

ECONOMY

A More Viable Approach

Carl Jacob

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I am indebted to those who have contributed to this book.
Their constructive comments are appreciated.

PREFACE

When I studied at the university in the 1970's I developed an interest in *system dynamics* – an area of mathematics that also had wide applications such as ecology, sociology and economics, and gave me a broader perspective. I was concerned with the relentless trends in economic policy and business. Already before my time, a number of people had voiced similar misgivings in these and other similar important areas; but few heeded the warnings. There was a general denial, wishful thinking, vested interests and ignorance; many scientists asserted that there was 'no [conclusive] evidence'; and the vast majority simply continued their activities regardless.

Inevitably the emerging consequences confirm the original good instinctive insight, and are now hitting us with increasing force. Should we really be surprised?

OUR THINKING MUST CHANGE!

This book outlines a modified, more rational and viable approach to economics that is aimed at every levels of society from the individual to the global. It is not directed at any specific country. It is about survival and prosperity with a civilised view and a better quality of life overall, especially in the medium-to-longer-term, rather than focusing mainly on the day-to-day fluctuations. It is also about intelligent development, instead of escalating the damaging existing system. Greed, wasteful consumerism and irresponsibility must be reduced substantially, and those who have power and influence need to widen their interests and concerns for the benefit of all, not only for selected groups.

This is not an academic textbook. It is rather a simplified map that could be more easily navigated, and where some of the dangers may be identified. It is also an attitude or a philosophy. Several significant aspects in the economy are addressed. My responses are intended to be practical and constructive. The writing is not esoteric but 'common sense', and in the interests of readability the use of abstract high-level concepts and specialised terminology has been kept to the minimum.

Any book on this subject tends to be dry and hardly entertaining. However this one is highly relevant, especially in the context of these times. *Economics* extends far beyond the concept of money and commercial exchange, into the areas of other limited resources and outcomes that are difficult to measure in monetary terms, but are nevertheless vital. If you only want to make lots of money, this book is not for you.

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CONTENTS

PREFACE (above)

INTRODUCTION

1. PRODUCTION, MONEY INCOME AND EXCHANGE

Production – The Production System – The Factors of Production – The Acquisition of Money Income – Money Income Distribution – The Circular Flow of Money Income and Exchange

2. SAVING AND THE MONEY FLOW

The Economic Problem of Saving – Re-injecting Savings into the Economy – The Problem of Preserving the Value of Savings – The Productive and the Speculative Sectors – Natural Differences in Incomes and Saving – The Widening Range of Incomes

3. INVESTMENT

Definition of Investment – Consumption and Investment – Money Injection versus Investment – Capital and Political Philosophies – Capital is Complementary – The Stock Market – Investment Revisited – A Realistic View on Financial and Non-financial Return – Destructive Investments – Income Distributions and Investment – Wealth

4. LAND AND NATURAL RESOURCES

Land Possession and Tenure – Land Speculation – Some Attempts to Control Land Speculation – Housing – Natural Resources – Energy Sources

5. ENTERPRISE AND BUSINESS SURVIVAL

Business Viability – Post-Commitment Exploitation – Insurance – The Relationship between Usage and Payment – Corporate Ethics – Competition and Monopoly – Economic Policy and Enterprise

6. TECHNOLOGICAL CAPITAL, SYSTEMS AND EFFICIENCY

Technology and Progress – Limitations and Problems – Some Problems of the Electronic Age – Efficiency – Communication, Access and Responsibility – Further Developments

7. WORK AND EMPLOYMENT

Natural Preferences and Necessities – A Definition of Work – Qualifications and Politics – Unemployment – The Need for an Incomes Policy – Complementary Support – Shortages of Skills

8. CURRENCY

Basic Function and Purpose of Currency – The Nature of Money – Availability and Supply of Money – Controlling the Availability of Money – Variable Interest Rates – The Banking System – Wealth and the Financial System

9. GOVERNMENT

The Limitations of Law – The Economic Role of Government – Market Forces and Unrestricted Income – Active Government Involvement in Businesses – Government Income and Taxation – Expenditure and Social Security – Some Dilemmas in Balancing the Budget – Crisis Management

10. THE MANAGEMENT OF INTERNAL ECONOMIC ACTIVITY

Productive Activity – Fiscal Policy – Monetary Policy – Fluctuations and Cycles

11. FOREIGN TRADE

Globalisation – Independence and Interdependence – International Trade and Foreign Interaction – Flexible Exchange Rates and Interest Rates – Foreign Investment – On-going Debates, Optimistic Scenarios and Language – Offshoring and Importing – Protection – A Realistic Foreign Trade Policy – National Security

12. DEVELOPMENT

Some Essentials for Internal Economic Development – The Need for Balance – Mistakes in Borrowing by Underdeveloped Countries – Foreign Aid and Required Evidence – Preventive Measures – Enterprise and the Market Economy – The Fallacy of Simplistic Comparisons – In the Final Analysis

13. SUSTAINABILITY AND THE ENVIRONMENT

The Global Environment Crisis – Growth – Exponential Multiplied – The Problem of Over-Usage, Waste and Pollution – Human Nature, Economic Systems and the Environment – A Different View and Policy

Appendix 1: MICRO-ECONOMICS

A Brief Review of Basic Market Relationships and Exchange

Appendix 2: PERSONAL ECONOMICS

Some Principles of Personal Economics – The Matter of Trust – Relativity – Wastage at the Personal Level – Poverty – Viability – Personal Values

INTRODUCTION

The Current Scene

Economy has existed since the dawn of humankind, and as culture evolved, the sense of economy developed along with it; however, the study of '*economics*' only became more formalised after Adam Smith, *The Wealth of Nations*, 1776.

At the start of the industrial revolution prior to 1800 the world population was around one billion. Towards the current era there was an accelerated development and complexity in production and commerce. Now we have over eight billion people; we are at the nuclear, information, electronic, high-technology era and have started to explore the solar system. Today most people may celebrate the benefits of modern technology, more comprehensive ease of communication, and the growth of rapid transport and mobility. On the other hand there can be misgivings on globalisation, outsourcing, and growing interdependence and a decrease of personal independence, more and larger international corporations, intangible currency without inherent value, the volume and complexity of law and bureaucracy and more need for insurance. These may be the price of progress, and their benefits and drawbacks can be argued according to the circumstances.

However, there are also a number of *highly damaging trends*.

Among them are

- The growing range of incomes and its inevitable consequences at the lower socio-economic levels
- The relentless escalation of personal demands, speed, pressure, stress, information overload and ever increasing uncertainty
- The increased difficulty to repair items, which is conducive to a 'throw away' mentality
- The cumulative negative impact on our environment, pollution and sustainability

People have become obsessed with prices, interests, dividends, shares, wages, income, expenditure, superannuation and exchange rates ... as if money measures and statistics are the essence of economies. These are only the visible effects that touch the lives of most people. To understand what is happening, one must look deeper within the basic fundamentals.

OVERVIEW AND STRUCTURE OF THE BOOK

The first three chapters are largely descriptive of the overall national economy, but with a deliberately simplified perspective.

- In chapter one, we explain the nature of **production** and its essential flows and outcomes, and emphasise the interdependent, interactive and cooperative nature of its major factors or elements.
- Chapter two considers the problem of **saving and the money flow**, talks about preserving the essential outcomes when necessary or desirable, and at the same time, maintaining the production system itself.
- Chapter three is focused on **investment**, namely developing and expanding further possibilities.

Chapters four through to chapter nine, each deal with the **major factors of production** more specifically. The material tends to be topical and not intended to be comprehensive.

The last four chapters deal with a number of broader relevant issues that can have considerable long-term consequences.

- Chapter ten looks at the way we try to **control the two major internal flows** of the economy in the face of internal fluctuations.
- We then discuss our **foreign trade** with the aim of supplementing and enhancing the lifestyle of the community in chapter eleven, and try to balance the intakes and outflows of the whole system.
- In chapter twelve, the objective is to assist the **development of other communities** to overcome their own difficulties.
- The final chapter, thirteen, considers the longer realistic perspective particularly with respect to **sustainability and the environment**.

The two appendices, *Micro-Economics* and *Personal Economics*, are supplementary for the reader's interest.

THE UNDERLYING THEME

The Economic System

Unlike purely natural systems, economic commercial systems are largely human-made, and continue to change because of political, legal and financial factors as well as developments in technology. Business conscience is relatively narrow and dominated by self-interests, and individual firms operate relatively independently with considerable latitude. As a result there are lags, chain-reactions and so on, with the result that the overall factors of production are rarely in perfect equilibrium. The consequences are that the economy as a whole is inherently unstable and must be *steered, managed and controlled* to ensure that undesirable trends and extreme tendencies would be averted. This overall role involves more than adhocery, allocating money and balancing short-term sectional interests: Government conscience must be wider, deeper and longer, so that it is conducive towards *individual* and *collective* survival and development.

A Pathway towards a More Viable System

Firstly, we need an attitude of greater moderation and effective balance at international *and* local levels. When several important elements are allowed to shift towards extremes they can threaten the viability of the whole system.

Secondly, all of our economic principles, maxims and assumptions must be questioned as to 'why' and 'for whose benefit'. Several areas of current policies need to be reconsidered, and may require other approaches including the new and those previously discarded. Critical discernment is needed.

Thirdly, our primary aim must be to care for *all* people and the whole system rather than only for selected groups. Power and freedom cannot be divorced from total integrity and responsibility, and the role of governing must be helpful at every level – not just superimposed remotely from the top.

Chapter 1

PRODUCTION, MONEY INCOME AND EXCHANGE

The most vital element in any economy is production, for without it there could not be an economy at all.

PRODUCTION

Production can be defined as any contribution to goods and services that have a want-satisfying ability. It is the key to prosperity and the central 'force' in any economic system. However, *production is not an end in itself.* Our deeper concern should always be the benefits of the individual person and all of society. Production *ought* to make positive contributions to human well-being. Unfortunately often it is used for limited aims disregarding any wider side-effects. In this chapter we only focus on the broadest definition of production. In later chapters some more specific qualities of production will need to be considered.

THE PRODUCTION SYSTEM

In any modern economy there are two major important flows. The first is the flow of practical factors of **production** from nature, technology and peoples' skills to create specialised goods and services. The second is the flow of **money income** that moves in the opposite direction in **exchange** for the productive contributions. The money income will then again be exchanged for other goods and services according to their needs and preferences, and the remainder will be saved. Initially we will assume that most prices are stable. The two major flows can now be examined in more detail.

THE FACTORS OF PRODUCTION

For the first major flow, every **Factors of Production** depending in its purpose must have its necessary inputs to function effectively. The **contributors** must supply these inputs. These can be grouped as below:

- **Natural Resources:** Land (space to produce); Environment (suitable natural conditions); Raw materials; Natural energy sources
- **Enterprise:** Acceptance of risk; Incentive or motive; Organisation and planning; Opportunity (Markets); Special Information, (Intelligence, Research, Forecasting, etc.);
- **Technology and Capital:** Know-how; Patents; Equipment and tools; Infrastructure (buildings, roads, power etc.);

- **Work:** Personal energy (Physical or mental labour); Skills, Education and training; Time
- **Currency:** Money such as Transferable accounts, Cash, Credit
- **Government:** Essential public infrastructure and services; Predictable social processes; Safeguards from exploitation; Law, Standards, Order and National Security; Licences

The flow of practical *production* starts with the **Contributors'** efforts through the **Factors of Production** resulting in the finished **Good or Service** at the end, where it is delivered to the **User**.

These factors are divided for convenience and clarity, but in practice they overlap and are not generally mutually exclusive. Traditionally, government was not seen as a factor of production, but as an overall controller rather than a participant. While that may be true in some respects, they *all interact* to make a given level of productive activity possible: Each factor requires all the necessary inputs from the others; each must be paid in the course of production; and a shortage or deficiency in any of them can place restraints on the others' activities. When two or more factors co-operate, their contributions cannot be separated by simple arithmetic: Co-operation and interaction has a power of its own beyond the sum of the isolated capabilities of the separate parts.

THE ACQUISITION OF MONEY INCOME

The second flow, namely that of **money income**, moves *approximately at the same rate and time*, but in the *opposite direction*. Money income moves from the **User**, to the **Good- or Service** 'deliverer', then to the **Factors of Production**, and finally to their **Contributors**.

In general terms, the *contributors'* money income can be acquired through their input through any of these factors of production –

- The holders of *land and other natural resources* are paid **rent** (including 'royalties' etc.)
- The reward or income of *enterprise* may be seen as **profit**
- The owner of *technology* and *capital* as **dividends**.
- The suppliers of *work* (skill, labour, personal time) earn **wages** (salaries, bonuses etc.)
- The lender of *currency* earns **interest**.
- The *Government* factor is paid in the form of **tax**.

Again, these are not strictly distinct but tend to overlap to some degree. The 'government' means the collection of all people receiving their incomes through the tax system (e.g. police, defence, etc.) We can think of people who receive government payments without working, as dependants of the government.

MONEY INCOME DISTRIBUTION

Money income does not have a fixed relationship with production. The exchange is subject to personal negotiable agreement in amount and timing. The transaction can be 'before', 'on' or 'after' the delivery of the goods or services.

The part of total income that each factor receives depends on the development of the productive system and the relative additional contribution for the factor in the circumstances. Other relevant components such as the state of the market (competition, oligopoly etc.), the type of government, taxation, trade unionism and others also have an important impact. For example, depending on the degree of socialism there may be more emphasis on wages or tax; under free enterprise the total money income contains more profit, dividends and interest.

THE CIRCULAR FLOW OF MONEY INCOME AND EXCHANGE

A market-oriented economy is driven by wants (natural and through education, advertising and persuasion!) and exchange. A person earns his *money income* through his contribution in the productive system, and then spends (part of) the income for other goods and services that he *wants* which is provided by others. This spending becomes part of another person's *money income* in the next round, and so on. The *exchange* process involves two steps – goods and services exchanged for money, and then money for further wants from other sources, which of course makes the exchange infinitely more flexible and convenient. In this respect, money is only a very useful *medium*, lubricant or catalyst.

The relationship is very basic. It is the added requirements and 'fine tuning' that make the relationships increasingly complicated – relative legal power; the retention of part of our income for tax, insurances, fees, additional conditional rights and obligations. Appendix 1: *Micro-economics* gives a brief summary of basic market relationships and exchange.

What happens when part of the money income is not spent but 'saved'? This will be addressed in the next chapter.

Chapter 2

SAVING AND THE MONEY INCOME FLOW

In theory the whole community's income could be spent on purchasing its production, which in turn becomes the income for the next round of production, and so on indefinitely. In reality however, only part of their money income will be spent, and a proportion would be retained as saving. As a result, there would be less income available for the next round of income, employment and production. If the pattern of saving continues, production would continue to decline. To prevent this downward spiral there must also be a continuous injection of new money to sustain employment, production and income. The new injection could come from borrowing, money investment and transfers from previously idle money. This is largely a simplification of reality, but it illustrates the overall principle.

THE ECONOMIC PROBLEM OF SAVING

Saving is possible because some people have a surplus of income after their wants have been satisfied, at least in the short term. When saving takes place, ideally, productive activity should fall to the level that meets total wants, but because of specialisation and interdependence the system does not work that way. When savers don't spend, *other* producers are deprived of income and cannot buy necessary goods and services, leading to a chain reaction that result in a much larger decline in activity and employment in areas different from which the original saver earned his income. Thus the natural effect of saving by one person is to reduce the *whole flow of money* into the productive system, while the productive activity of the original saver does not necessarily decrease.

For the level of activity to be maintained, any reduction in money income flow into the productive sector due to money-saving must be balanced by new injections. Part of this replenishment comes from other sources: –

RE-INJECTING SAVINGS INTO THE ECONOMY

Beyond spending for necessities, commitments, obligations and items such as entertainment, hobbies, donations and the like, the remainder of income can be regarded as 'surplus' or savings, which can be stored in a variety of forms

- Purchasing non-productive assets, e.g. land, valuables,
- Purchasing productive assets, e.g. newly issued shares in the stock market, properties, superannuation contributions, life insurance schemes, bonds and debentures
- Lending directly or through banks

- Put into a hidden safe for ready security (completely idle) or locked into the speculative system

For all of these choices the money-savings can be re-injected into the productive sector of the economy, except the last (i.e. keeping it locked up and hidden). Thus overall, the mechanism appears to be very convenient for all parties and good for maintaining the level of Economic activity. In fact, the first two options involve converting the money savings into other tangible forms of wealth that would (hopefully) maintain their value or generate even more income.

Retaining some money idle for flexibility, security, opportunity or speculation, does not damage the economy provided the amount is moderate and the store is reasonably constant. Assuming prices are stable, ***the critical matter is the rate at which the money is withdrawn from the productive sector (i.e. saving) compared with the rate at which money is re-injected***, rather than the amount of unused money lying around. As in an engine, the oil in the machinery is more important than the idle oil in the sump (as long as both are enough and stable). While these overall principles are basically sound in theory, in reality there are several limitations below:

THE PROBLEM OF PRESERVING THE VALUE OF SAVINGS

There must be legitimate avenues for accumulating and storing wealth, otherwise much of the saved money-income would not get back into circulation.

The suitability of an item for 'storing savings purposes' as the term is used here, is controlled by several variables such as durability, scarcity and ongoing demand. The only item that in general appeared to have an indefinite useful life is land, and even this can be disputed (e.g. if the land is polluted). Buying and holding unimproved land for speculation when it is becoming scarce is unethical and may also be unlawful. However any genuine improvements in the land can be regarded as legitimate. Some items of jewellery may have an indefinite life and may even be rare, but are not necessarily useful. Productive investments can reap a profit, but there is also an inherent risk. Certainly, nearly all human-made items deteriorate or become obsolescent in time. They can be reconverted into money, but none of these items are worth anything unless other people are willing and able to buy them. Like all of our wealth, the preservation and eventual retrieval of our non-financial 'savings' is problematic. There can be a risk of partial or total loss; there may be on-going maintenance costs; there may be deterioration or obsolescence; changes in market conditions, and so on.

At the lowest levels of profitability and risk, the money savings could have been deposited into a saving account at a moderate rate of interest that might offset inflation; more attractive rates were for offered in fixed terms. However, most banks are now public corporate companies and the profits are diverted

to the shareholders. Consequently the earnings in saving accounts are very small.

A modest amount of money savings *can* be useful in the short term as pointed out previously, but its value tends to decline more rapidly by inflation. High inflation overall could be seen as undesirable for several good reasons, and governments try to control it as far as possible; but low inflation can be useful by encouraging people to convert larger amounts of idle money into other forms of wealth, and get the money back into circulation.

THE PRODUCTIVE AND THE SPECULATIVE SECTORS

The *productive sector* of the economy is the part where the factors of production combine and interact to produce goods and services. Every transaction in the economy involves a 'value added' component plus a pre-existing component. For example, in its price, the sale of a garment by a tailor includes his own work, which is value added or 'new production', plus all the earlier stages of producing the materials and delivering them to the point where he can make his contribution. The further the transaction from the initial primary producer generally the more money is needed to transact it because of the 'added production and value' of the item; naturally, it is then divided to the respective factors.

In a number of cases, however, very large quantities of money can be occupied making repeated transactions that involve no additional production whatsoever. The *speculative sector* is the 'market' where relatively scarce 'assets' are repeatedly bought and resold, but contain no 'value added' in each transaction. Their prices are generally expected to have an upward trend. Land and collectables tend to fall into this category. The other instance is where buyers expect a windfall profit from a further increase in price at least in the short term such as when playing the stock market. Except where the original shares are issued, the stock market is part of the speculative sector. The onward buying and selling of shares can be like a game in which the stakes may range to millions of dollars as the money is moved from one source to another for advantages in expected trends; however, in the medium-term the overall outcome may be closer to a 'zero-sum' contest for the participants in normal situations. Lotteries and casinos might also be considered as part of the speculative sector. The second-hand market may have some similarities, but it is usually not speculative because their prices generally have a downward trend.

It is difficult to estimate how much of income is diverted to the speculative sector, but to the extent that it is locked in there, it can deprive the productive sector if it is siphoned from the flow of income and not compensated by other new injections.

NATURAL DIFFERENCES IN MONEY INCOMES AND SAVINGS

Why personal money incomes vary

As in all areas of the natural world, those who are cleverer, quicker, healthier, talented, physically and mentally fitter are comparatively fewer than the large majority. Because these people are more needed, they face less competition and have more sway to set their own terms. Those who understand the financial and taxation systems also benefit – ethically and otherwise. In general the result is that their incomes move *upwards*.

At the lower occupation levels, entry is easier, requirements are less stringent and achieving qualifications are less expensive; but people face more competition owing to relative abundance and greater threats from technology. Consequently, the incomes are mostly driven *downwards* in tangible or 'real' terms.

It is known that a ***person with a higher income will generally save a higher proportion of their income than a person with a lower income.*** As a result the people with the higher savings rate acquire more wealth, more flexibility and *can* expand the productive capital. It is neither realistic nor desirable for incomes to be uniform as incentive would suffer.

THE WIDENING RANGE OF MONEY INCOMES

As in all systems, there is a serious danger when operating at the extremes and possibly 'out of control'. In a dominantly democratic capitalist 'free enterprise' system –

- The business owners invariably have the balance of ***power, the initiative and the drive.*** Mostly the motive is to maximise their income.
- The average lower level employees are ***decision recipients.*** The union movement has succeeded in increasing the average wages, but only at the expense of reducing the total number of workers and importing cheaper non-union labour. Outsourcing and technology have also weakened its position. Therefore total income at that level is still restrained.
- Government almost invariably is ***reactive*** rather than proactive in the area of business; and it is further weakened by the powerful business influences that support the government. There is often also a lack of effective local business competition; the time lag between an item's availability in the market and any eventual legislation; and a lack of discernment in open door policies. Furthermore, the endeavour to control inflation must also suppress the incomes at the lower levels to reduce costs.

In simple terms, given the expectations of the business owners, their necessary costs and their anticipated revenues, the remainder can be divided between the employees. If the number of employees is increased, the individual incomes must go down; if their incomes are increased, the number of employees must be reduced. If the overall costs (including expectations) cannot be controlled then prices must increase. Whichever way, the employer has the greater power and the lower level employee is at a disadvantage. However, with fewer remaining workers the latter would have even more pressure and stress. These are the realities.

When the higher level socio-income area has the licence to take as much as they want, while the incomes of the lower levels are constrained by whatever means possible, the result is the relentless widening gap of incomes.

The need for business incentive has been well recognised, but ***it is vital that the relative range of personal incomes should be limited to reasonable proportions.***

Quite apart from the increased social problems due to decadence and financial desperation, the increasing polarisation of incomes also leads to greater instability in the banking industry and financial markets: The upper socio-economic levels have *too much surplus savings* to invest, lend, store or divert to the more risky speculative sector, while the lower socio-economic levels become increasingly indebted. That leads to a higher rate of losses and bankruptcies. The overall result eventually becomes a disadvantage to *everyone*.

Chapter 3

INVESTMENT

In traditional elementary economic theory, to maintain the overall flow of money income, investment must equal savings. However in this context the term 'investment' only means 'money reinjection', which is all it is. True *investment* has a far broader and more meaningful economic and social significance.

DEFINITION OF INVESTMENT

Perhaps the most practical definition of an Investment is 'an input with the hope of reaping a reward'. As a concept it is widely applicable in the broadest sense, and is equally appropriate in the economic sphere. Overall, any input that results in a longer term net benefit can be seen as an *investment*, whether it is financial or not. Investment can be multidimensional.

Consumption and Investment

With all due respect to the traditional distinction, it is very difficult to allocate most items as '*either consumption or investment*' with any validity. Food has a very short functioning life span but is vital to sustaining the productive capacity of the physically mature individual and expanding that of the child. A house, a pair of shoes, a car or even a holiday, could increase the comfort or status, have a short-term want-satisfying ability and could also increase their owners' productive capacity. Every item can be *both consumption and investment* to different degrees. The concept of investment may be valuable, but the distinction between consumption and investment appears to be of limited usefulness.

MONEY INJECTION VERSUS INVESTMENT

From the economic point of view, there are two different types of inputs. First, there is *added money injection* into the circulation flow of the economy. This includes 'putting ones savings into' other terms such as buying existing shares in an already working company, existing property, and purchasing 'non-productive' assets, for example, vacant land, jewellery and artwork. They are just payments beyond what are normally on-going commitments and routine maintenance.

The second is *investment* that could be *financial or otherwise* with the aim of enhancing production or quality of life. These include the creation or adoption of items that generate longer term income or add possible benefits in many other dimensions.

To illustrate the distinction, if a person buys a valuable painting to preserve his savings and hides it, the money injected does not benefit anyone except to help the income flow. On the other hand, a new art-work that is donated to a gallery *is* an investment that can create pleasure to other people but may not add to the flow of money income. *Both* money injection *and* investment are vital for an economy. In many situations they coincide, but much financial injection is not investment and vice-versa.

CAPITAL AND POLITICAL PHILOSOPHIES

Capital may be defined as the human-made 'tools' of the productive system. It is one of the cornerstones of the modern advanced civilisation. From the economic point of view, investment can be seen as Capital Formation.

In a strictly socialist regime, capital is owned by the government on behalf of the whole community. The benefits are divided on the principle 'from whom the greater ability to the greater need'. However, the overall result is a massive personal disincentive such that the whole productive system is depressed. Initiative and capital are created by people with enthusiasm and self-interest, all of which were lacking. After almost a century this 'experiment' was abandoned by the formal USSR and largely even by China. This has been addressed by several prominent writers and I will not discuss it further.

In a strictly capitalist regime, capital is owned by the individual or the financial contributors (share-holders). The benefits are taken entirely by the owners. Since the major part of the productive system is becoming increasingly capitalist (by the nature of higher technology), the component of the total income increases, and when labour and capital interact, the wages component of the productive system is kept as small as possible. The ultimate scenario would be when the whole productive system consists only of capital and the output is shared only by the owners of the system. The social outcome would be a highly polarised range with the very rich minority and the large majority who were very poor. As the wealthy increasingly dominates the land and the resources, the growing poor are pushed further to the denser fringes until there is no further 'elsewhere'.

Today most developed countries have various combinations of socialist and capitalist economic policies with an increasing tendency towards the latter side.

Capital is Complementary

In almost all material work from the house-hold to highly technical manufacturing, the ***use of capital with a minimum input of appropriately skilled labour is usually far more productive and financially efficient than by hard labour with a minimum of capital.*** That is nothing new. There has always been a trend towards the development of labour-saving devices and more recently towards higher technology, robotics and automation – even in the service industries. In any sustainable economy,

there must be a full range of capital goods that can be personally, commercially and communally owned that are *complementary* to the human input of production. Nevertheless, in all of these activities, the human must be its master, the on-going monitor and evaluator, and must carry the responsibility.

Furthermore, as every occupation involves some capital, every item of material capital also requires human input, whether directly, remotely or periodically. From the production point of view, the required human proportion varies with the occupation and activity; but this human 'capital' not only requires its routine wages, but also needs investments such as education, fitness and training for longer term development.

THE STOCK MARKET

In the context of trying to preserve *and* use our savings, we have already discussed the economic necessity of *money reinjection*, and also *speculation*, in chapter two. The third area for our savings can be for *investment*, that is, to expand our production, income and development. The **stock market** is involved with all of these areas. It is a valuable, if not an essential, part of the capitalist system.

The stock market is complex, so I will only discuss some of the main features: People can buy **shares** (i.e. a part) of a public company at the current market price, and hope to have some regular **dividend** (related to profit). They can sell off some of their shares at the new market price, which may be higher or lower than when they had purchased them.

- In normal situations there is a *relationship between the current prices of the shares and their dividends*. If the profits (or dividends) rate of the company increases, the current share values will go up, and vice-versa.
- However, the relationship is not rigid. It is influenced by the base interest rate from the central bank, similar types of companies, market volatility and risk, local and foreign conditions, rumours, advertising, expectations and forecasts with expectations of increasing or falling profits, and other factors.
- The nominal values of people's shares fluctuate according to the current market.

In the event of a general recession, or a massive tariff against the local countries exports, the expected profits of those companies could be substantially reduced, and hence their shares will fall likewise. The outcome is that the 'wealth' of the shareholder has been reduced.

Superannuation is usually a combination (portfolio) of several types of shares from local and foreign companies, bonds, debentures and other financial instruments. A person's own superannuation account can vary from high-

growth-high-risk to low-growth-low-risk returns depending on the individual's motives. [See also chapter nine.]

INVESTMENT REVISITED

Investment is the process of creating and adding to *capital* for the purpose of contributing further production. Usually it could be seen as financial inputs that are voluntary and discretionary rather than contractual or obligatory; but in the broadest sense, investment is more than money outlay. It also includes personal time, effort, dedication, investigation, research, education and voluntary support, which often cannot be accounted in pecuniary terms. Respect for the whole environment, and ensuring an integrated society where no-one is involuntarily excluded, are only two of these factors that have been grossly neglected. All of these become very necessary investments in the longer term. Likewise, the expected 'rewards' can be financial but not necessarily or only.

What is not often appreciated with regard to capital and investment is the need for *balance, moderation and control* in the interests of the economy and society as a whole, not only for the short-run benefits of the capital owners. This includes both incentive and broader responsibility.

A REALISTIC VIEW ON FINANCIAL AND NON-FINANCIAL RETURN

From the economic point of view, '**the return on investment**' can be seen as the part of income from the *capital* part of the productive system: A person has invested something (financial and otherwise) and anticipates a reward. This could be in the form of financial income such as profit, rent, interest, dividends or any other type depending on the investment.

All firms – ranging from small sole traders to large multi-billion companies – were founded and largely maintained by their own or their contributors' investments. There are several outstandingly successful long-term ventures that were publicised in the media, but one rarely hears about the over ninety per-cent of small-to-medium businesses that close down within two years of starting.

Overall it is unrealistic for any investment to generate a positive financial return indefinitely. Material capital depreciates or becomes obsolescent; money capital devalues due to inflation and so on. If the investor is skilled and fortunate, his total benefits should be greater than his input and he would reap a satisfying 'profit'. At the other end he could lose his whole investment and even inherit debt. However in normal circumstances, if the person seeks competent advice and has moderate expectations, then on the average he should at least break even.

DESTRUCTIVE INVESTMENTS

I will not attempt to categorise all of the possible destructive 'investments'. They usually have one thing in common: The vast majority are oriented to profit in the narrow perspective at the expense and detriment of the broader community. As with production itself, not all 'investments' are beneficial. Many of these are well known such as the illegal narcotic and drug trade, the clandestine arms trade and prostitution with human trafficking. Some others are not illegal but nevertheless arguably unethical such as the tobacco industry that induces dependency and the proliferation of violence in the entertainment industry that encourages aggression.

However, there is another kind of investment that is also damaging, not because it is illegal or even necessarily unethical in itself, but in its degree: –

MONEY INCOME DISTRIBUTIONS AND INVESTMENT

Given the wider and growing income disparity overall, the upper levels can become far beyond their needs, leaving large surplus savings. One of the dangers is that these can be financial invested into a more concentrated sector, and this area could experience unusual inflation and other distorting effects on the economy. One example is too much investment in real-estate, which would drive the purchasing and rental prices upwards, while those at the lower income levels could have an increasing struggle to survive financially.

The Need for Moderation and Control

Governments have long ago found it necessary and desirable to control quasi-monopolistic practices in the product market. The inherent dangers of excessive concentrations of power in the factor market, or indeed any sector or the economy, are no less dangerous. The market must be continuously monitored and if necessary strictly controlled.

WEALTH

The purpose of production and the whole economic system is not only survival, but development, improvement, well-being and many other aspects of life. Many believe that wealth is the keys to almost everything, which explains why so much emphasis has been dedicated to it.

The common dictionary definition of **wealth** is 'a large amount of money and valuable material possessions'. A more precise *economic* version is 'the things that are wanted for pleasure, usefulness or exchange'. Perhaps the broadest definition would be 'the total valuable possessions conducive to our on-going quality of life', including the intangible items. Although there may be some consensus, ultimately wealth can only be measured using personal values and circumstances, many of which are relative. Within the context of

this book, a distinction is made between 'money wealth' that could be spent directly, and 'nominal wealth' (meaning 'assets at market value'), which normally must first be sold and (re)converted into currency before it can normally be spent. However, ***no amount of money savings or stored wealth has any exchange value unless the system can continue to produce the on-going vital, but more perishable, goods and services.***

PERSONAL WEALTH AMBITIONS

Becoming Rich and the Money Game

Getting richer is more individual and is concerned with micro-economics, but there are macro-economic influences and policies. Education in tax law, finance, accounting and other related commercial skills can be valuable; however the details of these are beyond the scope of this discussion here. There are a number of ways of accumulating material wealth in decreasing order of 'acceptability'.

1. Investment: Making a valuable contribution; enterprise through the beneficial side of the productive system.
2. Gambling and gaming: Participating in 'zero sum' games, betting, using mathematics and speculation – there are an infinite number of possible games and schemes. Playing the stock market is also a matter of skill, intuition and information as well as good fortune; 'assets' may be bought or sold, according to trends and their yields. It is true that some can become substantially richer through these processes; however, their gain is others' losses. In general the overall impact on the broader economy is minimal unless extremely large amounts of money are withdrawn from the productive system and diverted to the speculative system.
3. Legal theft: Taking an unfair proportion of income from producers, workers or consumers; unjustifiable inflation; siphoning off; slavery, extortion or deception. Ethically there are also greyer areas such as competition and the 'tricks of the trade'. Economically, all of these are matters of 'unacceptable distribution', and the total material wealth is warped.

To the extent that the second or third option is used, production may also be impaired. These can make an individual very rich, but generally would not benefit the whole community. [See also chapter 8]

Investment and wealth are not to be denigrated in themselves. The issues are the important questions of why, how, in what, and for whom?

A Warning:

In any living dynamic system, as in the natural world, a small proportion of predators and parasites can usually be sustained, tolerated or possibly even useful. However, if these are allowed to multiply and become dominant, the whole ecology is endangered, including the predators and the parasites. This is not a matter of ethics but practical resources and production. The economic system is no different.

Chapter 4

LAND AND NATURAL RESOURCES

As a *factor of production*, land (i.e. environmental space or 'territory') and all its natural resources are necessary so that people can live, work and in general, make valuable contributions to increase their standards of living. Originally, that was mostly no more than 'an area of ground and location' allotted as 'theirs'. Today with our populations and development, our territory includes multi-level structures upwards and downwards. We are even encroaching on other peoples' ethers in our electronic communications. For these purposes, ***almost every 'territory' must always be governed.*** This 'control' can be allocated by law, commercial competition, agreement or any other means – otherwise our further development could be curtailed. Today, the problem is no longer as simple as putting up a fence.

Apart from the comments on possession, tenure and speculation below, there are a number of other 'land-related issues', which are intimately connected with other factors of production, such as housing, savings and pollution. These are discussed in *chapters 2, 8, 9 and 13.*

LAND POSSESSION AND TENURE

Land has always been important to people since they walked on this planet, and contentions in its possession have continued from the personal to the national. However, the concept of land ownership is at best nothing but a human construction. Regarding any claim of its 'ownership' and its original resources, the argument that "we were here first" has no more validity than the "we conquered it" excuse.

On the one hand, most people value some constancy in location, and so it was also almost universally accepted that some government must control the people in a geographical area for order, development and stability otherwise society and civilisation would degenerate to a very low level. On the other hand, people have had their own personal individualities with different vices, ambitions and disagreements in religion or political ideology. Furthermore, there has been ever increasing population pressure, and land is not uniform in quality or resources. These resulted in envy, plundering, slavery, murder, conquest, wars, domination over the suppressed and empire building. This has historically been the periodical pattern with the most powerful group prevailing.

Different methods have been attempted to achieve an easing of tension with varying success. At the national level, physical barriers and strong alliances with common interests seemed to work, at least for a period. At the local level it was often the opposite, where people with strong differences continuously

tried to separate themselves from the ruling government, and occasionally succeeded. Experience showed that people with strong irreconcilable differences in ideologies eventually had to be separated or be suppressed with force. In any case, there still has been no real peace.

There is a better way on this limited planet without destroying one another as well as ourselves. Eventually we need to elevate ourselves to a higher level of consciousness with wider, longer and deeper perspectives, and share the resources of the land more responsibly and equitably with fair trade and less envy of the other person's or country's space. This may be idealistic, but *any* movement in that direction would be a bonus.

LAND SPECULATION

As population increases, land naturally becomes relatively scarcer and competition rises. Where land can be legally 'owned', inherited or sold, usable land is often deliberately withheld by the owner so that an even higher than normal price or rental may be charged. This is the practice of land speculation.

The desire to 'invest' in land as a store of savings does encourage speculation, but land also competes with other investments that are more lucrative in a 'healthy' economy, while land and property returns tend to be more moderate. However when business is in recession and most other investments are sluggish, land may be especially targeted for speculation.

Some Attempts to Control Land Speculation

The control of land speculation is not a simple matter. Of course, crude attempts can be made which may succeed in eliminating it at the cost of creating even greater problems.

One method is by imposing a 'transfer duty' on the sale of real-estate of unimproved market value of the land equal to the difference between *at the time of purchase indexed for inflation*, and *at the time of sale*. The governing principle is that, the beneficiary of an increase in the market value of *personal property* (the improvements) should be the *person*, and the beneficiary of an increase in the market value of *community property* (land) should be the *community*. The problem in this case lies in separating the value of the improvement from the value of the land. When there is interaction this is not much more difficult.

Attempting to eliminate land speculation by imposing a large land tax would also very probably achieve its objective. However, such a tax would impose a major fixed cost or 'overhead expense' on all land users. This runs contrary to the interests of business survival in a volatile market, further addressed in chapter five. It also violates one of the fundamental principles of taxation that

'ultimately only production can ever be taxed', which will be discussed later in chapter nine.

One useful possibility might be to abolish 'permanent personal land ownership'. Tenure should be generous and normally renewable, but strictly temporary, and subject to beneficial use, such as active production, housing or enjoyment. If resumption is necessary, any improvements must be fairly compensated. There would be no need for any 'price', rent or 'tax' for land itself, and hence much less speculation.

Nevertheless, whatever form of regime in control (democratic or other), land or 'territory' must be shared and 'governed' according to the needs of the whole community, not only for short-term commercial interest.

NATURAL RESOURCES

In as much as the natural mineral resources that the earth produces belong to everyone, rationally there ought to have no price attached to them. However, the added values from extracting to ultimately transforming them to useful products rightfully belong to their creators.

Nevertheless the initial process cannot be totally unrestricted –

- Access to any resource must be regulated to assure that it is fair and equitable.
- Existing activities should otherwise not be disrupted unless necessary.
- Ideally, the area should not be grossly degraded in the environmental sense and ought to be restored.
- The extraction process must be monitored for health reasons.
- The resource should not be completely depleted.
- Issues such as restrictive trading processes must be investigated and rectified.
- Any sensitive political issues should be openly discussed.
- The overall activity must be subject to the principle of *total responsibility* including its effects and its side-effects.

Many of these desirable factors were often lacking and continue to be so. Historically most mining was done using simple tools by slave labour until relatively recently. It was among the dirtiest, hardest and hazardous works, and the life expectation was among the lowest. Fortunately with the advent of mechanisation major improvements have been made.

In general, there are a number of foreign-trade cautions:

1. Trade should be encouraged in the interests of greater availability and variety, but local control of the sources must never be compromised.
2. Fair trade must override free trade.
3. Where possible, any vital resource that depends on importation should be adequately stockpiled especially in politically unstable times. The most efficient 'just in time' attitude is idealistic and can be counter-productive.

4. Beware of the benefits of comparative advantage which tend to induce dependency and vulnerability, especially in a crisis.
5. Political neutrality may be necessary when there is a critical shortage of vital resources.

Most of the other natural resources such as soil, water, fishing and forestry, had been discussed by other authors, but it helps to remind readers of some of the monumental disasters in agriculture and land management in the past.

Fresh air and even sunlight are also vital resources. These like many others were once thought to be either unlimited and had no *economic* values. They included wasteland, un-penetrable jungles, the oceans and the atmosphere into which we can dump all of our pollution and rubbish with trivial cost and no responsibility. Now in the twenty-first century we are starting to wake up that there is no such thing as “elsewhere”; everything has a price, and can rapidly become expensive ‘economic commodities’.

ENERGY SOURCES

Although energy is mostly a secondary product, it is directly connected with mining because of its intimate connection with oil, coal and uranium. Perhaps most of the problems of extraction are being solved, but the by-products such as inevitable depletion and the environmental and health issues have not. Cleaner sources such as hydroelectric, tidal, geothermic, solar, and wind generation are at present limited because of factors such as cost, storage, seasonality and geography. This subject overlaps that of capital and technology.

With our western-style industrialisation, the demand for energy had been multiplied many times in the last century – considerably faster than the rate of population – for heating, air conditioning, refrigeration, transportation and so on. Almost certainly much less energy could be used without substantially impairing our lifestyle. Exponential behaviour and usage, in a finite world, are not compatible. The issue of sustainability and the environment will be addressed in chapter 13.

Chapter 5

ENTERPRISE AND BUSINESS SURVIVAL

BUSINESS VIABILITY

The end result of failure of any business is inadequate revenue to cover its total costs. That is simple. However, there can be a number of more remote factors in the chain or network in the process, include the market structure of the industry, namely whether it tends towards the monopolistic or the competitive, and the nature of its product on the scale of relative necessity. Firms producing necessities in a market where they have close to a monopoly, usually have a demand that is relatively insensitive to changes in price. Because their customers are committed to purchasing, they have more control over their prices and hence their survival.

Volatile Industries

Firms producing luxuries in a competitive market, have a demand that is much more sensitive to changes in price. They cannot cover their costs simply by raising prices because their demand may fall substantially. These firms are more vulnerable to increases in factor prices which may increase their costs beyond what the market price of their product can recover.

They are also highly vulnerable to changes in the total flow of money into the productive sector or changes in the directions of flow. If for any reason the flow of money is reduced and prices remain unchanged, the limited flow of money will first be directed towards necessities and less money will remain available to be spent on relative luxuries. Essentially the same thing happens when prices rise and the flow of money into the productive sector does not increase by the same proportion. The result is that there is a shift in spending away from firms producing 'luxuries', and an increase in business failures.

Economies of Scale and Fluctuations in the Market

One 'cure' that has been promoted is for these firms should try to increase their efficiency of operation in the hope of providing a better margin between price and cost. This makes sense if it entails the elimination of wasteful work practices. However, when interpreted as requiring the increasing substitution of labour with technology, the pursuit of efficiency must be treated with caution.

Labour is mostly a variable cost whereas the interest payable on money borrowed to finance technology is a fixed cost. The greater the fixed costs, the higher the critical level of demand needed to ensure the firm's survival.

When using more expensive equipment at high enough levels of output, the average cost per unit produced may be lower, but at lower levels of output the opposite is true. The net effect is that a smaller downturn in demand would threaten the survival of the firm. When fewer survive, the market then becomes more conducive towards monopoly. The subject of efficiency will be discussed in more detail in the next chapter.

DEBT AS A FIXED COST AND DEFAULT ON PAYMENT

Once the borrowed money is spent, with few exceptions, the repayments and interest become fixed commitments along with the other fixed costs which must be met regardless of the income of the borrower. The greater the fixed cost component is relative to his total costs, the more vulnerable the borrower is in the case of an unfavourable or fluctuating market for his product.

In a competitive market, the greater the interest rates and the greater the reliance on borrowed money to finance initial investment in expensive technology, the greater is the vulnerability. This is one of the major causes of the majority of business failures and bankruptcies.

In any given year, some debts will have to be written off due to the borrowers' inability to repay. This has the effect of reducing both the level of indebtedness and the store of savings at the same time. Whilst the effect on the individual or firm may be severe, the impact on the economy depends on the extent to which a chain reaction takes place. The ability to repay a particular debt depends jointly on the borrower's income and the market value of his assets. The ability to sustain a level of indebtedness depends only on the borrower's on-going level of income. This holds true for individuals, firms and nations alike.

POST-COMMITMENT EXPLOITATION

Several examples of this phenomenon exist ranging from those involving the personal consumer upwards.

- A person buys a vehicle or other device that runs on a different fuel that is initially deliberately cheaper than the one commonly used. When a sufficiently large number of people are committed to using it, the price of the fuel is increased. The same applies to the supply of their spare parts. In each case it is generally marginally cheaper for the operator of the equipment to pay the inflated 'support cost' than to change his equipment. The sellers then have a captive market.
- Renting a home can be a similar situation. The tenant incurs considerable expense in the act of moving itself. The 'advantages' of moving to marginally cheaper premises must be weighed against the costs of relocation including those which are not measurable in money

terms. When the rent is increased, the tenant reluctantly goes on paying.

- Borrowing money works the same way. Once the borrower has spent the money, he is committed to making his repayments with interest. If the interest rate on his loan can be increased, he must pay the extra.

The purpose of a contract is to create an element of predictability and stability that is mutually beneficial for their relationship, but still consistent with the general interests of the whole community. However, many contracts (including some marriages!) start ostensibly 'symbiotic' and rapidly become more 'parasitic'. Once behaviours, such as commitment exploitation, are allowed to become rampant they damage the whole economy.

It must be remembered that the whole economic system is ultimately dependent on the elements that currently produce tangibly usable goods and services. As in the natural world, moderate **voluntary** 'parasitic' behaviour (such as dependent offspring etc.) is tolerable and probably inevitable if the system is to retain a degree of freedom and flexibility that is consistent with development. The danger arises when the dependant parasite acquires the power to manipulate the provider and can even cripple it, or when the number and size of the dependants begins to exceed what the provider is able to support.

INSURANCE

Insurance is basically a mechanism for avoiding or sharing risk at a price. As a business, it could not survive unless the odds were loaded in favour of the insurer – a characteristic which it shares with gambling houses. Thus in the long term, the insured makes a financial loss in his transactions with the insurer. Nevertheless, it cannot be denied that in general the service insurance provides is a valuable one.

Although unethical practices occur on both sides of the insurance contract, by far the biggest problem lies in the exploitation of the system by those to whom the insurance payouts are made, namely, those whose business it is to investigate, repair, or otherwise deal with the situation against which the insurance was taken out. These businesses are encouraged by the fact that 'the insurance company pays', to inflate their charges to the maximum possible, while the insured has no reason to object as his own premium will not directly be affected in the short term. In addition, his motivation to engage in all but the minimum preventive behaviour required by the insurance contract is often substantially diminished. In the medium term, however, everyone's premium is increased.

The major concerns with this pattern are on the on-going redistribution of income and increasing fixed costs to businesses in a volatile competitive market. Those on low and fixed incomes find it increasingly difficult to pay the higher insurance premiums. The system has also greatly encouraged the

growth of lucrative litigation, which fosters greater fear, more insurance and higher premiums, all of which amount to higher personal and business costs.

Thus the insurance system is in many ways conducive to inflation – which is unwelcome but perhaps tolerable; a widening range of incomes and deepening poverty among those at the lower end of the scale – which is bad; and discouraging production and enterprise – which can be potentially disastrous.

It must be remembered that desirable as it is, insurance, like banking, is not productive in its own right. Its very survival and usefulness depends on the health of the economic system as a whole. Insurance-related exploitation is parasitic, and if allowed to grow out of control, it will debilitate and even cripple the host on which its own viability ultimately depends.

THE RELATIONSHIP BETWEEN USAGE AND PAYMENT

The problem of public exploitation through the insurance system is only one of a general group of situations where the nexus between payment and usage has been broken. Wherever the size of payment is averaged over a larger group of users of a service or a facility, there is little incentive for the individual user to limit his 'consumption'. This is because the more he uses compared with others in the group the cheaper the unit cost of the service to him, and conversely, the less he uses the service the more he subsidises the high user. If he has to pay anyway, why shouldn't he use it as much as possible; why should he benefit less than anyone else when he pays the same amount? That is the line of reasoning at the individual level. The consequences at the group level are that the total cost and rate of usage is considerably higher than it would otherwise be.

A simple example will illustrate the point. The member of an automobile club does not actively seek to have a flat tyre any more than the non-member. However, should it happen to him, he is more likely to ring for help even when he could change the tyre by his own effort at far less total cost overall. As a result, the breakdown service is over-used and membership fees are higher.

The point is that the method of 'average payment' for the use of a service, works efficiently in terms of resource usage only when there is also an inbuilt incentive for the individual to restrain his use of the service. This, however, is not always consistent with the business motives of the provider whose profit depends on the level of demand.

CORPORATIONS AND ETHICS

The greatest danger in any organisation including corporations is its **size**. Beyond some level it becomes increasingly difficult to control it both outside and often even inside. This applies to the churches, unions, militaries, companies, monopolies, and even governments. Mega-corporations can be a

danger to any smaller businesses and even to government through their power and leverage in money, through the media, lobbying and sponsorship. In common to all large organisations, they do have the advantage of the economy of scale and can usually afford the best staff.

The second aspect is the fundamental constitution or the understood ***purpose*** in which the particular business operates. Corporations are largely private, civilian, and commercially oriented. Their original founders may have personal ambitions or other reasons; but as the numbers of their owners grow, the most likely dominant common motive becomes the desire of money, achievement of wealth and power. The main significant legal characteristic is that they are governed by limited liability and have independent 'legal personality' under the civil law.

Ethically there are better corporations and there are worse corporations. At the one end many have a useful function – they have ambition and drive, but with moderation and effective control. At the other extreme, however, they can operate with limited conscience; they have no compassion; they take no moral responsibility; they bend the truth in their advertising manipulation and promotions, and are prone to be secretive and often corrupt if they 'can get away with' breaking the law to their own advantage; their efficiency is purely financial; their vested interests are the financial well-being of their owners; and their ultimate values consist only of money. They also have the most skilled lawyers.

It is sufficient to suggest here that there must be a radical move away from the ruthless application of the principle that the primary responsibility of management is to the shareholder, regardless of any consequences to the employees or the broader community. Such attitudes may work for the individual firm in the short term, but on a broader basis, everyone is eventually disadvantaged including the average shareholder. However, ensuring such a change could require encouragement, input and enforcement. One possibility is for the Government to appoint a board member with ethical veto power in larger corporations.

COMPETITION AND MONOPOLY

Some principles and observations

- Fundamentally, both monopoly and competition are generally destructive forces but in different ways. For example, private monopoly tends to exploit the community; competition can be conducive to further hidden degradation in order to maintain profits. Both monopoly and competition have their benefits and drawbacks, but must be controlled and never be allowed to reach extremes.
- Competition, like monopoly, is a matter of degree. Perfect competition is very rare, and monopoly can also be bypassed with other means such as ingenuity.

- Competition and monopoly are neither ‘good’ nor ‘bad’ in themselves, but only for specific purposes in given circumstances. They may also not be intentional, but can evolve out of the circumstances.
- Excessive competition can eventually be conducive to monopoly.
- Pseudo-independent competition can also be disguised monopoly.
- Regulated fairness may be an effective compromise.

Ethical competition – *This is the wider perspective*; openness and regulated fairness in the interests of all and in every relevant criterion.

For example: *Reasonable* profit over cost; lower price, higher quality, better service, reputation, closer proximity and convenience; limited patents. Some of these are in fact various types of ‘monopolistic competition’.

Unethical competition – *This is the narrower perspective*.

For example: Under-cutting below cost-price to remove a competitor; lies and deception; secrecy from relevant information; exploitation of foreign workers and their environment; unsafe operations and products.

Likewise, there are ***ethical and unethical forms of monopoly*** depending on whether the perspective is wider or narrower. Monopoly may be necessary where competition could threaten quality, reliability or security, or when the size of the whole industry prevents more than one operator to exist in the circumstances.

PROJECT MANAGEMENT VERSUS PROFIT-DRIVEN MANAGEMENT

Project management is a very valuable and legitimate profession as a whole. However, often it can degenerate into little more than *profit-driven management*, where the primary aim is to reach a target profit rate, and all other factors such as quality, safety and ethics, become of lesser importance. Given the anticipated market price, the permissible cost is set, and in turn, the quality of manufacturing. This strategy is mostly company initiated, rather than client driven. Although generally legal, much of it can be unethical.

PRODUCTIVITY

The term, *productivity*, has a high profile in business and government because of its connotations: Productivity is “good”. Nevertheless, like many other concepts, it must be qualified in terms of ‘for what, for whom, in what direct, at what cost and what circumstances’. It is necessary to take the longer, wider and deeper perspective. What about the side effects, which may include relentless stress, health or disequilibrium of lifestyle?

Again, it is vital to avoid the extremes. Under negative conditions such as unlimited competition, threat, greed or debt there are strong tendencies to apply the maximum pressure for achieving the highest possible performance. However, for any system – material or human – its highest rate can only be applied intermittently, not continuously. If the maximum pace is demanded all

the time, eventually and invariably it will malfunction or even break down completely.

ECONOMIC POLICY AND ENTERPRISE

There is no simple cure to the risk of business failure. However, there are several policies that can be put into effect in the interests of improved business viability. Among these

1. Initiative in enterprise and investment must be subject to the principle of reasonable responsibility, including the impact on the well-being of the consumer and the environment.
2. A clear distinction has to be made between enterprise and exploitation. The principle of *fair* trade must take priority over *free* trade.
3. Trust starts with personal integrity. The onus is on *me* to be *trustworthy* – consistent, fair and good to others. That is the first and most important factor in generating trust. To the extent that people interact with others commercially, their values and standards should be the same. Treating other people with lower standards selectively than ourselves is very divisive in any society. However, there is also no room for naivety. (See also appendix 2)
4. Research and development needs to be supported, but only in conjunction with a compatible education programme.
5. Inventors must be given a reasonable opportunity to profit from their developments; however, all patented inventions should become public property after a set time (such as ten years). It should not be permissible to purchase the rights to an invention with the intention of suppressing it, except by the government in the case of potential public harm.
6. The existence of fixed costs is inevitable in business, and varies with the type of industry. However, governments should implement policies that allow these costs to be minimised. Taxes and other government charges should never be imposed on any basis other than one that varies reasonably directly with the firm's output.
7. Legislation must reduce, rather than increase, the administrative burdens (legally required paperwork etc.) in the productive sector. This is particularly important for small business. Those who have an aptitude for enterprise should not have unnecessary burdens imposed on them to the extent that their energies are wholly diverted to unproductive concerns and their abilities are stifled. This is particularly important in the case of sole traders and very small firms.

8. **Reasonable independent competition within an industry must be encouraged, but extremes must be controlled.** Excessive competition leads to margins that are so low that quality and reliability are threatened, and the pressure is such that the well-being of people and the productive system is diminished. Its objective, symbolically speaking, is leanness and fitness, not malnutrition and starvation. Ethical competition must extend to *all* levels of production, not only at the retail.
9. The common thinking is to encourage ever higher productivity per person in the free competitive open market. However, there are also many good reasons to reduce productivity and produce useful, repairable and more durable products. The pace of fashion may be slower and initial prices higher, but much lower in the long run.
10. The most important step towards alleviating the difficulties of the local producer is a balanced, rational foreign trade policy. Manufacturers cannot be expected to compete against slave labour conditions and degraded environmental policies. ***The exploiting of people's health and well-being, or devastating the sustainability and environment should not be used for short-term marketing advantages.*** This policy is becoming increasingly important both for local *and* foreign sources. (See chapters 11 and 13).

Chapter 6

TECHNOLOGICAL CAPITAL, SYSTEMS AND EFFICIENCY

Technology can be more simply defined as encompassing the material human-made tools. The concept of 'system' has very broad applications. In this chapter 'system' is applied mostly, but not exclusively, to the more advanced technological area such as automation, information processing, networking, robotics, computing and alike related to the more advancing technologies. It includes not only the visible hard technology but the computing software. These are perhaps the most developing areas of the economy. Much of this area is very exciting and potentially beneficial.

This chapter touches on some of the concerns about technology, systems and efficiency. There are warnings for the tendency towards extremes, cautions, and risks of the negative sides.

TECHNOLOGY AND PROGRESS

There may be a lot of truth in the saying that one cannot, and indeed should not, stand in the way of progress; we may have little sympathy for those who want to stand still in a changing world. However, there are inherent dangers in the philosophy that places the values of 'further, faster, higher, cheaper and more' above all else. Sometimes the pace of change involves too much 'progress' with too little consolidation; there is little opportunity to fully explore the possible contributions before even further changes are made. Recent innovations often become obsolete long before we have the opportunity to discover what they can do for us.

There is an obsession with speed, ease, and accumulation. We avoid the more thorough boring work. In our communication and work people have an increasing habit of 'sampling', 'kangaroo hopping' and 'leap-frogging' – often to the wrong conclusions. The consequences lead to avoidable accidents, etc. Our lifestyle becomes increasingly towards over-specialisation, distortion of language, cluttering, being overwhelmed, not finishing projects, never repairing, and avoiding responsibility.

There is always a push by sellers and servicers to remove the old equipment for their own advantage, but not necessarily for the convenience of the existing user. In practical terms, there is considerable wisdom in retaining the older technology alongside the new, particularly when the new is not yet well tested in practice. If a new system shut down or becomes disabled, often the older devices could be used effectively. There are countless examples.

Only the most hardened conservative would try to legislate against change. However, the pressure to 'keep abreast with the latest' can also be conducive to fragmentation and alienation when those who 'move on' move ever further away from those who cannot keep up. Ideally changes should be introduced gently with patience, education and cooperation rather than forced, so that the user would convince themselves of the advantages of the change. Unfortunately often the benefit is only to the system owner, but added burdens for the practical user.

Many technological devices are often internally very sophisticated and beyond the repair of most ordinary users. That is rarely a problem provided they are generally reliable, and *economically* repairable within technical knowhow and ready access. Often they are not.

The sensible operator uses the latest if it is advantageous, but does not become enslaved by it. However, when the 'robot' makes the most important decisions independently, beware!

LIMITATIONS AND PROBLEMS

It is hard to be dogmatic about the possibilities of technology and automation for the future, but at the present time there are still very severe limits, especially with social and legal factors. For example, there are 'intelligent' motor vehicles without a driver that can navigate complex suburbia, but who is legally at fault in a crash? Another example is the growing use of automated 'intelligent' query systems without any human backups – few automatic systems can answer all human relevant questions or requirements. Tentatively I suggest that technology, including 'artificial intelligence', should be seen as *complementary* to human input and not as a total substitute.

Complexity

Our human-designed and operated systems have shown a relentless tendency towards ever increasing complexity. Versatility, flexibility, speed, extra features, comforts and so on, in combination at a lower cost, are typically promoted. In the meantime longevity, reliability, repairable or strength is often minimal; relevant explanation is convoluted; and any support is non-existing. Some observations from experience:

- With an increase in complexity there is also an increased risk of malfunction and breakdown, higher cost of identifying the problems, and fixing them.
- An integrated system can be used with advantage, but only if its subsystems can also be used independently; otherwise the risk of wider or even total paralysis is drastically increased.

- Complexity at the point of contact between the 'system' and the people who must deal with it, imposes a burden that makes its own demands on available resources such as time, energy, finance and skill, all of which are limited. As any one of these limits is approached, these systems begin to have an increasingly counter-productive and dis-unifying effect. Using an item may be relatively simple by itself; but when it is linked with several other devices all integrated through a computer system it may require a dozen or more steps with options in sequence before the job can even be started. Very few users can memorise such processes with infrequent use. Systems that demand increasing levels of operating skill, training and education suit an ever smaller proportion of the population.
- System size and complexity imposes a 'creeping burden' on the productive system and on society as a whole. The most obvious and culpable system is evident in the areas of administration and law.
- A further issue is that while great advances have been made in the manufacturing of complex items, much less emphasis has been in necessary maintenance, dismantling, repairs and recycling. The result is part of the 'throw-away-mentality' that is a major contributor to our current environment problems.

Some common sense:

- ❖ ***Items that are beyond the local knowledge and repair of any essential technology need to be robust, with very high durability and reliability.***
- ❖ ***Any subsystem should be usable independently if necessary.***

Dependency

When a person or an organisation adopts a new 'tool' they often change and expand their lifestyles to take advantage of its extra possibilities. It then becomes a case of dependency. A typical example is the motor car. This is acceptable when the item is common, economical, repairable and maintainable. However this is not always the case.

- There are many legal but ethically questionable schemes designed to lure the client. When he is committed they can extract much higher payment. Often a useful software application cannot be acquired permanently, but only hired for a limited period after which it ceases to operate. The 'upgraded' version must then be hired at further expense – a form of legal racketeering.

Where the provider has a monopoly, there can be a clear danger of dependence exploitation. Often the client would have to change his whole system at much higher expense. Aside from any considerations of justice or ethics, it is bad for the whole economy. ***Any monopoly should always be controlled*** as far as possible.

- Too much automation and 'artificial intelligence' also causes forgetting or not bothering to learn the manual skill: We no longer are able to do many things that could be done independently, e.g. simple calculations, elementary navigation etc.

SOME PROBLEMS OF THE ELECTRONIC AGE

As in all types of tools and their benefits, there are further emerging problems, costs and risks related to computers, mobile devices and their associated software that also need to be considered. Some of these include:

Health

- Pressure and pace – physical and mental health problems due to too much stress and concentration
- Posture and sedentary activity – lack of exercise and flexibility
- Miniature keyboards in mobile phones – looking at very small print
- Eyesight problems – due to looking at a screen at short distance

Limitations and frustrations

- Talking to a machine – the machine is still a moron and often cannot respond intelligently or discuss things
- At present most electronic devices can be seen and heard but cannot sense other dimensions such as feeling, smell, taste
- It is difficult to capture the 'whole' picture from a limited screen – they can only display fragments at a time
- Miniature keyboards cannot use ten fingers
- Alienation from other people
- Often they are used to substitute rather than complement the human--.

Vulnerability

- The risk of cyber-attack, hacking and sabotage; espionage, loss of privacy
- Security and the desirability of alternative usages and backups – the advantages versus the costs of security encumbrances
- The advantages and disadvantages of Integrated Systems – efficient when they work well, but can be catastrophic when not
- Documentation must be in other forms, e.g. paper etc. The instructions hidden in the disabled computer are useless.

Legal and Ethical aspects

- Exploitation
- Safety versus personal responsibility
- Limited legal ownership; licensing and enforced upgrading
- Illegal activities and usage
- Dangers of extremes – unnecessary control and inadequate regulation
- 'The spirit' versus the 'letters of the law' – deeper laws and their purposes

EFFICIENCY

Limited '*Financial Efficiency*' is the ratio of *money gained* compared with *money costs*. In business the rational minimum value of financial efficiency is the break-even point. From there upwards the business is independently viable and profitable. Financial efficiency is a continuum, and at the highest levels the aim is to maximise money profit for the owners.

When efficiency is viewed exclusively from the financial perspective, without redistributing the results more equitably, the outcome leads to social, economic and environmental problems that are of an escalating nature. From a community perspective, it is conducive to greater concentration of income and wealth in fewer hands, and more poverty among those who are no longer needed.

Overall it is rational and necessary to ensure financial viability as a minimum; but ***maximising profits and material wealth regardless of all other issues can be an unhealthy obsession.***

Broader Efficiency

In the wider context, 'efficiency' could be defined as effectiveness without waste. The more comprehensive view would be the 'total benefits compared with its extended costs'. That also includes the anticipated deeper effects on other people over the longer term. The efficiency of an item or process can always be assessed using several value criteria, such as health, vitality, pleasure, satisfaction, peace of mind and many others. These are often difficult to measure in financial or other tangible terms, but perhaps are even more important. Broader efficiency will vary depending on the chosen criterion. Optimising overall efficiency is a science in itself.

- Perfectionists try to shave off even the smallest costs, but generally neglect many more important factors in the broader picture. Perfectionism is neither efficiency nor effectiveness.
- Often there is no real gain in total efficiency at all, and sometimes even a net loss, where the individual 'improvements' in efficiency are achieved by shifting costs to others or the future.
- Like almost all extremes, efficiency becomes dangerous and counterproductive. The result becomes a paradox, where the outcome appears good or necessary for the individual or organisation in the short term, but harmful to everyone in the longer run.

Efficiency is a matter of balance and necessary proportion. In broader efficiency, the priority is not competition and speed; it is planning, and insight with due care and wider responsibility. There must always be some slack.

COMMUNICATION, ACCESS AND RESPONSIBILITY

Security, secrecy and privacy are subjects that could be expanded to volumes. For the user, simplicity and robustness are important in economy for several reasons including time and frustration, particularly in the context of the world-wide internet. ***The more connected we are, the more we can benefit, but also the more we are vulnerable with all the risks of contamination and disruption.*** There is no such channel or connection that can be absolutely impenetrable. Whatever external devices, mechanisms, assurances or 'insurance policies' are invented, safety always remains primarily the person's own responsibility.

In the development and use of communication devices and processes, just as any other areas, it is hard to argue against progress in technology, systems and efficiency for all of their present and potential benefits. But they can also be abused. In all situations we may delegate or deputise, *but never shed our duties*. We must always hold ourselves responsible for their effects and their side-effects, and actively endeavour to rectify their problems.

FURTHER DEVELOPMENTS

People have dreamt of creating machines that could duplicate all the human abilities. Whether these can ever be fully achieved, is a philosophical question that is beyond the scope of this discussion. Presently this task is certainly far from comprehensive or complete – especially regarding scientific creativity, imagination and even in terms of definition. However the pursuit is an exciting, continuing and promising research area.

At this stage, *artificial intelligence* can be seen as a set of very useful information, decision, communication and control devices. Their 'superior-human abilities' exist only in limited areas such as speed, accuracy and precision. They can be a boon for information research, some aspects of self-education and problem diagnose given the required inputs and necessary parameters. Nevertheless these devices have limitations; and there are also a number of issues such as privacy, lack of transparency, ethics etc.

For the present, artificial intelligence can only be a limited complementary tool and not a substitute: It can be a useful advisor, but must be supervised and cannot hold responsibility. Features such as self-repair, still lie beyond the foreseeable future.

Chapter 7

WORK AND EMPLOYMENT

While justice dictates that anyone who wants to draw from the system must also contribute, the system must also provide adequate and fair opportunities for everyone, whatever their abilities.

NATURAL PREFERENCES AND NECESSITIES

The song, "If I were a rich man" in the musical, *Fiddler on the Roof*, typifies the human desire for an easier life. The majority of us try to minimise hard prolonged labour wherever possible. This originally resulted in coercion in the form of outright slavery by force. When slavery was officially outlawed in civilised countries, other strategies were used to ensure that there was sufficient cheap labour so that the irksome jobs would be done at minimal cost. One way or another, every empire was built largely on exploitation and coercion. What is the situation today? What about the work that has been outsourced to third world countries? What about the migrants who fill the jobs that we don't want to do? What about the family partners who 'drive' the other to exhaustion with their threats and demands inducing them to incur mounting debts that prolong their hard labour? Slavery is still present, only its name has been changed.

In the continuum of socialism and capitalism, on the far left there can be total equality but no incentive, and on the far right there is 'everything for me and nothing for you'. With the growing ethos of capitalism the firm's predominant motive is to maximise its profit. To achieve this it must employ as few people as possible, and/or pay them as little as possible.

This chapter is not a crusade in favour of the poor against the rich – there are honest people and crooks and there are productive and lazy characters in all socio-economic levels. I will not enter deeply into the ethics, but to highlight some historical on-going trends, power, politics and human motives. There are always several sides in arguments. *Work Relations* is a complex subject and we will focus mainly on the broader economic areas such as unemployment, shortages and some associated costs which are not always monetary but are nevertheless real.

A DEFINITION OF WORK

For many, work has been traditionally seen as unwelcome labour that they must do in order to meet their obligations; it is distinct from leisure. ***Perhaps a better and more pertinent definition of work should be that of making a useful contribution with direct personal input.*** In terms of measuring this

from the limited operational economic viewpoint, it is usually associated with personal input in exchange of a monetary reward.

Qualifications and Politics

For most occupations there are usually a number of entry requirements, some of which are necessary and others artificial. Some of them are based on ignorance or prejudice, employer preferences and tradition, but ultimately employing another person is a matter of supply and demand. Beyond the regulations, employment is a matter of availability, competition, *limited* trust and negotiation.

In this respect it is largely in the supply area that restrictive trade practices are most active. Some professional organisations and unions genuinely try to raise their standards, but for others the main motive is just to maintain their incomes by trying to restrict their intake, possibly through other plausible excuses. [I will not nominate any particular professions.] Government may be persuaded to apply quotas, and there is often much sifting using irrelevant criteria, hurdles and artificial impairments. What is really most needed is practical observation and demonstration of competence rather than blanket artificial rules.

UNEMPLOYMENT

In a completely capital system,-- the employer has almost all of the power to hire or fire anyone for no reason. With the socialist regime most of the power rests in the government. Neither end of the spectrum has been shown to have been satisfactory for different reasons. The subject of Industrial Relations is well established and there have been significant improvements in society as a result, but the problem of unemployment persists. Perhaps it cannot be completely eradicated, and arguably should not be, but it can be reduced to a fraction of its current level.

Unemployment in perspective

Unemployment lies largely in the nature of specialised interdependent society. In practical terms, the person wants employment, but their skills are not needed enough.

A person's need for employment varies with their desired lifestyle, dependants and maintenance load, their accumulated wealth and other sources of income. It is also influenced by external economic factors such as the local cost of necessities and government-imposed overhead expenses. Some people can live happily on a fraction of the average full time wage, while others cannot make ends even working overtime.

Unemployment is the inability to find sufficient work within the person's capacity which would earn an income sufficient to maintain a lifestyle of dignity for themselves and any necessary dependants. Personal unemployment is a matter of degree that is properly measured by the difference between the person's financial need to work and their actual employment. However, those who are *unwilling to work for any occupation* should not be regarded as unemployed. Many government-generated unemployment statistics can be disregarded both from the economic and the social point of view. Measures that count a person among the employed if they have done as little as an hour of paid casual work in the past fortnight may deserve a place in a new edition of 'How to Lie with Statistics', but are not a sound basis for economic management. However, regardless of how unemployment is measured by a government or by an economist, no on-going unemployment is acceptable to the individual who is in need of work.

CAUSES OF UNEMPLOYMENT

Some personal causes

- Lack of relevant skill
- Over-specialisation
- Individual constraints and disabilities
- Inability to advertise and promote themselves
- Voluntary transition between jobs.

Some major causes stemming from the economic system

1. Pressure for financial efficiency, competitiveness and productivity
2. Free foreign trade that is excessively competitive
3. Inadequate availability of necessary complementary factors
4. Displacement by technology
5. Rigid determination of work hours and definition of full time work
6. The push for higher wages

RADICAL RETRENCHMENT

When the input of labour is reduced, either there will be fewer workers or less labour per worker. Here we are assuming that radical retrenchment means total dismissal from full-time employment.

Some advantages of radical retrenchment are that it may be easier to dismiss individual redundant employees than to face the complaints of the whole team on reduced pay; the pay and the hours of the remaining employees are not affected; and there may be less management work for restructuring.

Some disadvantages of radical retrenchment:

- With an emphasis on narrow personal specialisation, there is a growing difficulty for the individual to find alternative employment.
- If the person is made entirely economically redundant, in the absence of other suitable vocations, they can become an unwelcome dependant

on those remaining in the workforce who must support his unemployment benefits through higher taxes.

- The dramatic change from 'full-time' to complete unemployment is conducive to serious personal and social problems.
- A major problem is that fixed personal and family costs, such as mortgage repayments, rent, health costs, insurance, and school education, can rarely be suspended indefinitely when people become redundant. Only variable costs such as food, consumer goods, transport, holidays, luxuries etc. can easily be reduced. Lower social strata have higher incidence of redundancy, less savings and higher fixed costs by proportion of their income. Firms tend to cull their employees from the bottom upwards (privileges of rank).

WORK SHARING

Organisation based:

Time and pay can be reduced across the board on a company basis. Unless the firm collapses completely, it would be generally more beneficial to reduce the hours uniformly across the board rather than 'randomly' or 'selectively' sacking individuals. The benefit is that it is more conducive to morale as the whole firm is mutually supportive with *less desperation*. Similar schemes have been used successfully in different times and countries. Depending on the overall actual and practical unemployment in the nation, there may have to be a corresponding degree of government persuasion or even enforcement.

Occupation based:

A reasonably straightforward method is to deem the basic working week at a considerably shorter period depending on the current level of unemployment in a specific occupation category. Overtime would start at a considerably higher pay rate that would increase progressively. This would encourage employers to hire more surplus workers at the lower pay rate. The unemployment would decline and the better skilled employees would be given more hours and pay.

For all schemes of work sharing:

1. The aim is to reduce the number unemployed to below about 2%;
2. Work conditions, requirements and standards, should be preserved;
3. The total remuneration should be close to the previously expected;
4. Some categories would be exempted.

Some benefits of a work sharing system

- Such a system would be no more difficult and costly to an employer.
- Fractional employment results in improved personal efficiency and productivity.
- It would also lighten the financial and social burden for the community as less taxation should be needed to support non income earners.
- More time available for individual retraining and updating skills

- Reduced stress and work days lost due to stress-related illness; better health and lower national health costs
- Increased leisure time for income earners
- Employed parents with reduced working hours have more time with their families
- Any such measures tend to provide a cushioning effect, enabling those who find more lucrative opportunities elsewhere to leave voluntarily without the major trauma of unemployment and its consequences.

There would be resistance on the grounds of reduced pay. However, *any* form of employment reduction, whether total redundancy or work sharing, must involve necessary reduction in pay. Arguably it is preferable that everyone suffers just a little than a few suffer a lot.

SOME OTHER APPROACHES TO REDUCING UNEMPLOYMENT

Undesirable strategies such as reducing the retirement age; prolonging initial education and entering the workforce later; accelerating the rate of product obsolescence; and drafting the unemployed into the military are largely unsuccessful for valid reasons. However, the following strategies can work on an interim basis:

Partially effective approaches

- *Part-time employment in the Government Service:* Positions in the Public Service may be offered on a flexible part time principle where the fractional time is adjusted periodically to enable work-seekers to be absorbed. It does not guarantee work in the applicants most preferred area, but it does provide some work for all who cannot find it in other sources. It is also easier to administer as the government is the employer. While it does not optimise the distribution of work on the ability spectrum it does largely solve the most basic pressing unemployment problem: If a person who is out of work involuntarily in the private sector, **government work could be made available and at a rate no less than the basic wage at least for their necessities.**
- *Working for Community Service:* It would be better in justice and morale for both the unemployed person and society, that no working aged person should be given the unemployed payment without a valuable contribution. They should be given *any* task within their abilities at *not lower than the basic commercial rate* (otherwise it degenerates into no better than slave labour). The merits are that they are still occupied and have an income. They should be exempt from providing evidence that they are actively seeking work, otherwise the personal burden is multiplied and the dignity of the individual is demeaned. **All work must be supervised and accountable.**
- *Unemployment benefits ('the dole queue')*: In many countries, those who are unemployed are given a minimal regular payment subject to a

number of conditions such as submitting several applications for work per week, attending interviews with prospective employers and so on. It is denigrating to the unemployed person; the payment is a complete liability to the working taxpayer; the person is often unable to make any contribution because of onerous government regulations and requirements that take up most of their time and energy. In a recession when the number seeking work grossly exceeds the availability of vacancies, the policy of laborious applications and other hoops is very hard to justify. Arguably, this method can be ruthless, unhelpful and unproductive in the longer run *and the least desirable.*

SOME BENEFITS OF REDUCING UNEMPLOYMENT

- There could be a more equitable distribution of income
- Improved self-respect for those previously out of work
- Lower social costs such as severe poverty and crimes arising out of financial desperation and possibly fewer family breakdowns
- Easier collection of debts
- Reduced resistance to technological change as the worker's livelihood is less threatened
- Better social integration with fewer ghettos of unemployed migrants
- Better control over the exploitation of underpaid workers as they can find work at the common rate
- Tangible hope for school-leavers regarding employment prospects, and a reduction in social and psychological problems related to pessimism.

THE NEED FOR AN INCOMES POLICY

The differences in money incomes between the highest and the lowest groups have been increasing as discussed in chapter two. As the range widens, the mean cost of living also moves upward and the lowest income group becomes even further disadvantaged by comparison. ***Personal incomes at the highest levels and the lowest levels should be limited to a reasonable ratio.***

COMPLEMENTARY SUPPORT

Along with the basic survival income there must also be *adequate* basic *affordable* accommodation, health support and education. These cannot be relegated totally to the private sector or to charity, particularly in a dominantly capitalist society; the responsibility rests with the government.

SHORTAGES OF SKILLS

Some reasons for shortages

1. An aging population where older workers are retiring and fewer people are interested or qualified for the occupation
2. Some industries had been outsourced and as a result many of the skills have now been lost from the community. It is relatively easy to dismantle an industry, sell off the equipment, and make the skills redundant and largely forgotten.
3. With an increased emphasis on image, comfort, security and status, more people may avoid mundane manual work viewed as boring, repetitive, hazardous, unhealthy, uncomfortable, dirty, unrewarding and physically hard.
4. In some industries the increasing complexities and rate of change, older people have difficulty to keep up or are burnt out; this may also deter younger people getting involved.
5. The brain drain from elsewhere, often foreign sources
6. There may be a temporary crisis requiring larger numbers in some occupations.

Possible strategies

- Immigration: However there may be language problems and different standards, more accommodation and additional complementary capital
- Incentive, obligation (in a crises), promises, rewards: The skills may still require education, training, apprenticeships; these take time – even longer for experience to achieve higher quality
- “Do it for yourself”: It takes time to learn the skills; it may be impossible without expensive complementary tools or extensive training; some occupations are illegal for the amateur (e.g. certain types of electrical work or plumbing)
- Slavery: No longer acceptable in a free society ...

There is no quick and easy solution to a serious shortage of quality skills. It requires personal development, education, training, possibly complementary re-engineering and longer term investment. These could take several years.

SUMMARY

A realistic view: Whichever scheme is implemented to tackle unemployment, it is best that the person should **be paid, but only for useful contributions**. The absolute minimum requirement for any civilisation is not equal opportunity but **adequate opportunities** for employment so that people can contribute and provide for human necessities. Adequacy is the government's responsibility.

A more idealistic outlook: In traditional economic thinking, growth is generally associated with higher employment and greater opportunities of finding work. Other things being equal, this observation is valid. However, the ‘growth solution’ is simplistic; it does not guarantee employment and is environmentally unsustainable (see *chapter 13*). On the other hand, *any* good work-sharing scheme is not a temporary solution to joblessness, but a more

permanent one. It offers tangible hope of employment and making a meaningful contribution for all except a very small proportion. It leads to a more equitable distribution of income. It is therefore more conducive to economic and social stability. Some temporary unemployment would be inevitable for structural reasons, but with a proper employment policy long-term unemployment there should be little excuse.

Chapter 8

CURRENCY

A community does not live by money alone, but by every factor in the system.
– *Paraphrase of an old proverb.*

BASIC FUNCTION AND PURPOSE OF CURRENCY

Currency, or money, gives access to power and versatility *when all the other factors are readily available*. It is an important component of the economic system as a catalyst, lubricant or 'interim device' to facilitate the exchange of goods and services. However, as a measure in accounting, wealth or storage, it is a highly relative, circumstantial and a temporary device even in the short term and ***without the other components of the economic system money has no value at all***. For a long time, economic theory and policy have been obsessed with the dynamics of money, and many have lost sight of the underlying realities. Economics is not "the science of money". There has been an over-emphasis on money and its dynamics, as if personal work is almost obsolete. There have also been a large number of ill-conceived or devious schemes, and newer ingenious ones are continually being devised. In the meantime the fundamental essentials are neglected.

The internal world of money including banking, borrowing and lending, accounting, finance and their internal policies, can be very complex. Financial education is certainly to be encouraged, but the unlimited '*pursuit of money and wealth*', like any extremes can become very counter-productive to the economic system.

THE NATURE OF MONEY

Currency or money as 'cash' circulating within any economy, namely notes and coins, officially finds its origin in the government, or its central bank, and so it is universally acceptable in exchange for most goods and services. It is reasonably durable in stable circumstances, relatively scarce, divisible and not directly consumable. It can also be kept for security purposes at least in the short to medium term, or lent to someone else at an 'interest rate', like a rental charge.

In reality, however, money is not restricted to 'cash'. Banks also create additional money. When a person deposits money, the bank keeps the original deposit as a 'virtual' number in the person's account, but actually lends part of the money to someone else (with the original depositor not knowing it). When a depositor pays another person, it was a message to his own bank (by cheque or now electronically and directly) to move his 'virtual'

amount from his account to the other's account without any cash movement. As a result there is more money than just the original cash – the transaction can be made either by virtual money from a bank account to another bank account while the borrowed money can also be used for another transaction. Today the majority of money movements in the western world are done from one account directly to another account. In fact, money is usually nothing more than a number in an account (in credit or debit) that changes when the person makes a transaction. It may be surprising to most readers that the total amount of debt (the 'national debt') in the community is usually much greater than the total amount of cash in circulation.

In the matter of borrowing, for those who cannot repay, their assets would normally be sold to cover the debt. If not, the money may be permanently lost, and the bank would have to pay from its own profits, but the bank would usually have sufficient reserves for normal transactions. That is also nothing new. However, in widespread failures of repayment where too much lending is extended with too little security, and too many depositors demand 'hard currency', the banks may have too little reserve cash to supply it. In this event the money savings deposited are visibly lost, and there could be a major crisis where confidence with the banking system would be eroded.

THE TREND TOWARDS THE CASHLESS SOCIETY

The cashless transactions have a relatively old history: We entrust most of our money to our banking system and we communicate with the banks – by cheques, debit and credit cards or electronic (EFTPOS) – quite apart from cash. Nevertheless, it is undesirable to surrender *all* of our purchasing power to an external 'banking' system. Banks *can and do fail* for various reasons. Electronic systems also can and do fail, or they may not be available in the circumstances (at the initiator's end, during transmission or at the receiver's end). Wherever and whenever necessary, money must be in the *person's* possession and control. Cash and the banking system should always be interchangeable and complementary; cash should not be completely replaced – there must always be an alternative type of legal tender. Their relative usages are less important than the fact that they *are* available when needed.

POWER AND LIMITATIONS

From its original invention money became an important and useful component of an economy. Since then the relationships and interactions between money, prices, interest and time etcetera, had been studied progressively both in theory and in practical experience. Alongside its benefits there are also the negative sides – the connections with power, status, crime and the obsession by many economists, business people, politicians and even ordinary citizens with money above all other values. Money itself is just a tool and I shall not moralise it; nevertheless, I wish to emphasise a number of fundamental facts.

1. Money has no intrinsic value. Its sole 'value' lies in the goods and services that can be acquired. The value of the common currency that circulates through a community rests only and alone in the goods and services that the economy produces. **When a community produces something of value, then its currency will have value.** Ultimately you can even have an economy without money, albeit a very inefficient one, but you cannot have an economy at all without production to exchange.
2. Unlike tangible specific wealth which can only be **created** from resources and the productive system, money cannot be created privately but only through the government and banking system (via debt). Normally the possession of money can only be **shifted** around.
3. Overall the 'trickle down' theory is a myth. The dominant socio-economic movement of money is '*upward flow, siphon off, and high-level shunting*'. Much of the money in circulation is not used in transactions through the productive system, but around the speculative system to take advantage on marginal changes such as return rates and so on. There are a number of reasons, legitimate and otherwise, why almost every economic system operates the same way. There is very little commercial downward flow that benefits the poor or the unemployed.
4. Any additional money-wealth must be balanced by additional 'debt' somewhere else in the financial system. When additional loans are created by the banking system the money supply expands as a result. Inevitably the new money flows outwards and upwards, and the borrowers are made even more indebted.
5. Confidence in being able to **replenish** the stock (of money) is one of the dominant factors in a person's willingness to part with it, whether through spending or lending. The motive and tendency to hoard is inversely proportionate to the ease of replenishment. The tendency to hoard is accelerated in a recession, which tends to further reduce the effect of 'lubrication' in production.

THE AVAILABILITY AND SUPPLY OF MONEY

The Quantity Theory of Money, expressed in mathematical symbols states that,

$$M \times V = \text{Sum} (P \times T)$$

This is an identity, where,

M is the total quantity of money in circulation,

V is the average frequency in movements per unit of time,

P is the "price" per transaction,

T is the transactions per unit of time,

x means 'multiplied by'

In terms of Money Movement, mathematically it may be a necessarily correct or 'exact identity'. However, there are a number of ***cautions in its interpretation***:

1. A common mistake is to confuse the quantity of money (M) in circulation with the money supply. The quantity of money is a 'stock'. The *money supply* is the willingness to make a specific amount of money for hire at an interest rate; like any other commodity in the market, this is a 'flow'.
2. The quantity of money in circulation may be reasonably stable in the short-term in normal circumstances, but it can also be more variable when banks 'create' money through lending especially such as the credit card systems.
3. The velocity (V) is an overall aggregate. The velocity is not a constant but a variable. Credit, debit, demand or savings deposits can move electronically through the internet almost instantly, or can be frozen indefinitely; cash must be "carried by hand and foot". Due to their relative liquidity or fluidity, they have different velocities, but are generally interchangeable as valid currency. Money in 'fixed investment' deposits can even be used where necessary in different circumstances (with very low velocity and high penalties). The velocity can also vary with the interest rate from low when lenders are reluctant, to higher when lending is readily available.
4. The "Price", above, is actually not the total price of the item or contract, but the size of the amount of money that is transferred on the occasion. The total value in the contract can be transferred in smaller packages (P) more often (T) or as larger packages less often. But the total value of the item (PxT) could be the same.
5. The sum of Prices times Transactions (PxT) is **not** equal to the value of total production. These may be correlated in the short-term, but the former also includes all transfer-payments (e.g. pensions, grants etc.), the cumulated chain of 'independent' subcontractors (outsourcing versus internal production), wholesalers, distributors and retailers, with often much double-counting. It also includes all of the second-hand market transactions and those in the speculative sector.
6. IF we assume that business practises are stable, then P is generally correlated with the item of overall price, and T is correlated with employment and production.

Reorganise this identity, and make M the subject then

$$M = PxT \div V, \text{ where } \div \text{ means 'divided by'}$$

Assuming that V is constant in the short term and loosely interpreting this equation, it means that

‘The total quantity of money in circulation’ is related to ‘the level of prices’ times ‘employment and production’.

Now we know that historically, prices tend to rise easily and fall reluctantly, while employment and production tends to rise slowly but fall easily. So, notwithstanding the cautions above –

- If we hold the availability of money (M) constant and prices (P) still rise, then the rate of transactions (T) must fall. The overall result is that we have a case of increased *stagflation and more unemployment*.
- If we reduce M then we could create a deeper recession.
- If we increase the availability of money (M) and production cannot rise in the short term (limit of T), then prices (P) would inevitably rise and the result is serious *inflation*.

These three are some of the likely outcomes. (See chapter 10).

CONTROLLING THE AVAILABILITY OF MONEY

Since the primary role of money is to be an efficient lubricant it needs to be available at every level of the economy, and appropriately replenished so that on-going transactions can be made.

To estimate the total money required for the economy there are too many variables; their parameters are often unknown and the circumstances are continuously changing. All we know is that enough money is needed for the necessary transactions and *sufficient* slack. *Too much* slack is inflationary; *too little* money for transactions causes unemployment and business failure for an industry. However, for the economy as a whole the ‘too much’ and ‘too little’ areas actually overlap, and it is almost impossible to specify and ‘fine tune’ the optimal money needed.

Currency is only *one* of the factors in the productive system and cannot be considered in isolation. Other information such as competition, technology, the range of incomes and so on, is highly relevant. While some undesirable phenomena in the economy, such as inflation, are encouraged by too much money, not all of these can be solved by the opposite process. The ‘obvious’ strategy of limiting the money alone is highly simplistic and can be counter-productive. Other complementary strategies can be necessary. Inflation is discussed in the chapter on economic management.

VARIABLE INTEREST RATES

Money that is lent adds to debt, attracts interest and is a cost to the borrower. If the interest rate were increased on *new* shorter-term loans, in theory, people would borrow less and the money in circulation would be reduced; in this way, demand and inflation might be controlled.

However, a rise in the interest rate applied to all existing loans does not reduce the amount of money because that loan-money has already been put into circulation. The added interest increases the incomes of the lenders substantially and reduces the disposable incomes of those who are already heavily in debt. The effective range of incomes would be made even greater. Secondly, firms on the financial borderline must pass the increase on in the form of higher prices causing inflation, or become in danger of financial collapse and default and much of the higher interest or even the lent money itself could be lost. The results would be detrimental to both lenders and borrowers, and production diminished.

It is better that for long-term existing loans, especially housing loans, that interest rates should be reasonable and fixed. The opportunity loss in interest earnings using *restraint* by the lenders would be much less serious than that of increasing the interest rate of the existed loans.

THE BANKING SYSTEM

There is an on-going debate as to whether the banking system should be in private hands or in the hands of the government (i.e. for the whole community). Some arguments in favour of privatization include that the banks are a 'safe and attractive' form of private investment and that private organisations tend to be much more 'efficient and profitable'. With the sale of a public bank the government would also reap a large one-off windfall. On the other hand, the banking system would become a quasi-monopolistic factor that would be harder for the government to control; their primary loyalties are to their shareholders, and certainly they would be more 'efficient', but for whom?

There ought to be at least some government ownership to assure that effective market competition and ethical policy are preserved; otherwise the banking system may tend to develop self-optimising and self-serving characteristics to the disadvantages of the whole productive system.

WEALTH AND THE FINANCIAL SYSTEM

The subject of investment and overall net wealth has been addressed in chapter three. Below are some of the financial system's tools and methods associated with the processes of building personal wealth.

The internal financial system is largely relevant to the matters of *micro-economics* impacting on individuals and firms. There are numerous financial

'products' such as bonds, debentures, stocks and shares, insurance policies; processes such as compound and simple interest, fixed or variable interest; sinking funds and loan repayment plans. Commercial financial transactions can involve contracts that may contain several financial features such as time payments, risks, warranties and insurances, conditional rights or derivatives such as options and swaps. Many of these mechanisms are oriented towards personal advantages and minimising risk. Several of these are related to debt. This is a complex area and largely a matter of financial education and competent advice. The outcomes can result in considerable net tangible wealth and / or losses for any of the parties.

In the speculative sector, the financial aspects generally come to zero-sum outcomes, with the total gains of the winners equalling the losses of the losers.

It is only a small minority who have the interest, expertise and resources that get involved in the finance market at high stakes. The average investor is usually content just with monitoring trends or current yields etc. – participation is largely a matter of degree. Any of the financial tools may be relevant in special situations and the reader may delve into these if they desire.

Financial manoeuvring, clever schemes and the Money Games are *not* the essence of Economics, although naturally there is a connection. Like most games they can be summarised as having

- Stakes – money, property, including debt and the future
- Rules – moves, constraints, laws such as limited or unlimited liabilities
- Chance – risks and probabilities
- Strategies and tactics
- Experience, intelligence, motives and circumstances

Cautions: Games can evolve and become even more complex. No matter how skilled one is, someone else could always be smarter. As in all games, there can also be many illegal (cheating) or unethical behaviours.

Chapter 9

GOVERNMENT

If we want the law of the jungle we don't need a government at all, but this does not create a civilisation. True enough; but "government" does not consist solely of legislation and enforcement remotely from the top.

Taming the Jungle

Ideally, any government would be formed from the wiser and more knowledgeable people in the community who are concerned with the welfare of everyone. They should serve, not only a minority or even the majority, but benefit of every person in the longer term. In reality however, they have tended to serve only the most powerful groups and themselves.

The purpose of this chapter is to widen the perspective of effective governing. It is not aimed at any particular country.

THE LIMITATIONS OF LAW

There are limits to the volume of legislation that a system can effectively implement. Eventually the increasing volume and complications is a burden that discourages productive activity. Certainly, every addition has its rationale and it is difficult to identify the individual parts of legislation that should be discarded. It is like adding more and more security and reinforcement until the system is crippled by its own weight. The other side of the burden issue is the cost of complying with the law itself and insuring against liability.

This is particularly noticeable in areas that deal with safety and risk avoidance. Legislation here tends to suffer from the fallacy that because some safety is good, more is better. Risk avoidance involves a cost, usually of a fixed or 'overhead' kind, which in a volatile competitive market, increasingly threatens business viability. We can impose so much constraint for the sake of avoiding 'evils' that eventually no 'good' can be done either. We cannot minimise the evils and maximise the good at the same time. This is not an argument against better working conditions and adequate safety standards, but a warning that one cannot continue to pressurise the productive system by facilitating 'cut-throat' competition at one end and growing burdens at the other.

Law must be clear enough so that those people affected can understand it and be efficiently enforced. When major improvements are needed, there must be a rethink and redesign, rather than endlessly adding more volume, complications and obscurity. An increasing proportion of the population

cannot cope, and will either carry on their activities illegally or avoid getting involved altogether where the law may be applicable.

THE ECONOMIC ROLE OF GOVERNMENT

Government must be active in a way that is complementary, competitive or enforcing, wherever necessary in a timely manner. Whether it does in any situation or not, it *must always retain the power to do so at the executive level*.

The proper economic role of government is to ensure that all the factors of production are provided adequately, and in the necessary balance. It need not intervene where the system does this by natural market forces, but *must* intervene otherwise. The 'free market forces' really comprise all of the inherent human natural tendencies and learnt social behaviours that are connected with our economic interactions. These may be beneficial or harmful in different situations – using them is a matter of discernment rather than 'blind reverence'. By their nature, the 'free market forces' are primarily oriented to the short-term, the narrow interests and the superficial perspective. In a developed civilised society, government must take a longer, wider and deeper view. *Both* perspectives are necessary. Excessive concentration of wealth and power in *any* private control tends to be primarily self-serving rather than for the best interests of the productive system or the broader community.

MARKET FORCES AND UNRESTRICTED INCOME

- Traditionally the incomes of the highest sector would earn around seven times that of the lowest sector. Since then, it has increased many times. One of the consequences of the 'free market forces' is the ever widening gaps between the lowest and the highest incomes. This and some of its consequences have already been discussed in earlier chapters.
- There is a considerable difference between free enterprise, creativity, innovation and making a contribution on the one hand, and "non-illegal" exploitation, theft, fraud and scheming on the other. There is also a substantial difference between normal profit, and raking-in obscene amounts of money because one can. It is important not to stifle enterprise and depress the enthusiasm of the genuine producer, *but how much profit is enough?*

Here the 'natural forces' are clearly out of control and require intervention. The most useful method of control has been effective local independent competition (not the extreme ruthless variety) ensuring *reasonable* profit, but subject to environmental, health and other considerations. Other means can be used such as legislation if necessary.

ACTIVE GOVERNMENT INVOLVEMENT IN BUSINESSES

How much control should the government have over the economy is a perennial question. At the one end, most 'official ombudsmen' and 'watchdogs' are seen to be working for the public interest without actually doing anything because they have no 'teeth'. At the other end, officialdom could be so uptight that the system is almost paralysed with petty details.

Government business activity is necessary only to the extent that private enterprise has insufficient incentive or ability to provide necessary goods and services. Whether it is desirable beyond this point is a controversial issue. Some arguments in favour of active government activity are that efficiency can be measured in values that extend beyond the financial. Another argument is that it may be better for the profits of a 'necessary monopoly' to return to the community than be in private hands. A further consideration is that direct government competition can provide more effective price and quality control than legislation. The contrary arguments tend to be equally persuasive, such as the fact that government enterprises have less incentive to avoid wasteful work practices because they are not subject to the same threat of business failure.

There is a modern school of thought that the government should govern and not be directly involved in business activities. It is argued that it is not the role of government to take part in the game but to set the rules and create a level playing field. This sounds attractive in that it purports to elevate the representatives of the community above the partialities of the business world and leaves them to those who are more skilled and efficient in playing its games.

There are a number of problems with that view: First, there is no clear demarcation point between 'government' levels and any other management. It is a continuum. To believe that one can govern with no on-going participatory experience is a fallacy that becomes eminently clear within the hierarchies of management itself: Upper levels become increasingly remote from 'coal-face' realities. Second, it is naïve to assume that 'big business' does not collude, whether directly or by mutual understanding of common interests, and often act as a quasi-monopoly for public exploitation. Their influence through lobbying and campaign contributions can divert legislation and their lawyers are as skilled in circumventing legislation as the government is in creating it. There is no valid reason why a government-run enterprise cannot be a powerful, effective and profitable competitor in important areas and force the industry to maintain a social conscience more effectively, than by volumes of added legislation and enforcement expenses. There is also usually a long lag between undesirable business practices, and remedial legislation and enforcement. A further observation is that a remote government is invariably reactive, not proactive, but the game and its environment is constantly changing and evolving.

Economic management also does not improve by fiddling with refinements when the system itself is biased with heavily sectional interests; too often they are! Some of the principles have also been discussed in other chapters. Overall, both the government and the governed must always be mutually monitored and open. Whether the government should be a direct participant in any particular business in any given situation, needs to be given due consideration in the particular circumstances. However, ***the option must always be retained and be readily available.***

In general,

- Community assets should not be sold off to private concerns. There are deceptive advantages such as financial efficiency and massive one-off gains, but there are other values. **also**
- 'Government', to varying degrees, must operate throughout the economic system and the community – in all areas and at all levels – not only remotely at the top. It is a cooperative exercise with mutual advice and regular effective feedback. Its function is not necessarily initiative, but nevertheless its role must be to monitor, assist, evaluate, complement and supplement, control and veto if necessary.

GOVERNMENT INCOME AND TAXATION

Government is an essential factor of production, and tax is the most important form of the income for the government factor. Nearly every major tax is directly or indirectly built into the price of the finished product or service which the final user must pay. Without production, any 'tax' would eventually and inevitably dry up, no matter how ingeniously it was devised. Regardless of the method of taxation or the points in the flow of money where the Government 'taps' it, ultimately the only thing that can ever be taxed is production.

Progressive Income Taxation

Progressive taxation is an attempt to make the burden of taxation fall more heavily on those who, by virtue of their higher incomes, can more easily afford to pay the tax: The higher a person's income, the higher the percentage is taken out in tax. This *ought* to result of in a more equitable distribution of income, but it does nothing of the kind. People with higher rates of taxation are encouraged to consume more tax-deductible items such as for dependents, better schooling and health care, which effectively reduces their taxation. However, large families who *ought* to have larger legitimate deductions mostly have lower incomes and are in a lower tax bracket from the start. In this respect progressive income taxation largely fails in its ostensible prime objective; it is a costly added complication of doubtful benefit. If there were a constant rate of income tax, or no income tax at all (with net wages and a uniform rate incorporated with market price), the total tax paid could remain the same. There are many and much better ways to assist the more disadvantaged.

Other Government Income

There are several services organised by government for which the consumer must pay directly. Commodities such as electric power and postal services are frequent examples. Here government must be regarded as a business in its own right; that part of its income is never seen as taxation, but simply as added revenue. Nevertheless, it is still part of the productive system.

EXPENDITURE AND SOCIAL SECURITY

Much of the government function has already been covered in other chapters and many of the ordinary duties such as law and order, defence, diplomacy and so on, are generally self-evident. However social security needs to be clarified and emphasised.

These comments are not aimed at any particular country, but governments in general. Nevertheless regimes such as the extremes of capitalism, aristocracy and martial law tend to have poor reputations with regard to social security and neglect of the lower classes. Basic social security (Employment, housing, education, healthcare) need to be at high priorities because all others depend on the morale and cohesiveness of society itself. Social security should not be decadent, but at least adequate, disciplined, fair and consistent with the same dignity and freedom given to all other citizens. In any civilised society, whether largely capitalist or socialist, no person should be regarded as expendable.

There should be ample freedom and variation but no economic extremism. With regard to the financial side of Social Security, there must be *dual responsibility* between society as a whole and the individual. ***The first objective must be adequacy, not equality.***

1. Any able adult person who wants to have an adequate income should be required to work for it, *and*, for any economy there ought to be a place for every person who is willing to work.
2. There should be at least basic affordable accommodation, *and*, it should be maintained to a reasonable standard by the occupier.
3. There should be an affordable premium and an 'excess' in added medical expenses, a public insurance policy or any involuntary conditions.

These would represent the requirements in the areas of *employment, housing and health* in basic government social security policies without any unusual conditions or requirements, at least for able adults. Beyond these, any person could have as many benefits as they can afford.

UNEMPLOYMENT

This area was discussed in chapter seven, but a few points can be emphasised. Struggling with hand-outs is intended to be uncomfortable to give the person incentive to find employment. This may be reasonable when there are *adequate opportunities*; otherwise it is hypocrisy. *Get the unemployed person into supervised work for the government and pay them a wage that is at least liveable.*

HOUSING

Inadequate accommodation is one of the most serious social problems that are further increased by the escalating extremes of incomes. Granted that there will always be degrees of wealth and poverty, as it must be, there is no valid excuse to allow dire desperation and total homelessness in any civilised society. Whether the scarcity of accommodation is made artificially or by natural means, the buyers and renters are being exploited while their renting-property owners are being enriched far beyond reasonable profit. At the lower socio-economic levels rent and mortgages are the largest part of the income for the majority of tenants and buyers, and for some it can exceed their entire full-time income. Ensuring adequate minimum accommodation at affordable cost should not be the duty of the private sector, but must be a constitutional obligation regardless of the type of government; otherwise minorities can easily be neglected. This can lead to an escalation of disease and crime where all levels of society are affected.

As an emergency measure, rental should be limited according to the consumer inflation index; every liveable type of accommodation should be explored and made available, and immigration should be halted until further accommodation catches up. Foreign investment should not be permitted for local residential properties; and local investment must be monitored and controlled.

Other problems related to housing may also include –

- Growth of population
- Unemployment, and insufficient income for finance or rent
- Unrestricted allowance of overseas investment
- Government regulation and insurance
- Environmental crises
- Profiteering, unscrupulous practices
- Substandard building and maintenance,
- Scarcity in skill within the building industry
- Shortage of building materials available
- Lack of associated facilities
- Social and other prejudices
- Lack of government motivation due to the relative voting power by the poor and homeless.

Purchasing

In addition to the cost of buying and selling real-estate, there may have been considerable inflation in the sector. People may have had very limited access to thoroughly inspect the properties. There may have been no official prior professional inspection and history. Buyers compete before and during an auction and the transactions become a lucrative opportunity for major swindles.

Along with the well-established principle of 'let the buyer be aware', further means must be implemented to prevent prospective buyers against unethical practices when there are huge outlays from their life incomes. Here the government and the law could make a valuable contribution that would benefit prospective buyers and also lending institutions. For example –

- Prior to inviting offers to purchase, sellers should be compelled to make available a public, accurate and independent professional report, which includes the history of the property.
- Buyers must be given much more time to inspect the property
- Local government must disclose any issues or risks that may impinge on the property and its immediate environment
- As housing loans are generally on a long-term basis, the interest rate should be reasonable and fixed.

Renting

The most important aspect in the rental market is adequate supply and affordability, particularly at the lower socio-economic levels. Apart of the issue of homelessness, any lack of accommodation is highly conducive to more rapid real-estate inflation. Inevitably government assistance is likely to be necessary.

EDUCATION

Repairing or improving the education system is not only a matter of more money. It is a multi-dimensional task in which many elements need to be reoriented.

- Our present 'education system' imposes increasing demands, bureaucracy, continuous assessment, accountability, paperwork, 'extra' responsibilities, and endless changes. These lead to fatigue and exhaustion which must be radically reduced. It is little wonder why teachers are increasingly burnt out and leave the profession. Quality time is scarce; students and the staff need holidays to recuperate and revitalise their energies.
- Teachers who can teach well and enjoy the work are relatively scarce. They must have more time to *teach, supervise* and connect with the students. Technology (devices, computers, mobiles, robots) can be valuable as a complementary tool, but *never as a substitute*. There must be appropriate criteria and standards, rather than merely "competition and creaming off the top".

HEALTH CARE

Without attempting to denigrate the medical profession, many of whom are very skilled and dedicated; it is also a **commercial business**. It requires investment and has costs; it is limited by the current state of the art; it is prone to restrictive trade practices; and like in all professions their practitioners range from the outstanding to the opposite. In many countries there is both a private system which caters for those who can afford the costs, and a public system which is 'free' but is prone to longer delays, less experienced staff, more pressures and errors, less expensive and generally less effective treatments, and more limited budgets. Many specialised changes need to be made in this area, but first **adequate numbers of professionals must be trained and made available**.

Education, Health and Aged Care in the past were mostly the responsibility of the extended family. Under the present social and working conditions, given the dominant 'nuclear' (and even smaller) independent families, these tasks are much more difficult. By far the most important factor is to have **more talented and dedicated staff to ease the overload**.

PENSIONS AND SUPERANNUATION

Present production will always be required to support or supplement the present unretired population. Whether the retirement income is drawn via the tax component of production as in a pension system, or the interest, dividend or rent components as in a superannuation system, is ultimately arbitrary – valuable income can only be drawn from current tangible production.

This is not an argument against superannuation. To save more for retirement is prudent, whether in superannuation or any other lucrative investment. For those who have a large enough accumulation there are advantages such as more flexibility, more power for immediate purchases, the relative freedom for extensive travel, and on death the remainder can be willed to the beneficiaries. However from the overall economic perspective, one way or another, **those who no longer work must be supported largely by those who are working today**.

SOME DILEMMAS IN BALANCING THE BUDGET

Many western governments are understandably concerned when their spending continually exceeds their collected revenue. The 'obvious solution' – to reduce the size of government spending by cutting back on public works, welfare payments, education, defence etc. and increasing government income through higher rates of taxation and the sale of Government assets – is deceptively convincing.

In a healthy economy that has a productive system with excess capacity, the multiplier effect on every dollar spent by government ensures that it can easily be returned through taxation – as long as it is not rapidly funnelled into the hands of income earners who have a much higher tendency to save, get diverted to the speculative sector or spent on imports. Unfortunately this is all too often the case, and the lower multiplier effect is inadequate to ensure a balance. The multiplier effect also operates in reverse. However, spending cuts usually target the areas that have potentially the highest multiplier effect, namely those in the lower income categories. This leads to a massive loss of community income as well as tax paid. Not only does it fail to achieve the primary objective of bringing government revenue and expenditure into balance, it also causes higher unemployment and a greater welfare burden that makes it even more difficult to reconcile the budget. Thus a situation can arise where an increase in spending flows rapidly to where it does the least good, and a reduction would hit where it hurts most.

As it is relatively difficult to predict the *ongoing* direction in which money spent by the government will flow; the government may become locked into a situation where both an increase *and* a decrease in spending can be equally counter-productive. Without adopting more equitable income policies, and a rational foreign trade policy, there is little hope of resolving this dilemma.

There is another argument that is frequently put forward by those who favour a smaller government sector: Reducing the size and cost of government and the public service to make it possible to reduce taxes, and leave more spending power in the hands of the population. This allows an increase in the demand for goods and services, which should lead to increased employment. New job opportunities would thus be created for those who were made redundant when the public service was reduced. This is yet another idealistic myth. An increase in spending power in the hands of those who are already employed does not lead to a proportional increase in employment. Some of it will flow into the speculative sector and a part will go to imports. The combined effect is that the impact on employment in the private sector could be negligible, and the number of redundant public servants will become an added idle burden on the social security budget.

Deficit Spending

Provided there is adequate balanced excess capacity in the productive system, a moderate deficit spending in excess of the normal budget might achieve a government's target policy. In theory, this could result in further employment. If the deficit is large and the excess capacity is inadequate, the added funding will cause greater inflationary pressure.

CRISIS MANAGEMENT

In crises such as natural disasters, wars, famines and epidemics, the relationships of supply, demand and prices of important items often shift

radically. Production or transport can be disrupted; there may be shortages in the availability of many items as supply is reduced. There could be desperate needs for important items such as medicines, and so demand increases. As a result the prices could increase drastically.

One of the greatest economic concerns lies in the hyperinflation of necessities such as accommodation, transportation, food and health support. However, there are also other factors at work: There may be hoarding, panic-buying, looting, black-marketing, redirecting aid from the intended victims, and major changes in behaviours, morale and confidence. It is in these situations that the 'invisible hand' of market forces can move to extremes or even breaks down. Consequently, intervention becomes necessary to prevent exploitation by opportunists and ensure recovery.

The details of crisis management are beyond the scope of this book; however, in too many situations there was over-optimism and complacency. Scenario planning should be implemented and/or more thoroughly explored, and there must be a change towards anticipation, preventive measures, personal responsibility and timely *fixing action, and less emphasis on 'long-after-the-fact' monetary-type insurance*. The speed of recovery depends largely on the people themselves, but governments can lead and assist.

Chapter 10

THE MANAGEMENT OF INTERNAL ECONOMIC ACTIVITY

As pointed out in the *Introduction*, every modern economy based on specialisation is inherently unstable. The national government is responsible for the management and control of the internal productive system to ensure all the basic necessities, *regardless of any optimistic assurances on external advantages*.

This requires an attitude of maximum independence in all necessities, with attention on the adequacy and balance of all tangible factors of production as far as possible. Surpluses and luxuries can always be traded more freely. Countries that do not have adequate internal capacity to produce basic balanced necessities such as small countries with high population density are more vulnerable.

Furthermore it is imperative that *personal incomes at the highest levels and the lowest levels should be limited to a reasonable ratio*. Several other recommendations in earlier chapters are also relevant for overall economic management. Foreign trade interactions will be expanded in the next chapter.

Without these requirements, basic stability is likely to be much more precarious.

A Note on the use of Mathematical Models for Economic Management:

There is no harm in using sophisticated complex mathematic models of economic behaviours to explore possibilities. However, often their assumptions are difficult to measure and verify, and it is useless to make “fine-tuned” decisions based on little better than random numbers. Such models must be treated with caution and the results must always be supported using other means, such as ordinary common sense, intuition, parallel analogies, gut-feeling, relevant historical evidence and so on.

PRODUCTIVE ACTIVITY

Vital as production is, its measurement can be extremely difficult. Instead, the opposite flow, *‘money incomes’* (see *chapter 1*), is used for accounting convenience. This is only a very rough, inconsistent and tentative approximation; but for economic management purposes, it is perhaps the only measurable and workable device that is common across all commercial goods and services. [‘Production’ for themselves, family, friends or voluntary for charity generally does not involve money transactions and are not counted in the economic system.]

When the concept of employment is broadened to include all the factors of production we can think in terms of factor employment or **productive activity**. In theory, the controlling relationship is:

The rate of money flow into the productive sector divided by the level of the factor prices equals the rate of productive activity.'

Two main conclusions follow from this relationship:

- 1.If the money flow into the productive sector is increased and factor prices remain constant, productive activity ought to increase. The reverse should happen if money flow is reduced.
- 2.If the factor prices generally increase and the money flow into the productive sector remains constant then productive activity decreases. The reverse happens if factor prices fall.

A steady rate of productive activity will exist when either

- The rate of flow of money into the productive system and the level of factor prices both remain constant, or
- The flow of money and the level of general prices are changing at the same rate in the same direction.

In all of these it is assumed that there is sufficient excess capacity. When any necessary factor or resource approaches its natural rate capacity or “full employment”, any attempt to offer more money into that factor would only result in its price.

Despite the economic language this governing equation is very basic and remarkably simple: It is like the rule that “When one has a limited budget, and the prices of the items are increased, one can only purchase less.” The other conclusions follow logically and naturally.

What complicates fiscal and monetary policy is the many internal “component variables” of the equation and their measurements: “The devil lies in the details!” Much of their control must be delegated to lower levels of management (firms and areas of industry), but not made totally and legally autonomous. In the earlier part of chapter nine, I have attempted to emphasise the role of *government* and its responsibility at *all* levels within reason.

FISCAL POLICY

The basic task of Economic Management is to influence the ***volume and the direction of money flow into the productive system, and/or the level of factor prices***, when forces cause the level and type of productive activity to move in an undesirable direction or at an unwelcome rate.

Broadly speaking,

Injections of money into the productive system can come from several sources such as:

- Spending from the factor incomes
- Local borrowing
- Borrowing from overseas sources and exports (next chapter).

Reductions in the flow of money into the productive system can be due to:

- Saving from the factor incomes
- Diversion of money to the Speculative sector
- Imports (next chapter)

THE USES OF TAXATION, SUBSIDIES AND GOVERNMENT SPENDING

The effectiveness of a tax on any product depends on the sensitivity (elasticity) of the product's demand. When it is sensitive, a tax is a good means of control. When the demand is insensitive, the tax is a good source of revenue. This would generally work well and effectively at the micro-economic level. However, a large tax on any specific factor could seriously disadvantage a whole industry which depends on that factor, compared with those that use it much less. In general, such a tax could be too broad and disruptive for the whole productive system. Consequently there would have to be serious reasons beyond normal economics to discourage the use of that factor.

Subsidies can stimulate an economy if they are not immediately directed towards imports or the speculative sector. They are better directed towards the lower to middle socio-economic levels because of their lower saving tendencies and because money tends to move upwards. As a general rule, all subsidies should be *earned, not given* as free hand-outs. Government spending can be increased, but this needs to be directed towards the local productive sector, preferably where more employment is desirable.

THE SPECULATIVE SECTOR

The chief short-term dangers to the economy arising out of the speculative sector occur, where the level of activity in the productive sector is connected to the market value of assets that are subject to speculation. One example is where property speculation leads to a significant increase in property prices. Since the holder expects a rental return on the 'market value' of his property comparable with other going rates, an increase in this market value results in a proportional increase in the rental charged, thus increasing the cost of one of the factors of production.

There is a flow between the productive and the speculative (non-productive) sectors. If these flows are balanced there should be little problem. If not, then one of the sectors will increase in activity and the other will decrease. Increasing speculation draws money away from the kinds of transactions that generate production. Thus the speculative sector preoccupies a variable and

unstable part of the total flow of money, and depending on the relative size of this flow and the extent of the interaction, the fluctuations (and instability) will be passed on to the productive sector.

It is doubtful whether it is possible, or indeed desirable, to stop speculation altogether. Speculation is a natural by-product of the free market philosophy and the concept of private property. It is nevertheless essential to **keep it under control** and prevent serious harm to the productive sector.

- Firstly, a more equitable distribution of income tends to increase spending on tangible goods and services, and encourages the savings into less risky 'investments' that yield a moderate on-going return rather than those which offer the opportunity of 'windfall capital gains'.
- Secondly, improved business viability tends to encourage more investment in the productive sector rather than the speculative sector. It is vital not to discourage entry by excessively complex legislation, unnecessary compliance burdens, market erosion by uncontrolled imports and unfair internal restrictive trade practices. This area was discussed in the chapter five on *Enterprise and Business Survival*.

COMPENSATORY ACTION

In theory

- According to whether the total flow of money into a productive sector is seen as too low or too high, the government can change its own contribution to the flow by increasing or decreasing its own spending on goods and services produced by the system.
- It can also influence the flow from the incomes by lowering or raising taxes so that they have more or less money to spend. Similarly it may subsidise peoples' incomes so that they can spend more.

The limits of raising the level of economic activity occur, at or before, the "full employment" point of the scarcest factor. Further attempts to increase the flow of money into the productive sector will only encourage a rise in factor prices (inflation). In theory, fiscal policy should be more precise, but there are considerable lags in the reactions, particularly between initiation and the final effective implementation. It could be argued that considering the external or foreign influences and the present pace of change, traditional fiscal policy is generally 'too weak and much too late'; and also too many effective controls have been surrendered in exchange for short term advantages. As a result, fiscal policy is not effective enough today to cope with the short term fluctuations in most situations.

What about the use of fiscal policy for the medium-to-longer terms? It depends on economic policy reform:

1. There must be a rational 'incomes policy'. Escalating debts at one end of the system, and ever growing profits at the other, are not conducive to the effective circular flow of income and production. They lead towards increasing instability and inevitable breakdown.
2. There needs to be stricter control of longer term debt, interest and rent.
3. A balance between independence and interdependence is needed – both local and foreign (Chapter 11: *Foreign Trade*, below)
4. It would be desirable for sufficient slack in all resources, if possible, to improve flow and effective replenishment.
5. There are a number of other recommendations that may subdue extremes in various chapters.

As in any system, effective control depends on sufficient balance and effective boundaries. Reasonable balance includes limiting any excessive tendencies. If this can be achieved, then control can be much gentler and more effective. Excessive privatisation often makes monitoring the consequences and side-effects more difficult, and timely government action is further curtailed.

MONETARY POLICY

In as much as part of the flow into the productive system comes from money that is borrowed, the government can control the source and terms of this borrowing and the available funds. In theory, this is done by influencing interest rates so that borrowing could be made more or less attractive; however, the amount of lending by banks and financial institutions can also be controlled more directly if necessary. Altogether, *it is hoped* that the flow of funds might move into the correct sector.

From the producer's perspective, their inputs may have to be paid before the sale of the final product. These input payments are often made through short-term borrowing such as bank overdrafts. A rise in interest rates can cause a rise in their prices or a fall in their productive activity. Thus the interest rate creates a 'choke point' in the flow of working capital availability that can enhance or retard the whole production system.

The notion of controlling the level of economic activity by varying the availability of money is based largely on the quantity theory of money (see chapter 8). Although the relationship itself is beyond dispute, it is not a valid measure of *productive* activity, but only an average correlation of it at best, and only in the short term. A further major discrepancy arises because of transactions that involve no value-added components as in the sale of second-hand goods, collectables and items that change hands on the speculative market. These transactions can involve a large and variable movement of money.

Monetary policy is clearly crude and unselective by comparison to Fiscal policy, but it is timelier. To stimulate the productive sector, money made available whether from borrowing or through grants, must find its way into the hands of those who will spend it on local goods and services. There is, however, seldom any guarantee that it will in fact be injected into the productive sector rather than the speculative sector, or spent on imports.

From the demand viewpoint, the extra money from borrowing could be made available at an appropriate interest rate. In this way the user benefits and so does the production system. However, when too much money becomes available, particularly when production is limited, prices will rise ('inflation'). For example, the unlimited availability of credit via the consumer credit-card system can be one of the causes. Inflation is regarded as a major monetary problem; this is discussed below.

INTEREST RATES AND BORROWING MONEY

The relationship between interest rates and the demand for lendable money can tend to be relatively inelastic:

- In the need for borrowed money, there is usually an element of urgency or even desperation. The immediate benefit is more important than the later cost and interest, even if it is relatively high.
- Those who have desires beyond their temporary incomes generally can repay small loans quickly, such as credit cards, and therefore may also not be sensitive to the higher interest rates.
- In longer term loans, such as real-estate, it is harder to change the terms of the contract because of the processes involved. Lenders may have a captive market – borrowers need a home and are generally locked in by personal circumstances.

Consequently, the majority who need to borrow do so regardless of the rate of interest.

INFLATION

Inflation is the *increase* in the price of an item. In basic economic theory, the cause is either due to the seller's opportunity because of buyer demand ('demand pull' inflation), or out of necessity due to increases in input costs ('cost push' inflation). However I believe that more refinement is required to understand and manage the inflation problem:

- ***Monopolistic initiation*** – “greed and exploitation”
There may be induced dependence that creates a buyer need; restrictive trade practices, cartels, government regulation, patents, artificially restricted entry; any situation where the seller has the power

to set the price and the buyer has little alternative but to pay; *suppliers of scarce necessities*.

- **Demand-pull inflation** – “too much buyer money”
Buyers compete with each other offering more money in the face of limited products or services. This could be aggravated by peer pressure, brand pressure, aggressive marketing and social trends.
- **Parity inflation** – “a desire for equality”
After a ‘leader’ raises its prices, others tend to follow: There may be no formal collusion, only commonly understood mutual interests. For example, ‘keeping up with inflation’; preserving the image of similar quality; maintaining the nominal values of assets, charges and ‘expectations’ consistent with current inflation trends.
- **Cost-push inflation** – “necessity”
Prices can rise because of increasing input costs (wages, interest etc.). Trade union tactics may force business owners to raise their own prices otherwise there could be a major loss of income, a risk of folding or even bankruptcy.

In the case of necessary imports, their base prices are not normally under the control of the importer. However, more than likely the importer, wholesaler, distributor and retailer each add their own *percentage rate* rather than the original mark-up, making the local inflation even higher. This situation is a combination of *cost-push* and *parity inflation*.

Normal price fluctuations and emergency situations do not count as inflation provided the prices return to their usual levels. However, ***inflation*** itself is no riddle: The process mostly ***starts by those who put up their prices for no reason other than the opportunity for more profit.***

SOME STRATEGIES TO CONTROL INFLATION

- **Enforced fair independent competition** within every industry at every stage of manufacturing. The most important part of controlling inflation is effective local competition. Additional *open monitoring* may be necessary when there is evidence of quasi-monopolistic behaviour. Caution is needed when interfering with the natural dynamics of the free market.
- **Active competition by government** can be effective as an alternative to enforced competition; however there would also be a cost for setting up, and its operation must not be subsidised.
- **Allowing foreign competitors** to enter the local market could subdue inflation, but the government must be very careful to avoid increasing unemployment, or upset the balance of the *current account* (see

chapter 11). There are also strategic risks if the local industry collapses due to excessive foreign competition.

- **Limited lending and raising the interest rates** could reduce the availability of money. That would reduce demand in the hope of reducing prices; however if prices continue to rise, output production and employment would inevitably decrease. More than likely the financially weakest firms will suffer most rather than the main initiators of the inflation. (See also *chapter 8*)
- **Legislation by preventing the free market forces in prices** can create black markets or premature depletion of supply. This strategy tends to be undesirable.

Benefits of a Low but Positive Inflation

When idle money becomes an efficient and effective store of wealth, its main function is curtailed. The incentive to spend it or lend it is then lowered substantially and this reluctance causes a decline in economic activity and a rise in unemployment. Some inflation may discourage money from remaining idle and out of circulation. This also allows greater flexibility for the price mechanism to perform its function: Relative adjustments in factor and product prices are continuously needed, but downward movements in money incomes tend to be resisted. When relative prices must change, it is much easier to *raise* one's own prices than to try to force all the other parties to *reduce* theirs. For all of these reasons, the acceptance of a low but positive rate of inflation could be beneficial. Nevertheless, because a little inflation may be good does not mean that more is better!

Overall view on inflation

Continuing the expansion of the money supply without more production, would lead to continuing inflation, but reducing the money supply would not necessarily stop inflation. One reason is that producers with an inelastic demand can continue to raise their prices as long as there is any spending available at all. Any attempt to curb inflation by **reducing the money flow into the productive system will have a much greater impact on reducing economic activity than on prices**. Here monetary policy is necessary, but not sufficient.

Inflation cannot be eliminated completely, *nor should it be*. The objective is to reduce it to within acceptable boundaries. To achieve this, it is also necessary to

- Ensure adequate levels of all the factors of production;
- Enforce adequate fair internal competition; and
- Have a policy of reasonable balances in incomes.

The proper role of monetary policy is to ensure that there is sufficient lubrication for internal exchange but certainly never lower: Money must always be enough for transactions given the current price level.

FLUCTUATIONS AND CYCLES

There are day-to-day movements in the shares and other financial products on the stock market; however, we are not focusing on short term fluctuations. In the medium term, there are natural and social cycles such as the seasons which influence the economic system. There are cycles which are more subject to action and reaction, such as demand, supply, stock and inventory. Many of these can be subject to lags, optimism or pessimism, unsustainable trends or ceilings, or market saturation. Different techniques have been developed to make the fluctuations more predictable – each with variable success – but forecasting is largely based on past experience, probability and ignorance even in normal situations. With unusual circumstances such as famines, epidemics and the like, the outcome is even harder to predict.

Forecasting is helpful when the dynamics of the relevant subsystems are well understood; but for the broader cycles, part of the success to dampen or modify the fluctuations is to instigate policies such of ensuring that everyone has *enough* sustainable employment and partial income replenishment to deter desperation. Some suggestions were offered in regards to work sharing in the chapter seven. Another is to ensure that there is a *balance* between local production and foreign trade. Furthermore, a more equitable income policy would tend to stabilise excessive savings and spending on speculation, which adds even more unpredictability.

RECESSION AND DEPRESSION

- As explained in chapter two, there is a chain reaction that is inherent in the specialised commercial society. To avoid any wider recession, everyone would have to be self-sufficient, and this would clearly not be practical. To keep the economy stable, the rate of savings must be balanced with equal re-injections from elsewhere, assuming that prices remain constant. (See chapters 1 & 2)
- If the re-injection rate is less than savings, the effect on production and employment would be much greater than any fall in prices.
- If income falls below necessary expenditure then eventually both the store of past savings and further borrowing capacity will dry up. The reaction is not sudden; it is subject to lags.
- If prices continue to rise then the consequences will be even worse.
- With higher inflation, especially in fixed necessities, money resources will be depleted even more quickly. Businesses focusing on relative luxuries are more likely to collapse first.
- Hoarding and the lack of replenishment are made worse by the polarisation of incomes and inflation.

- A recession or depression can also be started from a number of other sources, such as a) local natural disasters, b) foreign economic instability with which the country has a very high economic interdependence, c) irresponsible borrowing or very large and growing current account deficit, d) serious social or political factors, and so on.

Recovery

Most specialised economies are inherently unstable, and if allowed only to the natural market forces they tend towards undesirable extremes. The recovery from a deeper recession would require even more than the usual fiscal and monetary policies. It is almost certain that active government emergency measures, intervention and control would be needed.

Chapter 11

FOREIGN TRADE

Unlike internal trade, foreign trade can be more difficult and challenging: There are independent governments, some of which are unstable; they have separate laws; often different languages, culture and ethics; there is more physical distance; alliances may be unstable and sometimes they may be in serious conflict or even at war. Foreign trade is therefore more dominated by external leverage, power and diplomacy than law enforcement. Consequently there needs to be more emphasis on independence than on interdependence, particularly in matters of vital interests.

Perhaps the days of the traditional empire are rapidly at the close, but the tendencies towards deception, coercion and exploitation continue. There may be a growing consciousness of benevolence in many areas of the international sphere, but the world of mutual respect, true fair and ethical trade is still largely in the future. The bottom line is that we cannot blindly *trust* foreign countries, and they should never trust us. The maxim of all interactions is 'let each be aware and on guard.'

GLOBALISATION

The latter half of the twentieth century has been marked by the growth of multinational corporations, common markets, free trade agreements, increased foreign ownership of local industries, public assets and natural resources, deregulation of banking and the opening of finance markets. The boundaries of most economic systems can no longer be defined on a purely national-political basis. There is a fear on part of most governments that unless they open up their systems and become integrated with the world economy their countries will be left behind, crippled and severely impoverished.

It is true that the days of 'splendid isolation' and total independence are, in the main, a thing of the past that is no longer viable if people are to enjoy all of the material benefits of the technological age. This is especially true for the smaller countries. However independence versus interdependence, like that of economic freedom versus central planning and control, the extremes inevitably prove unsuccessful in the long term. In the matter of openness and protection, at the risk of reminding the reader of the obvious, we do not live in a perfect world. We cannot in general trust others or depend on them to give equal consideration to our interests as they do to their own. By analogy, there is a gigantic difference between prudently opening screened windows to let in fresh air, and totally demolishing the walls; or letting in selected supervised callers on the one hand versus holding open house to every thief in the neighbourhood.

INDEPENDENCE AND INTERDEPENDENCE

As with any complex organism, openness is necessary. However, this must be seen in the proper perspective. A *viable* open system must have a mechanism for internal and external “awareness” (senses) to control its intake and outflow – to perform the functions of discernment and filtering. Animals have skins; our buildings have walls and computers have casings *for good reason*. In such a system openness does not grant outsiders a licence to dump whatever they want inside the system and extract whatever they wish to remove. It does not mean that we must allow others to freely inject harmful elements or exploit our assets to their advantage and our disadvantage. That system must maintain a balance between openness and protection.

At the economic sphere, from the individual to the international level, it is also vital to maintain a balance between interdependence and independence. The benefits of openness and interdependence such as cheaper goods, greater variety and easier technology transfer, can come at a very high price as we approach the end of the continuum. It is paid in the loss of internal control and increased vulnerability to exploitation when we lose sight of the original purpose of the economic system and the basic reasons for trade.

INTERNATIONAL TRADE AND FOREIGN INTERACTION

Much can be said for the virtues of free trade, including that the competition it provides is an incentive to greater local productive efficiency. A surplus of exports over imports has the effect of adding to the flow of money into the productive sector. The benefits of this are seldom disputed. However, the combination of unrestricted imports with easy borrowing from foreign sources or selling out internal productive assets can have serious consequences.

When the value of exports is less than that of imports the shortfall must be made up of ‘foreign investment’ or borrowing from overseas. ‘Foreign Investment’ is like ‘exporting our productive assets’. The alternative, namely borrowing from overseas, is a temporary solution and the loan still has to be repaid with interest. With either option, if the imbalance between the imports over the exports is escalating, the process can result in loss of local control and/or bankruptcy.

On the other hand, it is not necessary to maintain a huge surplus either. The ‘healthier’ relationship with mutual respect is a stable but flexible balance with only a few per cent difference either way occasionally.

FLEXIBLE EXCHANGE RATES AND INTEREST RATES

Assume that a unit of local currency buys a fixed unit of local produce (no inflation). *If the value of the local currency falls* compared with foreign

currencies, any foreign currency will buy more local produce and/or visitors would buy more local currency.

- For the local producer, exports should increase because their prices have been reduced in the foreign country. For the local consumer, their demand for imports would tend to fall because their prices (in terms of local currency) have increased. (This is good for the balance of payments.)
- There would also tend to be an increased foreign purchasing of local assets in the local economy.
- Foreign debt and the interest due would be more difficult to repay because foreign debt must be paid in the foreign currency, which is now more expensive. (That is not good).

If the local currency or the interests rise, the opposite would happen.

With a decrease in local interest rates, local currency can be 'hired' more cheaply, and therefore it has a similar effect on the exchange rate.

FOREIGN INVESTMENT

There is nothing inherently wrong with foreign investment provided it is the kind that improves the productive capacity of the local economy; local control is retained; the most of the profits remain within the local economy and that the total balance of exports over imports is still favourable. If the industry that is the target for investment is export oriented, then so much the better. However, the reality can be very different from these ideals.

The word 'foreign investment' with its connotations of increased confidence, increased productive capacity and economic well-being, is misleading. A considerable proportion of this 'foreign investment' is not directed towards expanding the local productive sector, but a large part flows either into the property market or purchasing existing locally owned enterprises. Foreign investment that is directed towards land and property encourages inflation in property prices and increased costs to businesses due to higher rentals. This results in greater business vulnerability and a higher failure rate. It does not contribute to greater productive capacity, but the opposite. The foreign investment which targets viable locally owned businesses is likewise deceptive. Apart from making more foreign currency available to pay for general imports, it increases the foreign ownership and control of local industry, and may send profits overseas. This worsens the balance of payments in the long term.

ON-GOING DEBATES, OPTIMISTIC SCENARIOS AND LANGUAGE

The 'level playing field'

The conditions of trade can be compared with the shape of the earth, which we recognise as round but uneven. We can artificially create and maintain a flat spot within a small area over which we have control. The further we want to extend it, the more difficult this becomes. Globally it is impossible. This is even truer in the economic sphere because we are dealing with a situation that has not only two or three dimensions, but several. For example, if we respect and value national sovereignty, we cannot prevent competing countries to allow substandard wage levels or working conditions, or allow detrimental environmental practices. This gives them an advantage, at least in the short term, over those countries whose citizens insist on higher internal standards. The 'level playing field' is a mythical ideal.

Comparative and absolute advantages

The benefits of specialisation can become grossly deceptive, as it may lock the players into a pattern of increasing vulnerability. Firstly, the theory of comparative advantage where one partner has an advantage in both products, might work in bilateral trade, but may become increasingly unworkable in a multilateral market. Secondly, where one partner has an absolute [price] advantage in [almost] all products, the other partner *must* resort to protective tactics or surrender more and more of its assets.

Specialisation requires wise discernment and sound diplomacy that is beyond simple financial considerations. We can trade where we find that it is mutually beneficial – in a balanced way, and we can even be generous if we want to, but we must never surrender the ability to do what we can for ourselves. To the extent that we are willing or forced by circumstances to give up any of our independence, we must ensure that the system guarantees us an adequate and equitable place to maintain our level of well-being.

Arguments against import reduction

There have been a number of arguments against a reduction in imports despite a shortfall in exports; some of these may be valid if the difference is relatively small and sustainable in the short-to-medium term. Otherwise it is like a household that is living beyond its means – a part of its assets must be sold off to foreigners to ensure that the total balance of payments is equalised.

OFFSHORING AND IMPORTING

The philosophy of outsourcing is inherent in specialisation and interdependence within any integrated system, whether in a family, a company and even the state. It is largely almost natural, necessary and workable – provided there is fair trade, no extreme tendencies and unified internal rules and purpose.

In the international trade scene there are different laws and legal systems, standards and aspirations. In foreign developing countries people are often willing to work at much lower pay, less stringent environmental, work and health standards and expected life-styles. This translates in much lower production costs, so their less expensive products have a price advantage. In any free market, only the firms that can compete would survive.

Within such a market, in the advanced developed countries with their higher internal costs and taxes, very few manufacturing industries can compete without 'offshoring' (i.e. 'offshore outsourcing') to reduce their costs. Offshoring is really 'importing'. If these countries develop unfavourable current trade accounts, they incur growing foreign debts with payable interest, and/or they are forced to sell off more and more of their internal assets to foreigners. In the longer term the internal consequences can be severe. In the meantime their offshoring and importing companies reap high profits; the middle to lower socio-economic strata may be underemployed and mostly in debt, while their country is progressively sold off from the bottom upwards.

Advanced countries cannot blame the foreigners: They let their attractive and less expensive goods into their local markets without protection. Offshoring and importing are not 'bad' in themselves. What can be disastrous is the degree, the direction and the resulting lack of balance in accounts.

Offshoring that is only for export

Offshoring for further export generally improves the balance of payments. However, it does not help to reduce (local) unemployment, and does not reduce global environmental problems (see *chapters 7 and 13*). It does increase the incomes of the 'exporting' sectors; but because money goes predominantly upward rather than downwards, it can also tend to worsen the polarisation of incomes.

PROTECTION

Unfortunately in the popular world of free trade, 'protection' has become a derogatory word. Exporters are curtailed in their profits and importers' profits are likewise restricted; both markets are more depressed; and for consumers prices are higher. From those points of views, the arguments may be valid. However, the case must be examined from a longer and broader perspective considering the matter of trust, national security, local independence, control

and fluctuations, employment, sustainability and the environment. Most of these areas have already been discussed above. There needs to be an appropriate balance of foreign accounts, and above all, the current foreign account. ***The total value of imports must be restricted to the total value of exports.***

TARIFFS

One of the means of limiting the importation of selected goods is to impose an additional ***tariff*** to artificially increase the local prices of imports. In this way the comparative local-made items would be more competitive and encourage local business and employment. The primary aim is for the local population to become as independent as possible and more internally productive. Imports should be reduced, and hopefully, the balance of payments should improve and foreign debt would decline.

The tariffs strategy can help to build or rebuild the local production, but this takes time. If the trading partners retaliate and impose tariffs on your exports, trade will be much lower, and your improvement to the balance of current account would be even much slower.

Assuming that one does not wish to escalate the foreign debt or surrender our internal assets, then the following options may be possible:

1. If the imported ***necessities*** are cheaper than the cost of the locally made items, tariffs must be imposed so that local producers can compete. In this way the country can be more independent.
2. Likewise, if any imported ***luxuries*** are cheaper, the local producers should be protected by tariffs, but this is less vital and there is more room for trade.
3. Any imported items that are ***not locally producible*** must be traded with marketable exports, and if possible, adequately stockpiled depending on their importance.

In the worst possible situation, if almost all imports are cheaper than the cost of the locally made items, without any tariffs or other protection the productive system could cease and the whole economy could eventually become bankrupt.

If the cumulative unfavourable current balance of payments is already very high and rising, the imposition of protection would be almost mandatory regardless of any retaliation by other partners. The situation is no different from that of a family continuing to live beyond their income.

As pointed out in chapter ten, it is rational to ensure the integrity of the nation's independence with regards to the necessities wherever possible, and protection could be necessary. Beyond this, attempting to impose tariffs in

excess of what is necessary for an on-going positive balance of a foreign current account may have serious implications in international diplomacy. The foreign capital account should also be in favour. Foreign investment can be permitted in ordinary multilateral commercial trading, but land and residential assets should never be sold to foreigners.

Smaller or poorer countries with very limited natural resources are in a more delicate situation in these respects. [If necessary, any locally produced item could be subsidised making it more marketable, and exported; the foreign exchange can import necessities, and this would not upset the foreign current account. However, these tend to be closer to third-world conditions.]

A REALISTIC FOREIGN-TRADE POLICY

This book does not argue against trade, but in favour of **balanced trade** so that the local economy benefits. To avoid excessive vulnerability, trade must be returned to its proper place of **supplementing local production and not displacing it**. Trading away one's own basic necessities in exchange of trust, assurances and other benefits, is always hazardous diplomacy. Having a *surplus* on the other hand is a different matter.

To maintain financial solvency and an acceptable credit rating the country's Foreign Account must balance overall. But that is not enough. It is highly desirable that the *current* account (i.e. exports and imports) must also be favourable. If the value of total exports is greater than that of imports, this is good for the economy. ***If the value of imports is greater than exports in the current account, then protection is necessary.*** In an emergency, a small temporary unfavourable balance could be tolerated; but a large long-term escalating one could endanger the whole economy and society.

Summary

- ***The combined imports must be limited to the combined value of exports.***
- ***Ideally all necessities should be provided locally. Luxuries can be traded more freely.***
- ***If some necessities cannot be provided locally, then the imports must be prioritised in descending order of importance: –***
 - 1. Vital goods and services that cannot be produced locally***
 - 2. Items that improve the effectiveness of the productive system***

Then of lesser concern: –

- 3. Goods that add variety to what is locally produced*
- 4. Products that can be made more efficiently elsewhere in overall terms*

Adherence to such an order becomes increasingly important when the local productive sector depends on resources or components that come from foreign sources.

NATIONAL SECURITY

Historically much has already been written on the subject of international diplomacy. In the interests of more peaceful on-going relationships from the economic viewpoint, among the most important principles are that:

- It is vital to maintain an effective *defence* system.
- No sources should ever be trusted totally. Information, discernment and effective filtering must always be used.
- Totally fair mutual ethical interactions are necessary.
- Leverage against the other for commercial purposes, enslavement, taking advantage, corruption or extortion should be avoided.
- It is better to err on the more generous side.

Chapter 12

DEVELOPMENT

A few Cautions and Pitfalls

It is one thing to repair, adjust, make necessary modifications or even redesign part of a system which may take up to a year or two in an already developed modern cultural setting. To build a new modern system in an elementary subsistence society with totally foreign concepts and culture shock would take much longer longer – perhaps a number of generations or more even with frequent contact. We are not talking about invasion and transplanting an extended technology and social systems, but allowing the original people to develop and control their own destinies.

My aim in this chapter is merely to highlight a few of the cautions and possible mistakes in the process of development.

SOME ESSENTIALS FOR INTERNAL ECONOMIC DEVELOPMENT

The most important factors in sound development lie in the intellectual and character elements of the society itself, namely **education, organisation** and **discipline**. The cultural element can radically accelerate or retard progress. Environment and material factors can be more or less conducive to productivity. Generous foreign aid ought to be made, but only judiciously. Foreign investment should be considered *last* and foreign loans not at all.

In parallel to the cultural developments, attention has to be made towards the material development, including

- Investigating the local resources
- Building and developing the factors of production
- Producing enough of the essential things internally
- Controlling the foreign interaction
- Minimising debt
- Not leaving anyone out of the system
- Distributing outcomes fairly
- Avoiding compromising the future

THE NEED FOR BALANCE

The correct combinations and balance must be found through experiment and experience, and these will vary according to culture, the stages of development, environment, natural resources, climate and education. It is unwise to become rigid and dogmatic. The *principle of balance* extends

beyond the tangible elements of the productive system. It includes a workable combination of independence and interdependence; specialisation and generalisation; centralisation and localisation; openness and protection. Each combination must be used as appropriate, but *never at any extreme*.

MISTAKES IN BORROWING BY UNDERDEVELOPED COUNTRIES

Whenever money is lent to the governments of less developed countries, there is always a risk that the borrowed funds will not lead to any productive development at all but be diverted to military expenditure, speculation or personal misappropriation. We shall assume that these do not apply and that economic development is the genuine aim. In the past we often observed the following evolution:

The Intention:

The plan is to borrow heavily and invest in more efficient productive capacity in order to become competitive. In this way you can capture a large enough share of the market and make a good profit. This would enable you to repay the loan with interest and be permanently better off.

The Fallacy:

The strategy that was successful for a small number of countries on the international market will work for the remainder, including the nations of the Third World.

The Reality:

There can never be a larger number of successful competitors than there is room in the market. In the short term, every market is limited due to the income structure of the buying population and the choices they must make. To capture a part of a limited market that already belongs to other producers' means that the new competitor's product must be cheaper or better. The original holders of the market will resist being squeezed out. They may try to become even more efficient and competitive, in which they will succeed if they have better access to the means of updating their technology. Thus new competitors run a substantial risk of being left with an inadequate market share, an unrepayable debt, and yet again, obsolete technology albeit more advanced than before. This applies equally to firms in a local scene as it does to underdeveloped countries on the international market. In both cases, major debt is usually the greatest single problem.

FOREIGN AID AND REQUIRED EVIDENCE

In the matter of foreign aid it is important for the donor to have a reasonable understanding of the country and its culture. Its donor must enquire about its intended purpose and collaborate, if invited, but not dictate or control. Nevertheless, all donations should be given in stages and *full accountability and evidence must be expected before any further aid is given*.

Foreign money could be lent or granted to boost useful local production in a developing or devastated country, provided they already had internal education, organisation and discipline (as in Germany and Japan after World War Two). Without these conditions, pumping money into such countries does little more than producing inflation or corruption.

PREVENTIVE MEASURES

Money should never be *lent* to underdeveloped countries. It should be **donated** to them, subject to flexible mutually agreed conditions, in order to enable them to develop their **internal** markets and the associated productive sectors first. It is vital that they develop and maintain an internal balance and refrain from severely distorting their economic systems, and refrain from becoming dependant on volatile export markets where they are almost certain to remain severely disadvantaged.

Foreign investment should be encouraged, but only on the conditions that

1. The investment be made in the productive sector, not the speculative sector,
2. Production is primarily for the home market,
3. Profits are mostly reinvested in the developing country,
4. Imports follow an order of priorities as indicated in the chapter on foreign trade, and should never be financed through overseas borrowing.

The purpose should be for the further independent development in internal and the export production (if and when they are competitive), rather than inducing increased dependence by the foreign sources.

ENTERPRISE AND THE MARKET ECONOMY

Sound economic development lies in the balanced availability of the factors of production and *appropriate* protection of home markets, the minimisation of foreign debt and strictly balanced trade. In the earlier stages it would most likely require central planning with foreign advice and eventually encouraging opportunities for the expansion of private enterprise whilst keeping firm control over speculation with basic resources. Internal private enterprise can then be allowed to take over at its own pace to the extent that it is viable at any given time. It must be emphasised that a successful private enterprise economy is the result of evolution rather than revolution; it is not possible to 'change over' to a market economy: The 'enterprise' factor of production does not come into magical existence through legislation, nor can it be imported on-mass by borrowing money from overseas. It must grow slowly and consolidate within.

The Fallacy of Simplistic Comparisons in Survival Income

It is tempting for the uninformed to compare the incomes of the poor in western economies with those in the 'third world'. By making the comparison on the basis of a common currency such as the American dollar, they reach the erroneous conclusion that the poor in the developed countries are still far better off. The reader of such statistics often fails to realise that the lowest income on which a person can survive in some form of dignity is very different in the two situations. A few American dollars per week may be sufficient for basic comfort in some parts of the world, but would not even pay the rental of a single room in a decaying residential area on the outskirts of most Western cities. Poverty cannot be compared on an income basis across countries that have different levels of material development. The desperation level of income in a modern city is far higher than in a village in a subsistence economy.

IN THE FINAL ANALYSIS

Most of development is oriented on greater technology, better government, efficient markets and a better material lifestyle. These of course can be beneficial; but without *personal character and quality inter-personal relationships with broader good will*, civilisation and peace inevitably degenerate to no more than a 'rat race'.

Chapter 13

SUSTAINABILITY AND THE ENVIRONMENT

There are an ever increasing number of people who are actively concerned about sustainability and environmental issues; their contributions have been commendable. What is below is written from an economic point of view.

While production is vital for any economy to exist at all, not all production is beneficial in terms of health, welfare or for the environment. This is a multi-dimensional issue in terms of people, location and time. In this chapter we consider production much more qualitatively in terms of usefulness and durability, cost-effectiveness in the all-inclusive sense, recyclability, wastefulness and all of their side-effects. Our emphasis is the longer, wider and deeper issues.

THE GLOBAL ENVIRONMENT CRISIS

Population and Lifestyle

That we are staring in the face of an imminent environmental crisis is beyond any doubt. The oceans are being depleted of life by over-fishing and pollution; the rain-forests are a fraction of what they were a few centuries ago and are continuing to diminish; atmospheric pollution is increasing daily and large numbers of plant and animal species are on the verge of extinction; several non-renewable resources may be heading towards depletion. The growing evidence on climate change and global warming adds a further dimension. Is this alarmism? I don't think so; there are far too many indicators.

Can the planet support an indefinitely large population? The instinctive answer is 'no'; but this is the wrong question. The capacity of the earth is determined by the total way of life, namely peoples' expectations and the way they go about satisfying them. The significant issue is not whether the earth can support 6 billion or 10 billion people: In reality it cannot permanently support even a fraction of the *present* population if they are consuming resources and creating side-effects at the current rate of the most exploiting and polluting countries. Despite this there is an almost total obsession in economic and political circles to pursue unrestricted economic growth with little discernment.

GROWTH

For a long time, aggregate growth in 'Gross Domestic Product per head' was seen as the chief indicator of the health and welfare of the economy. The assumption was that there was no such thing as an upper limit. In the initial stages when population was small enough, many resources were abundant by comparison and the impact on the environment was less significant, so there was room for 'exponential growth'. Now in the twenty-first century we are starting to realise that the earth, its ecology and environment, including many of our critical resources is limited. *Unlimited growth in any finite system is not possible*, at least in a material sense.

Since the industrial revolution, which also coincided with the revival of modern democracy, there has been acceleration in manufacturing. There was a growing use of more and more capital by proportion; and eventually modern methods of operation such as the 'assembly line' were implemented, onwards towards computer operated automation and robotics.

During the latter half of the twentieth century, much of the manufacturing began to change from quality, robustness, reliability and longer life, towards image, rapid change, and maximum turnover with a minimum of durability. This further accelerated manufacturing and business. For example, the new-looking refrigerators became less expensive, but would last only for a fraction of the time compared with most of the older ones. Capital and enterprise became even more dominant, and the human input in manufacturing was even smaller compared with the total volume of output.

The assumptions inherent in 'growth as a solution to unemployment' are that wants and markets are unlimited; resources are also either unlimited or renewable at an ever increasing rate; that the environmental impact of endlessly expanding production and consumption per person in a growing world population, is insignificant. In other words, we must drive ourselves and the economy at an ever-increasing pace. Surely that is absurd.

EXPONENTIAL MULTIPLIED

There is no mystery about why businesses outsource a large proportion of their production to poorer countries and why they import much of their consumer goods from these locations. It is cheaper. The reality is that their workers are willing to work more for far less financial reward; businesses are not encumbered by the same mandatory standards in working conditions, and environmental consequences are mostly ignored. Consequently, the high consumer lifestyle is now supported at the expense of a dramatically greater cost in pollution and environmental degradation than it would be otherwise. The foreign worker in the less developed country encourages their own aspirations of consumerism towards the "more advanced lifestyle" *at the cost of more substandard levels of environmental consciousness*. The intention is not to deny poorer foreigners the right for an improved standard of living; but the difference between one billion people having their consumerism wants

satisfied at higher cost with higher standards of environmental concern, compared with *more billions having the same wants supplied without environmental regard*, is very substantial.

That economic growth, high-consumerism, high turnover and built-in-deterioration being necessary and desirable for employment and prosperity is false economy in the overall context. The real motive is that unlimited consumerism with only adequate quality and minimal durability, generally ensures a high turnover and maximum financial gain. Of course, the side-effects – including all of the pollution, wastage and further sustainability problems – are mostly ignored.

In almost all material respects our world is a closed finite system. As we head toward saturations or depletions, the interactions can become heavily distorted. The usual dynamics and relationships can change radically.

THE PROBLEM OF OVER-USAGE, WASTE AND POLLUTION

A non-exhaustive list of wasteful practices includes

- Orchestrated changes in fashion
- Built-in-deterioration in products to maximise turnover
- Over prescribing in medicine
- War and the escalation of threatening armed conflict
- Efficiency dominated by financial rather than overall criteria
- Unnecessary imposed requirements & bureaucratic hoops
- Throw-away packaging
- Over-cleaning and face-lifting
- Unnecessary paper usage such as junk-mail, copying & packaging
- Agricultural destruction to maintain price
- Fuel usage with independent transportation using unnecessarily large motors, and heating or cooling large unused areas by artificial means
- Duplication of facilities and goods that are little used and could conveniently be shared
- An absence of the direct connection between personal usage and personal cost. This puts the resource-conserving individual at a relative disadvantage and the wasteful user at an advantage, resulting in a disincentive to be economical.
- Excessive indulgence in environmentally damaging leisure pursuits because one has the money to spend

Case Example

It had been estimated that the total environmental impact of manufacturing the average car was equivalent to running the most polluting car engine continuously for over 100 years. It is difficult to argue against cleaner engines, but the emphasis on exhaust emission is like 'straining out the flea and swallowing its host'. Considering that the fundamental purpose of the motor vehicle has not changed much over the last century, surely there is no valid reason why the average life of a car should be only about seven years.

Designing and building one that lasts twice as long, entails only a relatively small increase in cost. However, the shorter the product life, the more profitable it is for the manufacturer. The manufacturing of motor vehicles is only one of a very large number of examples.

Other things being equal, it is unfortunately true that *wasteful* lifestyles, activities, policies and practices create more 'employment' than *frugal* ones. However, unnecessary wastefulness is not a valid reason for employment – the same workers could have been employed productively elsewhere.

HUMAN NATURE, ECONOMIC SYSTEMS AND THE ENVIRONMENT

The technical side of the environment area, which is concerned with science, technology and engineering is beyond our discussion. However, little progress can be accomplished overall if the economic system, on which the individual's perceived prosperity depends, is a source of continual frustration.

Most people would like to become more affluent. Many thrive on ambition or creativity; others desire comfort, thrills, power, and the 'new'; or are addicted to make more and more money. For better or worse, some of the cornerstones of modern democracy have been achievement, competition, incentive and the principle of 'free enterprise'. To the extremes, these can also be divisive and very destructive!

A dominant feature of advanced economic systems is specialisation and interdependence – a person's material well-being depends on the size of *other* peoples' wants. This specialised activity may require considerable investment; so they have vested interests in maintaining and even aggressively promoting demand for their contribution. This is not a problem unless or until it has detrimental side effects: Should they then refrain from it or find an alternative activity; and who would compensate them? Consequently, the average person has little incentive to make the change. In this dilemma lies one of the major benefits towards the improved standards of living, and also the difficulty in controlling the systematic insidious destruction. Again there are dangers in *over-specialisation*, as in almost all extremes.

Unfortunately, attempting to make systematic community-wide changes in a highly specialised interdependent society, meets great resistance due to investment-related inertia. Vested interests are at stake, and major social and political issues are involved.

There were also other forces at work in the relation to human economic behaviour and the environment: –

1. Systems that reward people for solving problems rather than preventing them also develop professions that have vested interests in the continued supply of problems which they can be paid for solving. This is not intended to denigrate the 'helping' professions, for many of

their members are indeed dedicated to improving the overall quality of life, but to highlight a basic reality of human nature.

2. The pressures of competition or greed tend to promote a pursuit of efficiency that is measured in short term, narrowly viewed, financial terms. Often the total costs are greatly increased, but the individual or the firm has merely been successful in shifting the cost to others, or to a later time. For this the individual firm is not always to blame: The firm may have little choice because if it does not stay in business in the short term, it does not stay in business at all. The same applies to the survival of the individual. It is largely a collective economic system problem.
3. Much of human behaviour is governed by the individual's perception that his life is short. Rewards that are immediate, foreseeable and certain are more powerful motivators than delayed rewards for the possible future.
4. If we continue to reward people for activities that have harmful side effects on others and on the future, they will continue to pursue those activities.
5. Strategies that depend on *trust* among *untrustworthy* participants, or on unanimous voluntary compliance where there is no direct separate independent benefit and motivation, will never be effectively implemented, no matter how desirable the end result may be: The party who betrays will always have an advantage over those who remain constrained by the group standards.
6. In a competitive environment, individuals, firms and nations that are prepared to sacrifice their environments and are allowed to do so, will have the advantage over the others. Other things being equal, the system that operates under the illusion that it has inexhaustible resources and an un-fillable dumping ground for rubbish, will have lower short-term costs and the competitive edge.

As I have pointed out in the chapter on Government, 'the free market forces' are mostly the expressions of the good and bad tendencies of human nature that is dominated by the immediate, superficial and the personal interests. It is largely the economic jungle that needs civilisation. It requires intervention *where necessary*. Unfortunately most governments are still primarily at the service of powerful vested interests. What is really needed is the wisdom of global moderation that considers the long term, wider and deeper perspective. These insights and attitudes have in fact been developing for decades, but it is yet to be seen whether they will prevail early enough.

A DIFFERENT VIEW AND POLICY

The continuing increase in world population, of course, inevitably adds stress on the resources of the planet. On the other hand, most of the advanced countries have a declining fertility rate so their populations should become more stable. With intelligent development the poorer countries might also become more stable. If we respect the right to procreate freely and prosper, perhaps we should not try to restrain this. ***However, we do not have to artificially accelerate the environment problem many times over with unlimited greed and irresponsibility.***

The aim should be an economic system that ensures and promotes survival, well-being and development at all levels from the individual to the national and even the global. This involves a fundamental reorientation of thinking in several areas including:

Measurement of Prosperity

1. There is an important distinction between activity that is conducive to earning an income, and that which is conducive to personal and community well being. These overlap, but they do not coincide. There needs to be a redefinition of what constitutes productive activity.
2. The well-being of a community must also be measured by different scales rather than the sum total of money incomes.
3. Measures of economic 'prosperity' such as growth in 'gross domestic product per head of population', must cease to be regarded as ends in themselves as the chief indicators of progress. Currently all economic activity is included regardless of whether it is constructive or destructive.
4. There are many important things that money *cannot* buy. Government and the major social institutions must actively encourage values that are more than materialism and consumerism.

Reduction of Waste

5. A greater emphasis is needed on the prevention rather than cure. One example is the problem of waste. Local government councils often tell us to sort our rubbish in finer categories for collection, but few producers want to reduce the amount of rubbish being generated in the first place.
6. Materials that can be more easily recycled should be used in preference.

Conservation of Energy and Resources

7. We need to reduce the unnecessary over-usage of energy.
8. There must be more emphasis on energy-efficient and resource-efficient designs overall, not only the financial-efficient.
9. There are a number of strategies for reducing the use of energy in transportation, the home in heating, cooling, lighting and cleaning, and so on. Some of these are known and ought to be more publicised.
10. We must operate at a steadier pace, and produce useful durable items. There must be a radical shift away from built-in-decay in manufactured goods. This goes hand-in-hand with a decreased reliance on 'rapid mass consumption'. An increase in product longevity coupled with a reduction in output would have substantial and far reaching environmental benefits.

Education and Law

11. There needs to be more independent competent research, education and awareness on sustainability, resources and environmental matters, responsibility, repair and prevention, rather than being politically and business driven.
12. Where necessary, appropriate prescriptive and restrictive legislation, which is based on sound reasoning supported with reliable evidence, should be implemented and backed by effective enforcement and helpful support.

Business, government and all individuals must cooperate *actively* in using the tools at their disposal to encourage sound sustainability and environmental practices. Long-term survival and prosperity depends on refraining from irreparable damage. ***We need to reduce the non-sustainable destructive side substantially.*** Imposing endless new bureaucratic requirements, burdens, and threatened penalties alone would be ultimately futile. They need to take an effective part in changing the economic system so that the rewards of the individual are more in harmony with the long term good of the whole.

THE FORESEEABLE FUTURE

More recently there has been much international discussion toward 'phasing out the fossil fuels' because of environmental pollution, and replacing them with alternative forms of energy. While a substantial reduction in the use of fossil fuels is important, it is rarely neither necessary nor desirable to go to the opposite extreme. Many have missed the central point: ***The answer does not consist of any "single promising solution to all of our environmental problems."*** The real problems are the rate of pace, greed, rampant consumerism, irresponsibility, the huge waste that is created, the destruction of war ... ; not just fossil fuel usage! ***A multi-dimensional approach is needed.***

Appendix 1

MICRO-ECONOMICS

A BRIEF REVIEW OF BASIC MARKET RELATIONSHIPS AND EXCHANGE

This section is mainly concerned with micro-economics. This brief summary reviews some of the basic terms and relationships commonly understood in the free play of market forces. They generally reflect natural shorter-term human behaviour. However, beneath all of these there is a complex interplay between scarcity and need, competition and monopoly, perception and reality, information and secrecy, comparative leverages with respect to financial, legal and intellectual resources and power that could fill many volumes and would touch several subjects such as psychology, politics, marketing, and others.

DEMAND, SUPPLY AND PRICE

Demand is the willingness to purchase any good or service at some price per unit. Generally the lower the price offered, the larger the quantity of the goods that are bought in the market. Thus demand was a negative relationship between price and quantity.

Supply is the willingness to offer a quantity of the good or service at a given price per unit. Generally the higher the price at the market, the larger the quantity of the goods or services will be made available. Supply has a positive relationship between price and quantity. [There are some exceptions.]

ELASTICITY

The elasticity (flexibility or negotiability) of price depends on the nature of the good or service. For example, luxuries or items that have ready alternatives tend to have more flexible relationships; the buyer has more influence in the price. On the other hand, necessities have more rigid prices, at least in the short term; the buyer has much less influence in the price; and seller has more power. Naturally these relationships can change in different circumstances such as the existence and degree of competition.

MOVING OR SHIFTING RELATIONSHIPS

The relationships between price and quantity of **demand** can move because of *natural circumstances* such as needs, population, availability of other alternatives; or *artificial circumstances* such as regulations (threat, imposed costs), marketing (benefits, incentives), speculation (investment trends, foreign opportunities) and availability of finance.

The relationships between price and quantity of **supply** can also move because of *natural circumstances* such as the available of resources, natural decay, deterioration and seasons; or *artificial circumstances* such as maintenance and preservation, trashing (e.g. vandalism, war, theft), regulations, manufacture (e.g. planned obsolescence) and restrictive trade practices (e.g. information suppression, falsity).

The basic **market movement dynamics** indicate that where demand is greater than supply the price will increase, and the sellers will take the opportunity to reap more money. Where demand is less than supply the price will tend to decrease and then less will be made available. Consequently in any market there should be some 'equilibrium' price for the item where the amount wanted (demand) and its availability (supply) is approximately equal.

OTHER GENERAL RULES

There are a number of micro-economic maxims that are also useful, such as:

The Law of Diminishing Returns

The personal rewards or satisfaction are generally greatest from the first item acquired and tends to become less progressively from each subsequent item. For example, one car may be a large benefit; two cars might be better in total, but not twice as much as the first. Money also has diminishing returns in most situations.

The Economies of Scale

The cost of producing larger numbers of a given item generally decreases per unit. There are several reasons such as experience, specialisation and repetition.

PRICE AND VALUE

Price is not to be confused with value. The **value** of any product or service depends on its 'want satisfying ability', which varies from buyer to buyer. For example, in an auction an item may then go to the highest bidder, and this is one mechanism by which selling price can be determined, but that buyer might have an even much greater value for him. Transacted prices have objective validity in that they are verifiable in hindsight, but 'asking **price**' is no more than a wish, and 'value' is entirely personal. To minimise such confusion, the use of the term 'value' was avoided as far as possible in this book.

FACTOR PRICES

Factor prices consist of wage and salary rates, interest rates, set profit margins, rates of taxation, charged rentals and so on. They are the rates at which given quantities or packages of a particular factor are transacted. The

true contributions of the elements of production are interactive and cannot be clearly separated from one another; therefore their prices, and hence the incomes of their holders, are also set by forces of opportunity, scarcity and sometimes by regulation, in a similar way using the 'market forces of supply and demand'. Monopoly and unionism are examples of ways in which artificial scarcity can be created to have greater control over the relevant factor prices.

Appendix 2

PERSONAL ECONOMICS

Common sense based on sound economics principles can also be applied in the management of personal physical, mental, emotional and material resources beyond the mere financial

No commercial business can run at a loss in the long term. This means that the inflow of money must be equal to or greater than the outflow necessary to maintain these activities. For the individual it is the same – he cannot spend money faster than he earns it indefinitely. In the short term he can if he has a stored surplus or he borrows. The surplus inevitably runs out and his borrowing capacity eventually reaches a limit where the interest load and the required repayments threaten to exceed his income. People who are unable or unwilling to live within their means can fall into this trap.

This is elementary. However, there are more pressures than these: In the broader market there is also the relentless pursuit of financial efficiency and profit maximisation. Where competition is fierce this reduces to an overriding emphasis on cost minimisation. The increasing tendency towards open markets and globalisation intensifies competition even further, and all of these forces translate into ever increasing pressures on individuals to produce more for comparatively less.

The important message is that there are only 24 hours in every day, and there are natural limits to the flow of material resources, energy, the capacity of endurance, stamina and the physical or mental tolerance – at least in the short run. As pressures increase, *all* of these are increasingly drawn upon without relief until the weakest or scarcest component reaches its limit, possibly with serious long-term consequences. Few resources can be substituted with others; and not every resource can be readily purchased with money.

Furthermore, the intermittent short-term performance of any system is invariably greater than the continuous safe performance. However, when the higher short-term capacity is demanded on a continuous basis, premature breakdown becomes inevitable, namely, increasing physical and mental illness, higher accident rates or the breakdown of personal relationships.

SOME PRINCIPLES OF PERSONAL ECONOMICS

Personal rationing and balancing is not only about money but time, energy, stamina, physical and mental health and cooperative support. Below are some of the basic principles that people have known from experience:

- In the medium term, *expenditure in financial commitments must be less than money income* [of course!].
- Both central costs *and the peripheral costs* must always be considered. This is a particularly common trap for the inexperienced who take on new projects and commitments.
- A person who spends all of their surplus income ends up with inadequate reserves and often mounting debts, largely because of the *unexpected*.
- There is a need for balance, not only financially, but also in energy, time, health, human relationships and other resources.
- Running a system at an 'emergency' performance *continuously*, is very damaging and costly in the longer term.
- When approaching critical depletion (e.g. exhaustion) in any necessary resource, recovery becomes increasingly difficult and often impossible.
- *It is more important to ensure an adequate standard on all important criteria* than to achieve perfection on some, at the expense of neglecting other vital issues. Usually it takes very modest inputs to reach adequacy compared with that required to achieve perfection.
- *There are many things of value and importance that money cannot buy*: Genuine loving relationships, good conscience, restoring health after it has been ruined, incurable conditions, time that has been wasted, enthusiasm, meaning, innate abilities, empathy and compassion.
- Quality time is much scarcer than available time: Energy and the ability to concentrate, particularly in highly intensive occupations, are depleted long before the *time* available.
- Personal specialisation for earning an income is only viable when you have a ready market for your skills. If you do not have any *marketable* skills, you must make most of the necessities yourself.

THE MATTER OF TRUST

- Trust starts with personal integrity. The onus is on *me* to be trustworthy – fair, consistent and good to others. That is the first and most important factor in generating trust.
- People can only be trusted to the extent that you know them. That requires time and experience. There is no commandment to trust anyone. We must be good to everyone, but at a safe enough 'distance'.
- If you are *forced* to trust someone, investigate the relevant information responsibly and *face the risks*.
- Almost all advertising is inherently biased because of vested interests, lies, deception, doubletalk, distraction, selective and/or irrelevant criteria. Relevant information is often deliberately hidden.
- The cost in recovery or compensation through the law, insurance, time, chasing debtors indefinitely and so on, is often too high. The wisest strategy is to give or lend only what one can afford, and never to expect it to be returned.

RELATIVITY

- Performance must also be judged in the light of its costs in terms of time, resources, priorities, sacrifices (health, relationships etc.), alternative opportunities and ethics.
- The highest standard 'overall' achievable economically may not be the highest standard in every (or even any) individual criterion.
- Performance is always subject to *constraints* (i.e. circumstances).
- Perfection is not an absolute standard, but is subject to selected personal values (purpose; sensitivity of the receiver, etc.).
- In optimising, the decision maker must focus on the relevant whole with higher priority in the longer, broader and deeper than the immediate, limited and superficial. There are also issues of ethics and wisdom at stake: To optimise the wrong criterion could ruin the whole project. ['Winning the wrong battle can cost the war'.]

WASTAGE AT THE PERSONAL LEVEL

- Spending on insurance against affordable risks or for irreplaceable items of sentimental value
- Purchasing much more than is likely to be needed or useful
- Spending on more than is useful, including space, possessions and inputs (power, food, etc)
- Failing to investigate comparative prices [Impatience]
- Discarding what can be economically fixed
- Keeping up with the fashion, the latest; spending on symbols of status; gullibility to advertising and "want-creation"
- Failing to stop the flow of resources when no longer required (E.g. leaving the power on, etc)
- Purchasing on credit when waiting and saving up for the item
- Harboring expensive unfounded fears or superstitions
- Buying in uneconomic quantities
- Failing to maintain items in time
- Repurchasing what you forgot you already had
- Purchasing energy-inefficient items
- Using aerosol sprays, much of which are wasted and pollute the air
- Using private transport where public transport is almost as convenient
- Purchasing one's own when the item can be conveniently borrowed
- Getting professionals to do what you can effectively do for yourself
- Chasing a hopeful but uneconomic investment with endless further input
- Purchasing new when the second-hand item is reliable
- Purchasing decisions based on irrelevant criteria (often brand name or surface appearance)
- Failing to consider the total long-term cost, not only the initial cost
- Abusing items beyond their designed tolerances; losing or ruining things because of insufficient care.

The emphasis on personal economy is not intended to promote an attitude of the miserly “Scrooge”, but towards remaining solvent, environmentally conscious and even possibly to be in the position to assist others who may be less fortunate.

POVERTY

The state of wealth and poverty are largely a matter of reality and perception. However, there are a number of personal observations:

Reality

- The System may prevent the person from making any *contribution* [Their skills may be effective, but not cost-effective.]
- Poverty is often increased by the added loads imposed by bureaucracy
- Poverty is diminished with skills, human support and infrastructure
- Poverty is directly related to lack of support, homelessness, joblessness
- There are several things that cannot be bought with money

Relativity

- Poverty is a matter of definition and degree
- Poverty can be assessed relative to your real costs such as your medical, disabilities or dependent responsibilities, or your peer expectations.
- Poverty can be voluntary [e.g. In some closed communities, a person may have little personal property, but have liberal access to communal resources]

Psychological aspects

- Consciousness of poverty is more acute with risk and fear

Some Approaches with increasing reluctance

- Family support
- Second-hand purchases
- More practical skills and resourcefulness
- Minimal government hand-outs (with heavy bureaucratic conditions)
- Charities, churches, community organisations, soup kitchens
- Begging, squatting, scrounging

VIABILITY

People have a variety of *requirements*, and also available *resources* in the immediate and foreseeable future:

Requirements in which most people have some control, including

- Personal state of financial commitment and debt

- Number of dependants
- Values, ambitions, vision, non-financial commitments
- Necessities

Resources can be influenced or limited by many factors such as

- Supply and demands in the labour market
- Changes in employment
- The state of the economy
- Personal health and energy
- Skills
- Personal orientation in terms of optimism or pessimism
- Qualifications
- Self-knowledge
- Time, material wealth
- Available support, personal relationships and so on

The possible *Viability* (i.e. ‘resources’ compared with ‘requirements’) can vary from

“Slack”, “Comfortable”, “Tight”, “Desperate”, towards “Impossible”

Their actual position could be the result of choice, over-optimism, lack of wisdom, or ignorance and sometimes other factors beyond their control. In normal circumstances *if the person can choose* a realistically “comfortable” position, sometimes their fortunes may wander to the “slack” or to the “tight”, but very rarely towards the “impossible”. However, if they start optimistically at the “tight” position (where their resources are difficult to barter), it is almost certain that they can wander towards the “desperate” or even worse.

PERSONAL VALUES

Not all talented professionals are motivated by lots of money. Beyond earning enough for comfort, basic security and remaining solvent, most find that money has diminishing returns. For some, conscience, integrity, professional pride, the sense of making a contribution, achievement and satisfaction, or an intrinsic interest in their professional vocation are more important. Others are drawn by fame, kudos, social standing or praise.

There are many things necessary and desirable that money cannot buy – such as good health, sanity, peace, time and friendship of the more durable kind. A person wants to achieve many things, but cannot do everything because they have limited time, means and resources. They must choose, balance and prioritise in order to survive and to improve their situation according to their own values.

Within all of these they are also restricted by reason, the laws of nature and wisdom. *This is the broader essence of personal economics.* To focus solely on getting more and more money indefinitely without any other vision, is counter-productive both personally and for the whole system.