared	0.017	0.017	0.017	0.038	0.052	0.055
Sample mean	0.398			0.109		
Controls for opposite gender person aged 50+ and opposite gender pension eligible person in household in W2	YES	YES	YES	YES	YES	YES

Notes: Robust standard errors in brackets are clustered at the household level. Regressions are weighted with survey post-stratification weights. Sample is restricted to black men and women aged 50-75 in NIDS Wave 2. Sample in columns 4 to 6 is additionally restricted to people who had someone leave their household between Wave 1 and Wave 2.

*** p<0.01, ** p<0.05, * p<0.1