

# GROWTH AND DEVELOPMENT

with special reference to  
developing economies

A. P. THIRLWALI

Third Edition

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**Third Edition**

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# Preface to the Third Edition

Since *Growth and Development* was first published in 1972 it has been widely used as a text for courses in economic growth and development in both developed and developing countries. In 1978 a second edition was published, and it also became an English Language Book Society edition for subsidised distribution by the British Council in several countries. In this third edition, substantial revisions have been made to add to, and update, statistics, to include new institutional material, and to improve on the exposition to aid students and teachers alike. To this end, specimen questions for discussion and review have also been added at the end of each chapter.

The purpose of the book remains the same: to introduce students to the exciting and challenging subject of development economics, which draws on several branches of economics in order to elucidate and understand the development difficulties facing the economies of the world's poor countries. This does not mean that the book provides a recipe or blue-print for development: far from it. There can be no general recipes of this nature, and even if there were there would have to be more than economic ingredients.

The book combines description and analysis, with an emphasis on the elaboration of simple and useful theoretical economic models for an understanding of the issues that comprise the subject-matter of development economics. I make no apology for the use of conventional economic theory. I concur with Theodore Schultz, the Nobel-Prize-winning economist, who has said of development economics:

This branch of economics has suffered from several intellectual mistakes. The major mistake has been the presumption that standard economic theory is inadequate for understanding low-income countries and that a separate economic theory is needed. Models for this purpose were widely acclaimed until it became evident that they were at best intellectual curiosities. The reaction of some economists was to turn to cultural and social explanations for the alleged poor economic performance of low income countries. Quite understandably, cultural and behavioural scholars are uneasy about this use of their studies. Fortunately the intellectual tide has begun to turn. Increasing numbers of economists have come to realise that standard economic theory is just as applicable to scarcity problems that confront low income countries as to the corresponding problems of high income countries.<sup>1</sup>

This is not to say, of course, that all standard theory is useful and relevant for an understanding

<sup>1</sup>T. W. Schultz, 'The Economics of Being Poor', *Journal of Political Economy*, August 1980.

of the development process. I particularly cast doubt myself on the relevance of equilibrium theory. Nor am I denying the importance of non-economic factors in the growth and development process. The fact is, however, that the desire for material improvement in developing countries is very strong, and economics does have something positive to offer by way of analysis unadulterated by political, sociological and other non-economic variables. In the final analysis growth and development must be considered an economic process in the important practical sense that it is unlikely to proceed very far in the absence of an increase in the quantity and quality of the resources available for production. The book lays particular emphasis on the economic obstacles to development and the economic means by which developing countries may raise their rate of growth of output and living standards.

For those new to the book, or for those now using the second edition, I outline below the main contents of each chapter and the changes introduced into the third edition.

Chapter 1 portrays various dimensions of the development gap between rich and poor countries, and includes sections on income distribution, urban unemployment, nutrition, health and education. In this new edition there is a discussion of the call for a New International Economic Order and of the recent Brandt Commission Report, as well as of the new basic-needs approach to development adopted by the World Bank.

Chapter 2 is on the production-function approach to the measurement of the sources of growth. This chapter stays unchanged, except that it is stressed more directly than hitherto that the approach cannot tell us *why* factor supplies and productivity grow at different rates between countries. The production-function approach is essentially a supply-orientated approach to growth which treats the supply of factors of production as exogenous to an economic system. In practice, growth is likely to be demand-constrained, particularly by the balance of payments in an open economy, and factor supplies are likely to be endogenous to an economic system. Given the growth of output permitted by demand, however, it is interesting to apportion this growth between quantity and quality improvements in the various factors of production on the one hand and technical progress on the other.

Chapter 3 deals with the role of agriculture and surplus labour in the development process. Particular attention is paid to the influential Lewis model of economic development with unlimited supplies of labour. In a new section there is now a more explicit treatment, following on from Lewis, of the interaction and complementarity between agriculture and industry, with a number of interesting insights concerning the importance of the terms of trade and demand expansion from agriculture as a stimulus to industrial growth.

Chapter 4 is on the role of capital accumulation and technical progress in the development process, and remains unchanged.

Chapter 5 is on dualism and Myrdal's concept of the process of circular and cumulative causation. This chapter describes the various mechanisms by which economic divisions between regions and countries tend to be perpetuated and widened. The chapter is extended to include the early centre-periphery models of Prebisch and Seers, and the views of Marxist writers, including Emmanuel's model of unequal exchange.

Chapter 6 is on population and development and attempts to evaluate the debate on whether population expansion is a growth-inducing or retarding force. More attention is devoted to the work of Enke and to the recent work of Simon.

Part IV of the book (on planning, the allocation of resources and the choice of techniques) has been completely reorganised and rewritten. There are now separate chapters on social cost-benefit analysis and the choice of techniques.

Chapter 7 is on the case for planning and raises some of the broader issues of development strategy, including early discussion of investment criteria.

Chapter 8 is devoted exclusively to social cost-benefit analysis, comparing the approaches of Little and Mirrlees on the one hand and the United Nations on the other. This chapter has a

lengthy discussion of the determination of the shadow wage and absorbs chapter 11 of the second edition.

Chapter 9 is concerned with the choice of techniques and with the potential conflicts involved in moving towards the use of more labour-intensive techniques: between employment and output on the one hand, and between employment and saving on the other. The role played by the multinational corporations in dictating technological choice is also examined.

Chapter 10 introduces the student to the technique of input-output analysis and its role in planning and forecasting. The chapter has been extended to show the use of input-output analysis not only for forecasting output and import requirements but also labour and capital requirements.

Chapter 11 gives an elementary exposition of the technique of linear programming.

Chapter 12 turns to the finance of development from domestic resources and includes extensive discussion of the various means to raise the level of saving, including forced saving through inflation. As well as consideration of the role of monetary policy, there is an extended discussion of tax policy, and of tax reform on lines suggested by Kaldor from his various tax missions to developing countries.

Chapter 13 looks at the finance of development from external resources, and the debt-servicing problems created by foreign borrowing. The concept of dual-gap analysis is introduced with an empirical case study of the Sudan. All the statistics relating to foreign resource flows have been updated to 1980 or 1981. There is more discussion than previously of the activities of the World Bank and of the role of private foreign investment, and the whole aid debate is reviewed.

Chapter 14 is devoted to the topic of trade and development. The gains from trade are thoroughly explored, as are the ways in which the present pattern of trade works to the relative disadvantage of developing countries. The tendency for the terms of trade to deteriorate, and for balance-of-payments difficulties to arise, is stressed. The case for protection, and the relative merits of import substitution and export promotion, are examined.

Chapter 15 is a new chapter on the balance of payments and development to allow for full discussion of the important concept of balance-of-payments constrained growth and the various policy responses to this constraint at the national and international level. The latter involves a consideration of the extensive facilities afforded by the International Monetary Fund for balance-of-payments support. Some of the criticisms levelled at the IMF are also briefly considered, including the relevance of devaluation. The old chapter 15 on special drawing rights is integrated into this new chapter as a potential form of international assistance to developing countries.

By the time the fourth edition of this book becomes due in 1988, the facts pertaining to developing countries will again be out of date, and no doubt there will have been new institutional changes and new innovations in thinking about development strategy. To keep abreast with what is going on students are encouraged to consult such publications as the *World Development Report* and *Finance and Development* (published quarterly in several different languages by the IMF and World Bank), and journals such as *World Development*, *Journal of Development Studies*, *Journal of Development Economics*, and *Economic Development and Cultural Change*.

I am deeply grateful to Hilary Daly and Janet Bates for preparing the manuscript for this new edition, and to Lawrence Thirlwall for checking the tables.

Canterbury, January 1983

A. P. THIRLWALL

*The First Law of Development*

'For unto everyone that hath shall be given  
and he shall have abundance, but from him  
that hath not shall be taken away even that  
which he hath.'

(MATTHEW 25: 29)

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## **PART I**

# **Introduction**



## Chapter 1

# Development and Underdevelopment

### **Current interest in development economics**

Current academic interest in development economics, and the study of development economics as a separate subject, are relatively recent phenomena. For the student today it will be difficult to appreciate that as recently as thirty years ago a course in development economics was a rare feature of an undergraduate programme in economics, and that textbooks on economic development were few and far between. Today no self-respecting department of economics is without a course in economic development; there are scores of texts; hundreds of case studies; and thousands of articles on the subject. And, as in medicine, the perceived ills seem to multiply as the diagnosis deepens.

The political and public concern with the poorer nations of the world is of equally recent origin. The majority of the national and international bodies to promote development that exist today, such as national development banks, the World Bank and its affiliates, and agencies of the United Nations, have all been established since the Second World War. Before the war, when most of today's poor countries were still colonies, there was very little preoccupation with the economic and social problems of the developing (dependent) economies that we are concerned with today. Perhaps the facts were not so well known, or perhaps it was that the attention of most people was focused on the depression and underemployment in the developed countries. Whatever the reason for neglect, the situation today is very different. The development of the Third World (the collective name for the developing countries), meaning above all the eradication of primary poverty, is now regarded as one of the greatest social and economic challenges facing mankind.

What accounts for this change in attitude and upsurge of interest in the economics of development and in the economies of poor countries? A number of factors can be pinpointed, which interrelate with each other. First, in the wake of the great depression and in the aftermath of war there was a renewed academic interest among professional economists in the growth and development process and in the theory and practice of planning. Second, the poor countries themselves have become increasingly aware of their own backwardness, which has led to a natural desire for more rapid economic progress. The absolute numbers of poor people are considerably greater now than in the past, which has struck a humanitarian chord. Third, there has been a growing recognition by all concerned of the mutual interdependence of the world economy. The political and military ramifications and dangers of a world divided into rich and poor countries are far more serious now than they were in the past; at the same time the Cold War has led the major developed countries to show a growing economic and political interest in poor and ideologically uncommitted nations.

The recognition of interdependence has been heightened in recent years by fears of shortages of basic raw materials produced primarily in Third World countries, and by the rising price of oil.

## Academic interest in development

Academic interest in the mechanics of growth and development is a *renewed* interest rather than a new preoccupation of economists. The progress and material well-being of men and nations have traditionally been at the centre of economic writing and enquiry. It constituted one of the major areas of interest of the classical economists. Adam Smith, David Ricardo, Thomas Malthus, John Stuart Mill and Karl Marx all dealt at some length (with divergent opinions on many issues) with the causes and consequences of economic advance. It is entirely natural that thinkers of the day should comment on the contemporary scene, and there is perhaps an analogy here between the preoccupation of the classical economists at the time of Britain's industrial revolution and the concern of many economists today with the economics of development and world poverty, the nature of which has been brought to the attention of the world so dramatically in recent decades. Development also represents a challenge equivalent to that of depression and mass unemployment in the 1930s which attracted so many brilliant minds to economics, Keynes among them. But the nature of the challenge is of course very different. In the case of unemployment in the 1930s, there was an orthodox theory with which to grapple, the task was to formulate a theory to fit the facts and to offer policy prescriptions. As it turned out, the solution to the problem was to be costless: expand demand by creating credit and bring idle resources into play. Fancy, an economic problem solved costlessly! The challenge of development is very different. There is no divorce between theory and the observed facts. The mainsprings of growth and development are well known: increases in the quantity and quality of resources of all kinds. Countries are poor because they lack resources or the willingness and ability to bring them into use. The problems posed by underdevelopment cannot be solved costlessly. It would be reassuring to think, however, that advances in growth theory, coupled with more detailed knowledge of the sources of growth, and the refinement of techniques for planning and resource allocation, have all increased the possibility of more rapid economic progress than hitherto. Certainly particular theoretical models and techniques have been used extensively in some countries, presumably in this belief. For example, models for calculating investment requirements to achieve a target rate of growth invariably form an integral part of a development plan, and in some countries there have been experiments in recent years with such techniques as input-output analysis, for the achievement of sectoral balance and the avoidance of bottlenecks, and linear programming for the achievement of efficient resource allocation.

The question is often posed as to what lessons, if any, the present developing countries can draw from the first-hand observations of the classical writers, or more directly from the development experience of the present advanced nations. One obvious lesson is that while development can be regarded as a natural phenomenon, it is also a lengthy process, at least left to itself. It is easy to forget that it took Europe the best part of three centuries to progress from a subsistence state to economic maturity. Much of development economics is concerned with the time scale of development, and how to speed up the process of development without causing problems as acute and worrisome as the primary poverty it is desired to alleviate. In the next millennium, when primary poverty in most countries will, it is hoped, have been eradicated, courses in development economics will undoubtedly take a different form. The emphasis will be on inter-country comparisons, rather than on the process of development as such and the growth pains accompanying the transition from a primarily agrarian to an industrial economy.

As far as classical theory is concerned, the gloomy prognostication of Ricardo, Malthus and Mill that progress will end ultimately in stagnation would seem to be unfounded. It has certainly been confounded by experience. Population growth and diminishing returns have not been uni-