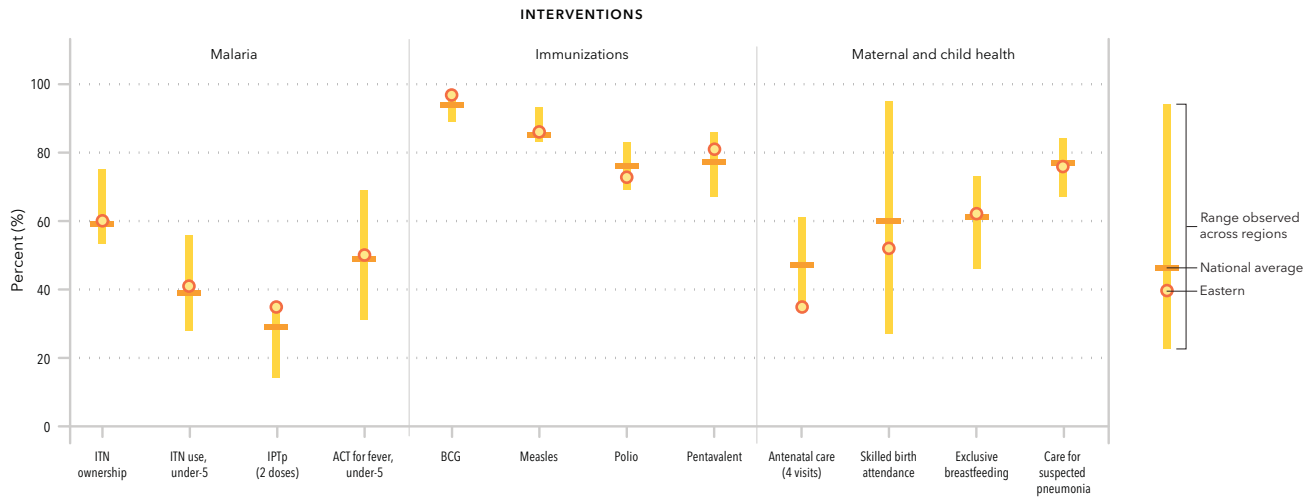


Eastern



Note: Estimates of intervention coverage are for 2011, with better performance reflected by higher levels of coverage.

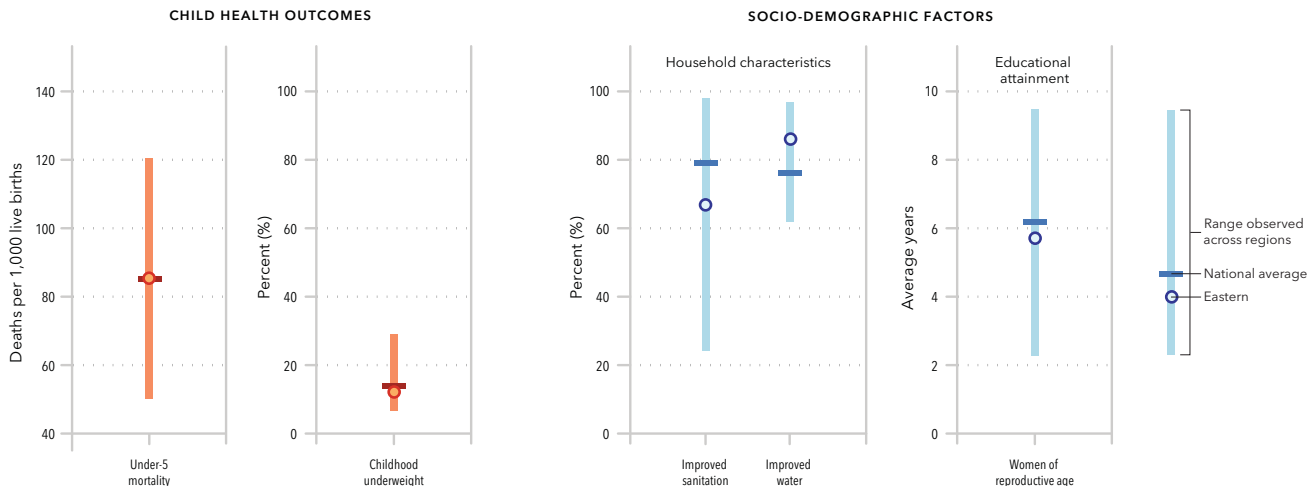
SUMMARY

Between 1990 and 2011, Eastern recorded substantial declines in all-cause under-5 mortality and the prevalence of childhood underweight. Prioritizing efforts to maintain these gains and further accelerate the region's progress in child health outcomes should be considered.

ITNs and the receipt of ACTs were quickly scaled up in Eastern, closely following the national trend. The region recorded improvements in immunization coverage as well, bringing BCG coverage to among the highest in the country in 2011. Skilled birth attendance gradually rose over time, but remained lower than the national average. Minimal progress was made for the proportion of women who had at least four antenatal care visits (ANC4), with the region's coverage consistently falling below the national trend.

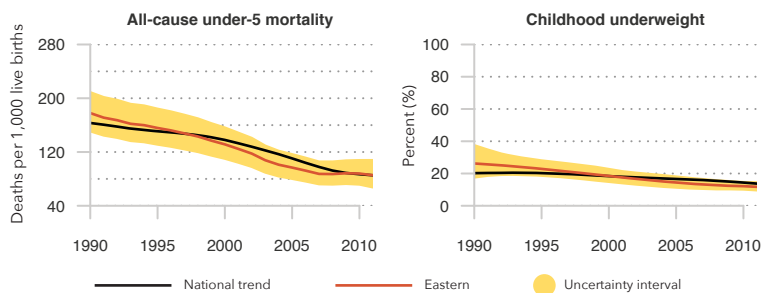
The region documented gains in the proportion of households with improved water, far exceeding the national average by 2011. While household access to improved sanitation slowly increased, Eastern lagged behind the national trend. After the mid-1990s, the region's average levels of educational attainment among women of reproductive age began falling below the national average.

In 2011, Eastern generally equaled or exceeded the national average for malaria interventions and immunization coverage, but largely fell below for maternal and child health interventions. For socio-demographic factors, the region mostly performed below the national average; household access to improved water was the exception. In comparison with the national average, Eastern showed similar levels of under-5 mortality and childhood underweight.



Note: Estimates of child health outcomes and socio-demographic factors are for 2011. Better performance is shown by lower levels of child health outcomes and higher levels for socio-demographic factors.

CHILD HEALTH OUTCOMES

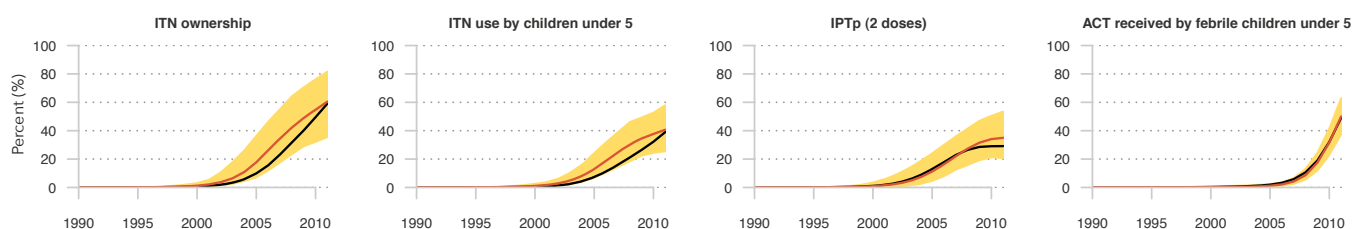


From 1990 to 2011, the region of Eastern recorded a significant reduction in all-cause under-5 mortality, dropping 52% from 178 deaths per 1,000 live births in 1990 (95% CI: 151, 209) to 85 in 2011 (95% CI: 67, 108). At the same time, it is important to note that Eastern's progress in reducing under-5 mortality slowed after 2005. In 2011, the region's under-5 mortality equaled the national average.

The proportion of children who were underweight in Eastern substantially decreased from 26% in 1990 (95% CI:

17%, 38%) to 12% in 2009 (95% CI: 10%, 15%). The prevalence of childhood underweight remained at 12% through 2011, which was slightly lower than the national average of 14% (95% CI: 12%, 15%). Eastern's improvements in childhood underweight are particularly notable given that the region had one of Uganda's highest levels of underweight during the early 1990s.

MALARIA INTERVENTIONS



ITN ownership remained below 10% until 2004, after which coverage rose to 60% in 2011 (95% CI: 35%, 82%). This level of ITN ownership was similar to the national average of 59% (95% CI: 36%, 79%).

The use of ITNs by children under 5 years old steadily increased from 13% in 2005 (95% CI: 7%, 24%) to 41% in 2011 (95% CI: 25%, 58%). This level of ITN use was comparable to the national average of 39% (95% CI: 27%, 53%). In this region, the difference between ITN ownership and ITN use by children under the age of 5 (19 percentage points) was comparable to what was observed at the national level (20 percentage points).

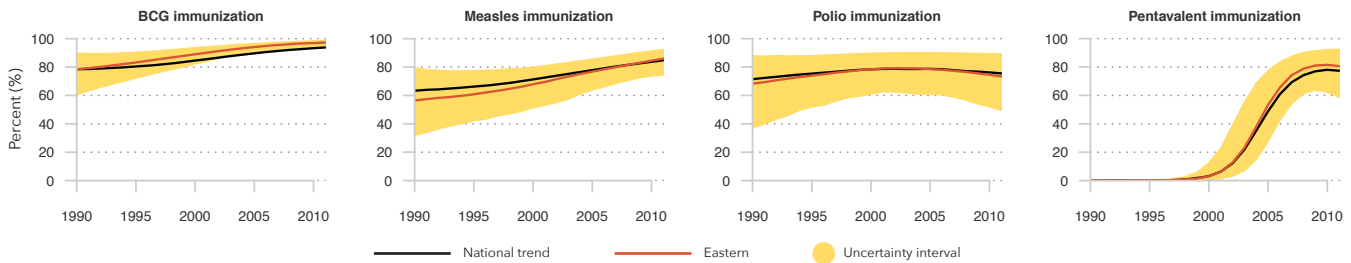
No districts in the region of Eastern had formally implemented IRS as of 2011.

ACTs formally became Uganda's first-line treatment for uncomplicated malaria in 2006, and the proportion of children in Eastern who received ACTs in response to experiencing a fever rapidly increased thereafter. Receipt of ACTs among febrile children under 5 rose from 9% in 2008 (95% CI: 6%, 13%) to 50% in 2011 (95% CI: 37%, 66%), which was similar to the national average of 49% (95% CI: 34%, 65%).

The proportion of pregnant women who received IPTp2 remained below 10% until 2005, after which coverage increased to 35% in 2011 (95% CI: 21%, 54%). This level of IPTp2 was higher than the national average of 29% (95% CI: 15%, 50%).

EASTERN, continued

IMMUNIZATIONS



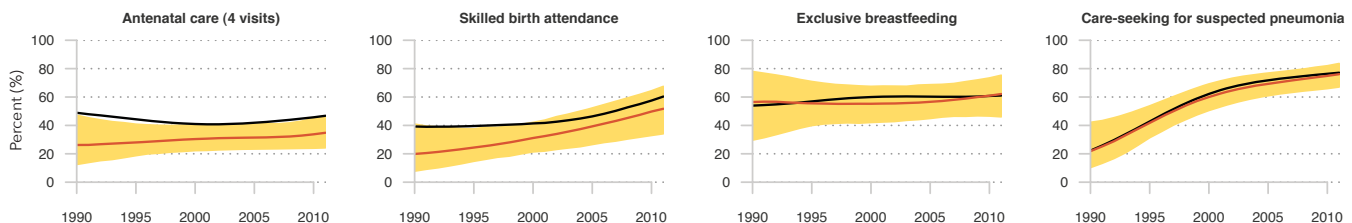
The proportion of children who received the BCG vaccine continuously increased between 1990 and 2011, rising from 78% in 1990 (95% CI: 61%, 90%) to 97% in 2010 (95% CI: 94%, 98%). This level of BCG immunization coverage was sustained through 2011, exceeding the national average of 94% (95% CI: 89%, 97%). Eastern had one of the highest rates of BCG immunization in Uganda for 2011.

Measles immunization substantially rose from 56% in 1990 (95% CI: 32%, 79%) to 86% in 2011 (95% CI: 74%, 92%), which was similar to the national average of 85% (95% CI: 75%, 91%). The region made marked progress in increasing measles immunization coverage since 1990.

Coverage of polio immunization remained somewhat consistent from 1990 to 2011, generally hovering between 70% and 80% during this time. In 2011, polio immunization coverage was 73% in Eastern (95% CI: 50%, 89%), which was slightly lower than the national average of 76% (95% CI: 52%, 90%).

The pentavalent vaccine was formally introduced in Uganda in 2002, after which coverage in Eastern rapidly increased from 38% in 2004 (95% CI: 15%, 68%) to 82% in 2010 (95% CI: 62%, 92%). Pentavalent vaccine coverage dipped to 81% in 2011 (95% CI: 59%, 92%), but remained slightly higher than the national average of 77% (95% CI: 51%, 92%).

MATERNAL AND CHILD HEALTH INTERVENTIONS



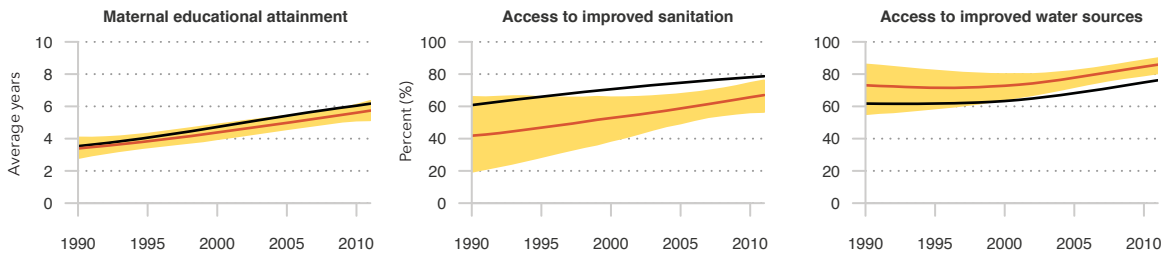
ANC4 coverage gradually increased between 1990 and 2011, rising from 26% in 1990 (95% CI: 12%, 47%) to 35% in 2011 (95% CI: 24%, 47%). This level of ANC4 coverage was well below the national average of 47% (95% CI: 41%, 54%), and was among the lowest in Uganda for 2011. Eastern's persistently low levels of antenatal care are quite worrisome.

There was a substantial rise in skilled birth attendance in Eastern, increasing from 20% in 1990 (95% CI: 8%, 41%) to 52% in 2011 (95% CI: 34%, 67%). While this level of SBA coverage remained lower than the national average of 60% in 2011 (95% CI: 47%, 73%), Eastern's gains in SBA are notable, especially given the region's very low coverage in the 1990s.

The proportion of children who were exclusively breastfed remained fairly consistent between 1990 and 2011, largely hovering between 55% and 60%. In 2011, coverage of exclusive breastfeeding was at 62% (95% CI: 46%, 75%), which was comparable to the national average of 61% (95% CI: 54%, 67%).

Serving as proxy for health system access, the proportion of children under 5 who sought care for suspected pneumonia steadily increased from 22% in 1990 (95% CI: 10%, 42%) to 76% in 2011 (95% CI: 67%, 84%). This level of health-care-seeking behavior was comparable to the national average of 77% (95% CI: 76%, 78%).

SOCIO-DEMOGRAPHIC FACTORS



Among women of reproductive age (15 to 44 years old) in Eastern, the average years of education attained increased 68% between 1990 and 2011, rising from 3.4 years in 1990 (95% CI: 2.8, 4.1) to 5.7 years in 2011 (95% CI: 5.1, 6.3). This level of educational attainment was lower than the national average in 2011, which was 6.2 years (95% CI: 5.9, 6.4).

Household access to improved sanitation (a flush toilet or covered pit latrine) steadily rose from 42% of households with improved sanitation in 1990 (95% CI: 19%, 66%) to 67% in 2011 (95% CI: 57%, 76%). Despite this progress, household

access to improved sanitation in Eastern was well below the national average in 2011, which was 79% (95% CI: 76%, 81%).

The proportion of households with access to improved water sources (e.g., piped water, protected wells, protected springs) continuously increased in Eastern, rising from 73% in 1990 (95% CI: 55%, 86%) to 86% in 2011 (95% CI: 81%, 90%). The region consistently recorded higher levels of improved water access than the national average between 1990 and 2011.