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The Covid-19 Pandemic and the New Poor in Africa: the Straw that Broke the Camel's Back ¹

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The Covid-19 Pandemic and the New Poor in Africa: the Straw that Broke the Camel's Back**Samba Diop & Simplicie A. Asongu**

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Abstract

This study assesses the incidence of the Covid-19 pandemic on poverty levels in 50 African countries by employing the PovcalNet computational tool for poverty monitoring. The empirical evidence is based on: (i) Pre Covid-19 macroeconomic projections of October 2019 and revised macroeconomic projections of April 2020 and (ii) three poverty thresholds, notably, US\$1.90, US\$3.20, and US\$5.50 per day for the extreme, middle and higher poverty lines. The following main findings are established. First, the extreme poverty line of US\$1.90 per day has increased by US\$0.1 per day while the middle poverty line and the higher line have increased by US\$0.19 and US\$0.32, respectively. Second, the poverty headcount has increased to 35.85% for the US\$1.90 poverty line, 57.55% for the US\$3.20 per day poverty line and 76.42% for the higher poverty line (US\$5.5 per day). Third, the corresponding additional percentage points in poverty headcount ratio are: (i) an increase of 2.09% for the poverty thresholds of US\$1.90 per day and US\$3.2 per day, corresponding to 28, 140, 345 and 26, 418, 200 million, respectively of the new poor in absolute terms and (ii) a boost of 1.78% for the higher poverty line of US\$5.5 per day, corresponding to 19, 062, 643 million of the new poor. Fourth, country-specific tendencies are also provided for more targeted policy implications.

Keywords: Coronavirus, pandemic, poverty, Africa, sustainable development

JEL Classification: H12; I12; I30; O55

1. Introduction

Over the past two decades, the world has accomplished interesting results in fighting poverty which has decreased considerably in most developing countries with the exception of Africa where about half of the continent did not attain the millennium development goal target of decreasing extreme poverty by half (Asongu & le Roux, 2019; Tchamyou et al., 2019a, 2019b; Asongu et al., 2020). Since 1990, the share of the World's population living below the extreme International Poverty Line of US\$1.90 per day has largely decreased. In 2015, poverty at the global level decreased to about 10% of the population of the world, which is equivalent to about 736 million people living below the attendant poverty line. In essence, over the past 25 years, in net terms, the average standard of living of people in the world has increased because about 1.1 billion people have escaped from extreme poverty during the same period (World Bank, 2015). However, following the latest World Bank poverty estimates, while extreme poverty has been on the decrease in other regions, the number of people living in extreme poverty has been growing in Sub-Saharan Africa, which was host to more than 50% of those living in extreme poverty in 2015. According to the narrative, forecasts also project that about 9 out of 10 people living in extreme poverty will be from Sub-Saharan Africa by 2030. Besides these alarming statistics on poverty, the Covid-19 pandemic could make the situation worse and will certainly disrupt the goal of limiting extreme poverty by 2030 to a threshold of below 3%

To the best of our knowledge, to date, three works have tried to estimate the global poverty impact of the Covid-19 pandemic. The first is carried out by the International Labour Organisation (ILO, 2020). The ILO (2020) estimates are drawn on the computable general equilibrium (CGE) methodological framework from McKibbin and Fernando (2020) on the one hand and on the other, focused on the population that is working. The authors establish that at the poverty line of the World Bank of US\$3.2, in 2020, there would be between 9 and 35 million of the new working poor. Of these, most would be apparent in middle-income developing countries. The second work is from the International Food Policy Research Institute (IFPRI) by Vos et al. (2020). Using their own global CGE model which is contingent on 30 household survey data predominantly from South Asian and Sub-Saharan African countries, they demonstrate that poverty (i.e. at the World Bank poverty line of US\$1.90 per day) would increase by between 14 and 22 million people becoming poor if global GDP contracted by 1%. They also argue that the most significant unfavourable externalities would be in Sub-Saharan Africa where approximately 50% of the new poor will live. The last, by Sumner et al. (2020) estimates the short run economic ramifications of the underlying global

pandemic on global monetary poverty using three main scenarios, namely: low (i.e. 5%), medium (i.e. 10%) and high (i.e. 20%). The authors find that considering the most extreme scenario of an income or a consumption contraction of 20%, the attendant people living in poverty could rise by between 420 and 580 million, in the light of the latest official recorded figures for 2018.

In a different light, we make new estimations of the macroeconomic impact of the Covid-19 pandemic specifically on African countries. Our estimates are different from the previous three works in two ways. Firstly, in contrast to ILO (2020), IFPRI (2020) and Sumner et al. (2020), we make our estimates not on imaginary scenarios but on the latest World Economic Outlook projections and their revisions due to the Covid-19 pandemic. This approach first allows us to estimate the macroeconomic incidence before we calculate the impact on poverty. Secondly, to capture the heterogeneity between economies, we use country level data in place of aggregated data used by the underlying authors to estimate global poverty.

The positioning of the study also departs from the contemporary literature on the consequences of Covid-19 which has largely focused on, *inter alia*, the incidence of the pandemic on the crash of oil prices (Albulescu, 2020), understanding of the relevance of crisis on commodity markets (Vercammen, 2020; Barichello, 2020), farmland markets and agricultural futures (Lawley, 2020; Wang et al., 2020) and attendant socio-economic effects (Nicola et al., 2020). As clarified above with regard to the three studies which have focused on the impact of the Covid-19 pandemic on poverty levels, the underlying last strand is closest to the present study. The various perspectives explored so far in the attendant last strand of the literature include: a brief policy and scholarly review of the economic implications of the Covid-19 pandemic in Africa (Ataguba, 2020); socioeconomic effects, opportunities and policy responses associated with the Covid-19 pandemic on the continent (Ozili, 2020), the incidence of the Covid-19 pandemic on remittances in Africa (Bisong et al., 2020) and policy insights into the impact of the Covid-19 pandemic on child poverty in the Middle East and North Africa (Agbe, 2020). Accordingly, while the corresponding literature has focused on the consequences of the Covid-19 pandemic on socio-economic development in developing countries from various perspectives, the incidence on poverty in Africa is sparse. Hence, this study also fills the underlying gap in the literature by assessing the effect of the Covid-19 pandemic on the new poor in Africa.

The rest of the study is structured as follows. Section 2 discusses the macroeconomic

impact of Covid-19 while Section 3 is concerned with the model specification. The results and discussion are disclosed in Section 4. Section 5 concludes with implications and future research directions.

2. Macroeconomic impact of the Covid-19 pandemic

In this section we make an effort to estimate the macroeconomic impact of Covid-19. As shown in Table 1, the Covid-19 pandemic will severely impact African economies. GDP growth is projected to contract by 1.15% this year in Africa as a whole compared to 1.6% in Sub Saharan Africa and 3% in the world. This contraction will entail to a downward turn of 5.4% point in the continent, 5.2% point in Sub-Saharan Africa and 6.4% point in the world respectively from the International Monetary Fund (IMF) projections. We can legitimately establish that this downward revision is largely explained by the Covid-19 crisis. Nevertheless, factors of idiosyncratic nature such as structural constraints (South Africa), adjustments in policy (Ethiopia) and climate and attendant natural shocks (like the recent locust invasion in Eastern Africa), *inter alia*, have also considerably contributed to the downward revisions (IMF, 2020).

The above exploratory insights are broadly consistent with the narrative of Ataguba (2020) on the macroeconomic effect of the pandemic in Africa. The author maintains that such an impact is likely to be constituted of combinations of supply and demand shocks in the economies of the continent, which can be assessed by probing into some macroeconomic aggregates like the inflation, the unemployment and the GDP growth rates. To put this in more perspective, commodity decline that builds on a reduction in productivity (or a decline in trade owing to the Covid-19 pandemic) could lead to inflation as a result of a general increase in price levels. Moreover, when corporations that are oriented by exports are not willing to export commodities, income from the exports would decline which obviously leads to the laying-off of workers and reduction of production units. Some examples used to substantiate the perspective are: (i) Nigeria that has devalued its currency as a result of the global fall in oil price due to the Covid-19 pandemic and (ii) South Africa which has revised its GDP growth forecast from 0.7% to 0.4% after the outbreak.

It is also worthwhile to clarify that the overall macroeconomic incidence of the pandemic on Africa is not in accordance with mainstream expectations because there was a general consensus that the continent would be severally affected because, *inter alia*, (i) it comparatively lacks robust healthcare systems, (ii) it is afflicted by corruption, and (iii) the overwhelming absence of safety income nets meant that most lockdown and social distancing

measures could not be applied as in more technically-advanced countries. In order to substantiate the above perspective, Mcaffrey (2020) in April established that Sierra Leone, the Central African Republic and Burkina Faso respectively had one, three and eleven ventilator(s). Fortunately, the number of deaths and positive cases have not been consistent with the expectations of most scholars and policy makers because as of mid-May 2020, Africa which represents about 17% of the World's population was accounting for less than 1% of the infected cases and also for less than 1% of the corresponding mortality rate (Mcaffrey, 2020). The present study is concerned with assessing the effect of the pandemic on poverty in Africa.

3. Methods of estimation

We use the PovcalNet Stata command to compute the impact of Covid 19 on poverty in 50 African countries. PovcalNet is a computational tool for monitoring poverty in groups of countries, individual countries as well as regions at any poverty line over time. The product is jointly managed by the World Bank's Data and Research Groups in the Development Economic Division of the Bank. It is also worth emphasising that it substantially leverages on a robust collaboration with the Poverty and Equity Global Practice, which has the responsibility of collecting and harmonizing the data that is obtained by survey. Latest updates on the data reflect a combination of the Purchasing Power Parity (PPP) exchange rates for household consumption from the 2011 International Comparison Program with data that is sourced from more than 1500 household surveys across 166 economies in the world, including 28 high-income economies. The PovcalNet dataset covers the period 1990-2018. The data coverage is improving for the Middle East and North Africa and Sub-Saharan Africa.

To measure poverty, PovcalNet reports global poverty at two higher poverty lines of \$3.20 and \$5.50 per day, in addition the International Poverty Line of \$1.90. These additional lines are based on the national poverty lines typically found in lower- and upper-middle income economies, respectively (see Jolliffe & Prydz, 2016). It follows that the poverty thresholds of \$1.90, \$3.20 and \$5.50 per day, respectively represent low income, lower-middle income and upper-middle incomes.

Consistent with the motivation in the introduction, previous studies have made estimates by imagining some scenarios of GDP contractions as a result of the ongoing Covid-19 pandemic. These are 5%, 10% or 20% contractions in Sunmer et al. (2020), ILO (2020) and IFPRI (2020), respectively. In a different light from these previous studies, we evaluate the economic consequences of the pandemic on poverty using the estimation of the

macroeconomic impact computed previously. As the individual income or consumption is not observable from the PovcalNet dataset, we capture the macroeconomic impact of the pandemic by increasing the value of the poverty line accordingly (US\$1.90, US\$3.20 and US\$5.50 per day). Let ζ be the poverty line. A macroeconomic impact corresponding to a contraction of $x\%$ will adjust upwardly the poverty line at $\frac{\zeta}{1-x}$. Thus, consistent with the poverty literature (Sunmer et al., 2020; Vos et al., 2020; ILO, 2020), we can apply this formulae to estimate this incidence of an economic growth contraction on poverty in every African country.

4. Results and discussion

As shown in Table 2, the macroeconomic impact captured by GDP growth contraction as a result of the Covid-19 pandemic, could increase the International Poverty Lines in African countries. The extreme poverty line of US\$1.90 per day (i.e. for low income) has increased by US\$0.1 per day (i.e. US\$ 2.00-US\$1.90) while the middle poverty line (i.e. lower middle income) and the higher line (i.e. higher income) have increased by US0.19\$(i.e. US\$ 3.39-US\$3.20) and US0.32\$(i.e. US\$ 5.82-US\$5.50), respectively. It is also worthwhile to note that the poverty line ranges from US1.93\$ per day (Eswatini) to US2.21\$ per day (Seychelles) at the first poverty line. For the second and the last poverty line, it ranges from US3.27\$ (Eswatini) to US3.73\$ per day (Seychelles) and for the higher poverty line, from US5.53\$ (Eswatini) to US6.40\$ (Seychelles).

As far as the poverty headcount rate is concerned, the potential macroeconomic impact of the Covid-19 pandemic would have negative incidences on the poverty in all African countries (Table 3). In Africa as a whole, the poverty headcount has increased to 35.85% for the US1.90\$ poverty line, 57.55% for the US3.20\$ per day poverty line and 76.42% for the higher poverty line (US5.5\$ per day).

Regarding the additional percentage, the poverty headcount rates at US1.90\$ per day and US3.2\$ per day could increase by 2.09 percentage points corresponding to 28, 140, 345 and 26, 418, 200 million of the new poor in absolute terms, respectively (Table 4), whereas the rise on the poverty headcount rates could be equal to 1.78 points percentage at the higher poverty line equivalent to 19, 062, 643 million of new people living in poverty².

² The number of new poor is calculated on the status quo of 2018, the latest available data on the population. We multiply the additional percentage points by the total population of the countries in our sample to obtain the new poor in absolute terms.

When we consider the individual poverty rate, many patterns emerge from our results. For the percentage of people living in poverty, the macroeconomic contraction due to the Covid -19 pandemic on the poverty is very heterogeneous between countries (high standard deviation). Focusing on the US\$1.90 per day, the poverty headcount rates ranges from 0.37% (Mauritius) and Tunisia to 79.42% (Madagascar) while the range is from 2.82% (Mauritius) to 92.35 (Democratic Republic of Congo) for US\$3.2 per day. At the US\$5.5 per day, the rate is between 9.39% (Seychelles) and 98.08% (Democratic Republic of Congo). The additional percentage points in poverty headcount ratio ranges from 0.00% (Mozambique and Namibia) to 5.90 percentage points (Sierra Leone) for the lower poverty line. Concerning the extreme poverty line, the incidence of the Covid-19 pandemic is less pronounced in Northern and Southern Africa especially in Mozambique, Namibia and Algeria. For Northern Africa, this result is not surprising because people living under this poverty line are fewer contrary to Southern Africa. Under the US\$5.5 per day poverty line, the heterogeneity is more pronounced when we take a look to the standard deviation. The additional percentage points in poverty headcount rates range from 0.19 percentage points (Benin) to 6.09 percentage points (Algeria). Contrarily, for the lower poverty line, the percentage of the new poor is moderate in Sub-Saharan Africa than in the Northern part of the continent.

5. Concluding implications and future research directions

The present study complements the extant literature by assessing the incidence of the Covid-19 pandemic on poverty levels in Africa. To make this assessment, a comparative analysis is anchored on three poverty thresholds, notably, \$1.90, \$3.20, and \$5.50 per day for the low income, lower-middle income and upper-middle incomes categories.

Employing the PovcalNet computational tool for poverty monitoring in 50 African countries, with Pre Covid-19 macroeconomic projections of October 2019 and revised macroeconomic projections of April 2020, the following main findings are established. First, the extreme poverty line of US\$1.90 per day has increased by US\$0.1 per day while the middle poverty line (i.e. lower middle income) and the higher line (i.e. upper middle income) have increased by US\$0.19 and US\$0.32, respectively. Second, the poverty headcount has increased to 35.85% for the US\$1.90 poverty line, 57.55% for the US\$3.20 per day poverty line and 76.42% for the higher poverty line (US\$5.5 per day). Third, the corresponding additional percentage points in poverty headcount ratio are: (i) an increase of 2.09% for the poverty thresholds of US\$1.90 per day and US\$3.2 per day, corresponding to 28, 140, 345 and 26, 418, 200 million, respectively of the new poor in absolute terms and (ii) a boost of

1.78% for the higher poverty line of US\$5.5 per day, corresponding to 19, 062, 643 million of the new poor. Fourth, country-specific tendencies are also provided for more targeted policy implications.

As a main policy implication, sampled countries can leverage on country-specific findings in order to tailor policies towards curbing the unfavourable consequences of the Covid-19 pandemic on poverty in Africa. Moreover, the continental findings also provide insights into cross-country policy measures that can be taken on board on view of fighting extreme poverty at the continental level. Even without the underlying economic growth contractions owing to the ongoing crisis, studies had already established that unless economic growth was sustained and the corresponding fruits of economic growth unevenly distributed, it was unlikely that most countries in Africa would reach the sustainable development goal (SDG) target to reducing extreme poverty to a below 3% threshold: *“This paper examines its feasibility for Sub-Saharan Africa (SSA), the world’s poorest but growing region. It finds that under plausible assumptions extreme poverty will not be eradicated in SSA by 2030, but it can be reduced to low levels through high growth and income redistribution towards the poor segments of the society”* (Bicaba et al., 2017, p. 93). Hence, in the light of previous concerns about achieving the SDG target of extreme poverty, the findings in the study have shown that the Covid-19 pandemic is another “straw that would broke the camel’s back” in the ambition of African countries of attain the underlying SDG poverty target.

The findings in the study leave room for further research especially in the light of examining how the Covid-19 pandemic has affected other sustainable development goals targets related to poverty, inequality and environmental degradation. In so doing, leveraging on yearly data as time unfolds to assess whether the projections in this study withstand empirical scrutiny is worthwhile.

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Table 1: Macroeconomic impact of Covid-19

Country	Pre-Covid projections (October 2019) (a)	Revised projections (April 2020) (b)	Economic Impact (a)-(b)
Algeria	2.4	-5.2	7.6
Angola	1.2	-1.4	2.6
Benin	6.7	4.5	2.2
Botswana	4.3	-5.4	9.7
Burkina Faso	6.0	2.0	4.0
Burundi	0.5	-5.5	6.0
Cabo Verde	5.0	-4.0	9.0
Cameroon	4.2	-1.2	5.4
Central African Rep	5.0	1.0	4.0
Chad	5.4	-0.2	5.6
Comoros	4.2	-1.2	5.4
Democratic Rep. of Congo	3.9	-2.2	6.1
Djibouti	6.0	1.0	5.0
Republic of Congo	2.8	-2.3	5.1
Cote d'Ivoire	7.3	2.7	4.6
Egypt	5.9	2.0	3.9
Eswatini	0.5	-0.9	1.4
Ethiopia	7.2	3.2	4.0
Gabon	3.4	-1.2	4.6
The Gambia	6.4	2.5	3.9
Ghana	5.6	1.5	4.1
Guinea	6.0	2.9	3.1
Guinea Bissau	4.9	-1.5	6.4
Kenya	6.0	1.0	5.0
Lesotho	-0.2	-5.2	5.0
Liberia	1.6	-2.5	4.1
Madagascar	5.3	0.4	4.9

Malawi	5.1	1.0	4.1
Mali	5	1.5	3.5
Mauritania	5.9	-2.0	7.9
Mauritius	3.8	-6.8	10.6
Morocco	3.7	-3.7	7.4
Mozambique	6.0	2.2	3.8
Namibia	1.6	-2.5	4.1
Niger	6.0	1.0	5.0
Nigeria	2.5	-3.4	5.9
Rwanda	8.1	3.5	4.6
Sao Tomé and Príncipe	3.5	-6.0	9.5
Senegal	6.8	3.0	3.8
Seychelles	3.3	-10.8	14.1
Sierra Leone	4.7	-2.3	7.0
South Africa	1.1	-5.8	6.9
South Sudan	8.2	4.9	3.3
Sudan	-1.5	-7.2	5.7
Tanzania	5.7	2.0	3.7
Togo	5.3	1.0	4.3
Tunisia	2.4	-4.3	6.7
Uganda	6.2	3.5	2.7
Zambia	1.7	-3.5	5.2
Zimbabwe	2.7	-7.4	10.1
Africa	4.3	-1.15	5.4
Sub-Saharan Africa	3.6	-1.6	5.2
World	3.4	-3.0	6.4

Sources: authors

Table 2: Macroeconomic impact of Covid-19 on poverty lines

Country	Economic Impact (a)-(b)	Poverty line: $\frac{\zeta}{1-x}$		
		\$1.9	\$3.2	\$5.5
Algeria	7.6	2.06	3.46	5.95
Angola	2.6	1.95	3.29	5.65
Benin	2.2	1.94	3.27	5.62
Botswana	9.7	2.10	3.54	6.09
Burkina Faso	4.0	1.98	3.33	5.73
Burundi	6.0	2.02	3.40	5.85
Cabo Verde	9.0	2.09	3.52	6.04
Cameroon	5.4	2.01	3.38	5.81
Central African Rep	4.0	1.98	3.33	5.73
Chad	5.6	2.01	3.39	5.83
Comoros	5.4	2.01	3.38	5.81
Democratic Rep. of Congo	6.1	2.02	3.41	5.86
Djibouti	5.0	2.00	3.37	5.79
Republic of Congo	5.1	2.00	3.37	5.80
Cote d'Ivoire	4.6	1.99	3.35	5.77
Egypt	3.9	1.98	3.33	5.72
Eswatini	1.4	1.93	3.25	5.58
Ethiopia	4.0	1.98	3.33	5.73
Gabon	4.6	1.99	3.35	5.77
The Gambia	3.9	1.98	3.33	5.72
Ghana	4.1	1.98	3.34	5.74
Guinea	3.1	1.96	3.30	5.68
Guinea Bissau	6.4	2.03	3.42	5.88
Kenya	5.0	2.00	3.37	5.79
Lesotho	5.0	2.00	3.37	5.79
Liberia	4.1	1.98	3.34	5.74
Madagascar	4.9	2.00	3.36	5.78
Malawi	4.1	1.98	3.34	5.74

Mali	3.5	1.97	3.32	5.70
Mauritania	7.9	2.06	3.47	5.97
Mauritius	10.6	2.13	3.58	6.15
Morocco	7.4	2.05	3.46	5.94
Mozambique	3.8	1.98	3.33	5.72
Namibia	4.1	1.98	3.34	5.74
Niger	5.0	2.00	3.37	5.79
Nigeria	5.9	2.02	3.40	5.84
Rwanda	4.6	1.99	3.35	5.77
Sao Tomé and Príncipe	9.5	2.10	3.54	6.08
Senegal	3.8	1.98	3.33	5.72
Seychelles	14.1	2.21	3.73	6.40
Sierra Leone	7.0	2.04	3.44	5.91
South Africa	6.9	2.04	3.44	5.91
South Sudan	3.3	1.96	3.31	5.69
Sudan	5.7	2.01	3.39	5.83
Tanzania	3.7	1.97	3.32	5.71
Togo	4.3	1.99	3.34	5.75
Tunisia	6.7	2.04	3.43	5.89
Uganda	2.7	1.95	3.29	5.65
Zambia	5.2	2.00	3.38	5.80
Zimbabwe	10.1	2.11	3.56	6.12
Africa	5.5	2	3.39	5.82
Std. Deviation	2.39	0.05	0.09	0.15
Sub-Saharan Africa	5.2	2.00	3.38	5.80
World	6.4	2.03	3.42	5.88

Sources: authors

Table 3: Poverty headcount and additional poverty

	People living in poverty (in %)			Additional percentage points in poverty headcount ratio		
	\$1.9	\$3.2	\$5.5	\$1.9	\$3.2	\$5.5
Algeria	0.6	5.57	35.28	0.14	1.68	6.09
Angola	48.65	70.77	87.90	1	0.98	0.69
Benin	50.58	77.46	90.80	1.06	1.24	0.19
Botswana	19.67	43.02	64.43	3.61	4.5	4.05
Burkina Faso	47.02	78.12	92.90	3.31	1.68	0.61
Burundi	74.73	90.58	97.21	2.94	1.32	0.45
Cabo Verde	4.61	19.23	45.84	1.38	4.32	5.05
Cameroon	26.12	47.06	71.22	2.31	2.34	2.33
Central African Rep	67.82	83.96	93.27	1.56	0.88	0.44
Chad	41.12	68.89	88.05	2.69	2.36	1.8
Comoros	18.65	39.07	64.25	1.1	2.13	1.93
Democratic Rep. of Congo	78.86	92.35	98.08	2.27	1.3	0.33
Djibouti	19.04	42.89	73.55	1.91	2.72	2.95
Republic of Congo	39.34	64.03	83.74	2.37	2.77	1.36
Cote d'Ivoire	30.49	59.94	83.82	2.28	2.5	1.56
Egypt	3.9	29.38	72.91	0.69	3.26	2.49
Eswatini	29.17	52.13	71.98	0.74	0.34	0.55

Ethiopia	33.53	71.51	91.03	2.73	2.62	0.83
Gabon	3.65	12.20	34.54	0.26	0.99	2.35
The Gambia	11.73	40.68	74.21	1.58	2.85	1.73
Ghana	14.45	32.28	59.37	1.17	1.78	2.45
Guinea	37.54	72.11	93.05	2.26	1.81	0.73
Guinea Bissau	69.63	85.89	94.18	2.55	1.37	0.76
Kenya	40.76	68.62	87.88	3.93	2.37	1.39
Lesotho	29.57	51.42	75.13	2.65	1.73	2
Liberia	43.82	75.28	92.89	2.91	2.72	0.65
Madagascar	79.42	91.70	97.57	1.79	0.7	0.25
Malawi	72.72	90.32	97.07	2.37	0.93	0.34
Mali	51.71	80.75	95.37	2.06	1.44	0.48
Mauritania	7.54	28.80	63.94	1.57	4.72	5.15
Mauritius	0.37	2.82	16.25	0.16	0.74	4.16
Morocco	1.49	9.74	36.39	0.46	2.04	5.09
Mozambique	62.90	82.85	92.48	0	0.97	0.46
Namibia	13.41	30.99	51.65	0	1.36	1.6
Niger	49.15	79.03	94.41	4.64	2.09	0.96
Nigeria	56.92	79.80	93.08	3.45	2.19	0.96
Rwanda	58.03	81.21	92.27	2.53	1.51	0.64
Sao Tomé and Príncipe	40.10	68.57	88.08	5.61	4.82	2.55

Senegal	39.99	69.87	88.99	2.01	2.33	0.93
Seychelles	1.24	3.61	9.39	0.18	1.15	2.77
Sierra Leone	45.96	77.82	93.39	5.9	3.45	1.31
South Africa	21.13	40.35	59.42	2.24	2.74	2.32
South Sudan	44.13	66.10	85.62	2.42	1.33	0.86
Sudan	14.97	48.73	82.76	2.28	3.75	2.91
Tanzania	51.56	78.13	92.31	2.48	1.57	0.58
Togo	52.01	75.28	91.34	2.19	1.89	0.91
Tunisia	0.37	3.90	20.84	0.12	0.89	3.38
Uganda	43.19	71.26	88.28	1.53	1.34	0.52
Zambia	59.02	75.74	88.32	1.52	1.49	1.1
Zimbabwe	39.74	65.69	84.26	5.8	4.69	2.98
Africa	35.84	57.55	76.42	2.09	2.09	1.78
Std. Deviation	23.06	26.61	23.04	1.42	1.13	1.47
Sub-Saharan Africa	44.94	70.39	85.96	2.65	2.27	1.24
World	11.6	28.84	48.45	1.56	2.45	2.3

Sources: authors

Table 4: Number of new poor

	\$1.9	\$3.2	\$5.5
Algeria	59120	709438	2571711
Angola	308098	301936	212587
Benin	121742	142415	21822
Botswana	81374	101436	91292
Burkina Faso	653776	331826	120484
Burundi	328556	147515	50289
Cabo Verde	7504	23491	27460
Cameroon	582495	590060	587538
Central African Rep	72795	41064	20532
Chad	416352	365275	278600
Comoros	9156	17728	16064
Democratic Rep. of Congo	1908346	1092885	277425
Djibouti	18315	26083	28288
Republic of Congo	124291	145269	71323
Cote d'Ivoire	571578	626731	391080
Egypt	679123	3208609	2450748
Eswatini	8408	3863	6249
Ethiopia	2981830	2861683	906564
Gabon	5510	20981	49803
The Gambia	36026	64983	39446
Ghana	348275	529855	729294
Guinea	280564	224699	90625
Guinea Bissau	47795	25678	14245
Kenya	2019745	1218014	714363
Lesotho	55865	36471	42163
Liberia	140232	131076	31323
Madagascar	470096	183837	65656
Malawi	429997	168733	61687
Mali	393000	274719	91573
Mauritania	69132	207837	226771

Mauritius	2024	9363	52637
Morocco	165734	734994	1833883
Mozambique	0	286111	135681
Namibia	0	33296	39172
Niger	1041353	469058	215452
Nigeria	6757679	4289657	1880398
Rwanda	311239	185759	78732
Sao Tomé and Príncipe	11839	10172	5381
Senegal	318673	369407	147446
Seychelles	174	1113	2680
Sierra Leone	451359	263930	100217
South Africa	1294264	1583162	1340487
South Sudan	265617	145980	94393
Sudan	953075	1567557	1216425
Tanzania	1396695	884198	326646
Togo	172771	149104	71791
Tunisia	13878	102930	390904
Uganda	653664	572490	222160
Zambia	263748	258542	190870
Zimbabwe	837463	677190	430283
Africa	28140345	26418200	19062643

Sources: authors