



The impact of household and community cash transfers on children's food consumption in Indonesia



Dian Kusuma^{a,b,*}, Margaret McConnell^a, Peter Berman^a, Jessica Cohen^a

^a Harvard T.H. Chan School of Public Health, Department of Global Health and Population, 655 Huntington Avenue, Boston, MA 02115, USA

^b Center for Health Economics and Policy Studies, Faculty of Public Health, Universitas Indonesia, Kampus Baru UI, Depok 16424, Indonesia

ARTICLE INFO

Article history:

Received 24 August 2016

Received in revised form 12 April 2017

Accepted 22 April 2017

Available online 24 April 2017

Keywords:

Indonesia

Conditional cash transfers

Household

Community

Children's food consumption

Clustered-randomized trials

ABSTRACT

The current state of child nutrition is critical. About 5.9 million children under the age of five still died worldwide with nearly half are attributable to undernutrition. One explanation is inequality in children's food consumption. One strategy to address inequality among the poor is conditional cash transfers (CCTs). Taking advantage of the two large clustered-randomized trials in Indonesia from 2007 to 2009, this paper provides evidence on the impact of household cash transfer (PKH) and community cash transfer (Generasi) on child's food consumption. The sample sizes are 14,000 households for PKH and 12,000 households for Generasi. After two years of implementation, difference-in-differences (DID) analyses show that both cash transfers lead to significant increases in food consumption particularly for protein-rich items. The programs significantly increase the consumption of milk and fish by up to 19% and 14% for PKH and Generasi, respectively. Both programs significantly reduce some measures of severe malnutrition. PKH significantly reduces the probability of wasting and severe wasting by 33% and 41% and Generasi significantly reduces the probability of being severely underweight by 47%. This underscores the potential of household and community cash transfers to fight undernutrition among the poor.

© 2017 Elsevier Inc. All rights reserved.

1. Introduction

The current state of child nutrition is critical. About 5.9 million children under the age of five died in 2015 worldwide and nearly half of all child deaths are attributable to undernutrition (UNICEF et al., 2015a; Black et al., 2013). One explanation is inequality in children's food consumption since poor children are more likely to have less diversified and nutritious diets and to live in food-insecure households (Bhutta et al., 2013; Black et al., 2008; Darnton-Hill and Coyne, 1998). About 159 million children under-five were stunted and 50 million were wasted globally in 2014, of whom 96% live in poorer countries in Asia and Africa (UNICEF et al., 2015b). In Indonesia, the proportion of children underweight is two times higher among the poorest compared to the wealthiest (Utomo et al., 2011). Since child nutrition contributes to many health and productivity outcomes, addressing child undernutrition among the poorest is needed (Victora et al., 2008).

One strategy is conditional cash transfers (CCTs), which provide cash payments to poor households in exchange for compliance with health/education-related conditionalities (Fiszbein et al., 2009). Evidence from randomized controlled trials (RCT) shows that CCTs improve children's food consumption: increased total caloric availability,

consumption of fruit and vegetables, and of animal products by 4.6%, 21.9%, and 17.4% in Mexico; increased food expenditure (largely on meat, fruits and vegetables) by 24.8 percentage points in Nicaragua (Hoddinott and Skoufias, 2004; Maluccio and Flores, 2005).

However, the literature is limited in three ways. First, existing studies use household-level but lack evidence using community-level CCTs. The former is relatively more expensive given the need to monitor individuals for conditionality. In Indonesia, the average administrative cost of a CCT (PKH) is almost three times as high as that of unconditional cash transfer (UCT/BLT) (Alatas et al., 2011). Also, household-level CCTs potentially lack community involvement such as supplementary feeding program. Secondly, evidence from large-scale RCT evaluation is limited. The Mexican PROGRESA used a longitudinal sample of approximately 24,000 households while the Nicaraguan *Red de Protección Social* (RPS) used only 1742 households (Hoddinott and Skoufias, 2004; Maluccio and Flores, 2005). A large-scale randomized evaluation helps establish evidence of whether the CCT impact is possible when taking into account the complexity of implementation namely issues with cash distribution, monitoring conditionality, and supply-side improvements (Madon et al., 2007). Thirdly, despite some evidence that CCTs improve children's food consumption and expenditure the existing evidence shows that significant impacts on nutritional outcomes are not assured (Fiszbein et al., 2009; Leroy et al., 2009).

Taking advantage of two large clustered-randomized trials in Indonesia, we provide evidence on the impact of household cash

* Corresponding author at: Harvard T.H. Chan School of Public Health, Department of Global Health and Population, 655 Huntington Avenue, Boston, MA 02115, USA.
E-mail address: dkusuma@mail.harvard.edu (D. Kusuma).

transfers (PKH) and community cash transfers (Generasi) on children's food consumption. The context and features of these programs may explain why we may not actually expect a cash transfer to change food consumption so the test that cash transfers significantly increase food consumption at all is actually a novel one. In PKH, there were no specific rules on how the cash must be spent by households and there were many implementation issues including delay in cash payments. In Generasi, block grants were allocated to village management team who gets to decide on which activities to be funded toward health and education. Furthermore, a comparison of the effectiveness of household and community cash transfers is important for policy options to overcome the aforementioned limitations of household CCTs. One might expect both programs to have differential results due to different approaches (household v. community) and different characteristics of population (PKH subdistricts are 75% urban and in Java while Generasi subdistricts are 90% rural), which could influence the outcomes differently. Also, community cash transfers are potentially less expensive since monitoring is done at the village level rather than at the household level. Previous evaluation of PKH found no significant effects on aggregate household consumption and that of Generasi provided no evaluation of consumption (Alatas et al., 2011; Olken et al., 2011).

2. Methods

2.1. Cash transfers: PKH and Generasi

The government of Indonesia piloted in 2007 two large-scale pilots: (1) *Program Keluarga Harapan* (PKH), a CCT to household; and (2) *Generasi*, an incentivized community block grant program. The goals are to reduce poverty, maternal and child mortality, and to ensure universal coverage of basic education. Details of the programs are provided elsewhere (Kusuma et al., 2016; Alatas et al., 2011; Olken et al., 2011) and in the Appendix. In brief, PKH is a traditional CCT program to very poor households (e.g. PROGRESA) while *Generasi* adopts that idea and applies it in a way that allows communities the flexibility to address supply or demand constraint. PKH provided quarterly cash transfers directly to mothers in the amount of approximately 15–20% of income with no specific rules on how the cash must be used while *Generasi* provided annual block grant to villages to be used only for health and education. Both programs were designed to achieve the same target indicators or conditionality (Table 1). Like most CCTs, the conditions are not specifically on nutrition but rather on growth monitoring and nutritional supplements, which may affect child nutritional outcomes. PKH was mostly in urban areas where area readiness is based on existing health and education facilities while *Generasi* was mostly in rural areas. The summary of program features is provided in Table 2.

Table 1
Conditionality and target indicators for PKH and *Generasi*.

Health indicators
1. Four prenatal care visits
2. Taking iron tablets during pregnancy
3. Delivery assisted by a trained professional
4. Two postnatal care visits
5. Complete childhood immunizations
6. Adequate monthly weight increases for infants
7. Monthly weighing for children under three and biannually for children under five
8. Vitamin A twice a year for children under five
Education indicators
9. Primary school enrollment of children 6-to-12 years old
10. Minimum attendance rate of 85% for primary school-aged children
11. Junior secondary school enrollment of children 13-to-15 years old
12. Minimum attendance rate of 85% for junior secondary school-aged children

Source: MOSA (2007); MHA (2008).

Table 2
Comparing program features of PKH and *Generasi*.

Features	PKH	Generasi
Cash	Quarterly cash transfer to mothers, through nearest post office; \$60–220 per household per year (approximately 15–20% of income); no specific rules about how the transfer must be used.	Block grant to villages each year; \$8500 (2007) and \$18,200 (2009) per village on average; only for health and education use. MIS data: health allocation is 44% of total, which consists of 42% on SFPs, 25% on financial assistance for mothers, 17% on infrastructure, 9% on facilities/equipment, 4% on financial incentive health workers, and 2% on training/BCC
Conditionality cash penalty	Health and education indicators; cash penalty design including first breach is warning; second breach is 10% discount; third breach is expulsion	Health and education indicators; no cash penalty.
Field facilitators	Trained facilitators to advise beneficiaries on conditionality and cash penalty.	Trained facilitators to advise village team on allocation of funds through social mapping and others.
Supply readiness	Mostly urban areas; readiness is precondition based on existing health and education facilities; threshold for readiness was set lower for off-Java	Mostly rural areas
Target beneficiaries	Very poor households (UCT database) with pregnant/lactating women and children 0–15 years.	Villages
Provinces	West Java, East Java, North Sulawesi, Gorontalo, East Nusa Tenggara, and Jakarta	West Java, East Java, North Sulawesi, Gorontalo, and East Nusa Tenggara

Note: MIS = management information systems; SFP = supplementary feeding program; BCC = behavioral change and communication; UCT = unconditional cash transfers. The UCT database is of poor households, based on economic and asset-based poverty measurements by the Department of Statistics, who received the unconditional cash transfers in 2005 to mitigate the inflationary impact caused by fuel price adjustments. In terms of location, there were no overlapping districts in the pilot of PKH and *Generasi* even though the provinces are similar.

2.2. Causal mechanisms of cash transfers and children's food consumption

There are at least four pathways by which PKH and *Generasi* could improve children's food consumption. The first pathway, for both PKH and *Generasi*, is through the conditionalities. While households in PKH areas are required to take children to health facilities for monthly growth monitoring, those in *Generasi* areas are conditioned to use the block grants on health and education. This should encourage improvement in children's food consumption in both programs. The second pathway, also for both PKH and *Generasi*, is through improved knowledge/information from increased interaction with health systems. Both programs have the element of supply-side improvement, but the timing is different. PKH required areas to improve health facilities before participating while *Generasi* targeted the less supply-ready areas but allowed improvement activities. The management information system (MIS) data show that 30% of *Generasi* health grants were for improving infrastructure, facilities, equipment, and incentives for health workers (Olken et al., 2011). The third pathway is through the child cash element, which mainly applies for PKH. The cash element in PKH is an additional \$80 per year only for households with a child under-five and/or a pregnant woman, which could serve as a nutrition cash element for these households. However, the MIS data for *Generasi* shows only 9% of villages provided financial assistance for child health. The fourth pathway, which applies only for *Generasi*, is supplementary

Download English Version:

<https://daneshyari.com/en/article/5635614>

Download Persian Version:

<https://daneshyari.com/article/5635614>

[Daneshyari.com](https://daneshyari.com)