Common link between policies conducive to both fertility transition and demographic dividend

Anrudh K. Jain
Distinguished Scholar

XXVII IUSSP International Population Conference
Session 093
Busan, Korea
August 28, 2013
Outline

- Introduction
- Indian context & national trends
- State-level fertility differences
  - Factors contributing to these differences
- State-level differences in demographic dividend
- Future prospects
- Conclusions
Introduction
Conditions conducive to demographic dividend

- Quantity of labor force marking the creation of the window of opportunity
  - Automatic outcome of fertility transition
- Quality of labor force when the window of opportunity is created
  - Requires early investment in education and health
- Economic opportunities for labor force to be productive
  - Requires favorable economic policies especially when the window of opportunity is created
Conditions conducive to fertility transition

• Strong family planning program
  • Requires investment in making contraceptive services of good quality easily available at low cost

• Higher female education
  • Requires early investment in broad based education

• Lower Infant and child mortality
  • Requires early investment in health
Common link between fertility transition and demographic dividend

- Early Investment in Education and Health
  - Strong Family Planning Program
  - Higher Female Education
  - Lower IMR

- Fertility Transition

- Economic Policies
  - Quantity of Labor Force
  - Quality of Labor Force

- Demographic Dividend
Indian context

- Population of 1.2 billion people growing at 1.64% annually
- Family planning program initiated in 1952, gained momentum in 1966 with creation of Department of Family Planning
- Divided in 29 states and 6 union territories
- Funds transferred to states through five year development plans
- Progress varies by states because states are responsible for:
  - Improving health and education
  - Implementing family planning programs
Fertility declined and age distribution became favorable in India.
Fertility declined in all 15 major states

- Fertility in 11 states declined by at least 50% between 1971 and 2004
- Seven states are at or below replacement level
- Four are close to replacement level
Northern states lagging behind in fertility transition
Contraceptive Prevalence by State in India 1992/93–2005/06

Legend

- <45.0
- 45.0 - 60.0
- >60.0

1992/93

1998/99

2005/06
Time-lagged Regression Analysis

- Girls education turned out to be the strongest predictor in all models
- Indexes of availability and poverty in 2003 did not show significant effect on 2004 TFR after controlling for girls education
Northern states lagging behind in infant mortality and girls education

Infant mortality rate

Girls education

- Kerala
- TN
- UP
- Bihar
Fertility Differences among States

- Reflect joint effect of investments in:
  - Family Planning
  - Education
  - Health
- North is behind South by at least 30 years in IMR and Education
- TFR in North now is what it was in South 30 years ago
State-level differences in conditions conducive to demographic dividend
Window of opportunity created in southern states but not in northern states

Kerala

Uttar Pradesh
Northern states lagging behind in quality of young adults

<table>
<thead>
<tr>
<th>Indicators</th>
<th>Unmarried males 15-24 (%)</th>
<th>Unmarried females 15-24 (%)</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>Bihar</td>
<td>TN</td>
</tr>
<tr>
<td>8+ yrs of schooling</td>
<td>60</td>
<td>81</td>
</tr>
<tr>
<td>Paid work</td>
<td>48</td>
<td>56</td>
</tr>
<tr>
<td>Watch TV</td>
<td>12</td>
<td>10</td>
</tr>
<tr>
<td>Physical fights</td>
<td>15</td>
<td>9</td>
</tr>
</tbody>
</table>
Northern states lagging behind in infant mortality and girls education
Southern States Have

- Favorable age distribution (quantity)
- Better educated and healthier young adults entering labor force (quality)
- Better able to take advantage of the economic liberalization policies of 1980s onwards
- Realizing demographic dividend
- Demographic dividend contributed substantially to growth in annual per capita income during 1980s and 1990s (AiyeR & Mody 2011)
Southern States are Better off in Household Wealth

- **Bihar**: 9% Highest, 15% Fourth, 19% Middle, 29% Second, 28% Lowest
- **U.P.**: 14% Highest, 25% Fourth, 24% Middle, 19% Second, 25% Lowest
- **T.N.**: 20% Highest, 24% Fourth, 30% Middle, 15% Second, 11% Lowest
- **Kerala**: 45% Highest, 38% Fourth, 12% Middle, 4% Second, 1% Lowest

*Population Council*
Future prospects of demographic dividend

- Will depend on the pace of fertility decline in northern states with 503 million people
  - Will require continued investment in education, health, and family planning in these states
- Staggered fertility decline among states
  - Extends the window of opportunity
  - Dependency burden in southern states will shift to old age as young age dependency burden in northern states starts to come down
Projected age distribution for India: 2001-2050
Dependency burden in southern states shifts to old age

Kerala

Uttar Pradesh
Conclusion

• Investment in FP, education, and health is winning combination—will contribute to:
  • Lower fertility—creating window of opportunity
  • Better quality of labor force
  • Realization of benefit from demographic dividend uniformly among states
  • Achievement of MDGs 2, 4, & 5
The **Population Council** conducts biomedical, social science, and public health research. We deliver solutions that lead to more effective policies, programs, and technologies that improve lives around the world.