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Low income measurements at Statistics Canada

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Context

- At Statistics Canada, we are often asked for information on poverty by policy makers and the public.
 - Who are poor?
 - How many poor are there?
 - How poor are they?
 - Poor for how long?
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Context

- Despite this ongoing interest
 - There is neither a unique definition of poverty nor a simple way of determining who is poor.
- Because defining poverty is hard.
 - What are common necessities?
 - What is considered minimally acceptable?
 - With reference to whom the standard is set?
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- It is not the proper role of a national statistics agency to define an official measure of poverty as its definition represents a social consensus and not an expert judgment.



The role of STC

- STC provides the context for a poverty debate in which the development of low income lines are a key aspect
 - Through supporting the construction of lines by other Canadians with data access and support
 - Through providing benchmark low income lines to facilitate international comparisons and assist the national debate



Low income lines at STC

- LICOs – Low Income Cut-Offs.
- LIM – Low Income Measure.
- MBM – Market Based Measure.



LICOs

- LICOs are thresholds below which a family is likely to spend a significantly higher proportion of its income on food, shelter and clothing than the average family and hence have relatively little “discretionary income” left for other spending and is likely to live under straitened circumstance.
- Significant: 20% more than average.
- Current LICOs are based on 1992 FAMEX survey, updated by annual CPI.



After-tax LICO thresholds 1992 and 2007

Family size	Rural area	Urban areas by number of residents			
		<30,000	30,000-99,000	100,000-499,000	500,000+
1992					
1	8,848	10,126	11,296	11,439	13,526
2	10,769	12,325	13,749	13,922	16,462
3	13,410	15,346	17,120	17,336	20,499
4	16,730	19,146	21,359	21,628	25,574
5	19,050	21,802	24,322	24,628	29,121
6	21,127	24,179	26,974	27,313	32,296
7 and over	23,204	26,556	29,626	29,998	35,471
2007					
1	11,745	13,441	14,994	15,184	17,954
2	14,295	16,360	18,250	18,480	21,851
3	17,800	20,370	22,725	23,011	27,210
4	22,207	25,414	28,352	28,709	33,946
5	25,287	28,940	32,285	32,691	38,655
6	28,044	32,095	35,805	36,255	42,869
7 and over	30,801	35,250	39,325	39,819	47,084



LICOs

- In 2007, a single person lived in rural Ontario (or rural area in any province) with after-tax income less than \$11,745 is said to be a low-income person in that year.
- Similarly, a family of four lived in a large city (more than 500,000 residents) with after-tax income less \$33,946 in 2007 is said to be in low-income in that year.



LIM

- Definition: half of the median family income where income is adjusted for family size and composition through an equivalence scale.
- Equivalence scale: first person 1, second person (regardless of age) 0.4, additional adults 0.4 and additional children (age<16) 0.3.
- Adjust family size: sum of the above factors for a family. A family of 2 adults/2 children has an adjust family size of 4 ($1+0.4+0.3+0.3$).



LIM

- 3 steps
 - Divide family income by adjust family size to get “adjusted income”.
 - Find the median of the adjusted income.
 - Divide the median by 2 (50%) to get the LIM threshold for single-person families, and multiply this threshold by adjusted family size to obtain the thresholds for other families.
- Rebase or update: annual with income survey.
- Market income, before- and after-tax income LIMs.



After-tax LIM thresholds

2006

# Children→	0	1	2	3	4	5
# adults						
1	15,179	21,251	25,804	30,358	34,912	39,465
2	21,251	25,804	30,358	34,912	39,465	44,019
3	27,322	31,876	36,430	40,983	45,537	50,091
4	33,394	37,948	42,501	47,055	51,609	56,162
5	39,465	44,019	48,573	53,127	57,680	62,234



LIM

- In 2006, a single person, no matter where he lived, with an income below \$15,179 is said to be in low income in that year.
- Similarly, a family with two adults and two children with an income below \$30,358 is said to be in low income in 2006.



MBM

- Working group with federal-provincial-territorial representatives designed an alternative to the LICO and LIM in 1997.
- Definition: cost of a basket of goods and services that are essential to maintain physical health and to moderately participate in community activities.
- Cost of a basket for a family of four
 - Food (nutritious food basket of Health Canada)
 - Clothing (Winnipeg social planning council clothing basket)
 - Shelter (average of median rent of 2 or 3 bedroom apartment with appliances)
 - Transportation (public transit in cities, car in rural)
 - Multiplier for other expenditures



MBM

- MBM for Ontario in 2004 for a family of four (2 adults and 2 children).

Rural	26,745
<30K	26,846
30K - 100K	24,809
100K - 500K	26,194
Ottawa	28,203
Hamilton/ Burlington	25,778
Toronto	30,121



MBM

- MBM thresholds are available from 2000. Latest is 2006.
- Other family size can be derived by adjusting the above thresholds with the LIM equivalent scales.
- The income concept to be used to determine low-income status under MBM is disposable income: after-tax income minus social contributions, alimony, child care expenses, out-of-pocket medical expenses.



MBM

- In 2004, a family of 4 lived in Toronto with less than \$30,121 of disposable income is said to be live in low income under MBM.
- But were the same family lived in Ottawa in 2004, it would be lived in low-income if its disposable income was below \$28,203.



Some strengths/weakness of the lines

- LICO has the longest history and widely accepted, but has low transparency, and may become irrelevant over time.
- LIM is the most suitable for international comparison, adopted by many European countries, as well as by the Ontario anti-poverty legislation; but it has little regional variation.
- MBM best reflects regional variation of costs of living among the three lines, but it is subject to many arbitrary choices and is very costly to produce.



Note

- The views expressed here are those of the author's, they do not necessarily reflect of those of STC and the Government of Canada.

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