ENOCK WILL NSUBUGA BULIME

Research Statement

My research lies at the intersection of macroeconomics, public economics, and international economics. I study how external shocks and domestic fiscal institutions shape government finances and long-run economic outcomes. My work asks four related questions: How do external price shocks transmit into sovereign debt? How do governments adjust fiscal policy when debt rises, and how do political institutions shape that adjustment? When does public spending translate into human capital accumulation? I study these questions primarily in developing economies, where exposure to external shocks, variation in fiscal institutions, and differences in tax capacity provide a useful setting for identifying mechanisms with broader implications for fiscal policy. My prior experience at Uganda's Economic Policy Research Centre gives me direct knowledge of African tax administration and government data environments that inform both the questions I ask and the identification strategies I use to answer them.

JOB MARKET PAPER: EXPORT AND IMPORT PRICE SHOCKS AND SOVEREIGN DEBT

My job market paper studies how external price shocks transmit into sovereign debt and shows that treating export and import prices symmetrically can mischaracterize fiscal risk for developing countries. Standard debt sustainability frameworks allow declining import prices to partially offset export-price stress. This netting logic is closely related to the conventional terms-of-trade approach: an adverse export-price movement can appear less damaging when accompanied by cheaper imports. Using structural export- and import-price shocks for twenty African economies over 1990–2019, I find that the two effects differ sharply in size and sign. A 10 percent decline in export prices raises sovereign debt by 5.7 percentage points of GDP after four years, whereas a 10 percent increase in import prices lowers debt by 3.4 percentage points. The asymmetry becomes particularly consequential when export and import prices move in the same direction. In severe commodity-price episodes in my sample, the two prices fall together 57 percent of the time. Following such episodes, government debt rises by 6 percentage points of GDP, even though a terms-of-trade-based stress test implies little or no deterioration. I corroborate the baseline estimates using a WTI-based local-projection IV strategy and three shift-share designs that share no price source or trade weights with the structural rotation. Together, the results show that fiscal stress tests can understate debt vulnerability when they treat declining import prices as a fiscal buffer against an export-price collapse.

SIGNALING FISCAL DISCIPLINE: THE COMPOSITION OF DEBT ADJUSTMENT IN AFRICA

My second dissertation chapter asks how governments adjust fiscal policy when debt rises and whether political institutions affect the margin through which adjustment occurs. This question is motivated by a puzzle: public debt re-accumulated rapidly across many African economies following earlier debt-relief initiatives, yet pooled estimates of fiscal balances reveal little systematic response to rising debt. Using an annual panel of 36 African countries from 1995 to 2023, I find that the composition of fiscal adjustment varies systematically with democratic accountability. In the long run, debt stabilization is associated primarily with expenditure compression across political regimes. In the short run, however, the revenue response to rising debt is concentrated in countries with greater electoral accountability, while I find no comparable activation of primary expenditure. Commodity-identified revenue shocks also display greater persistence in high-accountability settings. These results suggest that pooled fiscal reaction functions conceal institutional heterogeneity: the same debt pressure activates different fiscal margins depending on political accountability.

EDUCATION SPENDING, EFFECTIVE TAXATION, AND HUMAN CAPITAL IN AFRICA

My third dissertation chapter connects public expenditure to the tax system that finances it. Standard cross-country analyses typically evaluate education spending and taxation separately. I instead ask whether the effectiveness of public education expenditure depends on the incentives created by the tax system. Using a panel of 37 African countries over 1980–2018, I find that the association between education spending and schooling attainment weakens as effective labor taxation rises. A one-percentage-point increase in the effective labor tax rate reduces the implied association between education spending and attainment growth by approximately 0.020 percentage points per year. The interaction is concentrated in democratic, low-debt, non-resource-dependent economies with more progressive tax structures and is absent where resource rents substitute for broad-based taxation. By contrast, the corresponding interaction with effective capital taxation is close to zero. The results establish that the effectiveness of education spending in raising human capital growth is conditional on the labor-tax environment: evaluating public expenditure without accounting for the incentives generated by the tax system that finances it overstates its effectiveness in high-enforcement settings and understates it where labor taxation is low.

Research Agenda.

These projects form a broader research agenda on fiscal policy in open economies, connecting external shocks, fiscal institutions, and human capital accumulation through the common question of how governments absorb pressure and what determines whether that absorption strengthens or undermines long-run outcomes.

A companion paper extends the job market paper's findings to a global sample of 157 countries over 1990–2018. The export–import asymmetry is not specific to Africa: commodity price busts raise public debt globally, with effects that scale sharply with income level. The debt response is large and significant in low- and lower-middle-income economies and near zero in upper-middle-income economies. This income gradient suggests that fiscal vulnerability to commodity co-movement reflects the institutional and financial buffers available to higher-income economies, not commodity dependence per se. A related finding inverts the standard narrative on financial openness: more financially open economies experience larger debt responses to import-price shocks, suggesting that capital account liberalization can amplify rather than buffer fiscal vulnerability. The paper further examines when adverse external shocks escalate from higher debt burdens to episodes of repayment difficulty, and whether creditor composition shapes that transition.

A second research agenda examines the institutions governing fiscal adjustment. My dissertation's fiscal-signaling chapter establishes that the revenue margin is the politically sensitive margin of adjustment and that its activation depends on electoral accountability rather than formal fiscal rules. I am extending this into a broader project that asks whether formal fiscal institutions substitute for or complement electoral incentives to demonstrate fiscal discipline. Using a panel of 188 countries from 1990 to 2024, I examine how fiscal rules and creditor composition interact with political accountability when interest payments rise. Preliminary results suggest that fiscal rules accelerate primary expenditure compression but leave the revenue response unchanged, consistent with the signaling paper's finding that the revenue margin is politically rather than institutionally activated. Together, these papers develop a unified argument: formal rules and electoral discipline operate on different fiscal margins, and treating them as substitutes understates the distinct role each plays in sustaining debt credibility.

A third research agenda develops the microfoundations of the relationship between labor taxation, public spending, and human capital accumulation. The macro evidence from my third dissertation chapter establishes that the effectiveness of education spending in raising human capital declines as effective labor taxation rises. This motivates a research agenda that moves from country-level panels to individual-level data: do households' schooling investment decisions respond to changes in the after-tax formal wage premium? I am developing a project that uses labor force survey microdata from Ghana, Zambia, Uganda, Nigeria, and Rwanda to examine whether schooling investment decisions respond to the after-tax formal wage premium, exploiting sector-level and time-series variation in payroll tax enforcement as a source of identification.

Together, these projects share a common premise: fiscal outcomes depend not only on the size of shocks or the scale of government responses, but on the institutions and incentive structures through which those shocks and policies operate. Each paper identifies a distinct channel (shock transmission, adjustment composition, and spending effectiveness) through which institutions alter fiscal outcomes, and together they develop a research program on fiscal policy design in institutionally diverse developing economies.

My long-run objective is to develop a research program in macroeconomics, public economics, and international economics that connects the study of external shocks with the domestic institutions through which governments respond to them. Developing and emerging economies provide an especially valuable environment for this work because variation in fiscal institutions, tax capacity, and political accountability is wide enough to identify mechanisms that are difficult to isolate in richer settings. The underlying questions (how fiscal systems absorb shocks, how governments restore debt sustainability, and how the design of tax and expenditure policy shapes long-run outcomes) have implications well beyond the African context and are central to fiscal policy analysis in any economy where institutions and incentives vary.