

# Wealth Flow and Fertility Decline in Rural Kenya, 1981–92: A Reassessment of the Evidence

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## ABSTRACT

In 1981 and 1992, identical questionnaires measuring lineal and lateral wealth flows and emotional nucleation were administered to comparable samples of male household heads in rural Kenya. The 1981 results, showing limited evidence of economic or emotional nucleation within the household, were consistent with prevailing high fertility. By 1992 desired and observed fertility had declined significantly, but nucleation levels remained the same. The question then arose as to whether our bivariate measurements had been too coarse to detect subtle shifts in nucleation and/or the simultaneous effect of other independent variables. To resolve these issues, we re-examined our 1981 and 1992 data sets using regression analysis. The findings suggest that the independent contribution of wealth flow and emotional nucleation variables to explained variance in the desired number of children by rural male heads of households was limited, being approximately seven to 10 percent in 1981 and 10 to 18 percent in 1992. However, we observed that the independent variables picking up the explanatory slack in the current exercise were largely ideational in nature, having to do with the expectation of future child support, education, form of marriage, and spousal perception, communication, and consensus on key family size and family planning variables. (*Afr J Reprod Health* 1997;1(2): 41–66)

## RÉSUMÉ

**Les flux de richesse et la baisse de fertilité dans le Kenya rural, 1981-1992: Réévaluation des preuves**

En 1981 et 1992 des questionnaires identiques mesurant les flux de richesses linéaires et latéraux et la concentration émotionnelle étaient adressés à des échantillons semblables de chefs de familles hommes dans le Kenya rural. Les résultats de 1981, qui ont révélé de faibles traces de concentration économique ou émotionnelle, allaient dans le sens du taux élevé de fertilité qui prévalait. En 1992, le taux de fertilité désiré et observé avait baissé de manière significative mais les niveaux de concentration mesurés à travers les questionnaires étaient restés essentiellement les mêmes. La question s'est donc posée de savoir si oui ou non notre méthode de mesure à double variable avait été de par trop rigide et avait failli à détecter les changements subtiles dans le phénomène de concentration et/ou les effets simultanés d'autres variables indépendantes. Dans le but de résoudre ces problèmes, nous avons examiné à nouveau nos données de 1981 et de 1992 par la technique de régression. Les résultats laissent entendre que la contribution des flux de richesse et des variables de concentration émotionnelle indépendantes dans l'explication de la variation du nombre d'enfant désirés par les chefs de familles en milieu rural était assez limitée et était de l'ordre de sept à 10 pourcent en 1981 et de 10 à 18 pourcent en 1992. Cependant, nous notons que les variables indépendantes qui clarifient l'étude actuelle étaient largement de nature prévisionnelle, ayant beaucoup rapport à l'espoir de soutien de la part du futur enfant, à l'éducation, au régime matrimonial, à la prise en compte du conjoint, à la communication et au consensus dans les familles nombreuses et enfin, aux variables de planification familiale. (*Afr J Reprod Health* 1997;1(2): 41–66)

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ceived reasonable wages), and if economic motives substantially explain Kenyan parent's strong preferences for education, the school participation rates... could adjust downward."<sup>3</sup> Further reductions in fertility to subsidise the education of remaining children would be less urgent as a result. This is a reasonable hypothesis as of 1989. However, in the light of more recent data,<sup>2</sup> it is clear that while economic returns on educational investments have not been positive in the 1990s, educational participation rates have apparently not declined while dramatic reductions in desired and observed fertility have continued at a pace suggesting the robust quality of the educational commitment. Under these circumstances, 1993 KDHS desired fertility levels (3.7 for the country as a whole) would be a reasonable approximation of the magnitude of the next stage of decline.<sup>2</sup>

As to the rest of the region, there are significant parallels to the Kenyan situation in Zimbabwe, South Africa, and Botswana.<sup>f</sup> However, it is unlikely that its demographic transformation will soon be repeated in most other sub-Saharan countries where both structural change and a preference map appropriate to the redefinition of parental obligations are absent.

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### NOTES

- a Unfortunately, it was not possible from our survey data to determine the role of the husband or wife in the process which resulted in agreement on these two variables.
- b While we accept the subordination of the family planning variable in the above analysis, in that it is now generally acknowledged that family planning programme effort alone has a very limited impact on contraceptive use and fertility reduction,<sup>3,17</sup> we would still stress that given motivation for contraceptive use and lower fertility, an efficient family planning system (as in Kenya) will permit "a more rapid adjustment by house-

holds to their family size desires" than would otherwise be the case.<sup>3</sup>

- c In a recent study of female attitudes in rural Nyanza Province, Watkins, Rutenberg, and Green found that although the study area was predominantly involved in subsistence agriculture there was still "a great desire for money: for school fees..., for transport..., for food... and more generally, for *desirable goods* [emphasis added] such as nice clothing, baby powder and sofa sets."<sup>18</sup>
- d The reader will recall that independent variables in 1981 and 1992 with the greatest explanatory power with regard to desired fertility had primarily to do with the expectation of future child support, education, form of marriage, and spousal perception, communication, and consensus on family size and family planning variables.
- e An interesting study by Raftery et al. examines the same issue with Iranian data and reaches the opposite conclusion.<sup>19</sup>
- f Zimbabwe, South Africa, and Kenya were all settler colonies, and hence the secularising contribution of this experience, as argued above, laid the foundation for rapid contemporary reductions in fertility. In Botswana, the same result was achieved in the context of unprecedented economic integration with and domination by South Africa.

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