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Enrollment in Ethiopia's Community-Based Health Insurance Scheme

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Summary. — In June 2011, the Ethiopian government launched a Community-Based Health Insurance scheme. By December 2012, enrollment reached 45.5%. This paper examines uptake. Socioeconomic status does not inhibit uptake and food-insecure households are more likely to enroll. Chronic diseases and self-assessed health status do not induce enrollment, while past expenditure does. A relative novelty is the identification of quality of care. Both the availability of equipment and waiting time to see medical professionals substantially influences enrollment. Focus-groups raise concerns about providers favoring uninsured households. Nevertheless, almost all insured households want to renew and majority of uninsured want to enroll.

Key words — Community-Based Health Insurance, adverse selection, social exclusion, Ethiopia, Africa

1. INTRODUCTION

Over the past decade, Ethiopia has recorded notable progress in a number of population health outcomes. For instance child mortality per 1,000 live births has fallen from 166 in 2000 to 88 in 2011 and maternal mortality rates have declined from 871 to 676 per 100,000 live births. These changes have been accompanied by a rapid expansion of health-care infrastructure at all levels. According to Ethiopia's Federal Ministry of Health (FMoH, 2011), there has been an 18-fold increase in the number of health posts from 833 in 2000 to 15,095 in 2011 and a sevenfold increase (356–2,660) in the number of health centers over the same period. Consequently it is estimated that primary health care coverage, defined as village-level access to a health post, has increased from 51% in 2000 to 92% in 2011.

Despite these increases in the supply of health care and increases in the utilization of some specific services, overall utilization rates remain low. For example, according to the Ethiopian Demographic and Health Surveys, outpatient health care utilization per capita per year has increased only marginally from 0.27 visits in 2000 to 0.3 visits in 2011. The low utilization rates are accompanied by a high reliance on out-of-pocket (OOP) spending to finance health care. The FMoH (2010) estimates that the three main sources of health-care financing in Ethiopia are local and international donors (40%), out-of-pocket (OOP) spending by health-care users (37%), and central and local governments (21%). The remainder (about 2%) is covered by employer and other private insurance schemes.

Since the late 1990s, Community-Based Health Insurance schemes (CBHI) which involve potential clients in determining scheme benefits and scheme management have been implemented in several developing countries (Dekker & Wilms, 2010; Jütting, 2004). [1] Matching the roll-out of these schemes, studies examining various aspects and effects of CBHI have proliferated, focusing mainly on resource mobilization, insurance uptake, social exclusion, utilization of healthcare, and financial protection. Early reviews of this body of work are provided by Jakab and Krishnan (2001) and Preker, Carrin, Dror, Jakab, Hsiao, and Arhin-Tenkorang (2002). Based on 45 published and unpublished works, Jakab and Krishnan (2001) conclude that there is convincing evidence that community health financing schemes are able to mobilize resources to finance healthcare needs, and that such schemes are effective in terms of reaching low-income groups although the lowest-income groups are often excluded. As opposed to these two narrative reviews, Ekman (2004) provides a systematic review of the literature based on 36 studies conducted during 1980–2002. Echoing previous findings, Ekman (2004) concludes that while such schemes do provide financial protection for low-income groups, the magnitude of the effect is small and the lowest income groups are excluded from enrollment. More recently, based on a systematic review of 46 papers published during 1995–2012, Mebratie, Sparrow, Alemu, and Bedi (2013) examine (among other aspects) the extent of social exclusion and adverse selection in CBHI schemes. They conclude that a majority of papers (61%, 11 out of 18) find statistically significant evidence of exclusion of the lowest income groups from CBHI schemes. Even when such households become members, they tend to use healthcare services less intensively as compared to higher income groups, potentially due to their inability to afford co-payments and other related costs (such as transportation and forgone income). They also report that 67% (six out of nine) of the studies find evidence that individuals suffering from chronic health conditions, a proxy for adverse selection, are more likely to join CBHI schemes as compared to those in good health.

In July 2011, the Government of Ethiopia launched a pilot Community-Based Health Insurance (CBHI) scheme, with the aim of enhancing access to health care and reducing the burden of OOP expenditure. The scheme, which caters to rural households and urban informal sector workers, was rolled out in 13 districts located in four main regions (Tigray, Amhara, Oromiya, and SNNPR) of the country. The aim of this paper is to examine and identify factors that drive scheme

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enrollment. While straightforward this issue is pertinent from a policy perspective as the government plans a nation-wide roll-out of the scheme and hence it is important to examine what factors drive or deter enrollment.

In addition to the policy relevance, this study contributes to the existing empirical literature on CBHI uptake by drawing on a combination of rich survey data on household and health facilities, and mixed qualitative and quantitative methods. First, unlike the bulk of the literature which relies on examining the effect of current traits (such as individual health conditions) on current enrollment and relies on a single post-intervention cross-section of data, we are able to draw on two household surveys canvassed before and after the launch of the CBHI scheme to examine enrollment in 2012 as a function of individual, household, and community traits in 2011.[2] This enables us to provide estimates that are less likely to be influenced by the endogenous nature of some of the explanatory variables. For instance, post-intervention health status may be endogenous to CBHI enrollment. Second, the paper draws on both survey data and qualitative information gathered through a series of key informant interviews (KII) and focus group discussions (FGD) to identify factors that drive or deter enrollment. Finally, we are able to combine data from a health facility survey conducted prior to the launch of the CBHI scheme with the household survey data to examine the role played by the quality of health care in determining enrollment. While some studies (Chankova, Sulzbach, & Diop, 2008; Nketiah-Amponsah, 2009; Shimeles, 2010) do control for access to health care by including variables such as distance to the nearest health facility we are able to extend this by directly examining the role of health care quality (such as educational level of health professionals and the availability of medical equipment).[3]

The article unfolds by providing in the next section a description of the key design features of the pilot scheme. Section three describes the data, section four discusses the research methods, section five contains empirical results and the final section concludes.

2. KEY FEATURES OF THE ETHIOPIAN CBHI SCHEME

In June 2011 the Ethiopian CBHI scheme was rolled out in 13 pilot districts in four main regions (*Tigray*, *Amhara*, *Oromiya*, and *SNNPR*) of the country.[4] The pilot districts were selected by regional administrative bodies based on directives provided by the Federal Ministry of Health (FMoH). While the chosen districts were expected to fulfill five selection criteria, in practice, selection was based on two conditions. Namely, the district should have undertaken health care financing reforms designed to increase cost recovery and retention of locally raised revenues and that health centers in these districts should be geographically accessible (located close to a main road).[5]

The scheme was introduced by Ethiopia's Federal Ministry of Health (FMoH) in collaboration with USAID, Abt Associates Inc. (2013) and CARE Ethiopia, and is part of the government's broader health care financing reform strategy which aims to improve quality and coverage of health services by identifying alternative healthcare resources (USAID, 2011). Feasibility studies, scheme design, and scheme promotion were outsourced to Abt Associates and CARE Ethiopia. The basic design of the scheme in terms of benefit packages, registration fees, premium payments, and co-payments were determined on the basis of feasibility studies and in collaboration with regional governments and are the same within each of the pilot regions but differ slightly across regions. Scheme implementation and monitoring is conducted by Abt Associates in collaboration with relevant government authorities at the central, regional, district, and village levels.

While the scheme has been introduced by the government, it is "community based" in the sense that the community determines whether or not to join the scheme and is subsequently involved in scheme management and supervision.[6] In particular, after being exposed to a range of awareness creation activities a general assembly at the village (*kebele*) level decided whether or not to join the scheme (a simple majority had to support the decision) and then households decide individually whether to enroll in the scheme.[7] In order to reduce the possibility of adverse selection the unit of membership is the household rather than the individual.

Based on feasibility studies conducted by Abt associates, regional health administration officials determined the premiums to be charged. Household-level monthly premiums for core household members range between Ethiopian Birr (ETB) 10.50 in SNNPR to ETB 15 in Oromiya (see Table 1).[8] For each non-core household member the monthly premium lies between ETB 2.10 and ETB 3.00. Premiums in the Amhara region are set at ETB 3.00 per individual per month. The premiums amount to about 2–3% of household monthly income. Based on a comparison with schemes in other African countries, the premium to household income ratio for the Ethiopian scheme tends to be at the lower end of the cost spectrum.[9] To enhance affordability the central government subsidizes a quarter of the premium and district and regional governments are expected to cover the costs of providing a fee waiver to the poorest 10% of the population or so called "indigent groups".[10]

Premium collection intervals differ across pilot districts and are sensitive to local conditions. While local-level officials and community representatives are able to adjust the interval of premium collection they cannot change the premium. In order to enable community engagement every village is expected to select three delegates/CBHI members who will be part of the village CBHI administrative bodies and participate in the general assembly organized at district level.[11] According to information obtained from key informant interviews and focus group discussions, village-level government officials and the community at large are involved in identifying the poorest households and implementing the fee waiver arrangement.

The scheme covers both outpatient and inpatient health care services in public facilities. Transportation costs to access health facilities are not covered. Utilization of care from private providers is usually not permitted unless a particular service or drug is unavailable at a public facility. Treatment outside the country is not covered. Scheme participants are expected to access health providers who have signed a contractual agreement with district-level CBHI administrators. The selection of the facilities takes into account a number of factors such as quality of the care (in terms of human resource and equipment), geographical proximity between the providers, and the location of the target households, implementation of the healthcare financing reform, and service charges. There is no upfront payment at the time of service utilization if treatment is obtained from those facilities which have contractual agreements with the scheme. In Tigray, Amhara, and Oromiya regions, CBHI members are allowed to use care from public facilities that do not have formal contractual agreements with the scheme and then claim reimbursement. There is no reimbursement for service utilization outside CBHI-linked facilities in SNNPR.