

A decorative graphic on the left side of the page, resembling the spiral binding of a notebook. It consists of a vertical line of 15 circular rings connected by a wavy line, set against a grey background that also forms a border around the page.

Income Inequality

International Comparisons

Data Sources

- ✓ Luxembourg Income Study -- uses survey income from 25 countries; data organized to maximize comparability; measures equivalent disposable income
- ✓ World Development Indicators -- uses individual country data; some data is income data; some data is consumption data; measures per capita income or expenditure.

General Problems

- ✓ Debate over use of consumption vs income as measure of economic well being
- ✓ Income data generally excludes capital gains, imputed rents, home production and most of income in-kind. LIS survey does include near cash benefits. Problems arise in making comparisons across countries because one country may give out cash to poor families while another relies more on in-kind transfers.

Problems, cont.

- ✓ No account taken of indirect taxes of the benefits of public spending
- ✓ Snapshot at a single point in time so no measure of mobility
- ✓ Homeless population is typically not counted.

More Summary Measures

✓ Mean Logarithmic Deviation of Income

- Average of log ratios of the income of each individual to mean income
- Sensitive to changes at lower tail of distribution

✓ The Squared Coefficient of Variation

- Sum of squared deviations of income of each individual from population mean, divided by mean income
- Sensitive to changes at upper tail of distribution

The Atkinson Index

- ✓ Normative index, based on concept of equally distributed equivalent income
- ✓ Researchers can adjust weight given in different tails of distribution by setting a level of inequality aversion. The greater the inequality aversion (higher e), the more sensitive is the index to changes at the bottom tail.

Formulas

$$MLD = \frac{1}{n} \sum_{i=1}^n \log\left(\frac{\bar{X}}{X_i}\right)$$

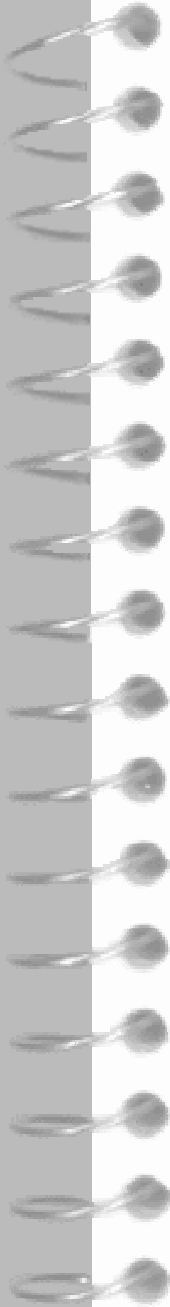
$$SCV = \frac{\sum_{i=1}^n (X_i - \bar{X})^2}{\bar{X}^2}$$

$$A = 1 - n \sum_{i=1}^n \frac{X_i}{\bar{X}}^{1-\varepsilon} \frac{1}{1-\varepsilon}$$



Issues

- ✓ Has the U.S. trend towards increasing inequality been replicated in other countries?
- ✓ How do differences in tax and transfer policy affect income inequality?
- ✓ How does the level of economic development affect income inequality?



1980's Increase in Inequality Is International Phenomena

- ✓ Smeeding's table three shows increase inequality in market income in nearly all countries. (Italy experienced small decline in Gini.)
- ✓ In some countries, increase in market income inequality offset by taxes and transfers such that disposable income inequality did not increase.



LIS Database -

[Http://www.lis.ceps.lu/ineq.htm](http://www.lis.ceps.lu/ineq.htm)

Australia, 1989-94 +

Canada, 1991-94, no change

Finland, 1987-95, +

France, 1984-94, -

Germany, 1989-94, +++

Hungary, 1991-94,+++

Italy, 1991-96, +++

Norway, 1991-95 +

Poland, 1992-95 ++

Republic of China,1991-95 +

Sweden, 1992-95, -

United Kingdom, 1991-95 +

United States, 1991-97 +

Taxes and Transfers Reduced Inequality

- ✓ Disposable income more equally distributed than market income
- ✓ Table 4 from Oxley, et al, “Income Distribution and Poverty in 13 OECD Countries,” OECD Economic Studies, No. 29, 1997,p. 71.
- ✓ Other countries tend to engage more actively in redistribution
- ✓ Comparison of pre and post distributions of income in the United States

Impact of Taxes/Transfers in United States

| | |
|--|------|
| Official Measure | .446 |
| Official Less Taxes, plus capital gains, without EIC | .429 |
| Official Less Transfers | .500 |
| After Tax, Pre- transfer, No EIC | .493 |
| With EIC | .489 |

Kuznets Revisited

The Distribution of Income is More Equal In Countries With Higher Per Capita GNP

