

Measuring Income Insecurity: Analysis of Income Data from the United States, Britain and Germany*

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Abstract

This paper seeks to measure and compare income insecurity in the United States, Great Britain and Germany using household income data from the Cross National Equivalence File (CNEF). As definitive techniques for measuring insecurity are yet to be established we present an explorative methodology based upon the volatility of incomes. Though imperfect, the method is well established in the fields of decision theory and inequality measurement and captures some important aspects of what may constitute income insecurity. Applying this technique we find that insecurity in the United States from 1990 to 2005 was substantially higher than in Great Britain and Germany, which were roughly comparable in several respects. We also measure the extent to which governmental taxes and transfers absorbed household insecurity and find that all three governments insulated households from similar levels in absolute terms. In relative terms however the German government absorbed around 80% of measured insecurity, the British government around 75% and the United States government less than 45%. Lastly we investigate the joint distribution of income insecurity and income and find that it was predominantly distributed amongst lower income earners for Britain and Germany, while in the United States it follows a distinct ‘U’ shape with very high insecurity levels for low and high income earners and lower insecurity levels for middle income earners. We argue that the distribution of insecurity has important implications for welfare and inequality.

1 Introduction

There has been a recent focus in the academic literature on the issue of economic insecurity. While the term is still new enough to lack a formal definition,

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