## Debt Sustainability Assessments —Current Efforts at the International Monetary Fund

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### DSA at the Fund

- Concerns about medium-term balance of payments and fiscal sustainability has traditionally been at the core of Fund work
- More recently, the focus has been increasingly on stocks—and its dynamics—in addition to flows

# Sustainability assessments are important in Fund staff work

- Exchange rate and current account assessments
- Fiscal policy advice
- Use of Fund Resources: inform decisions on capacity to repay the Fund, access levels
- □ Surveillance: crisis prediction, prevention → anticipate problems several years ahead to recommend policies to prevent crisis
- □ Distinction between insolvency and liquidity crisis → affects policy prescription

## **Objectives of the Framework**

- Ensure that surveillance adequately focuses on risks to debt dynamics
- Promote consistency and discipline/realism in sustainability analyses
- Provide basis for better judgments on:
  - Vulnerabilities
  - Plausibility of debt dynamics articulated in programs
  - Required degree of restructuring (countries that have defaulted)

#### Public debt projection: Brazil



## Two different DSA frameworks

- Countries with market access: advanced and middle-income countries
- Countries relying on official financing (low-income countries)

# Template for public and external DSA for countries with market access

- Baseline (program) projections for debt dynamics and gross financing needs over 5year period
- Underlying macroeconomic assumptions
- Stress tests for debt ratios
- Historical scenario (historical parameter averages)
- Possible country-specific alternative scenario

# Stress tests to check realism of projections...

- Use of small but persistent shocks
- Shocks applied to the baseline
- Shocks applied to interest rate, growth rate, current account (external), primary balance (public), real depreciation, contingent liabilities (public). Also combined shock.
- Graphical presentation
  - Lists baseline assumption, historical average, and bound test assumption







### How are sizes of shocks chosen?

- Stochastic simulation used to determine appropriate size of shocks. Key concern:
  - Iarge enough to capture potential risks
  - small enough to have reasonable likelihood of occurrence
- Historical data from emerging market economies used to simulate distribution of debt
- Sample:14 emerging market countries (public debt);
  41 middle-income market borrowers (External debt).
- <sup>1</sup>/<sub>2</sub> standard deviation shocks chosen as they reflect realistic p-values (to capture medium term risks)

# Simulated probability distribution



### Interpretario figure debt/ ratios



 $2000\ 2001\ 2002\ 2003\ 2004\ 2005\ 2006\ 2007\ 2008\ 2009\ 2010$ 



### Why different framework for LICs?

#### Debt mainly official

- Different "rollover risk"
- Different definition of crisis/ "debt distress" (arrears, Paris Club rescheduling, defensive lending)
- Concessional nature of debt—need to think in present value terms
- Different purpose—guide official lending in addition to policy advice (hence, jointly with World Bank)
- Caveat: Heterogeneity—some LICs are nearemerging markets (judgment)

### LICs: Relevant Debt-Burden Indicators

### Numerator

- NPV of debt (public/external)
- Debt service
- Denominator=measure of debtservicing capacity
  - Total resource base (GDP)
  - Foreign exchange (exports)
  - Administrative capacity (revenues)

### LICs: Basic Elements of Framework

# Indicative thresholds for PPG external debt

- Policy dependent (CPIA); supported by empirical analysis
- Less problematic than in EMs (official debt, no market reaction)
- Justified to guide official lending decisions
- Interpret with caution (political choice, distress definition, errors)