Copayments and the Value of Health Insurance: Experimental Evidence from Uganda*

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Abstract

Health expenditure shocks are among the largest sources of financial risk for households. Health insurance might mitigate this risk, yet a central contract design question remains, especially in low-income settings: How do copayments affect the benefits and costs of health insurance? We study this question in a field experiment in rural Uganda that varies copayments for hospital-based outpatient insurance. We randomly assign households to receive free insurance with copayments of different levels, or to a cash-transfer control group, and combine detailed household surveys with administrative hospital records. Insurance substantially increases the use of high-quality hospital care, more than doubling visits to insured hospitals, while households substitute away from lower-quality facilities. Importantly, insurance meaningfully reduces household financial vulnerability: out-of-pocket spending falls, distress asset sales decline, emergency borrowing drops, and forced reductions in food consumption decrease. Health outcomes also improve, with sick days falling by 13% and missed workdays by 15%. Lower copayments generate larger increases in utilization, yet health gains are similar across copayment levels, a pattern partly explained by lower copayments drawing relatively healthier individuals into care. We combine randomized copayment variation with incentive-compatible measures of household insurance valuation and administrative cost data to evaluate net welfare under two approaches. When benefits reflect households' revealed-preference valuations, lower copayments dominate. In contrast, benefits computed from experimentally estimated outcomes favor higher copayments, as lower cost sharing raises insurer expenditures without generating incremental health gains. This divergence highlights a fundamental tension between revealed-preference and treatment-effect-based approaches to optimal insurance contract design.

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1 Introduction

High-quality healthcare remains difficult to access for much of the population in low- and middle-income countries. Although public provision is often officially free or heavily subsidized, limited staffing, absenteeism, drug stock-outs, and long waiting times frequently constrain the effectiveness of public facilities around the world (Das and Hammer, 2014; Kruk et al., 2018). Alongside the public system, a subset of the private healthcare facilities provide substantially higher-quality care. While the sector is highly heterogeneous (Daniels et al., 2024), these facilities often employ better-trained staff, have more reliable drug supply, and broader diagnostic capacity, but charge higher prices.

An increasingly common policy response is, therefore, to subsidize access to these higher quality private providers through health insurance schemes that lower the cost of care at the point of use (Das and Do, 2023). This approach reflects the recognition that many households already rely on private providers because of low quality in the public sector, but do so at high financial risk. Publicly financed insurance allows governments to harness existing private capacity while reducing out-of-pocket spending and exposure to catastrophic health shocks, and has become a central pillar of health-system reform in many low- and middle-income countries, including Ghana's National Health Insurance Scheme, India's PM-JAY, and Indonesia's JKN (Dupas and Jain, forthcoming).

A central design challenge for such insurance programs is determining the appropriate level of copayment. Copayments can mitigate overuse, lower insurer expenditures, and reduce fiscal pressure on governments (Newhouse, 1993). At the same time, copayments may deter households from seeking care when they are sick, because they require cash precisely when households are most constrained, and in turn discourage health insurance take-up and potentially worsen health outcomes (Chandra et al., 2024). Policymakers thus face a fundamental trade-off between financial sustainability and access to effective care and household welfare. Yet there is limited causal evidence on how copayments shape not only healthcare utilization, but also financial and health outcomes in low-income settings.

In this paper, we study the consequences of copayment design in health insurance using a randomized controlled trial in rural Uganda. In partnership with three high-quality private not-for-profit hospitals and a healthcare technology provider, we offer hospital-based health insurance to households under different copayment regimes for outpatient care. Eligible households are randomly assigned to receive insurance with different copayments (USD 0, 1.25, 2.50) or to a cash-transfer control group. Leveraging rich household survey data and detailed administrative records, we first estimate the effects of insurance on healthcare seeking, financial outcomes, and health outcomes. We then combine these experimental estimates with incentivized measures of households' insurance valuation and insurer costs to study how copayments shape selection, behavioral responses, and, in turn, net benefits from health insurance.

We begin by documenting the effects of insurance and copayments on healthcare seeking. Access to insurance substantially increases utilization of high-quality hospital care and leads households to substitute away from lower-quality facilities. These shifts are large and economically meaningful: zero-copayment insurance more than doubles visits to insured hospitals relative to the control group, with progressively smaller increases at higher copayment levels. At the same time, total facility visits fall slightly, suggesting that a single hospital visit substitutes for multiple lower-quality encounters.

Insurance significantly reduces out-of-pocket health expenditures and reliance on costly coping strategies such as asset sales and borrowing. Insurance also leads to significant reductions in sick days, missed work and school, and self-reported health problems relative to the control group. We furthermore document within-household spillovers: while insurance does not measurably change healthcare utilization among uninsured household members, their health improves, consistent with reduced disease transmission or other household-level channels. Together, these findings indicate that insurance for high-quality care delivers sizable health and financial-protection benefits, in contrast to much of the existing experimental literature in low-income settings, which often finds limited or no health gains from health insurance (see, e.g., Dupas and Jain, forthcoming; Malani et al., 2024; Haushofer et al., 2020; Thornton et al., 2010). One possible explanation for why our estimated health impacts are larger than in much of the prior literature is that, unlike many public insurance programs that primarily subsidize low-quality and congested care, our intervention connects households to a small set of high-quality hospitals through a tightly implemented insurance system.

Improvements in risk-coping and health outcomes do not differ meaningfully between low-, medium-, and high-copayment plans, despite large differential responses in healthcare utilization. In other words, while lower copayments induce substantially more healthcare utilization, they do not generate proportionally larger improvements in measured health or financial protection. This pattern creates a puzzle: why do households use much more care when copayments are lower, yet appear no healthier than those facing positive cost sharing? We find that lower copayments do not change the types of conditions treated, but they do draw individuals with relatively better baseline status into care. As a result, the marginal patients induced to seek hospital care at low copayments may have lower expected health gains from treatment, which could help explain why large increases in utilization do not translate into commensurate improvements in average health outcomes.

Our experimental design allows us to go beyond estimating treatment effects of copayments — the target of previous experimental and quasi-experimental work on copayments (see, e.g., Chandra et al., 2024; Brot-Goldberg et al., 2017; Buitrago et al., 2023). By combining randomized variation in copayments with incentive-compatible measures of insurance valuation and detailed administrative data on insurer costs, we can disentangle selection and behavioral responses, and study the implications

of copayment design for health insurance from a policy perspective, accounting for these factors.[1] For this purpose, at baseline, we elicit households' valuation of insurance relative to cash for each copayment level. These data allow us to measure how much cash households are willing to forego to receive insurance with different degrees of cost sharing — the cash transfer equivalent, especially relevant for a government comparing social protection policies.

Using detailed administrative data on insurer costs, we show that randomly assigned lower copayments increase average insurer expenditures through higher utilization and a larger share of costs covered per visit. However, we find no evidence of adverse selection: individuals who generate higher costs under a given copayment do not have systematically higher valuations for low-copay insurance than for high-copay contracts. These insights contribute to the literature on selection into health insurance, which to date has focused primarily on premiums rather than on copayments (see, e.g. Malani et al., 2024; Banerjee et al., 2014; Fischer et al., 2023; Banerjee et al., 2021; Asuming et al., 2024).

In the final part of the paper, we identify the copayment level that maximizes benefits net of costs under two approaches for measuring benefits. We begin with a revealed-preference approach, where expected benefits are defined by households' valuations of different health insurance products.We combine these valuations with administrative data on insurer costs — driven by both selection into insurance and subsequent utilization — to compute the net benefits of alternative insurance contracts. This framework enables us to compare copayment levels on a common money-metric scale and to identify the copayment that maximizes revealed net benefits. We find that households place high value on low-copayment insurance. Insurance valuations decline sharply as copayments increase, even at prices well above the market premium. When we combine these valuation patterns with insurer costs under different copayments, we find that lower copayments generate higher revealed-preference net benefits, including at the cash-insurance choice bundle that maximizes net benefits for each copayment level. These results are in line with previous work documenting high valuation for low copayments in other settings (Sydnor, 2010).

A complementary way to evaluate insurance design is to compute net benefits using experimentally estimated health and financial outcomes rather than households' valuation. This approach, which requires assigning a monetary value to several experimental outcomes, suggests that higher copayments perform similarly or better than lower ones. These results arise from the absence of differential health gains at lower copayments and the lower costs for the insurer (and thus for the policymaker who needs to compensate them) under high copayments. Optimal copayment under revealed preferences, therefore, differs from the copayment that would be chosen based solely on the estimated treatment effects.

[1] As in the classic study by Karlan and Zinman (2009), we wish to "observe unobservables", however, while in their study there is one dimension of interest - the interest rate of the loan, which affects selection and behavioral responses – in ours there are two: the cash-transfer alternative, which affects selection, and the copayment, which affects both margins.

The experimental analysis thus reveals a fundamental tension in copayment design. Conditional on being insured, lower copayments do not generate larger improvements in health or financial protection. However, they substantially increase insurance take-up, because a larger share of households prefers low-copayment coverage over a given cash alternative. As a result, lower copayments raise both coverage and insurer expenditures. Our experimental design makes it possible to study this policy trade-off: by combining randomized variation in copayments with incentive-compatible measures of insurance valuation and detailed data on insurer costs, we can evaluate how alternative copayment structures perform under different notions of social benefits, i.e., based on revealed preferences (as in standard consumer surplus analysis, e.g., Einav and Finkelstein, 2011) or treatment effects.

This paper illustrates the value of combining randomized insurance policy variation with incentive-compatible measures of preferences and administrative cost data. Such an approach makes it possible to evaluate not only what insurance does, but how much households value what it provides and what it costs to deliver. As low- and middle-income countries continue to expand health insurance coverage and integrate private providers into public systems, understanding these trade-offs will be central to designing financially sustainable and welfare-maximizing health insurance systems.

The paper proceeds as follows. Section 2 introduces the setting and Section 3 the experimental design. Section 4 discusses the treatment effects of insurance on healthcare seeking, risk coping, and health outcomes, by copayment level. Section 5 quantifies the net benefits of insurance under alternative approaches, accounting for selection, insurer costs, and treatment effects. Section 6 concludes.

2 Setting

Uganda operates a healthcare system that is divided into public and private healthcare. The public healthcare system is officially free at the point of use. In practice, however, public provision in rural areas is constrained by limited staffing, high absenteeism, frequent drug stock-outs, and long waiting times, as documented in facility surveys and administrative assessments of the public health system (Fitzpatrick, 2022). As a result, while official user fees are low or zero, households often face substantial non-price costs of care, including travel, waiting, and foregone income. In addition, prior work documents the presence of informal payments and other unofficial charges in parts of the public system, which further increase the effective cost of care for patients (McPake et al., 1999; Anderson et al., 2017).

Alongside the public system, Uganda has a large private healthcare sector that plays an important role in healthcare provision, particularly in rural areas. Private providers are highly heterogeneous, ranging from small clinics with limited diagnostic capacity to large mission and not-for-profit hospitals offering comprehensive care. Prices and quality vary substantially across providers, with evidence of large dispersion in both dimensions across facilities (O'hanlon et al., 2017). While some private

facilities offer markedly higher quality of care than public alternatives, private healthcare is typically financed out of pocket, which can make it unaffordable for low-income households and lead households to delay or forgo care.

In this setting, we partner with Streamline, a healthcare technology provider operating in Uganda. Streamline supplies hospitals with healthcare management software that digitizes detailed data on patient registration, visit-level care received – including services, drugs, and tests –, as well as patients' payments. In addition, Streamline administers vertically integrated hospital-based health insurance products for participating facilities. During the study period, Streamline's platform was active in approximately 50 hospitals across Uganda and covered over one million registered patients, with insurance products operating in twelve of these facilities at the time of the launch of the experiment.

For this research, we also collaborate with three private not-for-profit hospitals located in small towns: Kagando Hospital in Kasese District, Rugarama Hospital in Kabale District, and Nkozi Hospital in Mpigi District (see Figure A.1 for a map). We refer to these three hospitals as insured hospitals for the rest of the paper. While these hospitals are physically located in towns, their catchment areas extend well beyond urban centers and include predominantly rural populations in surrounding subcounties. All three insured hospitals had adopted Streamline's software and insurance infrastructure prior to the start of the experiment.

We initially utilize administrative records to describe these insured hospitals. Table B.1 reports the most common conditions treated in the insured hospitals in the experimental sample. Importantly, these insured hospitals not only provide specialist and emergency care, but also serve as points of contact for routine health needs in their catchment areas. In descending order of frequency, households receive care for: respiratory infections (e.g., coughs, colds), mild pain (e.g., headaches), pain with swelling (e.g., sprains), stomach/intestinal infections (e.g., diarrhea, worms), stomach acid problems (e.g., gastritis), and allergies and inflammation (e.g., skin rashes). For these conditions, patients receive five main categories of care. Based on the percentage of outpatient visits in which they occur, these are: services (89%), consultations (81%, the most frequent service type), drugs (85%), tests (65%), and procedures (4%). Tables B.2 and B.3 detail the specific drug and tests provided.[2]

Additionally, we utilize household survey evidence to compare the insured hospitals to other healthcare facilities in Table A.1. Other facilities can be classified into four categories, following government guidelines. Level 1 facilities typically serve villages (around 5,000 people), level 2 facilities typically serve one subcounty (around 20,000 people), and hospitals (including our insured hospitals) often serve multiple subcounties or even larger areas. The final category is clinics, which mostly serve villages, are private, and fall in quality between level 2 facilities and hospitals. In alignment with the

[2]Less common services include seeing a specialist for diabetes, dental problems, and pregnancy. Procedures consist primarily of dental work, wound treatment, and ear or eye interventions.

administrative data, we observe that insured hospitals provide a wide range of services, from general examination to specialist services, tests, drugs, procedures, and inpatient care. In contrast, general examinations are only available in 49% to 60% of clinics, level 1 facilities, or level 2 facilities. While tests and drugs are theoretically available in these facilities, specialist care and procedures are limited (in 10% to 22% of these lower-tier facilities). These lower-tier facilities also have substantially more reported problems with respect to personnel absenteeism, lack of equipment, and lack of drugs. Figure A.2 demonstrates similarly that insured hospitals score higher on quality and general impression, but lower on affordability and convenience to reach.

The standard insurance product offered through Streamline is a hospital-based plan that covers care at the enrolled facility. The annual premium is approximately USD 7–8 per person, and the policy is sold at the household level. This premium may, at least in some years, cover the care provided by the hospital to the insured members. However, it does not cover other costs, including both variable costs (e.g., outreach activities) and fixed costs (e.g., insurance management and administration). Insurance coverage includes outpatient consultations, commonly prescribed drugs, diagnostic tests, emergency care, and inpatient care. The product features copayments: outpatient visits require a fixed copayment of USh 5,000 (approximately USD 1.25 using the average exchange rate at the beginning of the study), relative to typical uninsured visit costs of around USD 10. Inpatient care involves proportional cost sharing. Copayments are paid at the time of healthcare. As described in more detail below, although the insured hospitals had existing insurance schemes prior to the study, we recruited households in catchment areas where insurance coverage was minimal or absent at baseline, which we verify using baseline survey data. The insurance product is thus introduced to largely uninsured populations in the study sample.

3 Experimental Design

3.1 Sample Selection and Baseline Survey

We initially gathered information on savings groups operating in the geographical catchment areas of the three hospitals. Savings groups are common in rural Uganda (Burlando et al., 2021) and represent standard target populations for the hospitals offering the insurance product. We conducted a brief field exercise with the group leaders to confirm the identity of members in each group and identify target respondents in each group.

We then conducted a baseline survey with 3,019 households: 1,015 in the catchment area of the Kagando Hospital, 990 in the catchment area of the Rugarama Hospital, and 1,014 in the catchment area of the Nkozi Hospital. The baseline survey collected information on demographics, economic activities, health-seeking behavior, risk coping, and health.

3.2 Interventions: Health Insurance and Unconditional Cash Transfer

The main treatment of interest is the provision of free health insurance at one of the three insured hospitals, under three different copayment levels. To benchmark this treatment and control for income effects, we also introduced an unconditional cash transfer. We discuss the details of these interventions below.

Health insurance. Free health insurance provision targets up to four household members: the respondent, another randomly selected adult, and two randomly selected minors. The coverage terms of the experimental insurance product follow the pre-existing product described in Section 2.

In the experiment we randomly vary three levels of copayment for outpatient healthcare (the inpatient copayment is fixed at 30% across): i) $T0$: zero copayment for up to ten visits per households (and USD 1.25 afterwards); ii) $T1$: a copayment of approximately USD 1.25 per visit (as in the standard insurance product); iii) $T2$: a copayment of approximately USD 2.50 per visit. The coverage for the health insurance started within a few weeks after the baseline survey. Individuals assigned to health insurance received detailed guidelines on how to use the insurance at the hospitals and a personal health insurance card.

Unconditional cash transfer. The cash transfer group receives a cash transfer equivalent to the value of the premium of the standard insurance product for four household members (USD 7.5×4=USD 30). The money is received via mobile money shortly after the conclusion of the baseline survey, matching the timing of the recruitment into the health insurance. In our analysis, we compare outcomes for households receiving health insurance to this cash transfer group, which we refer to as the control group throughout the paper.

Randomization. At the end of the baseline survey, we randomly assign 2,809 of the 3,019 surveyed households into four equally likely treatment arms (i.e., free insurance with three copayment levels and the unconditional cash transfer).[3] Randomization was conducted at the household level at the end of the survey, with no stratification.

3.3 Data Collection

Our study combines two complementary sources of data: survey data collected from all sample households and administrative data from the hospital system for insured individuals.

Survey data. In addition to the baseline survey, we conducted two follow-up surveys. Approximately six months after treatment assignment, we administered a phone-based midline survey. Approximately twelve months after treatment assignment, we conducted an in-person endline survey. Both surveys targeted the primary adult woman in each household and collected information on the

[3]We excluded 88 households that already had health insurance at baseline and 122 households assigned to positive insurance prices, in order to ensure that our insurance valuation was properly incentivized. We provide more details on the valuation elicitation in Section 5.1.

previous six months, including economic activities, health-seeking behavior, risk coping, and health outcomes.

Administrative data. For individuals assigned to the three insurance groups, we obtained detailed administrative data from the Streamline hospital management system. This data covers all visits by insured individuals to the three insured hospitals during the insurance period. The administrative data includes patient-visit level information on all services provided, including consultations, as well as drugs dispensed, laboratory tests performed, and medical procedures conducted. For each visit and type of care, for instance, a consultation, the data records both the patients' payment, directly coming from the billing system, and the uninsured price (what an uninsured patient would pay). The billing system automatically generates the data, so it is likely to be close to complete.

3.4 Regression Specifications

To identify causal effects of health insurance on healthcare seeking, risk-coping, and health outcomes — and how such effects vary by copayment — we leverage the randomized assignment of insurance coverage and copayment levels.

Average treatment effects. In our first specification, we estimate the average treatment effect of health insurance based on our survey data, pooling insurance products across all copayment levels. We estimate:

$$y_{i,h,j,t} = \alpha + \beta T_h + \gamma y_{i,h,j,t=0} + \mu_t + \mu_j + \epsilon_{i,h,j,t} \tag{1}$$

where $y_{i,h,j,t}$ is an outcome for individual i in household h in the catchment area of hospital j at time t. Survey outcomes typically refer to the six-month period before the relevant survey wave (midline, endline). Some outcomes are collected on the household level. T_h is a binary indicator that is one if the household is assigned to any insurance treatment (T0, T1, or T2) and zero if it is assigned to the control group. In our main specification, we pool the midline and endline survey data and include survey wave fixed effects (μ_t), but we also report separate results in the appendix. If available, we control for the baseline value of the outcome variable, $y_{i,h,t=0}$. We additionally include hospital fixed effects (μ_j). We cluster standard errors at the level of treatment, the household level. The coefficient β captures the average treatment effect of free insurance relative to an equivalent cash transfer.

Our main analysis focuses on the individuals eligible for health insurance, i.e., up to two adults and two children as described in Section 3. However, we also investigate within-household spillovers by comparing outcomes for non-eligible members between treatment and control households.

Treatment effects by copayment level. To examine how treatment effects vary with copayment

levels, we estimate:

$$y_{i,h,j,t} = \alpha + \beta_0 T0_h + \beta_1 T1_h + \beta_2 T2_h + \gamma y_{i,h,j,t=0} + \mu_t + \mu_j + \epsilon_{i,h,j,t} \quad (2)$$

where $T0_h$, $T1_h$, and $T2_h$ are indicators for assignment to the USD 0, USD 1.25, and USD 2.50 copayment insurance products, respectively. The coefficients β_0, β_1, and β_2 represent the treatment effects for each copayment level relative to the cash transfer control group. We test for joint equality of these coefficients to assess whether copayment levels significantly affect outcomes.

3.5 Summary Statistics and Randomization Balance

Table A.2 presents summary statistics for the baseline analysis sample. The sample households are predominantly rural farming families. The average household size is 5.70 members, with 91% of households having children. The mean age of adults in the sample is 39.69 years, and the average age of children is 9.00 years. Most household heads are farmers (57%), followed by self employment (22%). Food insecurity is substantial in this population. At baseline, 58% of households report worrying about not having enough food, and 40% report running out of food in the period before the survey. This economic vulnerability points to the potential importance of financial protection from health shocks for this population.

Table A.3 provides further summary statistics on health-related variables and also examines the balance across treatment arms. Since the main sample refers to insured household members, only those are included in this table. On average, a household member is ill 7.04 days in a given year, missing 3.95 work days for adults and 1.80 school days for children. In the past month, 12% of members have visited any health facility; only 2% have visited an insured hospital. On average, they have spent USD 1.74 on health expenses in total in the past month. With households having on average USD 61.52 in savings, 29% report having taken a loan in the past year for health. While few households report mental illnesses like anxiety or depression, worries about health and medical expenses are widespread, with 41% stating that they are very worried about health and 55% that they are very worried about medical expenses in particular.

With respect to balance, we examine the balance of C versus T, where T pools across T0, T1, and T2, in Column (3). For this analysis, we run a specification similar to Equation 1, with the baseline outcome as a dependent variable rather than as a control. We additionally separately examine the balance of C versus T0, T1, and T2. The respective coefficients are reported in Columns (5)-(7) (see Equation 2). We also test for equality of the coefficients in Column (8). Critically, the randomization achieved balance in physical health outcomes. T2 appears to have stronger mental health related to anxiety or depression, but worries about health and medical expenses are balanced. A caveat of our

analysis is that despite the randomization, T0 appears to have higher healthcare utilization at baseline, which is reflected in some correlated outcomes, such as visits to the insured hospital and health expenses. We perform several strategies to address this concern. First, we show that our results are robust to alternative sets of control variables, including those selected via post-double selection Lasso (Belloni et al., 2014; Cilliers et al., 2024). Second, we incorporate robustness tests that exclude T0.[4]

3.6 Treatment Compliance: Insurance Adoption and Copayments

Before presenting our main results, we verify that our treatment variation induced meaningful variation in insurance adoption and copayments. Table 1 reports health insurance product knowledge and satisfaction, using survey data. Across all three treatment groups, 88% report owning health insurance, while in the control group, only 5% report having health insurance during the experimental period.[5] Conditional on reporting to own health insurance, households demonstrate a high knowledge of their respective copayment levels: 73% of households that were assigned to T0 correctly report a copayment of USD 0. 93% of households assigned to T1 correctly say they have a copayment of USD 1.25, and 90% of households assigned to T2 report a copayment of USD 2.50. Ten percent of households report having had problems with insurance. As we document more in detail in Section 4, households also report using health insurance, with usage varying by treatment groups: 49% of households in T0 report having used insurance, 40% in T1, and 35% in T2. Households are generally satisfied with the insurance, with satisfaction decreasing slowly with copayment levels: On a range from one to 5, where 5 is the highest value, T0 reports an average score of 4.14, T1 of 4.09, and T2 of 3.97.

Additionally, we validate our treatment variation in the administrative data, which is only collected for insured individuals. Figure B.1 depicts the percentage of outpatient visits with a certain copayment amount, over all outpatient visits, by treatment arm. We find that in the T0 arm, over 66% of visits are concentrated around the USD 0 copayment (in a range of USD 0 to USD 0.25). In the T1 arm, 58% of visits fall in a range of USD 1.00 and USD 1.50, and in the T2 arm, 48% fall in a range of USD 2.25 and USD 2.75. While the copayment can also take other values — for instance, when households obtain services or drugs that are not covered by the insurance — this pattern provides evidence that treatment assignment was implemented successfully in the hospitals.

4 Treatment Effects of Insurance

We analyze the treatment effects of insurance on healthcare seeking, risk coping, and health outcomes. Risk coping and health outcomes are obtained from the survey data, while measures of healthcare-

[4]Table A.4 demonstrates that none of the variables are statistically different in T versus C in the baseline, and health care utilization is balanced, considering only T1 and T2.

[5]There are two reasons why some treated households may report not owning health insurance. First, households might not be aware that they own health insurance, despite our introduction of the insurance. Second, in the endline, some households' insurance had just ended when we interviewed them.

seeking outcomes come from both survey and administrative data. Throughout, we investigate both the effect of insurance pooling across all three copayment levels (Equation 1) as well as the differential effect by copayment (Equation 2).

4.1 Healthcare Seeking

4.1.1 Survey Data

Healthcare-seeking by facility type. Table 2 presents treatment effects on healthcare utilization by type of healthcare facility. Insurance has a large and significant effect on visits to the insured hospitals: treated individuals have, on average, 0.07 more visits to insured hospitals (relative to a control mean of 0.05 visits per half-year), representing more than a doubling of utilization. This effect is significant at the one percent level. Looking at all hospital visits (not just insured hospitals), we see a similar pattern: insurance increases hospital visits by 0.06 (75% increase relative to the control mean of 0.08).

Additionally, insurance causes substantial substitution away from lower-tier facilities. Visits to these decrease by -0.01 to -0.04, or from 14% to 27%. This substitution pattern suggests that insurance allows households to access higher-quality hospital care instead of relying on lower-tier facilities. The substitution toward hospitals is economically meaningful because, as we documented in Section 2, hospitals generally provide higher quality care. This quality difference may contribute to the health benefits we document below.

Overall healthcare-seeking. Despite the relatively large increase in visits to the insured hospitals, Table 3 shows that insurance actually causes a small decrease in overall healthcare facility visits, both on the extensive and intensive margin. Treated individuals have 2 percentage points lower probability of any facility visit (5% relative to the control mean of 41%) and 0.03 fewer total facility visits (6% relative to the control mean of 0.51). These effects, while statistically significant, are modest in magnitude.

The pattern – more visits to insured hospitals but fewer total visits – suggests that a single hospital visit may substitute for multiple visits to lower-level facilities. This could occur if hospital care is more effective, resolving health issues that would otherwise require repeated visits. Alternatively, the higher quality of hospital care might include more comprehensive treatment at a single visit.

Routine healthcare visits do not change significantly with insurance. This suggests that the changes in utilization are driven by treatment of acute conditions rather than increased prevention.

Total health expenditures decrease with insurance. Treated individuals spend USD 0.28 less (5.6% of the control mean of USD 5.02 per half-year). The effect is significant at the one percent level. This reduction in out-of-pocket costs represents one of the primary benefits of insurance, providing financial protection against health shocks.

Treatment effects by copayment level. The effects on healthcare utilization vary with copayment levels. The increase in visits to insured hospitals is 0.09 for T0 (USD 0 copay), 0.07 for T1 (USD

1.25 copay), and 0.04 for T2 (USD 2.50 copay). The difference among the three treatment arms is statistically significant (p<0.01). The pattern is similar for all hospital visits. There is no significant difference across copayment levels in the degree of substitution away from lower-tier facilities. All three insurance groups show similar reductions, suggesting that the decision to substitute toward hospital care does not depend on the copayment level.

The reduction in total facility visits is larger for the high copayment group: -0.06 visits for T2 compared to -0.01 for T0 (p=0.01 for test of equality across the three coefficients). The reduction in total health expenditure is approximately equal across copayment levels.

These patterns suggest multiple margins of adjustment. Better hospital care early in an illness episode may reduce the need for subsequent visits across all copayment levels. However, higher copayments may create an additional constraint, limiting the total number of hospital visits that households can afford, even with insurance. The net effect on total utilization reflects the balance between these forces.

4.1.2 Administrative Data

Summary statistics. The administrative data provides detailed information on the care households receive at the insured hospitals. Overall, 16% of insured individuals have at least one outpatient visit during the insurance year, averaging 1.82 visits among those with any outpatient visit. Inpatient visits are rare (only 1% of individuals), so we focus exclusively on outpatient care.[6]

Conditional on having an outpatient visit, patients receive USD 17.16 in care, comprising USD 4.15 in copayments and USD 12.33 in insurance coverage. Given that patients with any outpatient visit average 1.82 visits, this translates to USD 10.29 per individual visit (USD 2.44 copayment, USD 7.63 covered). Copayment errors are negligible, occurring for less than 0.5% of individuals.

Treatment effects. The administrative data mirrors the key pattern observed in the survey: visits to insured hospitals decrease with higher copayments. By the end of the insurance year, approximately 40% of T0 households have visited an insured hospital, compared to 32% in T1 and 28% in T2. These figures align closely with self-reported data from the surveys. Across both survey waves, 46% of households in T0, 39% in T1, and 35% in T2 report having visited an insured hospital. In the endline survey, 38% of T0 households, 31% in T1, and 27% in T2 report having used their insurance.

Table B.4 reports the results for patient-level regressions, based on Equation B.1. Initially, this table confirms the pattern of decreasing outpatient visits as copayment increases. This pattern holds across different types of care, such as services, drugs, and tests. The probability of having a visit with

[6]Direct matching between data sources confirms their concordance. At the household level, 84% show identical information on whether they visited the insured hospital, and 66% match on visit frequency. Similarly, 85% of households show consistent reporting of visits to insured hospitals and insurance use on the extensive margin. At the individual level, 84% match on whether they visited the insured hospital, and 78% match on visit frequency. These concordance rates validate both the survey measures and the quality of the administrative data.

coverage decreases by the copayment amount, while the probability of having a visit with copayment increases with the treatment arm copayment. Similarly, while the monetary value of care and coverage decreases with copay, the value of copayment increases.[7]

Finally, Figure 1 demonstrates the dynamic patterns of healthcare utilization. It depicts the share of households with an outpatient visit at a given point in time since the insurance start. We find that the differential utilization by copayment level emerges early and persists throughout the insurance year. The biggest difference occurs between USD 0 and USD 1.25 copayments, with a smaller marginal effect of increasing the copayment from USD 1.25 to USD 2.50. Figures B.2 and B.3 depict similar patterns for different types of care, such as services, drugs, or tests. Equipped with the effects on healthcare utilization, we next examine the impact on risk coping.

4.2 Risk Coping

Table 4 examines effects on household risk coping strategies. Insurance significantly reduces the need for costly coping mechanisms. An index of risk coping behaviors decreases by 0.15 standard deviations ($p<0.01$). Insurance reduces foregone healthcare significantly by 4 percentage points (13% of the control mean). This suggests that insurance not only shifts where people seek care but also reduces the extent to which financial constraints prevent access to needed care entirely. Investigating individual risk coping strategies that are summarized in the risk coping index, insurance decreases asset sales by 5 percentage points (25% of the control mean) and reductions in food consumption by 3 percentage points (23% of the control mean).

Effects on savings and borrowing provide additional evidence of financial protection. While the probability of saving does not change significantly, the current amount of savings decreases by 14% (marginally significant), possibly because insurance reduces precautionary saving motives. The probability of taking out a loan decreases by 4 percentage points (5% of the control mean), with a corresponding 15% reduction in total borrowing amounts. Loans specifically for healthcare purposes decrease by 3 percentage points (9% of the control mean). Taken together, these results suggest that households need to rely less on savings and loans with access to insurance.

Treatment effects by copayment levels. The effects on risk coping do not vary significantly across copayment levels for most outcomes. This suggests that insurance provides substantial financial protection even with USD 2 copayments, relative to being uninsured.

4.3 Health

Table 5 presents treatment effects on health outcome measures. Insurance leads to significant improvements in physical health, compared to the control group (i.e., the cash-transfer group). Self-

[7] Table B.5 shows that the results are robust to including controls from the baseline survey.

rated health status at the time of the survey, measured on a scale from 1 to 5, increases by 0.08 standard deviations (p<0.01). The number of sick days decreases by 1.19 days over a six-month period (13% relative to control mean of 9.12 days), and work days missed due to illness decrease by 0.65 days (15% relative to control mean of 4.36 days). For children enrolled in school, school days missed due to illness decrease by 0.35 days (24% relative to control mean of 1.48 days).

These improvements in physical health are accompanied by reductions in health-related worries. An index of overall worry decreases by 0.09 standard deviations (p<0.01), with similar effects on worry about health problems and worry about affording medical expenses. Lower worries represent an additional dimension of welfare gain from insurance beyond the direct physical health improvements. However, we do not find significant effects on a broader mental health index that includes measures of anxiety or depression.

Treatment effects by copayment level. Examining heterogeneity by copayment level, we find no clear pattern in physical health outcomes. All three copayment groups show similar improvements in self-rated health, sick days, and days missed from work or school. The equality tests generally cannot reject the null of equal effects across copayment levels. There is some evidence that the reduction in worries is largest for the lowest copayment group. The USD 0 copayment group shows a 0.12 SD decrease in overall worry, compared to 0.08 SD for T1 and 0.07 SD for T2, though these differences are not statistically significant.

Why do lower copayments increase hospital utilization without improving health outcomes? Access to health insurance improves health outcomes. However, the absence of differential health effects by copayment level, despite large differences in healthcare utilization, suggests that the additional utilization induced by lower copayments does not translate into proportional improvements in measured health outcomes on average. We consider several potential explanations for this pattern.

First, copayments may affect the type of health events for which households visit an insured hospital. For example, households facing lower copayments might seek hospital care for less severe conditions. Our administrative data allow us to assess this possibility. The statistics indicate that individuals across copayment groups visit insured hospitals for similar diagnoses (Table B.1) and receive comparable drugs (Table B.2) and tests (Table B.3). Consistent with this, survey data indicate that self-reported pain levels and illness episode duration are similar across hospital visits by individuals from different copayment groups. Thus, while copayments strongly affect the likelihood of visiting an insured hospital, we do not find evidence that the types of health events prompting these visits differ systematically by copayment level.

Second, copayments may affect which individuals seek hospital care. Table A.5 provides suggestive evidence in this direction. Among individuals who visit an insured hospital, those in lower-copayment groups have better (standardized) baseline self-reported health than those facing

higher copayment: -0.23 in T0, -0.44 in T1, and -0.29 in T2, with the first difference significant at $p < 0.01$. These patterns are consistent with lower copayments inducing relatively healthier individuals to seek care, even for similar health events. For given symptoms, the returns to visiting the hospital may be lower for generally healthier individuals, which may help explain why a higher number of hospital visits in low copayment groups does not translate into better health outcomes at endline.

Third, some health benefits of additional utilization may not be captured by our outcome measures or time horizon. For example, lower copayments could generate short-lived improvements shortly after a visit that are not reflected in outcomes measured over a six-month period. While this remains possible, it appears unlikely that such effects would not be reflected in any of our measured outcomes, including sick days or days missed from work or school.

Finally, households' valuation of insurance declines sharply with copayments, even though health outcomes do not. As we discuss in the next section, this pattern is consistent with households valuing protection against rare or high-cost events, financial risk, or other outcomes that are not fully captured by our health measures.[8]

Comparison to other studies. Our findings of significant health and financial protection benefits of insurance stand in contrast to some previous studies of health insurance in developing countries. Table A.6 compares our results to a selection of recent experimental and quasi-experimental studies, summarized in Dupas and Jain (forthcoming). While some studies find reductions in out-of-pocket expenditures and catastrophic health spending, effects on healthcare utilization and especially health outcomes are often not statistically significant.

Possible explanations for why our health impacts are larger than in much of the existing literature is that both the quality of care insured and the effectiveness of insurance implementation differ sharply across settings. Many public insurance programs in low-income countries mainly expand access to already congested and low-quality public facilities, where absenteeism, weak diagnostics, drug stock-outs, and informal fees limit the scope for insurance to translate into health gains. In such environments, insurance may reduce prices without meaningfully changing the care received. In our setting, by contrast, insurance explicitly grants access to a small number of high-quality not-for-profit hospitals with reliable drugs, diagnostics, and trained staff, and is implemented through a tightly managed system that limits common frictions such as card rejection or informal payments. While we cannot separately identify these channels, together they suggest that insurance may generate larger health improvements when it reliably connects households to high-quality providers and when institutional frictions that undermine coverage elsewhere are minimized.

[8] Consistent with this interpretation, households facing lower copayments during the experimental year continue to report higher insurance valuation at endline.

4.4 Within-Household Spillovers

We investigate within-household spillovers on uninsured household members in healthcare utilization and health outcomes, measured at the individual level. Appendix Table A.7 shows no significant treatment effects on healthcare utilization outcomes, either when pooling all insurance treatments or when disaggregating by copayment level. This indicates no evidence of spillovers from insured to uninsured household members in healthcare utilization.

In contrast, Appendix Table A.8 provides evidence of improved health outcomes among uninsured household members. In particular, uninsured members experience fewer sick days and fewer days missed from work or school, while the estimated effect on self-reported health status is positive but not statistically significant. As with utilization outcomes, there is little evidence of heterogeneity by copayment level.

These findings suggest the presence of within-household spillovers in health outcomes but not in healthcare utilization. One possible interpretation is that uninsured members benefit from reduced disease transmission within the household. However, other mechanisms may also contribute, such as improved health knowledge or behavioral changes within the household, or the sharing of medicines obtained through insured hospital visits.[9]

4.5 Supplementary Analysis and Robustness

In this section, we break down results by midline and endline survey, by age and gender, and discuss robustness checks.

Midline and endline survey. In our main analysis, we pool the midline and endline surveys. We now examine these surveys separately. Our key results on healthcare utilization hold in the midline (Table A.11) and endline survey (Table A.12). One exception is the results on overall facility visits on the extensive and intensive margin, regardless of the facility level. These results are negative in the midline survey but only become significant in the endline survey. The risk coping index decreases significantly in midline (Table A.13) and endline survey (Table A.14), while whether a household has forgone healthcare or not appears to be primarily driven by the midline result. In terms of physical health outcomes, we find significant health improvements at midline (Table A.15) and at endline (Table A.16). The worry effects are driven by the midline and insignificant at endline. One potential explanation is that at the time of the endline survey, health insurance was either already expired for a small share of households or was expiring soon. Overall, most of our findings hold in the midline and the endline survey, demonstrating persistence of our results throughout the insurance period. This is in alignment with the continuous increase in healthcare utilization over the insurance period that we observe in the administrative data (see Figure 1).

[9] Table A.9 and Table A.10 provide results for the full set of household members, insured and uninsured.

Age and gender. We report results by age and gender. We classify respondents by age at baseline into three groups: adults (18 years and above), minors (17 years and below), and young children (5 years and below). We find that our results on healthcare seeking hold for adults (Table A.17), minors (Table A.18), and young children (Table A.19). Both adults (Table A.20) and minors (Table A.21) experience significant improvements in health, but we are likely underpowered to detect effects for young children; the effects on health rank and sick days indicates that the young children are healthier but the effects are not statistically significant (Table A.22). In terms of gender, we find that our key results on healthcare utilization hold for female individuals (Table A.23) as well as male individuals (Table A.24). The same holds true for health outcomes, even though some health outcomes are insignificant for male individuals (see Table A.25 and A.26). Overall, we conclude that our results are not driven by one specific subgroup, and household members, regardless of age and gender, are likely to benefit from health insurance.

Robustness. One caveat of our analysis is that, despite randomization, households in T0 appear to have higher healthcare utilization at baseline, which is reflected in some correlated outcomes, such as visits to the insured hospital and health expenses. Balance was achieved on physical health outcomes. To address this, Table A.4 demonstrates that there are no statistical differences between the control group and pooled treatment groups after excluding T0, and very few imbalances between T1 and T2. We thus repeat our main analysis excluding households in T0. We find that all our results hold in this robustness test (see Table A.27 for healthcare seeking, Table A.28 for risk coping, and Table A.29 for health outcomes).

As an additional robustness check, we employ post-double selection Lasso estimation to address potential concerns about baseline imbalances and improve precision (Belloni et al., 2014). This method selects control variables from a comprehensive set of baseline covariates (those in Tables A.2 and A.3) in two steps: first, selecting variables that predict the outcome, and second, selecting variables that predict treatment assignment. Table A.30 provides the results for healthcare seeking, Table A.31 for risk coping, and Table A.32 for health outcomes. Columns (3) and (9) report the number of control variables selected by Lasso for each outcome. The treatment effects estimated using post-double selection Lasso are highly consistent with our main specifications, both in magnitude and statistical significance. This consistency across specifications provides confidence that our results are not driven by chance imbalances or ad hoc covariate selection, but reflect treatment effects.

5 Quantifying the Net Benefits of Health Insurance

In this section, we leverage our experiment to study the implications of copayments for health insurance design from a policy perspective. We consider the problem of a policymaker choosing between two instruments: providing health insurance — financed through transfers to healthcare providers — and

delivering resources directly to households in the form of cash transfers. We examine how copayments shape: i) the share of households selecting into insurance under different values of cash transfers; ii) the insurer costs for healthcare provision, which depend both on selection into insurance and its behavioral effects on healthcare utilization. We then combine these elements to identify the copayment level that maximizes benefits net of costs under two approaches for measuring benefits. First, we measure households' benefits based on the revealed preferences inferred from their product valuation. Second, we compute benefits by combining treatment effects on several outcome variables. We study optimal insurance design (i.e., copayment levels) under these two approaches, and conclude by discussing potential sources of discrepancy between them.

5.1 Insurance Valuation

We measure the amount of cash transfers that households need to receive to forego insurance under different copayment levels. A large cash-equivalent amount implies that a social planner would need to make substantial cash transfers to match the expected welfare benefits generated by health insurance, providing a rationale for preferring direct provision of health insurance over cash transfers.

Elicitation. We elicit health insurance valuation at the beginning of the baseline survey. After the four household members eligible for the insurance are randomly chosen (see Section 2), we elicit insurance valuation using a multiple price listing (MPL) exercise. For each insurance product with a different copay, we ask the survey respondent to choose between the free insurance product and an amount x in cash. In this figure and in all the other figures of this section, x varies from 0% to 300% of the standard premium (USD 30 per household) in 20% steps (i.e., 0%, 20%, ...). The elicitation was conducted with careful attention to comprehension and incentive compatibility. Enumerators provided detailed explanations of the insurance product and the choice task, conducted practice rounds with a test item, administered comprehension checks, and showed physical cash to make the alternatives concrete. To ensure incentive compatibility, we randomly selected 4% of the households surveyed at baseline (N=122) to actually receive one of their MPL choices, chosen at random from their elicitation responses. We offered these households the insurance at a positive premium based on their MPL responses and dropped them from the rest of the study.

Valuation. Figure 2 shows the proportion of households choosing insurance over cash at values of the offered cash amount, separately for each copayment level. At the current premium (approximately USD 30 for four household members), 77% of households prefer insurance with USD 0 copayment over the cash equivalent, 69% prefer insurance with USD 1.25 copay, and 62% prefer insurance with USD 2.50 copay. Insurance valuation is high even at prices well above the standard premium. However, the standard premium may be the result of subsidies that help the insurer cover fixed and variable outreach costs. Therefore, we consider valuation for values of the premium up to three times the

standard premium. At this level (approximately USD 85), 48% of households still prefer insurance with USD 1.25 copayment over the cash equivalent.[10]

5.2 Insurer Costs

Besides affecting health insurance valuation, copayment levels also shape the costs that health insurance providers must cover in order to offer the product, in three ways. First, total costs will increase with the number of insured patients, which, as discussed in the previous section, decreases with the copayment. Second, insurer costs for a given amount of care are also mechanically decreasing in copayments, since patients pay a higher share of the total costs.

In addition, average gross costs (i.e., before subtracting any copayments) *per insured patient* may decrease with copayment level, through selection and behavioral effects. Figure 3 - Panel A indeed illustrates that insurer's average costs per insured individual decrease in copay. Two classic mechanisms relating to insurance design could drive this result. First, copayments may alter selection into insurance, i.e., the type of households choosing insurance under different insurance–cash tradeoffs. Second, copayments may induce behavioral responses by influencing healthcare utilization among insured individuals (for a given type). We quantify these channels using administrative data on healthcare utilization, and visit-level costs, together with our experimental elicitation of valuation for each copayment level (irrespective of subsequent treatment assignment).

Insurer costs induced by selection. Lower copayments could affect average costs per insured individual by changing the composition of individuals who select into insurance. We test this hypothesis using a key feature of our design, which allows us to compare average insurer costs under a common ex-post copayment level (USD 1.25) across the sets of individuals who would choose insurance over a given cash amount under each of the three copayment regimes. Figure 3 - Panel B describes the results. In this figure, each point captures the average gross insurer cost under the USD 1.25 copay, averaging across the set of people who would choose insurance with the relevant copay over the relevant cash equivalent on the horizontal axis.

At each cash threshold, average costs are very similar across copayment groups. This pattern indicates that variation in copayments does not generate economically meaningful adverse (or advantageous) selection. Figure 3 - Panel B also suggests absence of adverse selection by the (opportunity) cost of insurance: for each of the three copayment levels, average costs are quite flat in x.

Insurer costs induced by behavioral responses. Copayments may also increase average costs per insured individual by changing health-seeking behavior. Our experimental design allows us to quantify this mechanism, controlling for selection, by looking at average gross insurer costs under

[10] The valuation results are robust to focusing only on the first elicitation for each household; the order of elicitation across products with different copayments was randomized to address concerns about ordering effects.

different ex-post copayment levels among the set of households selecting into an insurance product with a common copayment level. Figure 3 - Panel C presents the results, focusing on individuals who would select into the USD 1.25 product at various levels of the cash transfer, but are then assigned to different copay levels. Insurer costs are decreasing in ex-post copayment throughout the valuation distribution, consistent with the treatment effects of copayments on health-seeking behavior and visits to insured hospitals (Section 4.1).

Copayments and total insurer costs. Finally, we study the relationship between copayments and total insurer costs, which depends on the number of insured individuals (Figure 2), as well as on their type (Figure 3 - Panel B) and their behavioral responses to copayments (Figure 3 - Panel C).

Figure 3 - Panel D reports gross total insurer costs (i.e., before subtracting copayments). At each valuation level, average insurer costs per individual in the full sample—unconditional on insurance choice—are highest under the low-copayment contract, intermediate under the mid-copayment contract, and lowest under the high-copayment contract. This ordering reflects two reinforcing channels: lower copayments increase the number of individuals who select into insurance and also raise insurer costs per insured individual through higher utilization, consistent with the behavioral responses to copayments documented above.

Figure 3 - Panel E presents the results for net total insurer costs, after subtracting any copayment paid by the insured individual. The figure displays the same ordering of the gross costs: net costs are markedly decreasing in copay levels.

5.3 Copayments and Insurance Design: A Revealed-Preference Approach

Building on the previous analysis, we evaluate insurance design through a revealed-preference approach. We combine households' valuation of insurance with insurer costs to assess how the net benefits of insurance — defined as the difference between household valuation and insurer costs — vary with copayment levels. We proceed in two steps. First, for each copayment level, we identify the alternative cash transfer — the amount a household would receive if it forgoes insurance — that maximizes total revealed net benefits. Second, we estimate the copayment level that yields the highest total revealed net benefits.

The optimal cash–insurance choice bundle for a given copay. For a given copayment level c (i.e., USD 0, 1.25, or 2.50 in our experiment), we consider the problem of a social planner who offers households a choice between health insurance with copayment c and a cash transfer x. The planner evaluates this choice using a revealed-preference objective and selects the cash transfer $x^*(c)$ that maximizes expected net benefits:

$$f(x,c) = \sum_{i:V(i,c)\geq x} V(i,c) - \big(E(i,c) - C(i,c)\big), \tag{3}$$

where i indexes households, $V(i,c)$ denotes household i's valuation of the insurance product with copayment c, $E(i,c)$ is the total value of healthcare received (e.g., consultations, tests, and drugs) by household i at the insured hospital, and $C(i,c)$ is the total amount of copayments paid by the household over the insurance year. Copayments enter the objective as a subtraction from insurer costs because they are paid by households and are therefore internalized in households' valuation of the insurance product.

This formulation transparently illustrates the trade-off faced by a planner when setting copayment levels. Lower copayments tend to increase households' valuation of insurance, raising revealed benefits, but may also increase insurer costs through changes in selection into insurance, utilization, and covered costs per visit.

Figure 4 - Panel A plots the empirical value of the objective function $f(x,c)$ for each copayment level c = USD 0, 1.25, 2.50, normalizing the cash-transfer axis by the standard premium level (so that $x = 100$ corresponds to USD 7.50 per person). For each copayment level, the objective function is hump-shaped in the alternative cash transfer. At low values of x, increasing the cash offer raises net benefits because the reduction in insurer costs dominates the low revealed benefits of the marginal households choosing cash over insurance. At higher values of x, however, more households forego insurance, and the resulting loss in their (higher) valuations outweighs the cost savings, leading total surplus to decline. The cash transfer that maximizes revealed net benefits varies by copayment: $x^*(c=0) = 80$, $x^*(c=1.25) = 40$, and $x^*(c=2.50) = 20$, where x is again expressed as a percentage of the current premium.

Optimal copayments. We characterize how revealed net benefits vary with the copayment level c by evaluating the objective function at the optimal cash transfer, $f(x^*(c),c)$. Figure 4 - Panel A shows that, across the full range of cash-transfer values, revealed net benefits are systematically higher for the low- and mid-copay products than for high-copay one. These patterns indicate that the increase in households' valuation induced by lower copayments more than offsets the associated increase in insurer costs. Although the highest level of copayment reduces insurer expenditures by limiting utilization, these cost savings are quantitatively smaller than the loss in valuation generated by reduced coverage generosity. This result also holds when comparing net revealed preferences at the copay-specific optimal $x^*(c)$.

Thus, within a revealed-preference framework, the low- and mid- copayment products, $c = 0$ and $c = 1.25$, paired with their optimal cash transfer alternatives ($x^*(c=0) = 80$ and $x^*(c=1.25) = 40$), generate the highest revealed net benefits, with no meaningful differences between the two products (USD 42.1 and 42.6 per household for $c = 0$ and $c = 1.25$, respectively, versus USD 38.7 for $c = 2.5$). Intuitively, while moving from to high copayments lowers utilization and costs, it also sharply reduces households' willingness to retain insurance relative to cash. In our data, this valuation response

dominates the cost savings from high copayments, leading low- and mid- copayment insurance to outperform higher-copayment alternatives in terms of revealed net benefits.

5.4 Copayments and Insurance Design: A Treatment-Effect-Based Approach

Lower copayments generate higher valuations and higher insurer costs. However, in our experiment, they do not induce differential treatment effects on health outcomes, nor on risk-coping. This suggests that policy choices based on valuation versus treatment effects may lead to different results. Here, we first quantify the benefits of different insurance products, once accounting for the selection induced by different cash transfer alternatives. Second, we identify the optimal copayment under these estimated benefits. Finally, we discuss potential sources of discrepancy in the net benefits by copayments and in the solution to the social planner problem under the revealed-preference and the treatment-effects-based approaches.

5.4.1 Simulating Treatment Effects Accounting for Selection

Our experimental analysis focuses on subjects randomly assigned to the main experimental sample, whose group assignment does not depend on their insurance valuation. In our analysis, we can therefore estimate treatment effects for the entire sample. However, incentive-compatible elicitation also allows us to simulate counterfactual outcomes under alternative cash offers, accounting for selection, and hence estimate Intention To Treat of such cash offer policies. To conduct this analysis, we introduce the following notation. For individual i, let:

- $Y_i^1(c)$ denote the potential outcome if insured with copayment level $c \in \{\text{USD } 0, 1.25, 2.50\}$
- Y_i^0 denote the potential outcome if uninsured (receiving cash transfer)
- $T_i(x, c)$ denote whether an individual would choose insurance with copay c over cash transfer x

For each individual, we observe one realized outcome Y_i (determined by treatment assignment) and all insurance choices $T_i(x, c)$ for $c \in \{0, 1.25, 2.50\}$ and $x \in [0\%, 300\%]$ (from the valuation elicitation). By randomizing insurance assignment regardless of demand, we identify average treatment effects $\Delta = \mathbb{E}[Y_i^1(c) - Y_i^0]$. As we randomize insurance assignment, these effects abstract from valuation-based selection. However, we can simulate potential outcomes under different cash offers and copayments:

$$\tilde{Y}_i^1(x, c) = Y_i^1(c)T_i(x, c) + Y_i^0(1 - T_i(x, c)), \tag{4}$$

and, in turn, simulated Intent to Treat

$$\tilde{\Delta}(x, c) = \mathbb{E}[\tilde{Y}_i^1(x, c) - Y_i^0]. \tag{5}$$

We estimate these simulated Intent to Treat for two health outcomes: number of sick days and total health expenses. We report outcomes at the household level, thus accounting for within-household spillovers, and aggregate at the annual level. Figure 5 presents the results in Panels A and B, respectively. Each point in these figures measures the average difference from the control group in the simulated outcomes at the value x of the cash transfer, by copay c. Panel A shows that simulated treatment effects on sick days do not exhibit a strong relationship with copayments: the value of copayments that maximizes treatment effects (in absolute value) varies by the level of the cash transfer. For each copayment group, health gains are larger at low values of the cash transfer, which induce higher enrollment. Panel B shows that reductions in health expenses are larger for medium- and high- copay for values of the cash transfer up to the regular insurance premium, and similar across copays afterwards. Lower reduction in the low-copay group may arise from the fact that households in this group visit the hospital more often and are occasionally also charged for non-insured items.

5.4.2 Net Benefits under Different Copayments

Next, we use the experimentally estimated treatment effects to compute net benefits under alternative copayment levels. We define

$$g(x,c) = \sum_{i:V(i,c)\geq x} B(i,c) - \big(E(i,c) - C(i,c)\big), \tag{6}$$

which mirrors Equation 3, with the key difference that $B(i,c)$ — the monetary value of the estimated benefits from insurance with copayment c for individual i — replaces the valuation $V(i,c)$. As before, $E(i,c)$ denotes total insurer expenditures, and $C(i,c)$ denotes copayments paid by households. Copayments enter the objective as a subtraction from insurer costs because they are already accounted for in B (i.e., they enter as health expenses).

To compute B, we combine simulated outcomes into one money-metric outcome. For this purpose, we must assign a monetary value to an averted sick day, and combine it with the negative of the value of health expenses. We use the value of a daily wage in rural areas, approximately USD 2 (Uganda Bureau of Statistics, 2021).[11] Figure 5 - Panel C plots simulated treatment effects for the monetary value of health benefits. The copayment with the highest health benefitss depends on the value of the cash transfer, x, with highest copay inducing larger benefits for low values of x, and the medium copay dominating at high values of x.

Finally, Figure 4 - Panel B presents illustrates the net benefit function $g(x,c)$. For each copay level, the highest net gains are obtained for $x = 0$, i.e., no compensation for households who forego

[11] Importantly, it is not possible to credibly quantify the monetary value of other outcomes affected by the treatment, such as the reduction in loans or asset sales. We discuss the implications in the next section.

insurance. At this value of the cash transfer, the highest copay level, $c = 2.50$, delivers the highest net benefits.

For each copayment level, this outcome is maximized at a zero value of the cash transfer (i.e., $x^*(c) = 0$ for $c = \text{USD } 0, 1.25, 2.50$). At this cash offer, the optimal level of copayments in this treatment-based approach — i.e., the copay maximizing net health benefits — is the highest one, $c = 2.50$. Intuitively, higher copayments achieve similar health benefits at lower insurer cost. Because the estimated health benefits exceed insurer costs at all copayment levels, net benefits are maximized by maximizing enrollment— that is, by offering no cash compensation for foregoing insurance.

5.4.3 Understanding Discrepancies Between Revealed-Preference and Treatment-Effects-Based Approaches

The previous analysis reveals that household's insurance valuation is substantially higher for low-copayment products, although a lower copayment does not induce differential improvements in health outcomes. This tension drives the difference in the copayment that maximize net benefits according to insurance valuation or treatment effects. What could drive this gap? We explore three possible explanations.

First, it may be the case that our surveys miss some important welfare measure. For example, highly risk-averse households may particularly value free coverage in years in which they are very sick. In addition, households may assign a particularly high weight in their valuation on outcomes that we could not monetize, such as the improvement in risk coping.

Second, individuals may be initially overoptimistic about the insurance and adjust their valuation after experiencing the product. We evaluate this explanation by eliciting again insurance valuation at endline. After the experimental year ended, the insurance company reverted to offer the standard product at copayment USD 1.25, and thus we could only elicit incentivized valuation for this product. Figure C.1 describes the results. We find that valuation indeed falls, but it remains quite high: At the standard premium, approximately 56% of previously insured households would choose insurance over cash at endline, compared to 69% at baseline. Figure C.1 - Panel B breaks down valuation for the USD 1.25 copayment by copayment during the experiment. Valuation for households with zero copayment in the experimental year is higher than other groups, and very close to the baseline valuation. This is consistent with households having more experience with insurance — because of higher usage during the experiment — also valuing it more ex-post.

Third, our valuation elicitation measures the amount of cash transfers that households are willing to forego to receive insurance, i.e., their willingness to accept. This measure is not the amount they would be willing to pay in a market setting. Implementing willingness to accept is motivated by two reasons. First, for policymakers who consider subsidizing health insurance, understanding the

equivalent cash transfers represents a natural benchmark. Second, enforcement of willingness to pay can be very challenging in these low-income settings, as households may initally be expressing interest for the product, but later not follow up with the purchases, resulting in very low actual take-up. To understand the gap between these measures, in an additional sample of 324 households from one of the hospitals (Nkozi), we measured willingness to pay, as well as willingness to accept. Consistent with a large literature (see, e.g., Hanemann, 1991; Burlig et al., 2025), we find that willingness to accept substantially exceeds willingness to pay (Figure C.2). This gap clearly highlights that, while willingness to accept is a natural benchmark in the comparison to cash transfers, it is not the right metrics to study demand in a market setting.

6 Conclusion

This paper studies how copayments shape the benefits and costs of health insurance in low-income settings. Using a randomized controlled trial in rural Uganda, we provide hospital-based health insurance under different copayment levels and combine experimental treatment effects with incentive-compatible measures of insurance valuation and detailed administrative data on insurer costs. This design allows us to examine not only how copayments affect healthcare utilization and health outcomes, but also how they shape selection into insurance and, ultimately, the net benefits of alternative insurance contracts.

We find that access to insurance substantially increases the use of high-quality hospital care, improves health, and reduces costly risk-coping behaviors such as borrowing and asset sales. These effects are economically meaningful and stand in contrast to much of the existing experimental literature on health insurance in low-income countries, which has often found limited health gains. Our results suggest that when insurance expands access to genuinely higher-quality care, the potential for health and welfare improvements is considerably larger.

Copayments induce sizable behavioral responses. Lower copayments lead to higher insurance take-up and much greater utilization of hospital care, conditional on insurance take-up. At the same time, we find that the health improvements generated by insurance do not vary meaningfully across copayment levels: households with zero copayments are not healthier, on average, than those facing positive cost sharing. We show that this pattern arises in part because lower copayments draw relatively healthier individuals into care, even for similar health events, reducing the marginal health returns of additional visits. As a result, copayments primarily operate on extensive margins of coverage and utilization rather than on the intensity of health benefits conditional on treatment.

These findings have important implications for insurance design. Using a revealed-preference approach that combines households' valuation of insurance with insurer costs, we show that low-copayment contracts generate the highest net benefits. Households place higher value on coverage that

minimizes out-of-pocket payments at the point of care, even after an experimental year of experience with the product. This valuation response more than offsets the higher costs associated with increased enrollment and utilization. From this perspective, generous coverage with low copayments is socially optimal.

In contrast, when net benefits are computed using experimentally estimated health and financial outcomes rather than households' valuation, higher copayments perform similarly or better. Because lower copayments do not generate additional health gains but do increase insurer costs, outcome-based calculations favor more cost sharing. The divergence between these two approaches highlights a fundamental tension in insurance design: whether policy should be guided primarily by realized health impacts or by the value households place on financial protection, access, and peace of mind.

The analysis presented in this paper illustrates the importance of integrating experimental variation in insurance design with direct measures of household preferences and detailed data on provider costs. This combination allows policymakers to move beyond estimating the effects of insurance alone and toward a fuller assessment of both the value households place on coverage and the resources required to provide it. As health insurance continues to expand and private providers play a growing role in publicly financed systems across low- and middle-income countries, carefully balancing these valuation–cost trade-offs will be essential for building insurance programs that are both fiscally viable and welfare enhancing.

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Tables

Table 1: Product Knowledge and Satisfaction

	C	T0	T1	T2	N
	(1)	(2)	(3)	(4)	(5)
Health insurance ownership (yes/no)	0.05	0.88	0.88	0.88	2,793
Copayment USD 0 (yes/no)		0.74	0.03	0.03	2,007
Copayment USD 1.25 (yes/no)		0.20	0.93	0.05	2,007
Copayment USD 2.50 (yes/no)		0.05	0.04	0.90	2,007
Usage (yes/no)		0.49	0.40	0.35	1,619
Satisfaction (1 to 5, 5 = highest)		4.14	4.09	3.97	2,016
Problems (yes/no)		0.10	0.08	0.08	2,016

Notes: This table reports product knowledge and satisfaction among treatment groups. The data are pooled from the midline and endline periods and are at the household level. The first row shows the proportion of households that report owning any health insurance (the study health insurance or any other health insurance). The next three rows show the proportion correctly identifying their copayment level (conditional on reporting insurance ownership). Usage indicates whether the household tried to use the insurance at any point; this variable was only collected at endline. Satisfaction is measured on a 1 to 5 scale. The variable problems indicates whether the household encountered difficulties using the insurance.

Table 2: Healthcare Seeking by Facility Type

	Mean C	β(T)	N	β_1(T0)	β_2(T1)	β_3(T2)	T0=T1=T2
	(1)	(2)	(3)	(4)	(5)	(6)	(7)
visits: insured hospital (nr)	0.05	0.07***	18,440	0.09***	0.07***	0.04***	0.00***
	(0.22)	(0.01)		(0.01)	(0.01)	(0.01)	
visits: any hospital (nr)	0.08	0.06***	18,440	0.09***	0.06***	0.03***	0.00***
	(0.29)	(0.01)		(0.01)	(0.01)	(0.01)	
visits: facility level 2 (nr)	0.11	-0.03***	18,440	-0.03***	-0.02	-0.04***	0.07*
	(0.35)	(0.01)		(0.01)	(0.01)	(0.01)	
visits: facility level 1 (nr)	0.07	-0.01	18,440	-0.01	-0.01	-0.01	0.88
	(0.25)	(0.01)		(0.01)	(0.01)	(0.01)	
visits: clinic (nr)	0.15	-0.04***	18,440	-0.04***	-0.03**	-0.04***	0.91
	(0.41)	(0.01)		(0.01)	(0.01)	(0.01)	

Notes: This table reports healthcare-seeking effects by facility type. Equation 1 corresponds to Column (2), and Equation 2 to Columns (4)-(7). The data are pooled from the midline and endline periods and are at the household-member level. Only insured household members are included in the sample. Any hospital includes insured hospitals. The facility categories form a quality hierarchy: hospitals (including insured hospitals) provide the highest quality of care, followed by Level 2 facilities, then Level 1 facilities. Clinics, which are mostly private, have quality levels that typically fall between Level 2 facilities and hospitals. Visits are winsorized at the 99th percentile. Survey questions refer to the past six months before the respective survey. The last column tests for the equality of coefficients among the three treatment arms, reporting p-values. Standard errors reported in parentheses are clustered at the household level. $***$, $**$, and $*$ indicate significance at the 1%, 5%, and 10% levels.

Table 3: Healthcare Seeking Overall

	Mean C	β(T)	N	β_1(T0)	β_2(T1)	β_3(T2)	T0=T1=T2
	(1)	(2)	(3)	(4)	(5)	(6)	(7)
any facility visit (yes/no)	0.41	-0.02*	18,440	-0.00	-0.02	-0.04***	0.02**
	(0.49)	(0.01)		(0.01)	(0.01)	(0.01)	
facility visits (nr)	0.51	-0.03**	18,440	-0.01	-0.03	-0.06***	0.01**
	(0.70)	(0.02)		(0.02)	(0.02)	(0.02)	
total health expenses (USD)	4.65	-0.28***	18,440	-0.21***	-0.32***	-0.31***	0.27
	(12.34)	(0.06)		(0.07)	(0.07)	(0.08)	

Notes: This table reports healthcare-seeking effects overall. Equation 1 corresponds to Column (2), and Equation 2 to Columns (4)-(7). The data are pooled from the midline and endline periods and are at the household-member level. Only insured household members are included in the sample. Routine visits refer to preventive healthcare visits. Total health expenses are calculated as the sum across all health events and all related actions taken. Visits and health expenses are winsorized at the 99th percentile. For outcomes measured in USD, we estimate a Poisson regression. Survey questions refer to the past six months before the respective survey. The last column tests for the equality of coefficients among the three treatment arms, reporting p-values. Standard errors reported in parentheses are clustered at the household level. $***$, $**$, and $*$ indicate significance at the 1%, 5%, and 10% levels.

Table 4: Risk Coping

	Mean C (1)	β(T) (2)	N (3)	β_1(T0) (4)	β_2(T1) (5)	β_3(T2) (6)	T0=T1=T2 (7)
risk coping index (std)	0.00	-0.15***	5,513	-0.15***	-0.17***	-0.14***	0.86
	(1.00)	(0.04)		(0.04)	(0.04)	(0.04)	
foregone healthcare (yes/no)	0.30	-0.04***	5,448	-0.05***	-0.05***	-0.03	0.47
	(0.46)	(0.01)		(0.02)	(0.02)	(0.02)	
sold assets (yes/no)	0.20	-0.05***	5,449	-0.05***	-0.04***	-0.05***	0.84
	(0.40)	(0.01)		(0.02)	(0.02)	(0.02)	
reduced food consumption (yes/no)	0.13	-0.03**	5,449	-0.02**	-0.03**	-0.03**	0.98
	(0.34)	(0.01)		(0.01)	(0.01)	(0.01)	
saved past year (yes/no)	0.83	-0.01	2,714	-0.00	-0.02	-0.01	0.61
	(0.37)	(0.02)		(0.02)	(0.02)	(0.02)	
savings current amount (USD)	100.01	-0.14*	2,714	-0.01	-0.22**	-0.19*	0.10
	(184.87)	(0.08)		(0.10)	(0.10)	(0.10)	
loan past year (yes/no)	0.82	-0.04**	2,720	-0.02	-0.04**	-0.04**	0.51
	(0.38)	(0.02)		(0.02)	(0.02)	(0.02)	
loan for health (yes/no)	0.32	-0.03*	2,719	-0.03	-0.04	-0.04	0.90
	(0.47)	(0.02)		(0.02)	(0.02)	(0.02)	
loan amount past year (USD)	245.48	-0.15*	2,720	-0.02	-0.24**	-0.20**	0.07*
	(481.19)	(0.08)		(0.10)	(0.10)	(0.10)	

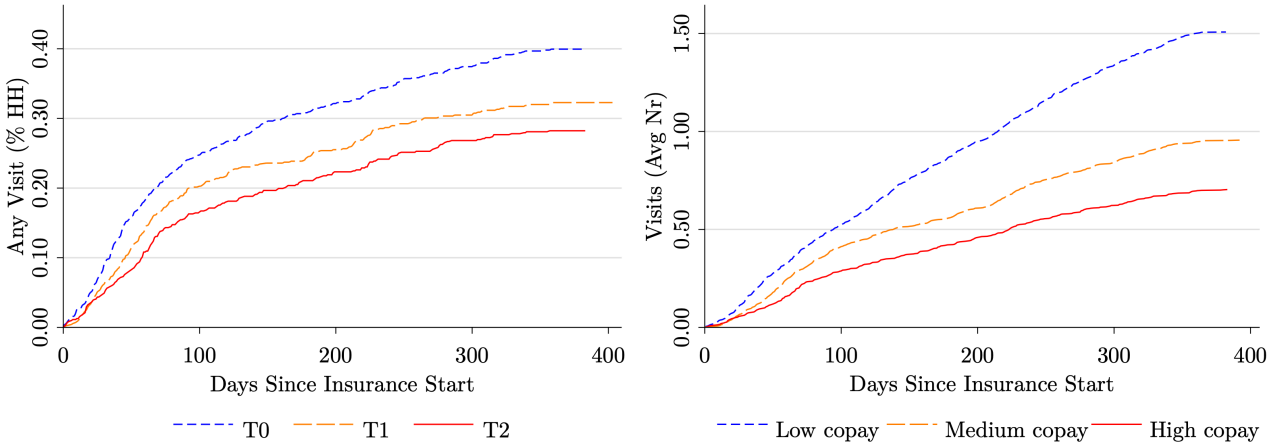
Notes: This table reports risk coping effects. Equation 1 corresponds to Column (2), and Equation 2 to Columns (4)-(7). The data are pooled from the midline and endline periods and are at the household level. Variables in rows 5 to 9 are only collected in the endline survey. The risk coping index averages over whether households used any of the following coping strategies: taking loans (from moneylenders, banks, family, friends, or groups), receiving remittances, selling assets, reducing consumption (food or other), increasing labor supply, or having children work or miss school. Savings and loan amounts are winsorized at the 99th percentile. For outcomes measured in USD, we estimate a Poisson regression. Survey questions refer to the past six months before the respective survey, except savings and loan questions in rows 5 to 9, which refer to the past year. The last column tests for the equality of coefficients among the three treatment arms, reporting p-values. Standard errors reported in parentheses are clustered at the household level. $***$, $**$, and $*$ indicate significance at the 1%, 5%, and 10% levels.

Table 5: Health Outcomes

	Mean C	β(T)	N	β_1(T0)	β_2(T1)	β_3(T2)	T0=T1=T2
	(1)	(2)	(3)	(4)	(5)	(6)	(7)
health status ranking today (std)	-0.00	0.08***	18,983	0.07***	0.10***	0.07**	0.69
	(1.00)	(0.02)		(0.03)	(0.03)	(0.03)	
sick days (nr)	9.12	-1.19**	18,979	-1.14**	-1.01*	-1.41**	0.78
	(23.28)	(0.46)		(0.56)	(0.56)	(0.58)	
work days missed (nr)	4.36	-0.65***	10,011	-0.58**	-0.58**	-0.81***	0.61
	(8.49)	(0.23)		(0.27)	(0.27)	(0.27)	
school days missed (nr)	1.48	-0.35***	7,583	-0.22*	-0.46***	-0.37***	0.07*
	(3.74)	(0.10)		(0.12)	(0.11)	(0.12)	
mental health index (std)	-0.00	0.04	9,219	0.05	0.01	0.05	0.39
	(1.00)	(0.03)		(0.04)	(0.04)	(0.04)	
worry index (std)	0.00	-0.09***	5,449	-0.12***	-0.08*	-0.07*	0.33
	(1.00)	(0.03)		(0.04)	(0.04)	(0.04)	
worry: health (std)	-0.00	-0.09***	5,449	-0.12***	-0.07	-0.08**	0.41
	(1.00)	(0.03)		(0.04)	(0.04)	(0.04)	
worry: medical expenses (std)	0.00	-0.11***	5,449	-0.14***	-0.10**	-0.09**	0.41
	(1.00)	(0.03)		(0.04)	(0.04)	(0.04)	

Notes: This table reports health outcome effects. Equation 1 corresponds to Column (2), and Equation 2 to Columns (4)-(7). The data are pooled from the midline and endline periods and are at the household-member level except for worry-related variables; these are collected at the household level. For household-member level variables, only insured members are included in the sample. Health status rank is measured by asking respondents: "In general, how do you rate your health status today on a scale from 1 to 5?". Work days missed are limited to members who are above 18 at baseline. School days missed are limited to members who are below 18 at baseline and enrolled in school. The mental health index averages over eight components and is only collected at the endline. Worries are measured by asking "How worried are you about having health problems/accidents/money for medical treatment/money for basic needs for you or your family members?". The worry index is based on these four items. Days are winsorized at the 99th percentile. Health status ranking and worry-related questions refer to the time of the survey, sick days and days missed to the previous six months, and the mental health index to the past month. The last column tests for the equality of coefficients among the three treatment arms, reporting p-values. Standard errors reported in parentheses are clustered at the household level. $***$, $**$, and $*$ indicate significance at the 1%, 5%, and 10% levels.

Figure 1: Healthcare Seeking at Insured Hospitals (Administrative Data)

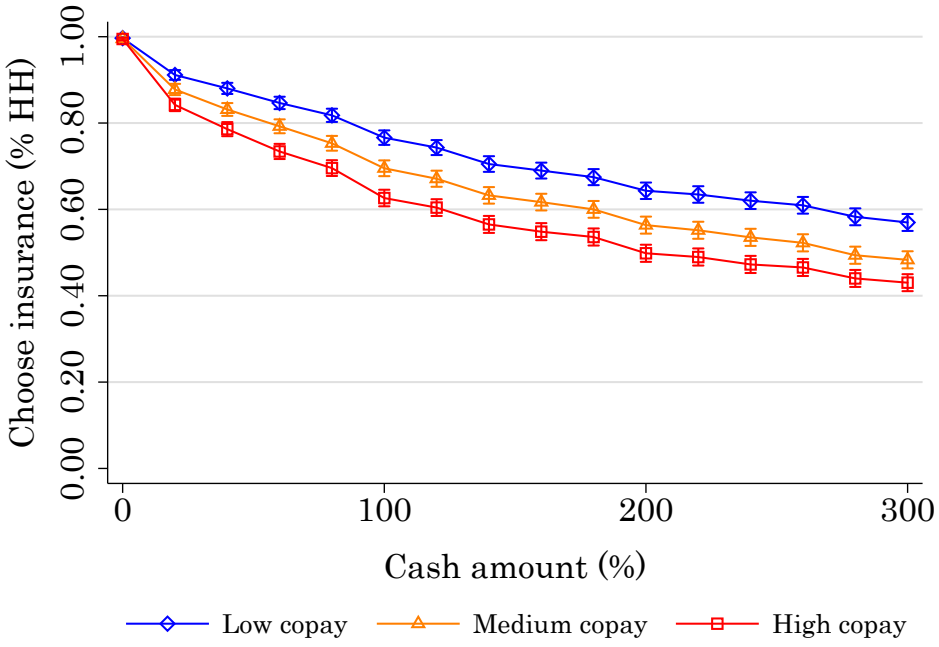


(a) Any Visit

(b) Average Number of Visits

Notes: This figure describes outpatient visits recorded in the administrative hospital data. Figure 1a depicts the share of households with an outpatient visit at a given point in time since the insurance start. Figure 1b depicts the average number of outpatient visits per household, at a given point in time since the insurance start. The short-dashed blue lines depict arm T0 (low copayment), the long-dashed yellow lines arm T1 (medium copayment), and the solid red lines arm T2 (high copayment).

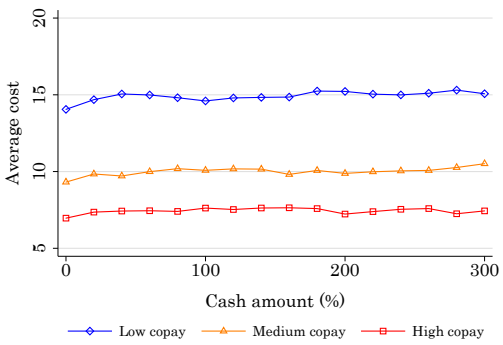
Figure 2: WTA by Copay



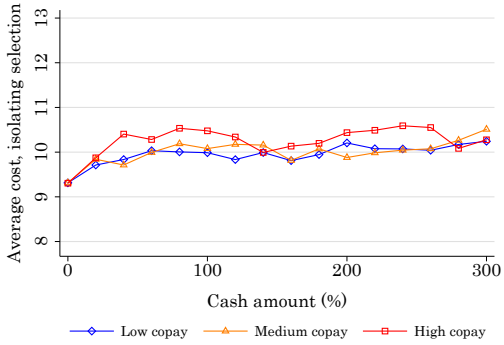
Notes: This figure shows the proportion of households choosing insurance over cash (willingness to accept) at different cash amounts, separately for three copayment levels: low (USD 0), medium (USD 1.25), and high (USD 2.50). The x-axis shows the cash amount as a percentage of the standard premium (USD 7.50 per person, or USD 30 for four household members). The y-axis shows the fraction of households preferring insurance to the cash equivalent at each point.

Figure 3: Insurer Costs

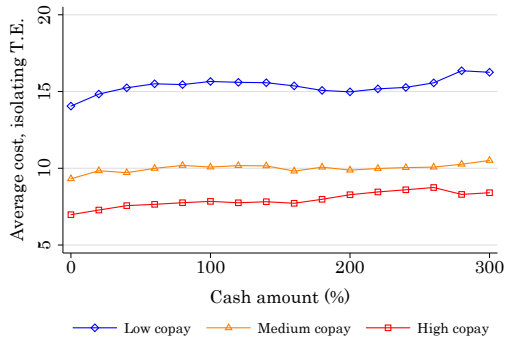
(a) Average cost curves



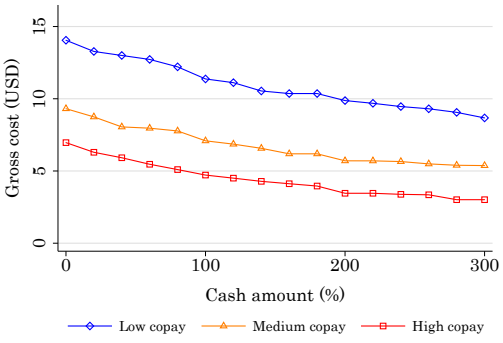
(b) Average cost curves isolating selection



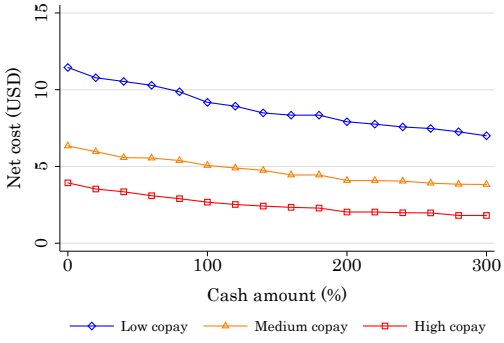
(c) Average cost curves isolating treatment effects



(d) Simulated gross costs

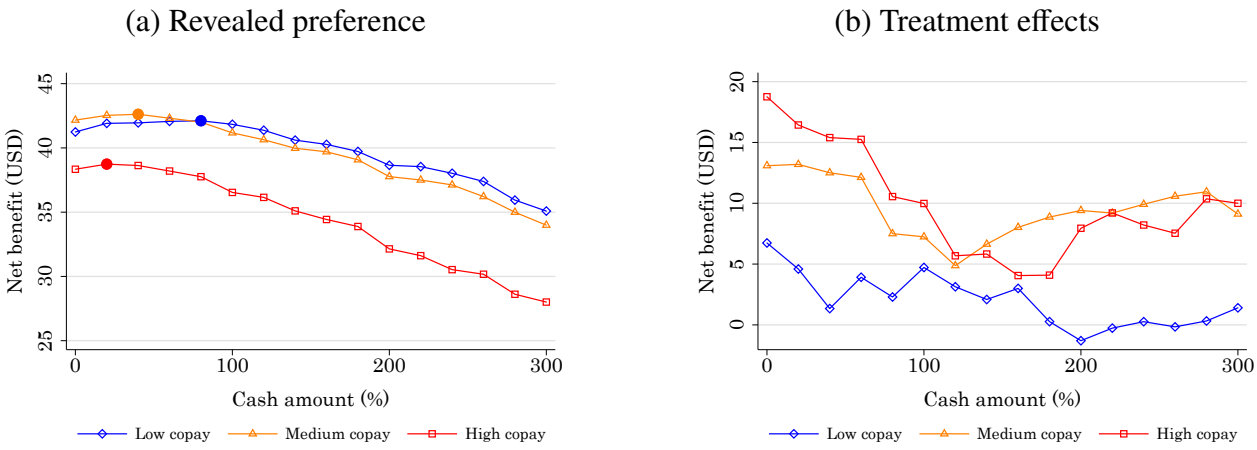


(e) Simulated net costs



Notes: This figure shows costs to the insurer of the healthcare provided to the insured. (a)-(c) show average gross costs per household, among insured households. (a) shows average costs among households choosing insurance at the respective copay over the respective cash amount, when given insurance with the respective copay. (b) isolates selection effects of copays in (a), showing average costs among households choosing insurance at the respective copay over the respective cash amount, when given insurance with the medium copay (USD 1.25). (c) isolates treatment effects of copays in (a), showing average costs among households choosing insurance at the medium copay (USD 1.25) over the respective cash amount, when given insurance with the respective copay. (d)-(e) show average costs per household, among all households in the sample, where insurer costs for a given household are set to zero if they choose the respective cash amount over insurance with the respective copay. (d) shows gross costs, and (e) shows costs net of copayments.

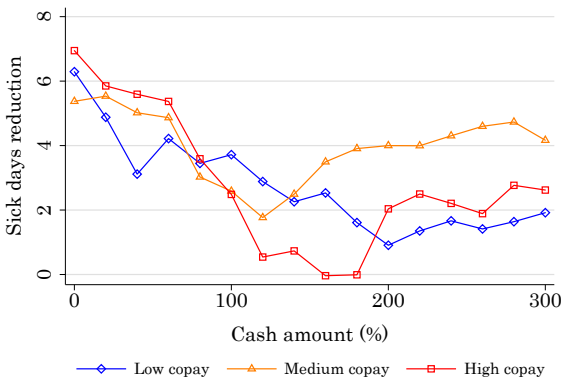
Figure 4: Net Benefits



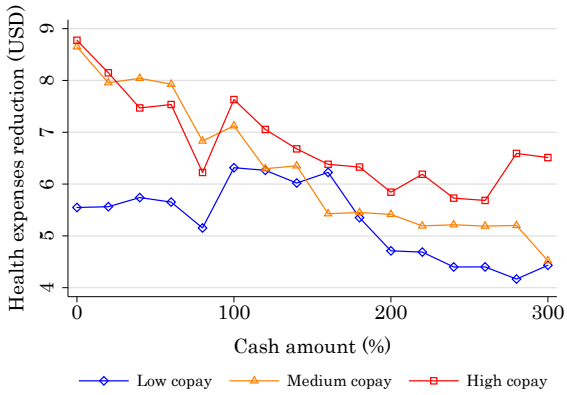
Notes: This figure shows net benefits of insurance provision, across all households in the sample, when households are offered the choice between insurance with the respective copay and the respective cash amount. (a) shows net benefit derived from revealed preference, which is the valuation of the insurance minus net costs to the insurer of the insured care for households who choose insurance, and zero for households who do not (Equation 3). (b) shows net benefit derived from treatment effects, which is the monetary equivalent of the effects on days sick and total healthcare expenditure, minus net costs to the insurer of the insured care, for households who choose insurance, and zero for households who do not (Equation 6).

Figure 5: Simulated Outcomes

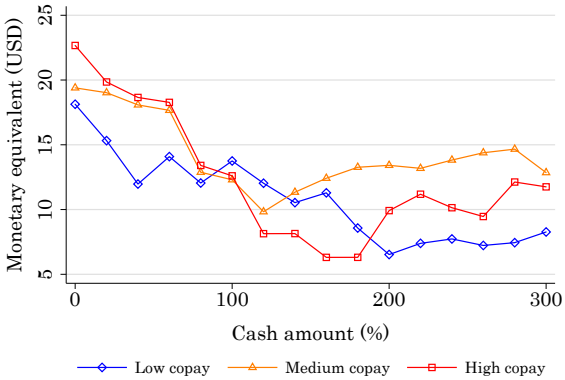
(a) Sick days



(b) Health expenses



(c) Monetary value of benefits



Notes: This figure shows the simulated treatment effects, across all households in the sample, when households are offered the choice between insurance with the respective copay and the respective cash amount. (a) shows the treatment effect on the number of sick days per household over the year. (b) shows the treatment effect on the total annual health expenditure of the household. (c) shows the monetary equivalent of these two treatment effects, valuing a sick day at $2.

Appendix A: Treatment Effects of Insurance (Survey Data)

Tables

Table A.1: Healthcare Facility Characteristics

	Clinic (villages)	Level 1 (villages)	Level 2 (one) (subcounty)	Hospital (beyond) (district)	Insured (multiple) (subcounties)
N facilities (nr)	93	29	50	19	3
share public (%)	5.21	50.74	55.58	47.80	2.25
available: general examination (%)	52.34	48.89	59.52	87.75	94.77
available: specialist (%)	16.09	9.66	22.36	70.60	91.75
available: tests (%)	91.09	87.75	96.33	98.51	98.83
available: drugs (%)	98.50	94.10	99.09	98.06	99.48
available: x-ray (%)	8.35	4.21	12.83	66.29	86.32
available: inpatient (%)	54.26	39.79	81.38	83.87	96.54
available: procedures (%)	12.53	9.80	21.66	75.88	93.02
free care (%)	5.34	52.45	54.22	44.50	1.95
free care in practice (%)	69.68	89.86	77.79	45.35	21.01
insurance plan (%)	0.03	0.00	0.49	4.05	75.33
problems: closed (%)	6.55	9.01	2.62	0.47	0.30
problems: waiting time (%)	6.23	18.79	22.64	17.65	14.84
problems: no doctor/nurse (%)	7.71	13.62	9.45	1.76	1.47
problems: not well trained (%)	3.46	2.90	1.67	0.96	0.55
problems: lack equipment (%)	18.01	17.41	13.67	5.36	1.01
problems: lack drugs (%)	14.99	40.55	38.31	23.68	3.20
problems: cleanliness (%)	0.93	5.01	3.77	4.05	1.24
problems: additional/unexpected costs (%)	3.86	1.22	4.26	7.88	11.62
problems: overcharges (%)	22.31	6.88	9.52	19.05	37.54
reach by walking (%)	54.84	50.25	27.96	4.75	7.15
transport time (minutes)	27.62	25.05	31.05	105.43	37.50
transport cost (USD)	0.50	0.39	0.77	3.91	1.41
go for mild illness (e.g., headache) (%)	23.43	17.96	15.39	1.40	5.16
go for mild malaria (%)	24.92	16.61	22.74	5.22	19.08
go for severe malaria (%)	11.56	9.41	15.74	15.62	37.39

Notes: This table reports summary statistics for different health care facility types. These are reported based on household-level averages. Households were asked about multiple facilities. N facilities indicates how many facilities households were interviewed about in this category. We exclude facilities with fewer than five households interviewed. Problems indicate whether the household had any problems at this facility.

Table A.2: Baseline Household Summary Statistics

	Mean (1)	SD (2)	Min (3)	Median (4)	Max (5)	N (6)
Household members (nr)	5.70	2.40	1.00	5.00	18.00	2,809
Adults 18+ (nr)	2.64	1.25	1.00	2.00	10.00	2,809
Has children <18 (yes/no)	0.91	0.28	0.00	1.00	1.00	2,809
Children <18 (nr)	3.06	1.95	0.00	3.00	13.00	2,809
Students (nr)	2.95	1.97	0.00	3.00	13.00	2,809
Insured members (nr)	3.60	0.74	1.00	4.00	4.00	2,809
Insured adults (nr)	1.89	0.32	1.00	2.00	2.00	2,809
Insured children (nr)	1.71	0.62	0.00	2.00	3.00	2,809
Female (%)	0.53	0.20	0.00	0.50	1.00	2,809
Age of adults (years)	39.69	11.30	20.00	37.00	94.00	2,809
Age of children (years)	9.00	3.58	0.00	9.14	17.00	2,570
HH head: Farmer (yes/no)	0.57	0.50	0.00	1.00	1.00	2,809
HH head: Self-employed (yes/no)	0.22	0.41	0.00	0.00	1.00	2,809
HH head: Salaried employment (yes/no)	0.11	0.32	0.00	0.00	1.00	2,809
HH head: No formal education (yes/no)	0.10	0.31	0.00	0.00	1.00	2,809
HH head: Primary school (yes/no)	0.46	0.50	0.00	0.00	1.00	2,809
HH head: High school (yes/no)	0.26	0.44	0.00	0.00	1.00	2,809
HH head: College/university (yes/no)	0.17	0.37	0.00	0.00	1.00	2,809
Adult had work absence past month (yes/no)	0.48	0.38	0.00	0.50	1.00	2,809
Work days off (nr)	3.54	4.54	0.00	2.00	30.00	2,809
Work days off - health (nr)	1.57	3.13	0.00	0.00	30.00	2,809
Student had school absence past month (yes/no)	0.30	0.38	0.00	0.00	1.00	2,461
School days off (nr)	1.17	2.14	0.00	0.00	30.00	2,461
School days off - health (nr)	0.65	1.52	0.00	0.00	30.00	2,461
Earth/mud floor (yes/no)	0.41	0.49	0.00	0.00	1.00	2,809
Has electricity (yes/no)	0.30	0.46	0.00	0.00	1.00	2,809
Has piped drinking water (yes/no)	0.50	0.50	0.00	0.00	1.00	2,809
Insufficient water access (yes/no)	0.25	0.44	0.00	0.00	1.00	2,809
Worried about food (yes/no)	0.58	0.49	0.00	1.00	1.00	2,809
Skipped meals (yes/no)	0.40	0.49	0.00	0.00	1.00	2,809
Has insurance at baseline (yes/no)	0.00	0.03	0.00	0.00	1.00	2,809
Trust in insurance (1 to 5, 5 = highest)	3.75	0.76	1.00	4.00	5.00	2,809
Reason no insurance: Unaware of insurance (yes/no)	0.64	0.48	0.00	1.00	1.00	2,809
Reason no insurance: Too expensive (yes/no)	0.34	0.47	0.00	0.00	1.00	2,809

Notes: This table presents baseline characteristics at the household level. Insured members refer to members who receive insurance through our study. Education refers to whether the members have any education in this category; the education does not have to be completed. Gender, age, and absence variables are the averages across household members for a given household. Work absence refers to the past month and is conditional on adults. School absence refers to the past month and is conditional on students below the age of 18.

Table A.3: Baseline Characteristics by Treatment Group

	Mean C (1)	Mean C (not std) (2)	β(T) (3)	N (4)	β_1(T0) (5)	β_2(T1) (6)	β_3(T2) (7)	T0=T1=T2 (8)
health status ranking today (1 to 5, 5=highest, std)	-0.00	4.19	-0.03	10,104	-0.05	-0.04	-0.00	0.39
	(1.00)	(0.87)	(0.03)		(0.04)	(0.04)	(0.04)	
sick days (nr)	7.04		0.23	10,102	0.26	0.25	0.18	0.99
	(15.27)		(0.41)		(0.51)	(0.50)	(0.52)	
work days missed (nr)	3.95		0.15	5,302	0.08	0.21	0.16	0.94
	(9.18)		(0.31)		(0.38)	(0.37)	(0.39)	
school days missed (nr)	1.80		0.06	3,994	0.04	-0.08	0.24	0.42
	(5.06)		(0.20)		(0.24)	(0.23)	(0.26)	
mental health index (1 to 5, 5=highest, std)	0.00	4.50	0.01	10,104	-0.03	-0.01	0.08**	0.01***
	(1.00)	(0.70)	(0.03)		(0.04)	(0.04)	(0.04)	
worry index (1 to 4, 4=highest, std)	-0.00	3.21	-0.02	2,809	0.02	-0.06	-0.03	0.26
	(1.00)	(0.68)	(0.04)		(0.05)	(0.05)	(0.05)	
worry: health (1 to 4, 4=highest, std)	-0.00	3.07	0.03	2,809	0.08	0.01	-0.01	0.17
	(1.00)	(0.96)	(0.04)		(0.05)	(0.05)	(0.05)	
worry: medical expenses (1 to 4, 4=highest, std)	-0.00	3.33	-0.01	2,809	0.01	-0.03	-0.00	0.64
	(1.00)	(0.85)	(0.04)		(0.05)	(0.05)	(0.05)	
any facility visit (yes/no)	0.12		0.01*	10,102	0.03***	0.00	0.00	0.01***
	(0.32)		(0.01)		(0.01)	(0.01)	(0.01)	
facility visits (nr)	0.13		0.02**	10,102	0.05***	0.01	0.01	0.02**
	(0.37)		(0.01)		(0.01)	(0.01)	(0.01)	
visits: insured hospital (nr)	0.02		0.01	10,102	0.01**	0.01	0.00	0.10
	(0.14)		(0.00)		(0.00)	(0.00)	(0.00)	
visits: any hospital (nr)	0.03		0.01	10,102	0.01**	0.01	-0.00	0.05**
	(0.17)		(0.00)		(0.01)	(0.01)	(0.01)	
visits: clinic (nr)	0.02		-0.00	10,102	0.00	-0.01	-0.00	0.26
	(0.14)		(0.00)		(0.00)	(0.00)	(0.00)	
routine visits (yes/no)	0.05		0.00	10,059	-0.00	-0.00	0.01	0.20
	(0.21)		(0.01)		(0.01)	(0.01)	(0.01)	
total health expenses (USD)	1.74		0.18*	10,102	0.33***	0.11	0.06	0.03**
	(6.85)		(0.09)		(0.11)	(0.12)	(0.12)	
risk coping index (0 to 1, 1=highest, std)	0.00	0.08	0.08*	2,809	0.11*	0.08	0.06	0.77
	(1.00)	(0.12)	(0.05)		(0.06)	(0.06)	(0.05)	
sold assets (yes/no)	0.02		0.00	2,809	-0.00	0.01	0.00	0.50
	(0.13)		(0.01)		(0.01)	(0.01)	(0.01)	
reduced food consumption (yes/no)	0.03		0.01	2,807	0.02**	0.01	0.00	0.12
	(0.18)		(0.01)		(0.01)	(0.01)	(0.01)	
saved past year (yes/no)	0.66		0.03	2,787	0.03	0.02	0.04	0.73
	(0.47)		(0.02)		(0.02)	(0.02)	(0.02)	
savings current amount (USD)	61.52		0.05	2,787	0.06	-0.13	0.21*	0.01**
	(128.55)		(0.09)		(0.11)	(0.11)	(0.11)	
loan past year (yes/no)	0.76		0.02	2,809	0.03	0.01	0.01	0.62
	(0.43)		(0.02)		(0.02)	(0.02)	(0.02)	
loan for health (yes/no)	0.29		0.01	2,809	0.02	0.02	-0.01	0.32
	(0.45)		(0.02)		(0.02)	(0.02)	(0.02)	
loan amount past year (USD)	203.16		0.11	2,808	0.08	0.09	0.15	0.78
	(396.76)		(0.08)		(0.10)	(0.10)	(0.10)	

Notes: This table presents baseline characteristics. Column (2) reports the non-standardized control mean. Equation 1 corresponds to Column (3), and Equation 2 to Columns (5)-(8). Only insured household members are included in the sample. A description of the variables is provided in the respective main outcome Tables 2, 3, 4, and 5. Sick days and days missed refer to the past year. Similarly, routine controls, risk coping, and savings and loans questions refer to the past year. Data on facility visits, total health expenses, mental health index, and worries are collected for the past month. For outcomes measured in USD, we estimate a Poisson regression. The last column tests for the equality of coefficients among the three treatment arms, reporting p-values. Standard errors reported in parentheses are clustered at the household level. $***$, $**$, and $*$ indicate significance at the 1%, 5%, and 10% levels.

Table A.4: Baseline Characteristics by Treatment Group (Excluding T0)

	Mean C (1)	Mean C (not std) (2)	β(T) (3)	N (4)	β_2(T1) (5)	β_3(T2) (6)	T1=T2 (7)
health status ranking today (1 to 5, 5=highest, std)	-0.00	4.20	-0.02	7,555	-0.04	-0.00	0.28
	(1.00)	(0.87)	(0.03)		(0.04)	(0.04)	
sick days (nr)	7.04		0.22	7,554	0.25	0.17	0.88
	(15.27)		(0.44)		(0.50)	(0.52)	
work days missed (nr)	3.95		0.19	3,963	0.22	0.16	0.89
	(9.18)		(0.33)		(0.37)	(0.39)	
school days missed (nr)	1.80		0.07	2,980	-0.08	0.24	0.19
	(5.06)		(0.21)		(0.23)	(0.26)	
mental health index (1 to 5, 5=highest, std)	0.00	4.51	0.03	7,555	-0.01	0.08**	0.02**
	(1.00)	(0.69)	(0.03)		(0.04)	(0.04)	
worry index (1 to 4, 4=highest, std)	-0.00	3.20	-0.05	2,101	-0.06	-0.03	0.59
	(1.00)	(0.68)	(0.04)		(0.05)	(0.05)	
worry: health (1 to 4, 4=highest, std)	-0.00	3.05	0.00	2,101	0.01	-0.01	0.65
	(1.00)	(0.96)	(0.04)		(0.05)	(0.05)	
worry: medical expenses (1 to 4, 4=highest, std)	-0.00	3.33	-0.02	2,101	-0.03	-0.00	0.55
	(1.00)	(0.86)	(0.04)		(0.05)	(0.05)	
any facility visit (yes/no)	0.12		0.00	7,554	0.00	0.00	0.91
	(0.32)		(0.01)		(0.01)	(0.01)	
facility visits (nr)	0.13		0.01	7,554	0.01	0.01	0.92
	(0.37)		(0.01)		(0.01)	(0.01)	
visits: insured hospital (nr)	0.02		0.00	7,554	0.01	0.00	0.33
	(0.14)		(0.00)		(0.00)	(0.00)	
visits: any hospital (nr)	0.03		0.00	7,554	0.01	-0.00	0.16
	(0.17)		(0.00)		(0.01)	(0.01)	
visits: clinic (nr)	0.02		-0.00	7,554	-0.01	-0.00	0.46
	(0.14)		(0.00)		(0.00)	(0.00)	
routine visits (yes/no)	0.05		0.00	7,526	-0.00	0.01	0.20
	(0.21)		(0.01)		(0.01)	(0.01)	
total health expenses (USD)	1.74		0.09	7,554	0.12	0.06	0.61
	(6.85)		(0.10)		(0.12)	(0.12)	
risk coping index (0 to 1, 1=highest, std)	0.00	0.08	0.07	2,101	0.08	0.06	0.83
	(1.00)	(0.11)	(0.05)		(0.06)	(0.05)	
sold assets (yes/no)	0.02		0.01	2,101	0.01	0.00	0.48
	(0.13)		(0.01)		(0.01)	(0.01)	
reduced food consumption (yes/no)	0.03		0.01	2,099	0.01	0.00	0.35
	(0.18)		(0.01)		(0.01)	(0.01)	
saved past year (yes/no)	0.66		0.03	2,082	0.02	0.04	0.43
	(0.47)		(0.02)		(0.02)	(0.02)	
savings current amount (USD)	61.52		0.05	2,082	-0.14	0.21*	0.00***
	(128.55)		(0.10)		(0.11)	(0.11)	
loan past year (yes/no)	0.76		0.01	2,101	0.01	0.01	0.96
	(0.43)		(0.02)		(0.02)	(0.02)	
loan for health (yes/no)	0.29		0.00	2,101	0.02	-0.01	0.22
	(0.45)		(0.02)		(0.02)	(0.02)	
loan amount past year (USD)	203.16		0.12	2,100	0.09	0.15	0.56
	(396.76)		(0.09)		(0.10)	(0.10)	

Notes: This table presents baseline characteristics, excluding households in treatment arm T0. Column (2) reports the non-standardized control mean. Equation 1 corresponds to Column (3), and Equation 2 to Columns (5)-(7). Only insured household members are included in the sample. A description of the variables is provided in the respective main outcome Tables 2, 3, 4, and 5. Sick days and days missed refer to the past year. Similarly, routine controls, risk coping, and savings and loans questions refer to the past year. Data on facility visits, total health expenses, mental health index, and worries are collected for the past month. For outcomes measured in USD, we estimate a Poisson regression. The last column tests for equality between the T1 and T2 treatment coefficients, reporting p-values. Standard errors reported in parentheses are clustered at the household level. $***$, $**$, and $*$ indicate significance at the 1%, 5%, and 10% levels.

Table A.5: Baseline Health Status Conditional on Visit to Insured Hospital

	C	T0	T1	T2
	(1)	(2)	(3)	(4)
health status ranking at baseline	-0.28	-0.23	-0.44	-0.29
conditional on visit to insured hospital	(1.14)	(1.11)	(1.07)	(1.05)
T0=T1 p-value	0.01***			
T1=T2 p-value	0.44			
T0=T2 p-value	0.07*			

Notes: This table reports health status ranking today at time of the baseline survey, conditional on having any visit to an insured hospital at midline or endline. Health status rank is measured by asking respondents: "In general, how do you rate your health status today on a scale from 1 to 5?", where 5 is the highest value. The table also tests for the difference in means between T0 and T1, T1 and T2, and T0 and T2.

Table A.6: Comparison to Other Health Insurance Studies

	Country	Insurance Provider	Time Period	Research Method	OOPE Impact	Risk of Catastrophic Expenditure	Healthcare Utilization	Health
Karan et al. (2017)	India	Gov	2008-12	DD	not sig.	not sig.	N/A	N/A
Fan et al. (2012)	India	Public	2007-08	DD	not sig.	not sig.	N/A	N/A
Powell-Jackson et al. (2014)	Ghana	Community	2004	RCT	-30%***	N/A	+0.3 visits**	not sig.
King et al. (2009)	Mexico	Gov	2005-06	RCT	-16%	-1.9pp**	not sig.	not sig.
Conti and Ginja (2023)	Mexico	Gov	2005-10	DD	N/A	N/A	heterogenous	heterogenous
Levine et al. (2016)	Cambodia	NGO	2007-08	RCT	N/A	-1.8pp**	not sig.	not sig.
Fink et al. (2013)	Burkina Faso	Community	2004-06	RCT	not sig.	-3.9pp**	not sig.	not sig.
Malani et al. (2024)	India	Gov	2013-19	RCT	N/A	N/A	not sig.	not sig.
Haushofer et al. (2020)	Kenya	Private	2011-13	RCT	not sig.	N/A	not sig.	not sig.
Gruber et al. (2023)	China	Public	2004-10	DD	not sig.	N/A	+8.4pp**	+2.7%** life exp.

Notes: This table compares findings from selected studies estimating impacts of health insurance on out-of-pocket expenditure (OOPE), catastrophic health expenditure, healthcare utilization, and health outcomes. This table is obtained from Dupas and Jain (forthcoming), Table 1 in their paper.

Table A.7: Healthcare Seeking (Uninsured Members)

	Mean C	β(T)	N	β_1(T0)	β_2(T1)	β_3(T2)	T0=T1=T2
	(1)	(2)	(3)	(4)	(5)	(6)	(7)
any facility visit (yes/no)	0.28	-0.02	12,160	-0.00	-0.01	-0.04**	0.12
	(0.45)	(0.01)		(0.02)	(0.02)	(0.02)	
facility visits (nr)	0.33	-0.03	12,160	-0.01	-0.02	-0.05**	0.13
	(0.57)	(0.02)		(0.02)	(0.02)	(0.02)	
visits: insured hospital (nr)	0.02	0.00	12,160	0.00	0.00	0.00	0.92
	(0.15)	(0.00)		(0.00)	(0.00)	(0.00)	
visits: any hospital (nr)	0.03	0.01	12,160	0.01	0.01*	0.00	0.37
	(0.19)	(0.00)		(0.01)	(0.01)	(0.01)	
visits: facility level 2 (nr)	0.06	-0.00	12,160	0.00	0.00	-0.01	0.19
	(0.26)	(0.01)		(0.01)	(0.01)	(0.01)	
visits: facility level 1 (nr)	0.05	-0.00	12,160	0.01	-0.00	-0.01	0.49
	(0.21)	(0.01)		(0.01)	(0.01)	(0.01)	
visits: clinic (nr)	0.10	-0.02	12,160	-0.02	-0.02*	-0.01	0.64
	(0.33)	(0.01)		(0.01)	(0.01)	(0.01)	
routine visits (yes/no)	0.02	-0.00	11,774	-0.00	-0.00	-0.01*	0.32
	(0.14)	(0.00)		(0.00)	(0.00)	(0.00)	
total health expenses (USD)	2.52	-0.10	12,160	-0.05	-0.09	-0.16	0.67
	(8.46)	(0.09)		(0.11)	(0.11)	(0.11)	

Notes: This table reports healthcare-seeking effects for uninsured household members. Equation 1 corresponds to Column (2), and Equation 2 to Columns (4)-(7). The data are pooled from the midline and endline periods and are at the household-member level. The facility categories form a quality hierarchy: hospitals (including insured hospitals) provide the highest quality of care, followed by Level 2 facilities, then Level 1 facilities. Clinics, which are mostly private, have quality levels that typically fall between Level 2 facilities and hospitals. Routine visits refer to preventive healthcare visits. Total health expenses are calculated as the sum across all health events and all related actions taken. Visits and health expenses are winsorized at the 99th percentile. For outcomes measured in USD, we estimate a Poisson regression. Survey questions refer to the past six months before the respective survey. The last column tests for the equality of coefficients among the three treatment arms, reporting p-values. Standard errors reported in parentheses are clustered at the household level. $***$, $**$, and $*$ indicate significance at the 1%, 5%, and 10% levels.

Table A.8: Health Outcomes (Uninsured Members)

	Mean C	β(T)	N	β_1(T0)	β_2(T1)	β_3(T2)	T0=T1=T2
	(1)	(2)	(3)	(4)	(5)	(6)	(7)
health status ranking today (std)	0.00	0.04	11,775	0.06	0.07*	-0.02	0.06*
	(1.00)	(0.03)		(0.04)	(0.04)	(0.04)	
sick days (nr)	5.08	-0.76**	11,770	-0.97**	-0.57	-0.73	0.64
	(15.85)	(0.39)		(0.44)	(0.47)	(0.47)	
work days missed (nr)	2.61	-0.66**	3,902	-0.78**	-0.41	-0.75**	0.48
	(7.47)	(0.31)		(0.37)	(0.38)	(0.34)	
school days missed (nr)	1.30	-0.24**	6,396	-0.22*	-0.25*	-0.25*	0.96
	(3.50)	(0.12)		(0.13)	(0.15)	(0.14)	
mental health index (std)	-0.00	0.01	6,075	0.05	-0.01	0.00	0.57
	(1.00)	(0.05)		(0.05)	(0.06)	(0.06)	

Notes: This table reports health outcome effects for uninsured household members. Equation 1 corresponds to Column (2), and Equation 2 to Columns (4)-(7). The data are pooled from the midline and endline periods and are at the household-member level. Worry-related variables are not reported because they vary only on the household level. Health status rank is measured by asking respondents: "In general, how do you rate your health status today on a scale from 1 to 5?". Work days missed are limited to members who are above 18 at baseline. School days missed are limited to members who are below 18 at baseline and enrolled in school. The mental health index averages over eight components and is only collected at the endline. Days are winsorized at the 99th percentile. Health status ranking refers to the time of the survey, sick days and days missed to the previous six months, and the mental health index to the past month. The last column tests for the equality of coefficients among the three treatment arms, reporting p-values. Standard errors reported in parentheses are clustered at the household level. $***$, $**$, and $*$ indicate significance at the 1%, 5%, and 10% levels.

Table A.9: Healthcare Seeking (Full Sample)

	Mean C	β(T)	N	β_1(T0)	β_2(T1)	β_3(T2)	T0=T1=T2
	(1)	(2)	(3)	(4)	(5)	(6)	(7)
any facility visit (yes/no)	0.36	-0.02*	30,600	-0.01	-0.02	-0.04***	0.02**
	(0.48)	(0.01)		(0.01)	(0.01)	(0.01)	
facility visits (nr)	0.44	-0.03**	30,600	-0.01	-0.03	-0.06***	0.01***
	(0.66)	(0.01)		(0.02)	(0.02)	(0.02)	
visits: insured hospital (nr)	0.03	0.04***	30,600	0.06***	0.04***	0.02***	0.00***
	(0.20)	(0.00)		(0.01)	(0.01)	(0.01)	
visits: any hospital (nr)	0.06	0.04***	30,600	0.05***	0.04***	0.02***	0.00***
	(0.26)	(0.01)		(0.01)	(0.01)	(0.01)	
visits: facility level 2 (nr)	0.09	-0.02**	30,600	-0.02*	-0.01	-0.03***	0.06*
	(0.32)	(0.01)		(0.01)	(0.01)	(0.01)	
visits: facility level 1 (nr)	0.06	-0.01	30,600	-0.00	-0.01	-0.01	0.67
	(0.23)	(0.01)		(0.01)	(0.01)	(0.01)	
visits: clinic (nr)	0.13	-0.03***	30,600	-0.03**	-0.03**	-0.03**	0.98
	(0.38)	(0.01)		(0.01)	(0.01)	(0.01)	
routine visits (yes/no)	0.05	-0.00	30,757	-0.01	-0.00	-0.01**	0.14
	(0.21)	(0.00)		(0.00)	(0.00)	(0.00)	
total health expenses (USD)	3.80	-0.23***	30,600	-0.17**	-0.25***	-0.27***	0.32
	(11.01)	(0.06)		(0.07)	(0.07)	(0.07)	

Notes: This table reports healthcare-seeking effects for the full sample, including uninsured household members. Equation 1 corresponds to Column (2), and Equation 2 to Columns (4)-(7). The data are pooled from the midline and endline periods and are at the household-member level. The facility categories form a quality hierarchy: hospitals (including insured hospitals) provide the highest quality of care, followed by Level 2 facilities, then Level 1 facilities. Clinics, which are mostly private, have quality levels that typically fall between Level 2 facilities and hospitals. Routine visits refer to preventive healthcare visits. Total health expenses are calculated as the sum across all health events and all related actions taken. Visits and health expenses are winsorized at the 99th percentile. For outcomes measured in USD, we estimate a Poisson regression. Survey questions refer to the past six months before the respective survey. The last column tests for the equality of coefficients among the three treatment arms, reporting p-values. Standard errors reported in parentheses are clustered at the household level. $***$, $**$, and $*$ indicate significance at the 1%, 5%, and 10% levels.

Table A.10: Health Outcomes (Full Sample)

	Mean C	β(T)	N	β_1(T0)	β_2(T1)	β_3(T2)	T0=T1=T2
	(1)	(2)	(3)	(4)	(5)	(6)	(7)
health status ranking today (std)	0.00	0.06***	30,758	0.07**	0.08***	0.04	0.35
	(1.00)	(0.02)		(0.03)	(0.03)	(0.03)	
sick days (nr)	7.57	-1.04***	30,749	-1.11***	-0.82*	-1.18***	0.68
	(20.84)	(0.35)		(0.42)	(0.43)	(0.45)	
work days missed (nr)	3.85	-0.63***	13,913	-0.61***	-0.49**	-0.79***	0.39
	(8.24)	(0.20)		(0.24)	(0.24)	(0.23)	
school days missed (nr)	1.40	-0.30***	13,979	-0.23**	-0.36***	-0.31***	0.31
	(3.64)	(0.09)		(0.10)	(0.10)	(0.10)	
mental health index (std)	-0.00	0.03	15,294	0.05	-0.01	0.03	0.39
	(1.00)	(0.03)		(0.04)	(0.04)	(0.04)	

Notes: This table reports health outcome effects for the full sample, including uninsured household members. Equation 1 corresponds to Column (2), and Equation 2 to Columns (4)-(7). The data are pooled from the midline and endline periods and are at the household-member level. Worry-related variables are not reported because they vary only on the household level. Health status rank is measured by asking respondents: "In general, how do you rate your health status today on a scale from 1 to 5?". Work days missed are limited to members who are above 18 at baseline. School days missed are limited to members who are below 18 at baseline and enrolled in school. The mental health index averages over eight components and is only collected at the endline. Days are winsorized at the 99th percentile. Health status ranking refers to the time of the survey, sick days and days missed to the previous six months, and the mental health index to the past month. The last column tests for the equality of coefficients among the three treatment arms, reporting p-values. Standard errors reported in parentheses are clustered at the household level. $***$, $**$, and $*$ indicate significance at the 1%, 5%, and 10% levels.

Table A.11: Healthcare Seeking (Midline)

	Mean C	β(T)	N	β_1(T0)	β_2(T1)	β_3(T2)	T0=T1=T2
	(1)	(2)	(3)	(4)	(5)	(6)	(7)
any facility visit (yes/no)	0.36	-0.01	9,220	0.01	-0.01	-0.03*	0.08*
	(0.48)	(0.01)		(0.02)	(0.02)	(0.02)	
facility visits (nr)	0.41	-0.01	9,220	0.02	-0.01	-0.03	0.05*
	(0.58)	(0.02)		(0.02)	(0.02)	(0.02)	
visits: insured hospital (nr)	0.04	0.07***	9,220	0.09***	0.06***	0.04***	0.00***
	(0.19)	(0.01)		(0.01)	(0.01)	(0.01)	
visits: any hospital (nr)	0.06	0.06***	9,220	0.08***	0.06***	0.04***	0.00***
	(0.24)	(0.01)		(0.01)	(0.01)	(0.01)	
visits: facility level 2 (nr)	0.08	-0.02**	9,220	-0.02**	-0.01	-0.03***	0.30
	(0.27)	(0.01)		(0.01)	(0.01)	(0.01)	
visits: facility level 1 (nr)	0.06	-0.01	9,220	-0.01	-0.01	-0.02*	0.81
	(0.24)	(0.01)		(0.01)	(0.01)	(0.01)	
visits: clinic (nr)	0.11	-0.03***	9,220	-0.03**	-0.02**	-0.03***	0.77
	(0.31)	(0.01)		(0.01)	(0.01)	(0.01)	
routine visits (yes/no)	0.10	-0.01	9,764	-0.02*	-0.00	-0.02*	0.21
	(0.30)	(0.01)		(0.01)	(0.01)	(0.01)	
total health expenses (USD)	3.29	-0.28***	9,220	-0.22**	-0.32***	-0.33***	0.50
	(9.55)	(0.08)		(0.10)	(0.10)	(0.10)	

Notes: This table reports healthcare-seeking effects for the midline period. Equation 1 corresponds to Column (2), and Equation 2 to Columns (4)-(7). The data are at the household-member level. Only insured household members are included in the sample. The facility categories form a quality hierarchy: hospitals (including insured hospitals) provide the highest quality of care, followed by Level 2 facilities, then Level 1 facilities. Clinics, which are mostly private, have quality levels that typically fall between Level 2 facilities and hospitals. Routine visits refer to preventive healthcare visits. Total health expenses are calculated as the sum across all health events and all related actions taken. Visits and health expenses are winsorized at the 99th percentile. For outcomes measured in USD, we estimate a Poisson regression. Survey questions refer to the past six months before the respective survey. The last column tests for the equality of coefficients among the three treatment arms, reporting p-values. Standard errors reported in parentheses are clustered at the household level. $***$, $**$, and $*$ indicate significance at the 1%, 5%, and 10% levels.

Table A.12: Healthcare Seeking (Endline)

	Mean C	β(T)	N	β_1(T0)	β_2(T1)	β_3(T2)	T0=T1=T2
	(1)	(2)	(3)	(4)	(5)	(6)	(7)
any facility visit (yes/no)	0.46	-0.03**	9,220	-0.01	-0.03*	-0.05***	0.12
	(0.50)	(0.01)		(0.02)	(0.02)	(0.02)	
facility visits (nr)	0.61	-0.06**	9,220	-0.03	-0.05*	-0.10***	0.06*
	(0.79)	(0.02)		(0.03)	(0.03)	(0.03)	
visits: insured hospital (nr)	0.05	0.07***	9,220	0.10***	0.07***	0.03***	0.00***
	(0.25)	(0.01)		(0.01)	(0.01)	(0.01)	
visits: any hospital (nr)	0.10	0.05***	9,220	0.09***	0.05***	0.02*	0.00***
	(0.34)	(0.01)		(0.01)	(0.01)	(0.01)	
visits: facility level 2 (nr)	0.13	-0.03***	9,220	-0.04**	-0.02	-0.05***	0.08*
	(0.40)	(0.01)		(0.01)	(0.01)	(0.01)	
visits: facility level 1 (nr)	0.07	-0.01	9,220	-0.00	-0.01	-0.01	0.76
	(0.25)	(0.01)		(0.01)	(0.01)	(0.01)	
visits: clinic (nr)	0.19	-0.05***	9,220	-0.05***	-0.04**	-0.04**	0.96
	(0.48)	(0.02)		(0.02)	(0.02)	(0.02)	
routine visits (yes/no)	0.03	0.00	9,219	0.01	0.00	0.00	0.59
	(0.16)	(0.00)		(0.01)	(0.01)	(0.01)	
total health expenses (USD)	6.01	-0.27***	9,220	-0.20**	-0.32***	-0.30***	0.36
	(14.48)	(0.07)		(0.08)	(0.08)	(0.09)	

Notes: This table reports healthcare-seeking effects for the endline period. Equation 1 corresponds to Column (2), and Equation 2 to Columns (4)-(7). The data are at the household-member level. Only insured household members are included in the sample. The facility categories form a quality hierarchy: hospitals (including insured hospitals) provide the highest quality of care, followed by Level 2 facilities, then Level 1 facilities. Clinics, which are mostly private, have quality levels that typically fall between Level 2 facilities and hospitals. Routine visits refer to preventive healthcare visits. Total health expenses are calculated as the sum across all health events and all related actions taken. Visits and health expenses are winsorized at the 99th percentile. For outcomes measured in USD, we estimate a Poisson regression. Survey questions refer to the past six months before the respective survey. The last column tests for the equality of coefficients among the three treatment arms, reporting p-values. Standard errors reported in parentheses are clustered at the household level. $***$, $**$, and $*$ indicate significance at the 1%, 5%, and 10% levels.

Table A.13: Risk Coping (Midline)

	Mean C (1)	β(T) (2)	N (3)	β_1(T0) (4)	β_2(T1) (5)	β_3(T2) (6)	T0=T1=T2 (7)
risk coping index (std)	-0.00	-0.17***	2,793	-0.20***	-0.15***	-0.15***	0.56
	(1.00)	(0.04)		(0.05)	(0.05)	(0.05)	
foregone healthcare (yes/no)	0.39	-0.07***	2,729	-0.09***	-0.07**	-0.04	0.16
	(0.49)	(0.02)		(0.03)	(0.03)	(0.03)	
sold assets (yes/no)	0.23	-0.06***	2,729	-0.07***	-0.05**	-0.06***	0.68
	(0.42)	(0.02)		(0.02)	(0.02)	(0.02)	
reduced food consumption (yes/no)	0.21	-0.03*	2,729	-0.04*	-0.02	-0.04*	0.80
	(0.41)	(0.02)		(0.02)	(0.02)	(0.02)	

Notes: This table reports risk coping effects for the midline period. Equation 1 corresponds to Column (2), and Equation 2 to Columns (4)-(7). The data are at the household level. The risk coping index averages over whether households used any of the following coping strategies: taking loans (from moneylenders, banks, family, friends, or groups), receiving remittances, selling assets, reducing consumption (food or other), increasing labor supply, or having children work or miss school. Other variables on savings and loans are only collected in the endline survey. Survey questions refer to the past six months before the respective survey. The last column tests for the equality of coefficients among the three treatment arms, reporting p-values. Standard errors reported in parentheses are clustered at the household level. $***$, $**$, and $*$ indicate significance at the 1%, 5%, and 10% levels.

Table A.14: Risk Coping (Endline)

	Mean C (1)	β(T) (2)	N (3)	β_1(T0) (4)	β_2(T1) (5)	β_3(T2) (6)	T0=T1=T2 (7)
risk coping index (std)	0.00	-0.14***	2,720	-0.10*	-0.18***	-0.14***	0.32
	(1.00)	(0.04)		(0.05)	(0.05)	(0.05)	
foregone healthcare (yes/no)	0.22	-0.02	2,719	-0.02	-0.03	-0.02	0.88
	(0.41)	(0.02)		(0.02)	(0.02)	(0.02)	
sold assets (yes/no)	0.16	-0.04**	2,720	-0.03	-0.04*	-0.05**	0.64
	(0.37)	(0.02)		(0.02)	(0.02)	(0.02)	
reduced food consumption (yes/no)	0.06	-0.02*	2,720	-0.01	-0.03**	-0.01	0.33
	(0.24)	(0.01)		(0.01)	(0.01)	(0.01)	
saved past year (yes/no)	0.83	-0.01	2,714	-0.00	-0.02	-0.01	0.61
	(0.37)	(0.02)		(0.02)	(0.02)	(0.02)	
savings current amount (USD)	100.01	-0.14*	2,714	-0.01	-0.22**	-0.19*	0.10
	(184.87)	(0.08)		(0.10)	(0.10)	(0.10)	
loan past year (yes/no)	0.82	-0.04**	2,720	-0.02	-0.04**	-0.04**	0.51
	(0.38)	(0.02)		(0.02)	(0.02)	(0.02)	
loan for health (yes/no)	0.32	-0.03*	2,719	-0.03	-0.04	-0.04	0.90
	(0.47)	(0.02)		(0.02)	(0.02)	(0.02)	
loan amount past year (USD)	245.48	-0.15*	2,720	-0.02	-0.24**	-0.20**	0.07*
	(481.19)	(0.08)		(0.10)	(0.10)	(0.10)	

Notes: This table reports risk coping effects for the endline period. Equation 1 corresponds to Column (2), and Equation 2 to Columns (4)-(7). The data are at the household level. Variables in rows 5 to 9 are only collected in the endline survey. The risk coping index averages over whether households used any of the following coping strategies: taking loans (from moneylenders, banks, family, friends, or groups), receiving remittances, selling assets, reducing consumption (food or other), increasing labor supply, or having children work or miss school. Savings and loan amounts are winsorized at the 99th percentile. For outcomes measured in USD, we estimate a Poisson regression. Survey questions refer to the past six months before the respective survey, except savings and loan questions in rows 5 to 9, which refer to the past year. The last column tests for the equality of coefficients among the three treatment arms, reporting p-values. Standard errors reported in parentheses are clustered at the household level. $***$, $**$, and $*$ indicate significance at the 1%, 5%, and 10% levels.

Table A.15: Health Outcomes (Midline)

	Mean C	β(T)	N	β_1(T0)	β_2(T1)	β_3(T2)	T0=T1=T2
	(1)	(2)	(3)	(4)	(5)	(6)	(7)
health status ranking today (std)	0.00	0.10***	9,764	0.10***	0.12***	0.09**	0.70
	(1.00)	(0.03)		(0.03)	(0.04)	(0.04)	
sick days (nr)	11.29	-1.52*	9,759	-1.59	-1.16	-1.82*	0.78
	(30.59)	(0.81)		(0.98)	(0.98)	(0.98)	
work days missed (nr)	4.66	-0.79**	5,146	-0.80**	-0.79**	-0.77*	1.00
	(9.85)	(0.33)		(0.40)	(0.40)	(0.40)	
school days missed (nr)	1.90	-0.47***	3,774	-0.25	-0.65***	-0.52**	0.07*
	(4.89)	(0.18)		(0.21)	(0.19)	(0.21)	
worry index (std)	0.00	-0.17***	2,729	-0.19***	-0.18***	-0.15***	0.75
	(1.00)	(0.04)		(0.05)	(0.05)	(0.05)	
worry: health (std)	0.00	-0.17***	2,729	-0.21***	-0.16***	-0.14**	0.44
	(1.00)	(0.04)		(0.05)	(0.05)	(0.06)	
worry: medical expenses (std)	0.00	-0.21***	2,729	-0.23***	-0.21***	-0.18***	0.62
	(1.00)	(0.04)		(0.05)	(0.05)	(0.05)	

Notes: This table reports health outcome effects for the midline period. Equation 1 corresponds to Column (2), and Equation 2 to Columns (4)-(7). The data are at the household-member level except for worry-related variables; these are collected at the household level. Only insured household members are included in the sample. Health status rank is measured by asking respondents: "In general, how do you rate your health status today on a scale from 1 to 5?". Work days missed are limited to members who are above 18 at baseline. School days missed are limited to members who are below 18 at baseline and enrolled in school. Worries are measured by asking "How worried are you about having health problems/accidents/money for medical treatment/money for basic needs for you or your family members?". The worry index is based on these four items. Days are winsorized at the 99th percentile. Mental health information is only collected at endline. Health status ranking and worry-related questions refer to the time of the survey, sick days and days missed to the previous six months. The last column tests for the equality of coefficients among the three treatment arms, reporting p-values. Standard errors reported in parentheses are clustered at the household level. $***$, $**$, and $*$ indicate significance at the 1%, 5%, and 10% levels.

Table A.16: Health Outcomes (Endline)

	Mean C	β(T)	N	β_1(T0)	β_2(T1)	β_3(T2)	T0=T1=T2
	(1)	(2)	(3)	(4)	(5)	(6)	(7)
health status ranking today (std)	-0.00	0.06**	9,219	0.05	0.07*	0.06	0.81
	(1.00)	(0.03)		(0.04)	(0.04)	(0.04)	
sick days (nr)	6.87	-0.85***	9,220	-0.66*	-0.88**	-1.01***	0.62
	(11.18)	(0.31)		(0.37)	(0.37)	(0.37)	
work days missed (nr)	4.05	-0.51**	4,865	-0.34	-0.34	-0.84***	0.13
	(6.79)	(0.24)		(0.29)	(0.30)	(0.29)	
school days missed (nr)	1.07	-0.23***	3,809	-0.19**	-0.27***	-0.22**	0.63
	(2.00)	(0.08)		(0.09)	(0.09)	(0.09)	
mental health index (std)	-0.00	0.04	9,219	0.05	0.01	0.05	0.39
	(1.00)	(0.03)		(0.04)	(0.04)	(0.04)	
worry index (std)	0.00	-0.01	2,720	-0.05	0.02	0.02	0.27
	(1.00)	(0.04)		(0.05)	(0.05)	(0.05)	
worry: health (std)	-0.00	-0.01	2,720	-0.04	0.02	-0.03	0.48
	(1.00)	(0.04)		(0.05)	(0.05)	(0.05)	
worry: medical expenses (std)	0.00	-0.01	2,720	-0.05	0.02	-0.00	0.40
	(1.00)	(0.04)		(0.05)	(0.05)	(0.05)	

Notes: This table reports health outcome effects for the endline period. Equation 1 corresponds to Column (2), and Equation 2 to Columns (4)-(7). The data are at the household-member level except for worry-related variables; these are collected at the household level. Only insured household members are included in the sample. Health status rank is measured by asking respondents: "In general, how do you rate your health status today on a scale from 1 to 5?". Work days missed are limited to members who are above 18 at baseline. School days missed are limited to members who are below 18 at baseline and enrolled in school. The mental health index averages over eight components and is only collected at the endline. Worries are measured by asking "How worried are you about having health problems/accidents/money for medical treatment/money for basic needs for you or your family members?". The worry index is based on these four items. Days are winsorized at the 99th percentile. Health status ranking and worry-related questions refer to the time of the survey, sick days and days missed to the previous six months, and the mental health index to the past month. The last column tests for the equality of coefficients among the three treatment arms, reporting p-values. Standard errors reported in parentheses are clustered at the household level. $***$, $**$, and $*$ indicate significance at the 1%, 5%, and 10% levels.

Table A.17: Healthcare Seeking (Adults)

	Mean C	β(T)	N	β_1(T0)	β_2(T1)	β_3(T2)	T0=T1=T2
	(1)	(2)	(3)	(4)	(5)	(6)	(7)
any facility visit (yes/no)	0.47	-0.02	9,730	-0.01	-0.02	-0.04***	0.08*
	(0.50)	(0.01)		(0.02)	(0.02)	(0.02)	
facility visits (nr)	0.61	-0.04**	9,730	-0.01	-0.03	-0.08***	0.02**
	(0.76)	(0.02)		(0.03)	(0.03)	(0.03)	
visits: insured hospital (nr)	0.06	0.08***	9,730	0.11***	0.08***	0.04***	0.00***
	(0.26)	(0.01)		(0.01)	(0.01)	(0.01)	
visits: any hospital (nr)	0.11	0.07***	9,730	0.09***	0.07***	0.04***	0.00***
	(0.35)	(0.01)		(0.01)	(0.01)	(0.01)	
visits: facility level 2 (nr)	0.13	-0.04***	9,730	-0.04***	-0.02*	-0.05***	0.03**
	(0.38)	(0.01)		(0.01)	(0.01)	(0.01)	
visits: facility level 1 (nr)	0.07	-0.01	9,730	-0.01	-0.01	-0.01	0.69
	(0.25)	(0.01)		(0.01)	(0.01)	(0.01)	
visits: clinic (nr)	0.17	-0.04***	9,730	-0.04**	-0.03**	-0.04***	0.80
	(0.44)	(0.01)		(0.02)	(0.02)	(0.02)	
routine visits (yes/no)	0.11	-0.01	10,014	-0.01	-0.00	-0.01	0.75
	(0.31)	(0.01)		(0.01)	(0.01)	(0.01)	
total health expenses (USD)	6.59	-0.27***	9,730	-0.23***	-0.27***	-0.32***	0.59
	(15.22)	(0.07)		(0.08)	(0.08)	(0.09)	

Notes: This table reports healthcare-seeking effects for insured adults (age 18 and above at baseline). Equation 1 corresponds to Column (2), and Equation 2 to Columns (4)-(7). The data are pooled from the midline and endline periods and are at the household-member level. The facility categories form a quality hierarchy: hospitals (including insured hospitals) provide the highest quality of care, followed by Level 2 facilities, then Level 1 facilities. Clinics, which are mostly private, have quality levels that typically fall between Level 2 facilities and hospitals. Routine visits refer to preventive healthcare visits. Total health expenses are calculated as the sum across all health events and all related actions taken. Visits and health expenses are winsorized at the 99th percentile. For outcomes measured in USD, we estimate a Poisson regression. Survey questions refer to the past six months before the respective survey. The last column tests for the equality of coefficients among the three treatment arms, reporting p-values. Standard errors reported in parentheses are clustered at the household level. $***$, $**$, and $*$ indicate significance at the 1%, 5%, and 10% levels.

Table A.18: Healthcare Seeking (Minors)

	Mean C	β(T)	N	β_1(T0)	β_2(T1)	β_3(T2)	T0=T1=T2
	(1)	(2)	(3)	(4)	(5)	(6)	(7)
any facility visit (yes/no)	0.34	-0.02	8,710	0.00	-0.03*	-0.04**	0.05**
	(0.47)	(0.01)		(0.02)	(0.02)	(0.02)	
facility visits (nr)	0.40	-0.03	8,710	-0.00	-0.03	-0.05**	0.07*
	(0.61)	(0.02)		(0.02)	(0.02)	(0.02)	
visits: insured hospital (nr)	0.03	0.05***	8,710	0.08***	0.04***	0.03***	0.00***
	(0.18)	(0.01)		(0.01)	(0.01)	(0.01)	
visits: any hospital (nr)	0.05	0.05***	8,710	0.08***	0.04***	0.02**	0.00***
	(0.22)	(0.01)		(0.01)	(0.01)	(0.01)	
visits: facility level 2 (nr)	0.08	-0.02*	8,710	-0.02*	-0.01	-0.02*	0.52
	(0.30)	(0.01)		(0.01)	(0.01)	(0.01)	
visits: facility level 1 (nr)	0.06	-0.01	8,710	-0.01	-0.01	-0.01	1.00
	(0.24)	(0.01)		(0.01)	(0.01)	(0.01)	
visits: clinic (nr)	0.12	-0.03***	8,710	-0.03**	-0.03**	-0.03**	0.99
	(0.37)	(0.01)		(0.01)	(0.01)	(0.01)	
routine visits (yes/no)	0.02	-0.00	8,969	-0.00	0.00	-0.01	0.11
	(0.13)	(0.00)		(0.00)	(0.00)	(0.00)	
total health expenses (USD)	2.51	-0.31***	8,710	-0.16	-0.49***	-0.29***	0.01***
	(7.51)	(0.09)		(0.11)	(0.10)	(0.11)	

Notes: This table reports healthcare-seeking effects for insured minors (below age 18 at baseline). Equation 1 corresponds to Column (2), and Equation 2 to Columns (4)-(7). The data are pooled from the midline and endline periods and are at the household-member level. The facility categories form a quality hierarchy: hospitals (including insured hospitals) provide the highest quality of care, followed by Level 2 facilities, then Level 1 facilities. Clinics, which are mostly private, have quality levels that typically fall between Level 2 facilities and hospitals. Routine visits refer to preventive healthcare visits. Total health expenses are calculated as the sum across all health events and all related actions taken. Visits and health expenses are winsorized at the 99th percentile. For outcomes measured in USD, we estimate a Poisson regression. Survey questions refer to the past six months before the respective survey. The last column tests for the equality of coefficients among the three treatment arms, reporting p-values. Standard errors reported in parentheses are clustered at the household level. $***$, $**$, and $*$ indicate significance at the 1%, 5%, and 10% levels.

Table A.19: Healthcare Seeking (Children Age 0 to 5)

	Mean C	β(T)	N	β_1(T0)	β_2(T1)	β_3(T2)	T0=T1=T2
	(1)	(2)	(3)	(4)	(5)	(6)	(7)
any facility visit (yes/no)	0.37	0.01	2,512	0.01	0.01	-0.00	0.83
	(0.48)	(0.02)		(0.03)	(0.03)	(0.03)	
facility visits (nr)	0.44	0.01	2,512	0.00	0.03	-0.01	0.68
	(0.64)	(0.03)		(0.04)	(0.04)	(0.04)	
visits: insured hospital (nr)	0.02	0.08***	2,512	0.11***	0.08***	0.05***	0.00***
	(0.13)	(0.01)		(0.02)	(0.02)	(0.01)	
visits: any hospital (nr)	0.04	0.07***	2,512	0.11***	0.07***	0.03**	0.00***
	(0.20)	(0.01)		(0.02)	(0.02)	(0.01)	
visits: facility level 2 (nr)	0.09	-0.00	2,512	-0.02	0.02	-0.01	0.11
	(0.33)	(0.02)		(0.02)	(0.02)	(0.02)	
visits: facility level 1 (nr)	0.07	-0.02	2,512	-0.02	-0.02	-0.02	0.99
	(0.26)	(0.01)		(0.02)	(0.02)	(0.02)	
visits: clinic (nr)	0.17	-0.06***	2,512	-0.08***	-0.06**	-0.04	0.20
	(0.41)	(0.02)		(0.02)	(0.03)	(0.03)	
routine visits (yes/no)	0.02	0.01	2,576	0.00	0.01	0.01	0.43
	(0.13)	(0.01)		(0.01)	(0.01)	(0.01)	
total health expenses (USD)	2.38	-0.13	2,512	-0.10	-0.31*	-0.00	0.18
	(6.23)	(0.14)		(0.17)	(0.16)	(0.18)	

Notes: This table reports healthcare-seeking effects for insured young children (below age 6 at baseline). Equation 1 corresponds to Column (2), and Equation 2 to Columns (4)-(7). The data are pooled from the midline and endline periods and are at the household-member level. The facility categories form a quality hierarchy: hospitals (including insured hospitals) provide the highest quality of care, followed by Level 2 facilities, then Level 1 facilities. Clinics, which are mostly private, have quality levels that typically fall between Level 2 facilities and hospitals. Routine visits refer to preventive healthcare visits. Total health expenses are calculated as the sum across all health events and all related actions taken. Visits and health expenses are winsorized at the 99th percentile. For outcomes measured in USD, we estimate a Poisson regression. Survey questions refer to the past six months before the respective survey. The last column tests for the equality of coefficients among the three treatment arms, reporting p-values. Standard errors reported in parentheses are clustered at the household level. $***$, $**$, and $*$ indicate significance at the 1%, 5%, and 10% levels.

Table A.20: Health Outcomes (Adults)

	Mean C	β(T)	N	β_1(T0)	β_2(T1)	β_3(T2)	T0=T1=T2
	(1)	(2)	(3)	(4)	(5)	(6)	(7)
health status ranking today (std)	0.00	0.11***	10,014	0.11***	0.12***	0.10***	0.89
	(1.00)	(0.03)		(0.03)	(0.03)	(0.03)	
sick days (nr)	12.65	-1.49**	10,010	-1.50*	-1.08	-1.90**	0.67
	(28.66)	(0.75)		(0.90)	(0.91)	(0.93)	
work days missed (nr)	4.36	-0.65***	10,011	-0.58**	-0.58**	-0.81***	0.61
	(8.49)	(0.23)		(0.27)	(0.27)	(0.27)	
school days missed (nr)	.	.		.	.	.	.
	(.)	(.)		(.)	(.)	(.)	
mental health index (std)	0.00	0.05	4,865	0.07	0.01	0.08	0.23
	(1.00)	(0.04)		(0.05)	(0.05)	(0.05)	

Notes: This table reports health outcome effects for insured adults (age 18 and above at baseline). Equation 1 corresponds to Column (2), and Equation 2 to Columns (4)-(7). The data are pooled from the midline and endline periods and are at the household-member level. Worry-related variables are not reported because they vary only on the household level. Health status rank is measured by asking respondents: "In general, how do you rate your health status today on a scale from 1 to 5?". Work days missed are limited to members who are above 18 at baseline. School days missed are limited to members who are below 18 at baseline and enrolled in school. The mental health index averages over eight components and is only collected at the endline. Days are winsorized at the 99th percentile. Health status ranking refers to the time of the survey, sick days and days missed to the previous six months, and the mental health index to the past month. The last column tests for the equality of coefficients among the three treatment arms, reporting p-values. Standard errors reported in parentheses are clustered at the household level. $***$, $**$, and $*$ indicate significance at the 1%, 5%, and 10% levels.

Table A.21: Health Outcomes (Minors)

	Mean C	β(T)	N	β_1(T0)	β_2(T1)	β_3(T2)	T0=T1=T2
	(1)	(2)	(3)	(4)	(5)	(6)	(7)
health status ranking today (std)	0.00	0.05*	8,969	0.03	0.08**	0.05	0.47
	(1.00)	(0.03)		(0.04)	(0.04)	(0.04)	
sick days (nr)	5.23	-0.94**	8,969	-0.83*	-1.04**	-0.95**	0.88
	(14.35)	(0.37)		(0.44)	(0.44)	(0.47)	
work days missed (nr)	.	.		.	.	.	.
	(.)	(.)		(.)	(.)	(.)	
school days missed (nr)	1.48	-0.35***	7,583	-0.22*	-0.46***	-0.37***	0.07*
	(3.74)	(0.10)		(0.12)	(0.11)	(0.12)	
mental health index (std)	-0.00	0.04	4,354	0.04	0.02	0.07	0.63
	(1.00)	(0.04)		(0.05)	(0.05)	(0.05)	

Notes: This table reports health outcome effects for insured minors (below age 18 at baseline). Equation 1 corresponds to Column (2), and Equation 2 to Columns (4)-(7). The data are pooled from the midline and endline periods and are at the household-member level. Worry-related variables are not reported because they vary only on the household level. Health status rank is measured by asking respondents: "In general, how do you rate your health status today on a scale from 1 to 5?". Work days missed are limited to members who are above 18 at baseline. School days missed are limited to members who are below 18 at baseline and enrolled in school. The mental health index averages over eight components and is only collected at the endline. Days are winsorized at the 99th percentile. Health status ranking refers to the time of the survey, sick days and days missed to the previous six months, and the mental health index to the past month. The last column tests for the equality of coefficients among the three treatment arms, reporting p-values. Standard errors reported in parentheses are clustered at the household level. $***$, $**$, and $*$ indicate significance at the 1%, 5%, and 10% levels.

Table A.22: Health Outcomes (Children Age 0 to 5)

	Mean C	β(T)	N	β_1(T0)	β_2(T1)	β_3(T2)	T0=T1=T2
	(1)	(2)	(3)	(4)	(5)	(6)	(7)
health status ranking today (std)	0.00	0.06	2,576	0.08	0.04	0.06	0.83
	(1.00)	(0.05)		(0.06)	(0.06)	(0.06)	
sick days (nr)	5.67	-0.23	2,576	-0.48	0.04	-0.24	0.85
	(13.69)	(0.67)		(0.76)	(0.93)	(0.88)	
work days missed (nr)	.	.		.	.	.	.
	(.)	(.)		(.)	(.)	(.)	
school days missed (nr)	1.05	0.01	1,536	-0.02	-0.06	0.13	0.52
	(2.27)	(0.14)		(0.18)	(0.17)	(0.17)	
mental health index (std)	0.00	0.07	1,256	0.11	0.05	0.07	0.75
	(1.00)	(0.07)		(0.08)	(0.08)	(0.08)	
worry index (std)	0.00	-0.09***	5,449	-0.12***	-0.08*	-0.07*	0.33
	(1.00)	(0.03)		(0.04)	(0.04)	(0.04)	
worry: health (std)	-0.00	-0.09***	5,449	-0.12***	-0.07	-0.08**	0.41
	(1.00)	(0.03)		(0.04)	(0.04)	(0.04)	
worry: medical expenses (std)	0.00	-0.11***	5,449	-0.14***	-0.10**	-0.09**	0.41
	(1.00)	(0.03)		(0.04)	(0.04)	(0.04)	

Notes: This table reports health outcome effects for insured young children (below age 6 at baseline). Equation 1 corresponds to Column (2), and Equation 2 to Columns (4)-(7). The data are pooled from the midline and endline periods and are at the household-member level. Worry-related variables are not reported because they vary only on the household level. Health status rank is measured by asking respondents: "In general, how do you rate your health status today on a scale from 1 to 5?". Work days missed are limited to members who are above 18 at baseline. School days missed are limited to members who are below 18 at baseline and enrolled in school. The mental health index averages over eight components and is only collected at the endline. Days are winsorized at the 99th percentile. Health status ranking refers to the time of the survey, sick days and days missed to the previous six months, and the mental health index to the past month. The last column tests for the equality of coefficients among the three treatment arms, reporting p-values. Standard errors reported in parentheses are clustered at the household level. $***$, $**$, and $*$ indicate significance at the 1%, 5%, and 10% levels.

Table A.23: Healthcare Seeking (Female)

	Mean C	β(T)	N	β_1(T0)	β_2(T1)	β_3(T2)	T0=T1=T2
	(1)	(2)	(3)	(4)	(5)	(6)	(7)
any facility visit (yes/no)	0.42	-0.01	9,976	0.00	-0.00	-0.04**	0.06*
	(0.49)	(0.01)		(0.02)	(0.02)	(0.02)	
facility visits (nr)	0.53	-0.03	9,976	-0.00	-0.02	-0.06**	0.06*
	(0.72)	(0.02)		(0.03)	(0.02)	(0.02)	
visits: insured hospital (nr)	0.05	0.08***	9,976	0.11***	0.08***	0.05***	0.00***
	(0.22)	(0.01)		(0.01)	(0.01)	(0.01)	
visits: any hospital (nr)	0.09	0.07***	9,976	0.09***	0.07***	0.04***	0.00***
	(0.31)	(0.01)		(0.01)	(0.01)	(0.01)	
visits: facility level 2 (nr)	0.12	-0.03***	9,976	-0.03**	-0.02	-0.04***	0.05**
	(0.37)	(0.01)		(0.01)	(0.01)	(0.01)	
visits: facility level 1 (nr)	0.06	-0.01	9,976	-0.00	-0.01	-0.01	0.64
	(0.24)	(0.01)		(0.01)	(0.01)	(0.01)	
visits: clinic (nr)	0.15	-0.04***	9,976	-0.04***	-0.03*	-0.04***	0.72
	(0.41)	(0.01)		(0.01)	(0.02)	(0.01)	
routine visits (yes/no)	0.08	-0.00	10,266	-0.00	0.00	-0.01	0.47
	(0.26)	(0.01)		(0.01)	(0.01)	(0.01)	
total health expenses (USD)	4.82	-0.25***	9,976	-0.18**	-0.35***	-0.23**	0.19
	(12.33)	(0.07)		(0.08)	(0.09)	(0.09)	

Notes: This table reports healthcare-seeking effects for insured female individuals. Equation 1 corresponds to Column (2), and Equation 2 to Columns (4)-(7). The data are pooled from the midline and endline periods and are at the household-member level. The facility categories form a quality hierarchy: hospitals (including insured hospitals) provide the highest quality of care, followed by Level 2 facilities, then Level 1 facilities. Clinics, which are mostly private, have quality levels that typically fall between Level 2 facilities and hospitals. Routine visits refer to preventive healthcare visits. Total health expenses are calculated as the sum across all health events and all related actions taken. Visits and health expenses are winsorized at the 99th percentile. For outcomes measured in USD, we estimate a Poisson regression. Survey questions refer to the past six months before the respective survey. The last column tests for the equality of coefficients among the three treatment arms, reporting p-values. Standard errors reported in parentheses are clustered at the household level. $***$, $**$, and $*$ indicate significance at the 1%, 5%, and 10% levels.

Table A.24: Healthcare Seeking (Male)

	Mean C	β(T)	N	β_1(T0)	β_2(T1)	β_3(T2)	T0=T1=T2
	(1)	(2)	(3)	(4)	(5)	(6)	(7)
any facility visit (yes/no)	0.39	-0.03**	8,464	-0.01	-0.04**	-0.05***	0.06*
	(0.49)	(0.01)		(0.02)	(0.02)	(0.02)	
facility visits (nr)	0.48	-0.04**	8,464	-0.01	-0.04	-0.07***	0.04**
	(0.67)	(0.02)		(0.02)	(0.02)	(0.02)	
visits: insured hospital (nr)	0.05	0.05***	8,464	0.08***	0.05***	0.02**	0.00***
	(0.22)	(0.01)		(0.01)	(0.01)	(0.01)	
visits: any hospital (nr)	0.07	0.05***	8,464	0.08***	0.05***	0.02*	0.00***
	(0.27)	(0.01)		(0.01)	(0.01)	(0.01)	
visits: facility level 2 (nr)	0.09	-0.02**	8,464	-0.03**	-0.01	-0.03**	0.44
	(0.31)	(0.01)		(0.01)	(0.01)	(0.01)	
visits: facility level 1 (nr)	0.07	-0.01	8,464	-0.01	-0.01	-0.01	0.91
	(0.25)	(0.01)		(0.01)	(0.01)	(0.01)	
visits: clinic (nr)	0.15	-0.04***	8,464	-0.03**	-0.04**	-0.04**	0.99
	(0.40)	(0.01)		(0.02)	(0.02)	(0.02)	
routine visits (yes/no)	0.05	-0.01	8,717	-0.01	-0.00	-0.01*	0.42
	(0.22)	(0.01)		(0.01)	(0.01)	(0.01)	
total health expenses (USD)	4.44	-0.30***	8,464	-0.23**	-0.28***	-0.42***	0.23
	(12.35)	(0.08)		(0.10)	(0.10)	(0.11)	

Notes: This table reports healthcare-seeking effects for insured male individuals. Equation 1 corresponds to Column (2), and Equation 2 to Columns (4)-(7). The data are pooled from the midline and endline periods and are at the household-member level. The facility categories form a quality hierarchy: hospitals (including insured hospitals) provide the highest quality of care, followed by Level 2 facilities, then Level 1 facilities. Clinics, which are mostly private, have quality levels that typically fall between Level 2 facilities and hospitals. Routine visits refer to preventive healthcare visits. Total health expenses are calculated as the sum across all health events and all related actions taken. Visits and health expenses are winsorized at the 99th percentile. For outcomes measured in USD, we estimate a Poisson regression. Survey questions refer to the past six months before the respective survey. The last column tests for the equality of coefficients among the three treatment arms, reporting p-values. Standard errors reported in parentheses are clustered at the household level. $***$, $**$, and $*$ indicate significance at the 1%, 5%, and 10% levels.

Table A.25: Health Outcomes (Female)

	Mean C	β(T)	N	β_1(T0)	β_2(T1)	β_3(T2)	T0=T1=T2
	(1)	(2)	(3)	(4)	(5)	(6)	(7)
health status ranking today (std)	-0.00	0.09***	10,266	0.11***	0.12***	0.06*	0.19
	(1.00)	(0.03)		(0.03)	(0.03)	(0.03)	
sick days (nr)	10.38	-1.65***	10,266	-1.70**	-1.85**	-1.39*	0.83
	(25.66)	(0.63)		(0.74)	(0.73)	(0.80)	
work days missed (nr)	5.06	-1.00***	5,678	-0.91**	-1.07***	-1.01***	0.88
	(9.20)	(0.30)		(0.36)	(0.35)	(0.36)	
school days missed (nr)	1.41	-0.33**	3,921	-0.31**	-0.35**	-0.32**	0.95
	(3.73)	(0.13)		(0.15)	(0.15)	(0.16)	
mental health index (std)	-0.00	0.04	4,987	0.07	0.00	0.04	0.33
	(1.00)	(0.04)		(0.04)	(0.04)	(0.04)	

Notes: This table reports health outcome effects for insured female individuals. Equation 1 corresponds to Column (2), and Equation 2 to Columns (4)-(7). The data are pooled from the midline and endline periods and are at the household-member level. Worry-related variables are not reported because they vary only on the household level. Health status rank is measured by asking respondents: "In general, how do you rate your health status today on a scale from 1 to 5?". Work days missed are limited to members who are above 18 at baseline. School days missed are limited to members who are below 18 at baseline and enrolled in school. The mental health index averages over eight components and is only collected at the endline. Days are winsorized at the 99th percentile. Health status ranking refers to the time of the survey, sick days and days missed to the previous six months, and the mental health index to the past month. The last column tests for the equality of coefficients among the three treatment arms, reporting p-values. Standard errors reported in parentheses are clustered at the household level. $***$, $**$, and $*$ indicate significance at the 1%, 5%, and 10% levels.

Table A.26: Health Outcomes (Male)

	Mean C	β(T)	N	β_1(T0)	β_2(T1)	β_3(T2)	T0=T1=T2
	(1)	(2)	(3)	(4)	(5)	(6)	(7)
health status ranking today (std)	0.00	0.06**	8,717	0.03	0.07*	0.09***	0.16
	(1.00)	(0.03)		(0.04)	(0.04)	(0.04)	
sick days (nr)	7.56	-0.56	8,713	-0.40	0.05	-1.39**	0.07*
	(19.85)	(0.53)		(0.65)	(0.68)	(0.62)	
work days missed (nr)	3.40	-0.15	4,333	-0.09	0.11	-0.50	0.18
	(7.30)	(0.27)		(0.34)	(0.35)	(0.32)	
school days missed (nr)	1.56	-0.37***	3,662	-0.13	-0.57***	-0.41**	0.01**
	(3.75)	(0.14)		(0.18)	(0.15)	(0.17)	
mental health index (std)	-0.00	0.03	4,232	0.03	0.00	0.07	0.35
	(1.00)	(0.04)		(0.05)	(0.05)	(0.05)	

Notes: This table reports health outcome effects for insured male individuals. Equation 1 corresponds to Column (2), and Equation 2 to Columns (4)-(7). The data are pooled from the midline and endline periods and are at the household-member level. Worry-related variables are not reported because they vary only on the household level. Health status rank is measured by asking respondents: "In general, how do you rate your health status today on a scale from 1 to 5?". Work days missed are limited to members who are above 18 at baseline. School days missed are limited to members who are below 18 at baseline and enrolled in school. The mental health index averages over eight components and is only collected at the endline. Days are winsorized at the 99th percentile. Health status ranking refers to the time of the survey, sick days and days missed to the previous six months, and the mental health index to the past month. The last column tests for the equality of coefficients among the three treatment arms, reporting p-values. Standard errors reported in parentheses are clustered at the household level. $***$, $**$, and $*$ indicate significance at the 1%, 5%, and 10% levels.

Table A.27: Healthcare Seeking (Robustness Excluding T0)

	Mean C	β(T)	N	β_2(T1)	β_3(T2)	T1=T2
	(1)	(2)	(3)	(4)	(5)	(6)
any facility visit (yes/no)	0.41	-0.03**	13,782	-0.02	-0.04***	0.16
	(0.49)	(0.01)		(0.01)	(0.01)	
facility visits (nr)	0.51	-0.05***	13,782	-0.03	-0.07***	0.08*
	(0.70)	(0.02)		(0.02)	(0.02)	
visits: insured hospital (nr)	0.05	0.05***	13,782	0.07***	0.04***	0.00***
	(0.22)	(0.01)		(0.01)	(0.01)	
visits: any hospital (nr)	0.08	0.04***	13,782	0.06***	0.03***	0.01**
	(0.29)	(0.01)		(0.01)	(0.01)	
visits: facility level 2 (nr)	0.11	-0.03***	13,782	-0.02	-0.04***	0.02**
	(0.35)	(0.01)		(0.01)	(0.01)	
visits: facility level 1 (nr)	0.07	-0.01	13,782	-0.01	-0.01	0.96
	(0.25)	(0.01)		(0.01)	(0.01)	
visits: clinic (nr)	0.15	-0.03***	13,782	-0.03**	-0.04***	0.69
	(0.41)	(0.01)		(0.01)	(0.01)	
routine visits (yes/no)	0.06	-0.00	14,175	-0.00	-0.01	0.15
	(0.25)	(0.00)		(0.01)	(0.01)	
total health expenses (USD)	4.65	-0.32***	13,782	-0.32***	-0.31***	0.91
	(12.34)	(0.06)		(0.07)	(0.08)	

Notes: This table reports healthcare-seeking effects, excluding households in treatment arm T0. Equation 1 corresponds to Column (2), and Equation 2 to Columns (4)-(7). The data are pooled from the midline and endline periods and are at the household-member level. Only insured household members are included in the sample. The facility categories form a quality hierarchy: hospitals (including insured hospitals) provide the highest quality of care, followed by Level 2 facilities, then Level 1 facilities. Clinics, which are mostly private, have quality levels that typically fall between Level 2 facilities and hospitals. Routine visits refer to preventive healthcare visits. Total health expenses are calculated as the sum across all health events and all related actions taken. Visits and health expenses are winsorized at the 99th percentile. For outcomes measured in USD, we estimate a Poisson regression. Survey questions refer to the past six months before the respective survey. The last column tests for equality between the T1 and T2 treatment coefficients, reporting p-values. Standard errors reported in parentheses are clustered at the household level. $***$, $**$, and $*$ indicate significance at the 1%, 5%, and 10% levels.

Table A.28: Risk Coping (Robustness Excluding T0)

	Mean C (1)	β(T) (2)	N (3)	β_2(T1) (4)	β_3(T2) (5)	T1=T2 (6)
risk coping index (std)	0.00	-0.16***	4,127	-0.17***	-0.15***	0.61
	(1.00)	(0.04)		(0.04)	(0.04)	
foregone healthcare (yes/no)	0.30	-0.04**	4,078	-0.05***	-0.03*	0.41
	(0.46)	(0.02)		(0.02)	(0.02)	
sold assets (yes/no)	0.20	-0.05***	4,078	-0.04***	-0.05***	0.59
	(0.40)	(0.01)		(0.02)	(0.02)	
reduced food consumption (yes/no)	0.13	-0.03**	4,078	-0.03**	-0.03**	0.94
	(0.34)	(0.01)		(0.01)	(0.01)	
saved past year (yes/no)	0.83	-0.02	2,033	-0.02	-0.01	0.51
	(0.37)	(0.02)		(0.02)	(0.02)	
savings current amount (USD)	100.01	-0.20**	2,033	-0.22**	-0.18*	0.74
	(184.87)	(0.09)		(0.10)	(0.10)	
loan past year (yes/no)	0.82	-0.04**	2,039	-0.04**	-0.04**	0.98
	(0.38)	(0.02)		(0.02)	(0.02)	
loan for health (yes/no)	0.32	-0.04*	2,038	-0.04	-0.04	0.98
	(0.47)	(0.02)		(0.02)	(0.02)	
loan amount past year (USD)	245.48	-0.22***	2,039	-0.24**	-0.21**	0.71
	(481.19)	(0.09)		(0.10)	(0.10)	

Notes: This table reports risk coping effects, excluding households in treatment arm T0. Equation 1 corresponds to Column (2), and Equation 2 to Columns (4)-(7). The data are pooled from the midline and endline periods and are at the household level. Variables in rows 5 to 9 are only collected in the endline survey. The risk coping index averages over whether households used any of the following coping strategies: taking loans (from moneylenders, banks, family, friends, or groups), receiving remittances, selling assets, reducing consumption (food or other), increasing labor supply, or having children work or miss school. Savings and loan amounts are winsorized at the 99th percentile. For outcomes measured in USD, we estimate a Poisson regression. Survey questions refer to the past six months before the respective survey, except savings and loan questions in rows 5 to 9, which refer to the past year. The last column tests for equality between the T1 and T2 treatment coefficients, reporting p-values. Standard errors reported in parentheses are clustered at the household level. $***$, $**$, and $*$ indicate significance at the 1%, 5%, and 10% levels.

Table A.29: Health Outcomes (Robustness Excluding T0)

	Mean C	β(T)	N	β_2(T1)	β_3(T2)	T1=T2
	(1)	(2)	(3)	(4)	(5)	(6)
health status ranking today (std)	-0.00	0.09***	14,175	0.10***	0.07**	0.48
	(1.00)	(0.02)		(0.03)	(0.03)	
sick days (nr)	9.12	-1.21**	14,174	-1.01*	-1.42**	0.47
	(23.28)	(0.49)		(0.56)	(0.58)	
work days missed (nr)	4.36	-0.70***	7,473	-0.58**	-0.82***	0.36
	(8.49)	(0.24)		(0.27)	(0.27)	
school days missed (nr)	1.48	-0.41***	5,650	-0.46***	-0.37***	0.36
	(3.74)	(0.11)		(0.11)	(0.12)	
mental health index (std)	-0.00	0.03	6,890	0.01	0.05	0.25
	(1.00)	(0.04)		(0.04)	(0.04)	
worry index (std)	0.00	-0.07**	4,078	-0.08*	-0.07*	0.84
	(1.00)	(0.04)		(0.04)	(0.04)	
worry: health (std)	-0.00	-0.08**	4,078	-0.07	-0.09**	0.66
	(1.00)	(0.04)		(0.04)	(0.04)	
worry: medical expenses (std)	0.00	-0.09***	4,078	-0.10**	-0.09**	0.90
	(1.00)	(0.04)		(0.04)	(0.04)	

Notes: This table reports health outcome effects, excluding households in treatment arm T0. Equation 1 corresponds to Column (2), and Equation 2 to Columns (4)-(7). The data are pooled from the midline and endline periods and are at the household-member level except for worry-related variables; these are collected at the household level. Only insured household members are included in the sample. Health status rank is measured by asking respondents: "In general, how do you rate your health status today on a scale from 1 to 5?". Work days missed are limited to members who are above 18 at baseline. School days missed are limited to members who are below 18 at baseline and enrolled in school. The mental health index averages over eight components and is only collected at the endline. Worries are measured by asking "How worried are you about having health problems/accidents/money for medical treatment/money for basic needs for you or your family members?". The worry index is based on these four items. Days are winsorized at the 99th percentile. Health status ranking and worry-related questions refer to the time of the survey, sick days and days missed to the previous six months, and the mental health index to the past month. The last column tests for equality between the T1 and T2 treatment coefficients, reporting p-values. Standard errors reported in parentheses are clustered at the household level. $***$, $**$, and $*$ indicate significance at the 1%, 5%, and 10% levels.

Table A.30: Healthcare Seeking (Robustness Lasso)

	Mean C (1)	β(T) (2)	Con (3)	N (4)	β_1(T0) (5)	β_2(T1) (6)	β_3(T2) (7)	T0=T1=T2 (8)	Con (9)
any facility visit (yes/no)	0.41	-0.02***	21	18,190	-0.00	-0.03***	-0.04***	0.00***	23
	(0.49)	(0.01)			(0.01)	(0.01)	(0.01)		
facility visits (nr)	0.51	-0.03***	23	18,190	-0.01	-0.04**	-0.06***	0.00***	25
	(0.70)	(0.01)			(0.01)	(0.01)	(0.01)		
visits: insured hospital (nr)	0.05	0.06***	18	18,190	0.09***	0.06***	0.03***	0.00***	22
	(0.22)	(0.00)			(0.01)	(0.01)	(0.01)		
visits: any hospital (nr)	0.08	0.06***	20	18,190	0.08***	0.05***	0.03***	0.00***	26
	(0.29)	(0.01)			(0.01)	(0.01)	(0.01)		
visits: facility level 2 (nr)	0.11	-0.03***	20	18,190	-0.03***	-0.02**	-0.03***	0.01***	26
	(0.35)	(0.01)			(0.01)	(0.01)	(0.01)		
visits: facility level 1 (nr)	0.07	-0.01**	15	18,190	-0.01	-0.01**	-0.01*	0.81	21
	(0.25)	(0.00)			(0.00)	(0.00)	(0.00)		
visits: clinic (nr)	0.15	-0.04***	18	18,190	-0.04***	-0.03***	-0.04***	0.81	22
	(0.41)	(0.01)			(0.01)	(0.01)	(0.01)		
routine visits (yes/no)	0.06	-0.01	19	18,809	-0.01	-0.00	-0.01	0.45	28
	(0.25)	(0.00)			(0.00)	(0.00)	(0.00)		
total health expenses (USD)	4.65	-0.29***	16	18,274	-0.22***	-0.35***	-0.32***	0.21	21
	(12.34)	(0.06)			(0.07)	(0.07)	(0.07)		

Notes: This table reports healthcare-seeking effects, using a post-double selection Lasso estimator. All variables from Table A.2 and Table A.3 are included as potential control variables. Wave fixed effects, hospital fixed effects, and the lagged dependent variable are in the set of controls that are always included. Columns (3) and (9) show the number of control variables selected by Lasso. A plug-in penalty parameter is used. Equation 1 corresponds to Column (2)-(3), and Equation 2 to Columns (5)-(9). The data are pooled from the midline and endline periods and are at the household-member level. Only insured household members are included in the sample. The facility categories form a quality hierarchy: hospitals (including insured hospitals) provide the highest quality of care, followed by Level 2 facilities, then Level 1 facilities. Clinics, which are mostly private, have quality levels that typically fall between Level 2 facilities and hospitals. Routine visits refer to preventive healthcare visits. Total health expenses are calculated as the sum across all health events and all related actions taken. Visits and health expenses are winsorized at the 99th percentile. For outcomes measured in USD, we estimate a Poisson regression. Survey questions refer to the past six months before the respective survey. Column (8) tests for the equality of coefficients among the three treatment arms. Standard errors reported in parentheses are clustered at the household level. $***$, $**$, and $*$ indicate significance at the 1%, 5%, and 10% levels.

Table A.31: Risk Coping (Robustness Lasso)

	Mean C (1)	β(T) (2)	Con (3)	N (4)	β_1(T0) (5)	β_2(T1) (6)	β_3(T2) (7)	T0=T1=T2 (8)	Con (9)
risk coping index (std)	0.00	-0.16***	15	5,459	-0.16***	-0.17***	-0.14***	0.71	15
	(1.00)	(0.03)			(0.04)	(0.04)	(0.04)		
foregone healthcare (yes/no)	0.30	-0.04***	14	5,395	-0.05***	-0.04***	-0.03	0.34	14
	(0.46)	(0.01)			(0.02)	(0.02)	(0.02)		
sold assets (yes/no)	0.20	-0.05***	12	5,396	-0.06***	-0.05***	-0.05***	0.77	12
	(0.40)	(0.01)			(0.01)	(0.01)	(0.01)		
reduced food consumption (yes/no)	0.13	-0.03***	10	5,400	-0.03**	-0.03**	-0.03**	0.98	10
	(0.34)	(0.01)			(0.01)	(0.01)	(0.01)		
saved past year (yes/no)	0.83	-0.01	6	2,689	-0.01	-0.02	-0.01	0.65	6
	(0.37)	(0.02)			(0.02)	(0.02)	(0.02)		
savings current amount (USD)	100.01	-0.16**	10	2,711	-0.05	-0.24**	-0.20**	0.15	10
	(184.87)	(0.08)			(0.09)	(0.10)	(0.10)		
loan past year (yes/no)	0.82	-0.04**	6	2,717	-0.02	-0.04**	-0.04**	0.53	6
	(0.38)	(0.02)			(0.02)	(0.02)	(0.02)		
loan for health (yes/no)	0.32	-0.04*	9	2,716	-0.03	-0.04	-0.04	0.97	9
	(0.47)	(0.02)			(0.02)	(0.02)	(0.02)		
loan amount past year (USD)	245.48	-0.18**	10	2,718	-0.06	-0.25***	-0.23**	0.11	10
	(481.19)	(0.08)			(0.10)	(0.10)	(0.09)		

Notes: This table reports risk coping effects, using a post-double selection Lasso estimator. All variables from Table A.2 and Table A.3 are included as potential control variables. Wave fixed effects, hospital fixed effects, and the lagged dependent variable are in the set of controls that are always included. Columns (3) and (9) show the number of control variables selected by Lasso. A plug-in penalty parameter is used. Equation 1 corresponds to Column (2)-(3), and Equation 2 to Columns (5)-(9). The data are pooled from the midline and endline periods and are at the household level. Variables in rows 5 to 9 are only collected in the endline survey. The risk coping index averages over whether households used any of the following coping strategies: taking loans (from moneylenders, banks, family, friends, or groups), receiving remittances, selling assets, reducing consumption (food or other), increasing labor supply, or having children work or miss school. Savings and loan amounts are winsorized at the 99th percentile. For outcomes measured in USD, we estimate a Poisson regression. Survey questions refer to the past six months before the respective survey, except savings and loan questions in rows 5 to 9, which refer to the past year. Column (8) tests for the equality of coefficients among the three treatment arms. Standard errors reported in parentheses are clustered at the household level. $***$, $**$, and $*$ indicate significance at the 1%, 5%, and 10% levels.

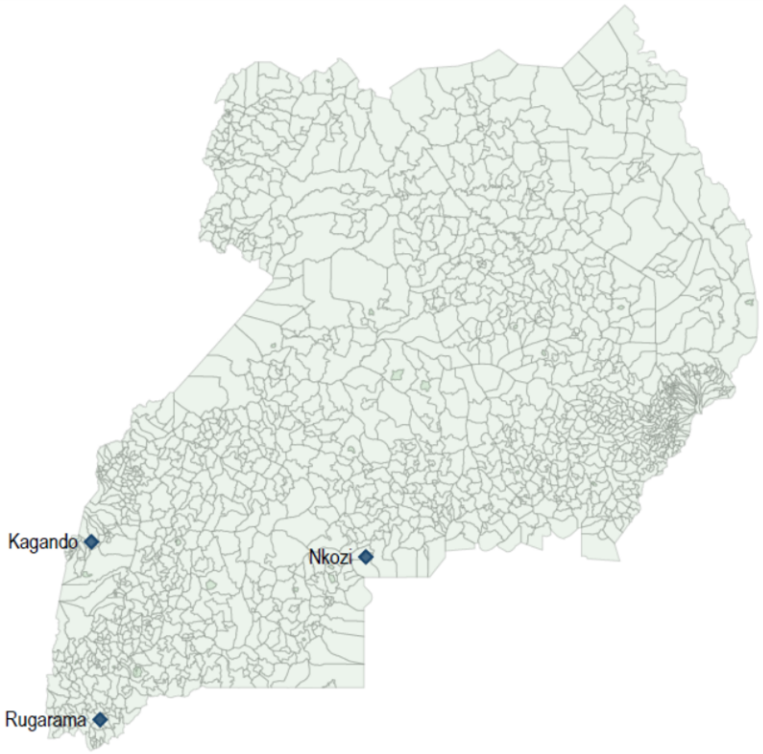
Table A.32: Health Outcomes (Robustness Lasso)

	Mean C (1)	β(T) (2)	Con (3)	N (4)	β_1(T0) (5)	β_2(T1) (6)	β_3(T2) (7)	T0=T1=T2 (8)	Con (9)
health status ranking today (std)	-0.00	0.08***	25	18,722	0.07***	0.09***	0.07***	0.61	31
	(1.00)	(0.02)			(0.02)	(0.02)	(0.02)		
sick days (nr)	9.12	-1.14***	16	18,719	-1.33***	-1.02**	-1.25***	0.76	25
	(23.28)	(0.37)			(0.45)	(0.45)	(0.45)		
work days missed (nr)	4.36	-0.65***	18	9,849	-0.67***	-0.56**	-0.73***	0.73	21
	(8.49)	(0.19)			(0.23)	(0.22)	(0.23)		
school days missed (nr)	1.48	-0.35***	11	7,507	-0.23**	-0.46***	-0.36***	0.03**	11
	(3.74)	(0.09)			(0.11)	(0.10)	(0.11)		
mental health index (std)	-0.00	0.05**	17	9,094	0.06**	0.01	0.07**	0.05*	19
	(1.00)	(0.02)			(0.03)	(0.03)	(0.03)		
worry index (std)	0.00	-0.09***	13	5,396	-0.12***	-0.08**	-0.07*	0.26	13
	(1.00)	(0.03)			(0.04)	(0.04)	(0.04)		
worry: health (std)	-0.00	-0.10***	14	5,396	-0.12***	-0.07*	-0.09**	0.37	14
	(1.00)	(0.03)			(0.04)	(0.04)	(0.04)		
worry: medical expenses (std)	0.00	-0.11***	14	5,396	-0.14***	-0.10***	-0.08**	0.27	14
	(1.00)	(0.03)			(0.04)	(0.04)	(0.04)		

Notes: This table reports health outcome effects, using a post-double selection Lasso estimator. All variables from Table A.2 and Table A.3 are included as potential control variables. Wave fixed effects, hospital fixed effects, and the lagged dependent variable are in the set of controls that are always included. Columns (3) and (9) show the number of control variables selected by Lasso. A plug-in penalty parameter is used. Equation 1 corresponds to Column (2)-(3), and Equation 2 to Columns (5)-(9). The data are pooled from the midline and endline periods and are at the household-member level. Only insured household members are included in the sample. Health status rank is measured by asking respondents: "In general, how do you rate your health status today on a scale from 1 to 5?". Work days missed are limited to members who are above 18 at baseline. School days missed are limited to members who are below 18 at baseline and enrolled in school. The mental health index averages over eight components and is only collected at the endline. Worries are measured by asking "How worried are you about having health problems/accidents/money for medical treatment/money for basic needs for you or your family members?". The worry index is based on these four items. Days are winsorized at the 99th percentile. Health status ranking and worry-related questions refer to the time of the survey, sick days and days missed to the previous six months, and the mental health index to the past month. Column (8) tests for the equality of coefficients among the three treatment arms. Standard errors reported in parentheses are clustered at the household level. $***$, $**$, and $*$ indicate significance at the 1%, 5%, and 10% levels.

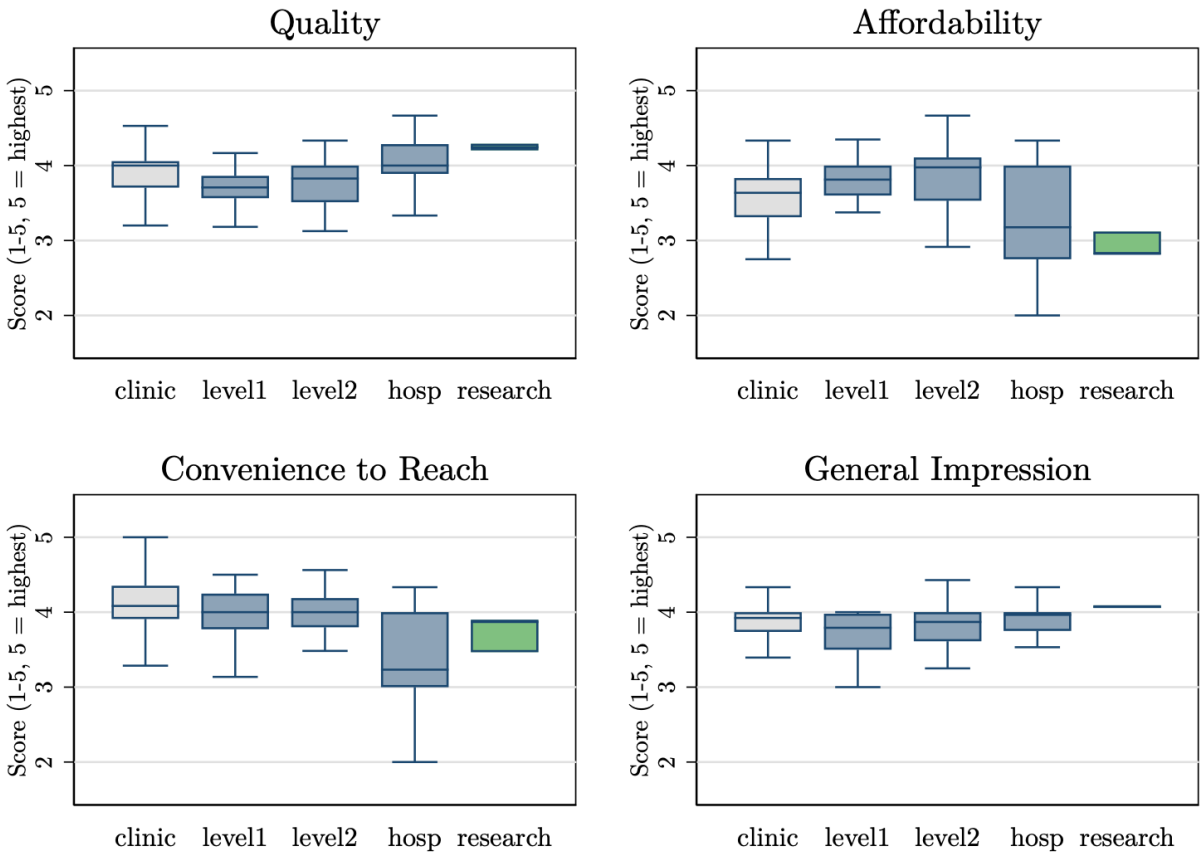
Figures

Figure A.1: Insured Hospital Locations



This figure depicts the locations of the three insured hospitals: Kagando Hospital in Kasese district, Rugarama Hospital in Kabale district, and Nkozi Hospital in Mpigi district. All three hospitals are in rural areas.

Figure A.2: Healthcare Facility Characteristics



This figure depicts the score of a given facility, averaged over households that were interviewed about this facility. Households could provide a score between one and five. The graph provides box plots based on the underlying facility-level data. The box plots depict the upper adjacent value, the 75th percentile, the median, the 25th percentile, and the lower adjacent value. The adjacent values are calculated based on 1.5 times the inter-quartile range (IQR), i.e. Q1 - 1.5 × IQR and Q3 + 1.5 x IQR.

Appendix B: Administrative Data

Tables

Table B.1: Summary Statistics on Illnesses

	Visits with illness (%)			
Illness category	T	T0	T1	T2
respiratory infections (coughs, colds, sore throat, ear infections, pneumonia)	48.71	48.51	51.95	44.71
mild pain (headaches, body aches)	29.95	30.26	29.15	30.34
pain with swelling (joint pain, muscle pain, sprains)	26.74	25.61	31.75	22.36
stomach/intestinal infections (diarrhea, food poisoning, worms, amoeba)	23.14	22.98	24.24	21.96
stomach acid problems (heartburn, ulcers, indigestion, gastritis)	17.82	17.63	17.60	18.56
allergies and inflammation (skin rashes, hay fever, itching)	15.85	16.67	15.30	14.77
vitamin and mineral deficiencies (anemia, weak bones)	14.87	15.70	13.42	14.97
skin infections (wounds, boils, bacterial skin infections)	8.91	10.00	8.08	7.58
urinary tract infections (bladder infections, painful urination)	5.53	5.18	5.63	6.19
moderate to severe pain	4.33	3.51	4.33	6.19
fungal infections (yeast infections, ringworm, thrush)	4.16	5.96	2.02	2.99
high blood pressure and heart conditions	3.30	2.98	3.17	4.19
nerve pain (burning, tingling, shooting pain)	2.70	3.42	2.02	2.00
depression and anxiety	2.49	2.37	3.17	1.80
severe infections requiring iv treatment	2.10	2.46	1.73	1.80

Notes: This table reports the share of outpatient visits with the respective illness. The top 15 illnesses in the overall treatment sample (T) are reported, followed by the share of visits with an illness in T0 (low copay), T1 (medium copay), and T2 (high copay). Illnesses are derived from the type of drugs that were issued.

Table B.2: Summary Statistics on Drugs

	Visits with drug (%)			
Drug category	T	T0	T1	T2
analgesic - simple	27.85	28.42	26.70	28.14
analgesic - anti-inflammatory	24.81	23.68	29.58	20.76
antibiotic - penicillin	21.17	20.96	23.52	18.36
gastrointestinal - acid reducer	16.80	16.14	17.03	17.96
antibiotic - metronidazole	15.21	14.30	16.88	14.97
vitamin/supplement	14.87	15.70	13.42	14.97
respiratory - cough syrup	10.54	12.28	9.96	7.39
antibiotic - fluoroquinolone	10.54	9.47	11.40	11.78
antihistamine	8.83	9.47	8.08	8.38
antibiotic - macrolide	8.27	7.98	7.79	9.58
steroid - systemic	6.26	6.75	6.06	5.39
antibiotic - cephalosporin	6.21	6.49	7.50	3.79
antibiotic - nitrofurantoin	5.53	5.18	5.63	6.19
gastrointestinal - rehydration	4.93	5.53	4.91	3.59
antiparasitic	4.63	4.82	4.18	4.79

Notes: This table reports the share of outpatient visits with the respective drug. The top 15 drug types in the overall treatment sample (T) are reported, followed by the share of visits with a drug type in T0 (low copay), T1 (medium copay), and T2 (high copay).

Table B.3: Summary Statistics on Tests

	Visits with test (%)			
Test category	T	T0	T1	T2
malaria testing	31.92	32.72	34.20	26.95
urine testing (infections, kidney problems)	25.32	25.26	25.25	25.55
typhoid fever testing	25.28	25.53	25.40	24.55
complete blood count (anemia, infections)	22.71	22.72	23.95	20.96
h. pylori testing (stomach ulcers)	13.67	13.25	12.99	15.57
ultrasound scans	7.88	7.11	7.50	10.18
brucella testing (animal-borne infection)	7.07	5.79	8.51	7.98
syphilis testing	6.51	6.84	5.63	6.99
diabetes monitoring (blood sugar tests)	4.67	3.51	4.62	7.39
stool testing (parasites, infections)	4.28	4.12	3.46	5.79
inflammation and arthritis tests	3.77	3.51	4.62	3.19
hiv testing	2.91	3.16	2.89	2.40
x-rays	1.97	1.40	2.16	2.99
other specialized tests	1.84	1.84	2.16	1.40
pregnancy testing	1.63	1.49	2.02	1.40

Notes: This table reports the share of outpatient visits with the respective test. The top 15 test types in the overall treatment sample (T) are reported, followed by the share of visits with a test type in T0 (low copay), T1 (medium copay), and T2 (high copay).

Table B.4: Healthcare Utilization

	Mean all	Mean T0	β_1(T1)	β_2(T2)	N
outpatient: any visit (yes/no)	0.16	0.22	-0.06***	-0.09***	7,849
	(0.37)	(0.41)	(0.01)	(0.01)	
outpatient: visits (nr)	0.30	0.42	-0.15***	-0.22***	7,849
	(0.90)	(1.10)	(0.03)	(0.03)	
inpatient: any visit (yes/no)	0.01	0.01	-0.01*	-0.00	7,849
	(0.11)	(0.12)	(0.00)	(0.00)	
inpatient: visits (nr)	0.01	0.02	-0.01*	-0.00	7,849
	(0.12)	(0.13)	(0.00)	(0.00)	
outpatient: any service (yes/no)	0.16	0.21	-0.06***	-0.09***	7,849
	(0.37)	(0.41)	(0.01)	(0.01)	
outpatient: service (nr of visits)	0.26	0.37	-0.13***	-0.20***	7,849
	(0.80)	(0.99)	(0.03)	(0.03)	
outpatient: any consultation (yes/no)	0.16	0.20	-0.06***	-0.09***	7,849
	(0.36)	(0.40)	(0.01)	(0.01)	
outpatient: consultation (nr of visits)	0.24	0.34	-0.12***	-0.19***	7,849
	(0.69)	(0.85)	(0.03)	(0.02)	
outpatient: any drug (yes/no)	0.15	0.20	-0.06***	-0.09***	7,849
	(0.36)	(0.40)	(0.01)	(0.01)	
outpatient: drugs (nr of visits)	0.26	0.37	-0.15***	-0.21***	7,849
	(0.79)	(0.99)	(0.03)	(0.03)	
outpatient: any tests (yes/no)	0.13	0.18	-0.06***	-0.08***	7,849
	(0.34)	(0.38)	(0.01)	(0.01)	
outpatient: tests (nr of visits)	0.19	0.28	-0.10***	-0.16***	7,849
	(0.58)	(0.71)	(0.02)	(0.02)	
outpatient: any procedures (yes/no)	0.01	0.01	-0.00	-0.01**	7,849
	(0.10)	(0.12)	(0.00)	(0.00)	
outpatient: procedures (nr of visits)	0.01	0.02	-0.00	-0.01**	7,849
	(0.15)	(0.15)	(0.00)	(0.00)	
outpatient: coverage (yes/no)	0.15	0.21	-0.07***	-0.10***	7,849
	(0.36)	(0.41)	(0.01)	(0.01)	
outpatient: copay (yes/no)	0.12	0.10	0.05***	0.02*	7,849
	(0.33)	(0.30)	(0.01)	(0.01)	
outpatient: wrongly paid (yes/no)	0.00	0.01	-0.00	-0.00	7,849
	(0.07)	(0.08)	(0.00)	(0.00)	
outpatient: zero copay item (yes/no)	0.14	0.19	-0.07***	-0.09***	7,849
	(0.34)	(0.39)	(0.01)	(0.01)	
outpatient: positive copay item (yes/no)	0.16	0.21	-0.06***	-0.09***	7,849
	(0.37)	(0.41)	(0.01)	(0.01)	
outpatient: share items zero copay (%)	0.06	0.09	-0.03***	-0.04***	7,849
	(0.19)	(0.21)	(0.01)	(0.01)	
outpatient: total uninsured price (USD)	2.81	3.82	-1.29***	-1.80***	7,849
	(8.15)	(9.46)	(0.30)	(0.28)	
outpatient: copay (USD)	0.68	0.56	0.14*	0.22***	7,849
	(2.52)	(2.35)	(0.07)	(0.08)	
outpatient: coverage (USD)	2.02	3.10	-1.38***	-1.96***	7,849
	(6.14)	(7.68)	(0.24)	(0.22)	

Notes: This table reports healthcare utilization effects, using the administrative data. Equation B.1 describes the regression. The data are at the patient level. Only insured household members are included in the sample. Services include consultations, which are general, and other specialized services, such as dental services. Coverage (yes/no) is an indicator of whether the patient had a visit with a coverage. Copayment (yes/no) is an indicator of whether the patient had a visit with a copay. Wrongly paid (yes/no) is an indicator of whether the patient wrongly paid for an item that they should not have paid for. Zero copayment item (yes/no) is an indicator that is one if the patient received at least one zero copayment item; positive copayment item (yes/no) is an indicator that is one if the patient received at least one positive copayment item. The share of items with zero copayment is the number of items with zero copayment divided by the total number of items received at the visit; we then take the average over the visits. The variables in USD are summed over all visits. Total uninsured price is what an uninsured patient would pay at the hospital. Standard errors reported in parentheses are clustered at the household level. $***$, $**$, and $*$ indicate significance at the 1%, 5%, and 10% levels.

$$y_{i,h,j} = \alpha + \beta_1 T1_h + \beta_2 T2_h + \mu_j + \epsilon_{i,h,j} \tag{B.1}$$

Table B.5: Healthcare Utilization With Baseline Survey Controls

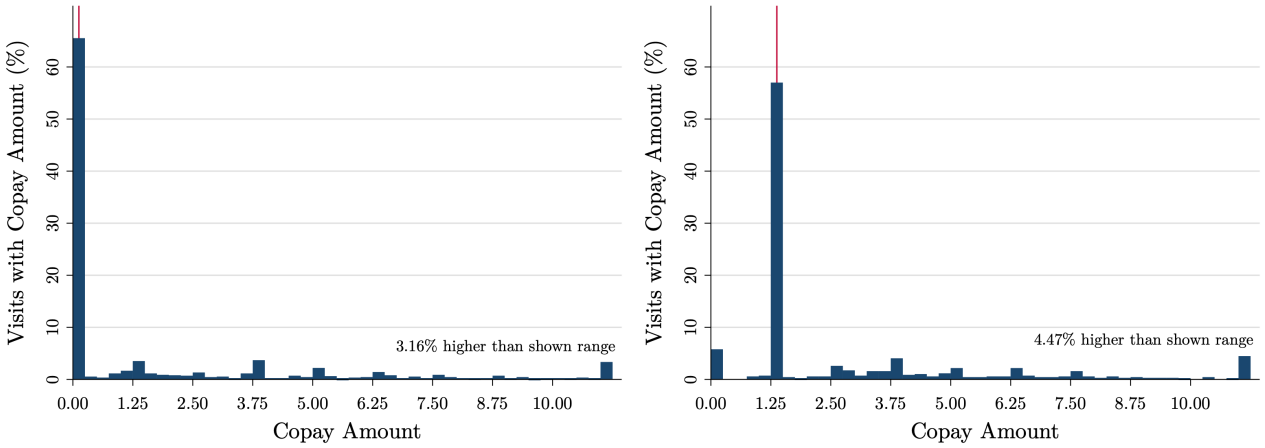
	Mean all	Mean T0	β_1(T1)	β_2(T2)	N
outpatient: any visit (yes/no)	0.17	0.22	-0.06***	-0.10***	7,329
	(0.37)	(0.41)	(0.01)	(0.01)	
outpatient: visits (nr)	0.30	0.43	-0.16***	-0.23***	7,329
	(0.90)	(1.12)	(0.03)	(0.03)	
inpatient: any visit (yes/no)	0.01	0.02	-0.01**	-0.00	7,329
	(0.11)	(0.12)	(0.00)	(0.00)	
inpatient: visits (nr)	0.01	0.02	-0.01*	-0.00	7,329
	(0.12)	(0.13)	(0.00)	(0.00)	
outpatient: any service (yes/no)	0.16	0.22	-0.06***	-0.09***	7,329
	(0.37)	(0.41)	(0.01)	(0.01)	
outpatient: service (nr of visits)	0.27	0.38	-0.13***	-0.20***	7,329
	(0.80)	(1.01)	(0.03)	(0.03)	
outpatient: any consultation (yes/no)	0.16	0.21	-0.06***	-0.09***	7,329
	(0.36)	(0.41)	(0.01)	(0.01)	
outpatient: consultation (nr of visits)	0.24	0.35	-0.12***	-0.20***	7,329
	(0.70)	(0.86)	(0.03)	(0.03)	
outpatient: any drug (yes/no)	0.15	0.21	-0.06***	-0.09***	7,329
	(0.36)	(0.40)	(0.01)	(0.01)	
outpatient: drugs (nr of visits)	0.26	0.38	-0.15***	-0.21***	7,329
	(0.79)	(1.00)	(0.03)	(0.03)	
outpatient: any tests (yes/no)	0.14	0.19	-0.06***	-0.09***	7,329
	(0.34)	(0.39)	(0.01)	(0.01)	
outpatient: tests (nr of visits)	0.20	0.29	-0.10***	-0.16***	7,329
	(0.59)	(0.73)	(0.02)	(0.02)	
outpatient: any procedures (yes/no)	0.01	0.02	-0.01*	-0.01**	7,329
	(0.11)	(0.12)	(0.00)	(0.00)	
outpatient: procedures (nr of visits)	0.01	0.02	-0.00	-0.01**	7,329
	(0.15)	(0.15)	(0.00)	(0.00)	
outpatient: coverage (yes/no)	0.15	0.22	-0.08***	-0.10***	7,329
	(0.36)	(0.41)	(0.01)	(0.01)	
outpatient: copay (yes/no)	0.12	0.10	0.06***	0.02**	7,329
	(0.33)	(0.30)	(0.01)	(0.01)	
outpatient: wrongly paid (yes/no)	0.00	0.01	-0.00	-0.00	7,329
	(0.07)	(0.08)	(0.00)	(0.00)	
outpatient: zero copay item (yes/no)	0.14	0.19	-0.07***	-0.09***	7,329
	(0.34)	(0.39)	(0.01)	(0.01)	
outpatient: positive copay item (yes/no)	0.17	0.22	-0.06***	-0.10***	7,329
	(0.37)	(0.41)	(0.01)	(0.01)	
outpatient: share items zero copay (%)	0.06	0.09	-0.03***	-0.04***	7,329
	(0.19)	(0.22)	(0.01)	(0.01)	
outpatient: total uninsured price (USD)	2.85	3.97	-1.33***	-1.89***	7,329
	(8.22)	(9.69)	(0.31)	(0.29)	
outpatient: copay (USD)	0.67	0.56	0.16**	0.22***	7,329
	(2.49)	(2.34)	(0.07)	(0.08)	
outpatient: coverage (USD)	2.07	3.26	-1.45***	-2.04***	7,329
	(6.25)	(7.90)	(0.25)	(0.23)	

Notes: This table reports healthcare utilization effects, using the administrative data, with baseline survey controls (health status, sick days, total health expenses, visits to insured hospitals). Equation B.2 describes the regression. The data are at the patient level. Only insured household members are included in the sample. Services include consultations, which are general, and other specialized services, such as dental services. Coverage (yes/no) is an indicator of whether the patient had a visit with a coverage. Copayment (yes/no) is an indicator of whether the patient had a visit with a copay. Wrongly paid (yes/no) is an indicator of whether the patient wrongly paid for an item that they should not have paid for. Zero copayment item (yes/no) is an indicator that is one if the patient received at least one zero copayment item; positive copayment item (yes/no) is an indicator that is one if the patient received at least one positive copayment item. The share of items with zero copayment is the number of items with zero copayment divided by the total number of items received at the visit; we then take the average over the visits. The variables in USD are summed over all visits. Total uninsured price is what an uninsured patient would pay at the hospital. Standard errors reported in parentheses are clustered at the household level. $***$, $**$, and $*$ indicate significance at the 1%, 5%, and 10% levels.

$$y_{i,h,j} = \alpha + \beta_1 T1_h + \beta_2 T2_h + \mu_j + \epsilon_{i,h,j} \tag{B.2}$$

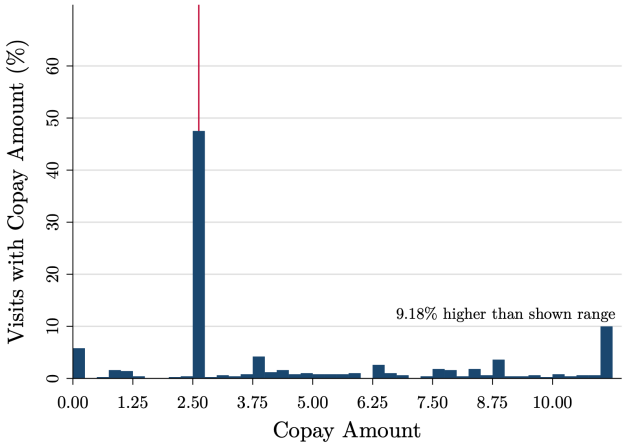
Figures

Figure B.1: Copayments at Insured Hospitals

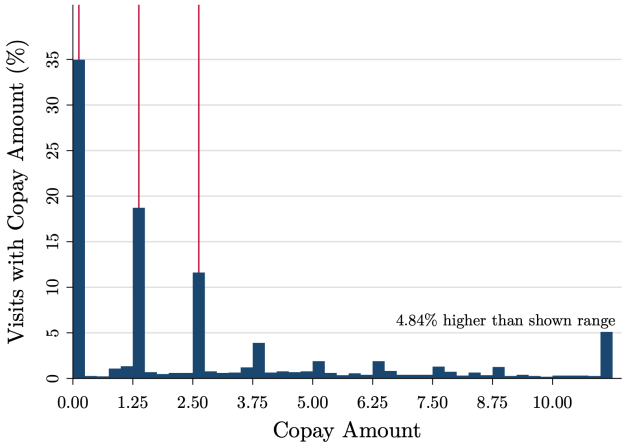


(a) T0: Copayment USD 0

(b) T1: Copayment USD 1.25



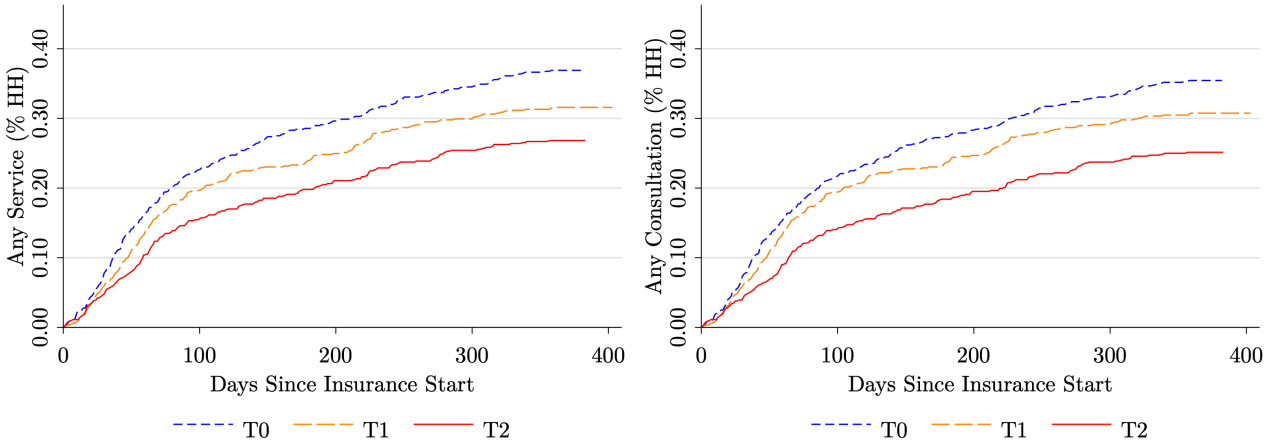
(c) T2: Copayment USD 2.50



(d) T0, T1, and T2 pooled

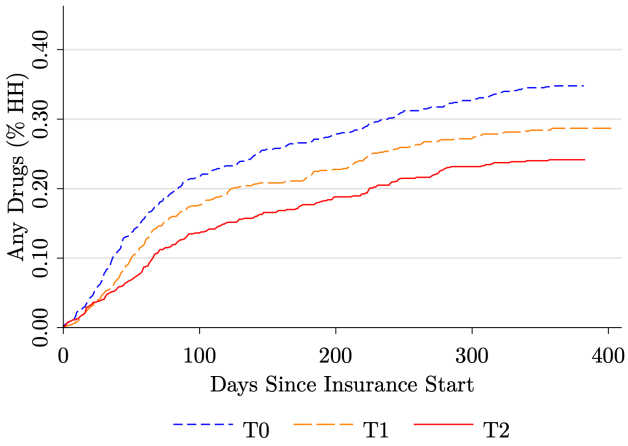
This figure depicts the percentage of outpatient visits with a certain copayment amount, over all outpatient visits, by treatment arm (Figures B.1a, B.1b, and B.1c) and pooled among treatment arms (Figure B.1d). The red vertical lines indicate the copayment as of the insurance contract for the respective treatment arm.

Figure B.2: Healthcare Seeking (Any Visit with Category)

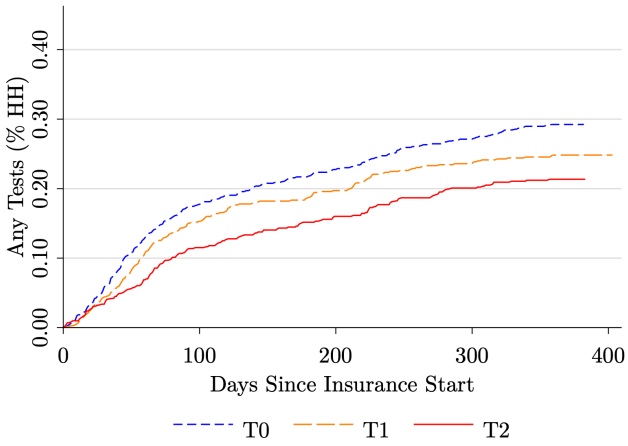


(a) Services

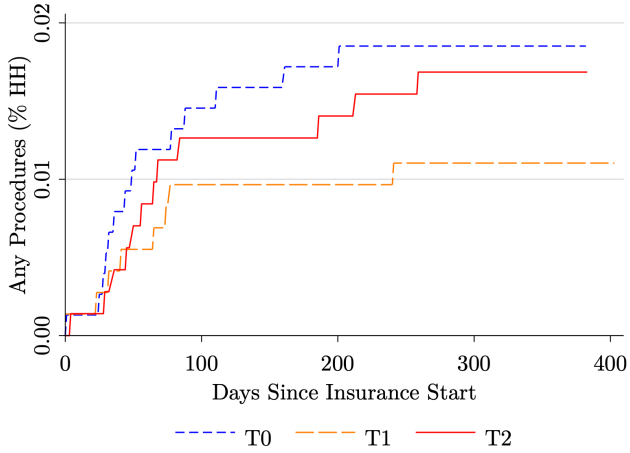
(b) Consultations



(c) Drugs



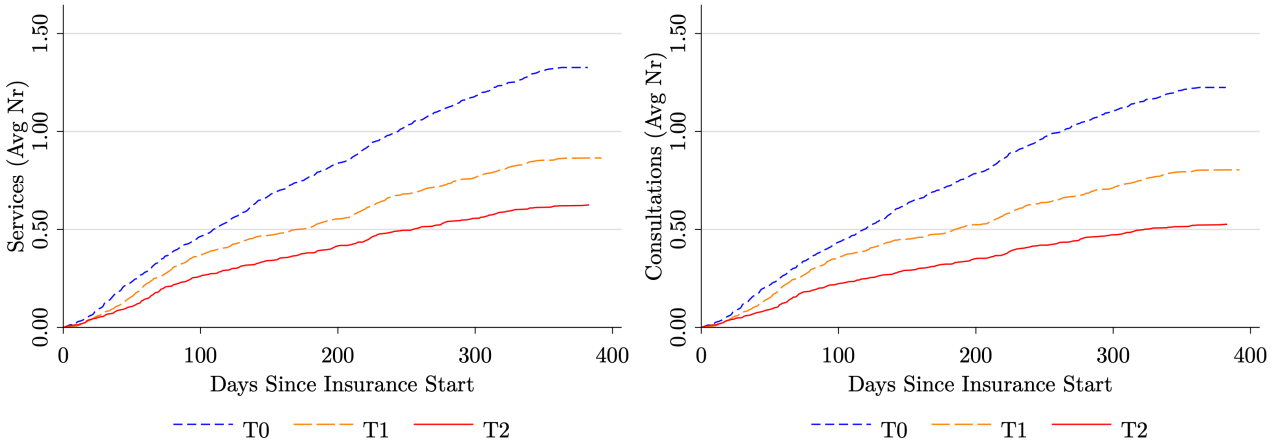
(d) Tests



(e) Procedures

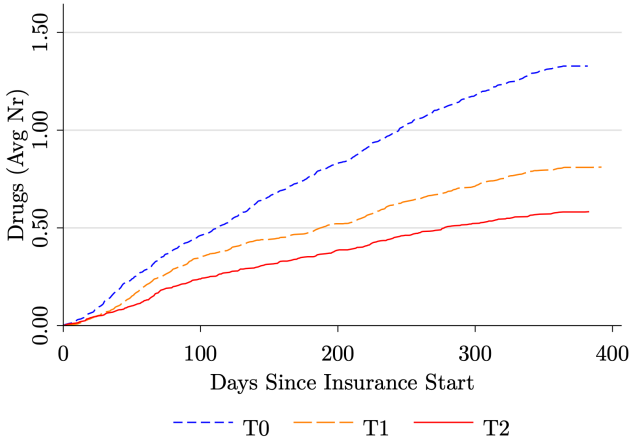
This figure describes the share of households (HH) with outpatient visits that include services (Figure B.2a), consultations – which are a type of services – (Figure B.2b), drugs (Figure B.2c), tests (Figure B.2d), or procedures (Figure B.2e), as recorded in the administrative hospital data. Statistics are provided at a given point in time since the insurance started. The short-dashed blue lines depict arm T0 (low copayment), the long-dashed yellow lines arm T1 (medium copayment), and the solid red lines arm T2 (high copayment).

Figure B.3: Healthcare Seeking (Number of Visits with Category)

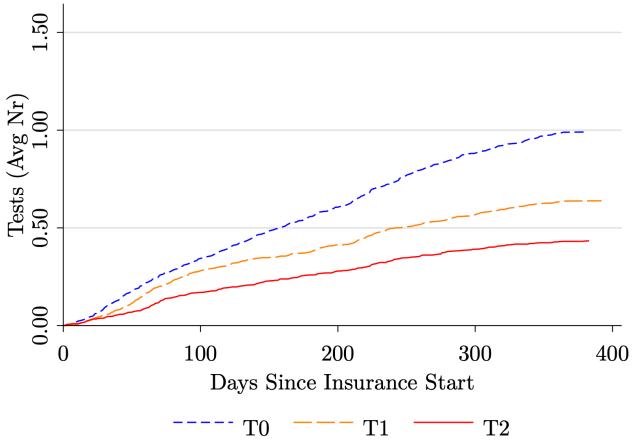


(a) Services

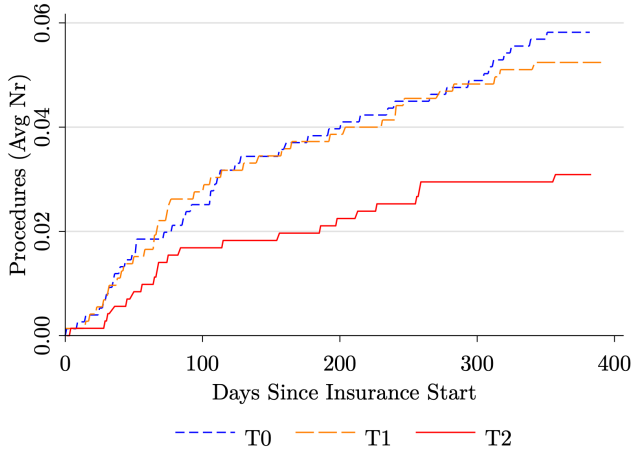
(b) Consultations



(c) Drugs



(d) Tests



(e) Procedures

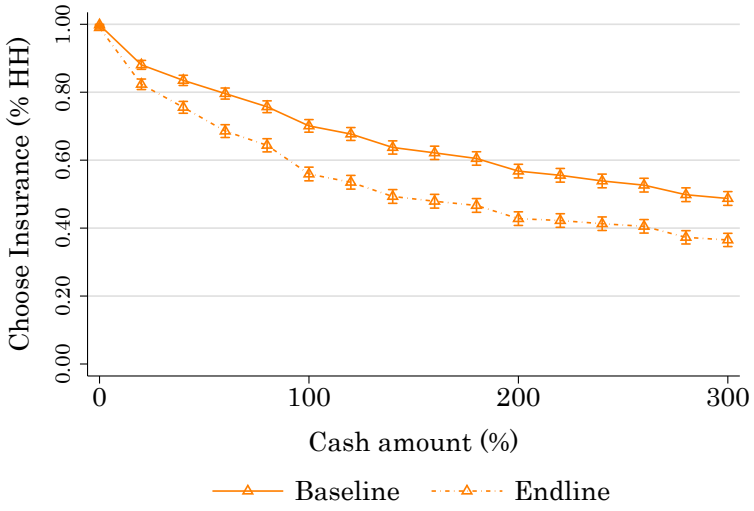
This figure describes the average number of outpatient visits per household, conditional on having any outpatient visit, that include services (Figure B.3a), consultations – which are a type of services – (Figure B.3b), drugs (Figure B.3c), tests (Figure B.3d), or procedures (Figure B.3e), as recorded in the administrative hospital data. Statistics are provided at a given point in time since the insurance started. The short-dashed blue lines depict arm T0 (low copayment), the long-dashed yellow lines arm T1 (medium copayment), and the solid red lines arm T2 (high copayment).

Appendix C: Insurance Valuation

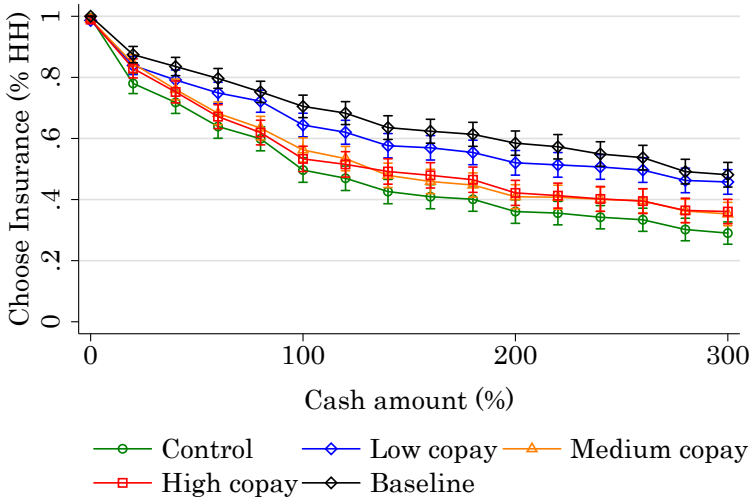
Figures

Figure C.1: Demand for Insurance (USD 1.25 Copay) at Endline

(a) Baseline vs. Endline

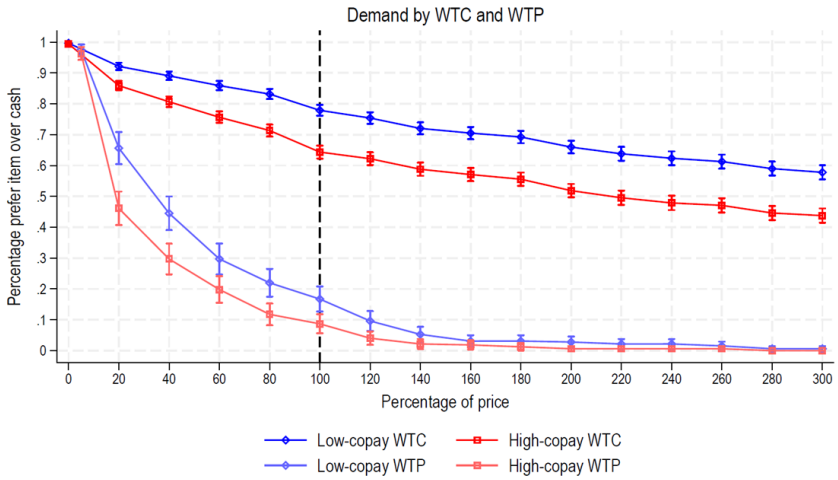


(b) Endline by treatment groups



This figure shows the proportion of households choosing USD 1.25 copayment insurance over cash at endline (after 12 months of insurance coverage for treated households). (a) compares choices at endline to choices at baseline (before treatment assignment), restricting to households that received insurance treatment (T0, T1, or T2). (b) compares choices across treatment groups in the main experiment. The x-axis shows the offered cash amount as a percentage of the standard premium. The y-axis shows the fraction preferring insurance to cash.

Figure C.2: Willingness to Accept versus Willingness to Pay



This figure compares willingness to accept (WTA) and willingness to pay (WTP) for insurance in a subsample of 324 households. Both low-copayment (USD 0) and high-copayment (USD 2.50) insurance are shown. WTA (solid lines) measures the proportion choosing insurance over cash, while WTP (dashed lines) measures the proportion willing to purchase insurance at each offered cash amount. The x-axis shows offered cash amount as a percentage of the standard premium.