

**ANALYSIS OF REFORM OPTIONS FOR
EXTENDING HEALTH CARE COVERAGE IN NEW MEXICO:**

Study Design

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Overview

- **Microsimulation modeling**
 - What is it?
 - Why this approach?
- **Components of microsimulation**

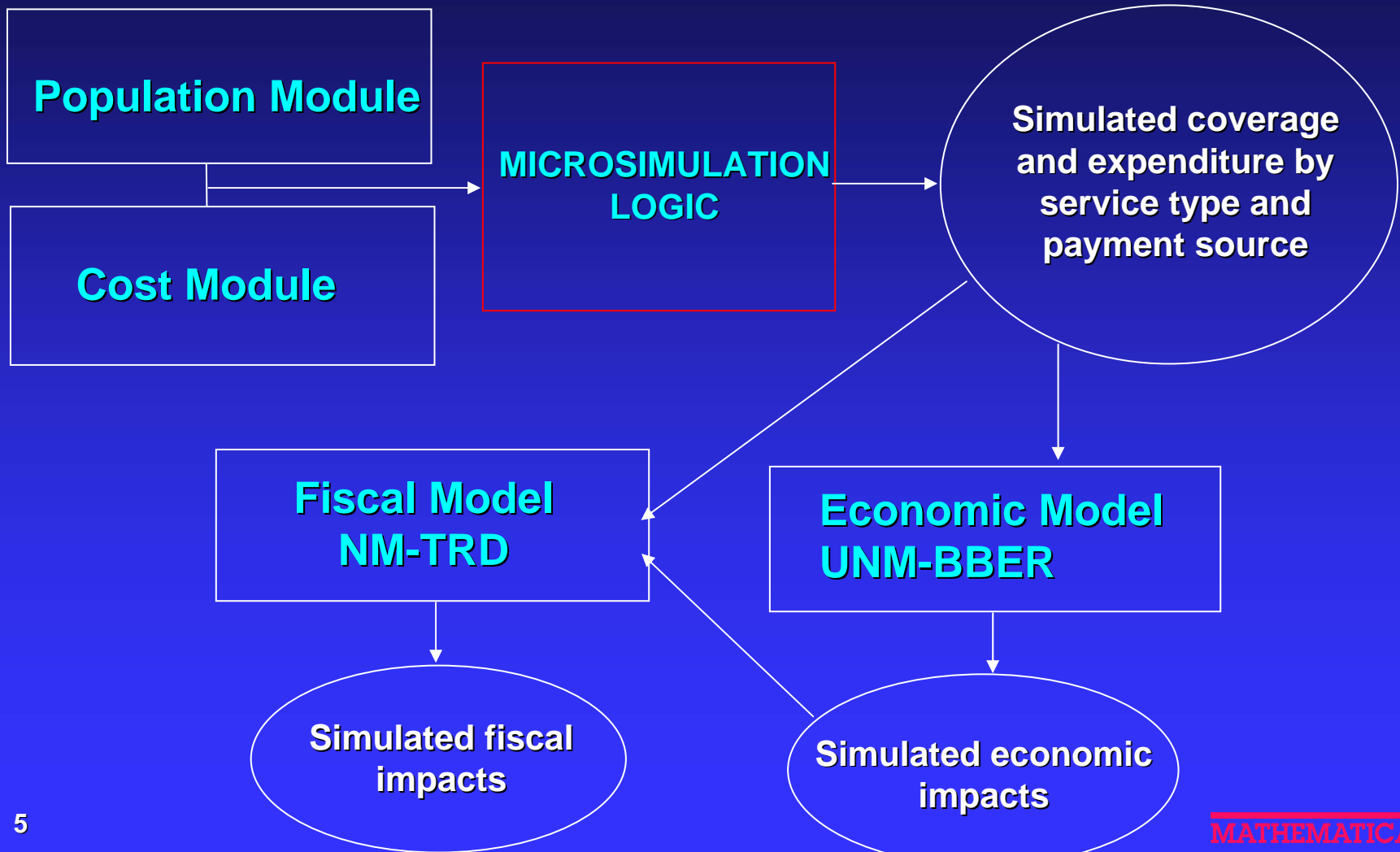
What Is Microsimulation?

- **Structured way of thinking about a complex problem**
- **“Bottom-up” (micro) modeling versus “top down” accounting framework**
- **Mimics the operation of a program or system**
- **Considers Individual responses to alternative opportunities and the many factors that affect response**

Why Microsimulation?

- **Allows estimation of coverage models that involve choice**
- **Ensures consistent application of assumptions**
- **Supports flexible analysis of subgroups and sensitivity to assumptions**
- **Often reveals results of complex logical relationships you might otherwise overlook**

Components of the Microsimulation Model for New Mexico



Population Module

- **Current Population Survey, 2004-2006**
 - **New Mexico population sample**
 - **“Borrowed” population sample**
 - ◆ **Rural and small-MSA samples from Arizona, Colorado, Nevada, and Texas**
 - ◆ **Re-weighted to reflect prevalence in New Mexico (age, ethnicity, income, health status, insurance source, MSA location)**

Population Module, cont.

- **State program data**
 - **Persons enrolled and member months by age and gender in MSA and nonMSA counties, 2001-2005**
 - **Five programs**
 - ◆ **Medicaid/SCHIP**
 - ◆ **SCI**
 - ◆ **NMHIA**
 - ◆ **NMMIP**
 - ◆ **State employees**

Population Module, cont.

- Estimate unobserved characteristics:
 - Employer offer of coverage when not taken
 - Enrollment in self-insured employer plans
 - Participation in state programs: Medicaid/SCHIP, SCI, HIA, NMMIP, PA

Cost Module

- Expenditures by program, location, age, and gender for services in 7 categories:
 - Inpatient hospital
 - Outpatient hospital
 - Emergency room
 - Office-based providers
 - Home health
 - Vision/dental
 - Other services and medical equipment

Cost Module, cont.

- **National Medical Expenditures Panel Survey (MEPS) data, calibrated to state program data**
 - Medicaid/SCHIP
 - SCI
 - NMHIA
 - NMMIP
 - State employees
 - Dept. of Insurance
- **Estimate unobserved characteristics**
 - Private group premiums
 - Employee contributions to premium

Additional Sources of Data

Employer offer of coverage

- 2002 Health Care Access & Coverage Survey (NM Health Policy Commission)

Enrollment in self-insured employer plans

- Medical Expenditure Panel Survey – Insurance Component 2004 (NM)

Participation in state programs

- State program rules and 2006 program enrollment

Private group premiums and employee contributions

- Medical Expenditure Panel Survey – Insurance Component 2004 (NM)

Projection to 2007-2011

- **Medical costs**
 - Calculated per member per month by source of payment, 2002-2006
 - Projected to 2007 at 4-year average annual growth rate
- **Nonmedical costs by source payment**
 - Calculated as a percent of medical cost, 2002-2006 average percentage
 - Average percentage applied to projected 2007 medical cost
- **No adjustment for offsetting changes in the working-age population**