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An Assessment of Commodity Export Performance in South Pacific Countries, 1960 to 1999

by

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An Assessment of Commodity Export Performance in South Pacific Countries, 1960 to 1999

Euan Fleming and Anita Blowes**

Abstract

We examine export performance and the factors influencing export growth in ten South Pacific countries, concentrating on the comparative influences of geographic endowments, policies and institutions. The countries under study are Cook Islands, Fiji, Kiribati, Niue, Papua New Guinea, Samoa, Solomon Islands, Tonga, Tuvalu and Vanuatu. Only Fiji, Papua New Guinea and Solomon Islands experienced a positive trend in total commodity export values. Agricultural export values grew significantly only in Papua New Guinea and Solomon Islands. Most countries experienced growth in non-agricultural commodity export values, albeit from a low base.

As a general rule, export performance was superior for countries with richer endowments of natural resources. Geographic factors associated with small size impeded export performance in small South Pacific countries, in particular. Evidence suggests that export performance was not improved by good policies unless those policies were properly implemented. To be satisfactorily implemented, they required soundly operating and effective institutions. Unfortunately, institutional performance deteriorated over the study period and was likely to have adversely affected export performance, particularly in the primary industries.

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1. Estimates of Trends in Commodity Export Values

A trend towards a liberalised world trading environment has pressed South Pacific countries to orient production towards greater international competitiveness in existing markets while continually searching for new markets. Complementing their aims of more efficient production and greater competitiveness, countries have attempted to move their production processes up the export value chain through higher value-adding industries. This orientation towards greater international competitiveness and higher value adding would be expected to lead to increased commodity export values over recent decades.

Commodity export values were analysed for ten independent or self-governing developing South Pacific island countries over the final four decades of the 20th century to measure their success in improving export performance. The countries under study are Cook Islands, Fiji, Kiribati, Niue, Papua New Guinea, Samoa, Solomon Islands, Tonga, Tuvalu and Vanuatu.

The study was undertaken for total commodity exports, and separately for agricultural and non-agricultural commodity exports. Stochastic dominance analysis was used by applying the RISKROOT program devised by McCarl (1996) to assess export performance across the four decades. This program allows simultaneous assessment to be carried out for two key criteria: the mean value of commodity exports and variability around the mean. As a supplementary measure, linear trends in annual export values were also estimated for total, agricultural and non-agricultural exports from 1960 to 1999. All export values were expressed in 1999 US dollars by converting annual domestic values in nominal terms to US dollars using the annual average exchange rate. These values were then adjusted to 1999 values using the US dollar-denominated world export unit value index published by the International Monetary Fund (IMF 2002).

Table 1 reveals that only three countries (Fiji, Papua New Guinea and Solomon Islands) experienced a significant positive trend in total commodity export values per year over the study period. The trend was downward in six countries and insignificant in Tuvalu. Examining the disaggregated results, agricultural export values grew significantly in only two countries (Papua New Guinea and Solomon Islands) and

declined significantly in seven countries, with no significant trend in Fiji. Six countries experienced significant growth in non-agricultural commodity export values. Values declined in two countries (Kiribati and Niue) and did not change significantly in Vanuatu.

Table 2 shows the stochastic dominance by country from decade to decade during the study period for agricultural and non-agricultural export values separately as well as for total exports. The decade of overall dominance is shaded for each series of values, with no shading for export categories for which the 1960s is the dominant decade. Taking Cook Islands as an example, the dominant decade for non-agricultural exports is shown as the 1990s and the dominant decade for both total and agricultural exports is the 1960s.

As a general rule, export performance was superior for countries with richer endowments of natural resources. Total and non-agricultural export values improved from one decade to the next in Fiji, Papua New Guinea and Solomon Islands, with the 1990s the dominant decade. For Vanuatu, the 1970s was the dominant decade for total and agricultural exports and the 1990s was the dominant decade for its non-agricultural exports. In contrast, total export performance generally declined over the decades in Cook Islands, Samoa, Tonga and, after exhausting its major natural resource of phosphate in 1979, Kiribati. Tuvalu bucked this trend somewhat as the 1980s dominated the 1970s and was the dominant decade. But this was a temporary phenomenon brought about largely by the waxing and waning of the idiosyncratic philatelic industry, which was managed from United Kingdom.

Tonga achieved a rare success among those countries less well endowed with natural resources by reversing the downward trend in total and agricultural export values in the 1990s, but not sufficiently to counter the decline from the 1960s to the 1980s. Agricultural export performance fell back even among countries well served with natural resources, with the 1970s the dominant decade in Fiji and Papua New Guinea. Only Solomon Islands was able to improve agricultural export performance across successive decades, but recent strife means that the omens are not good for a continuation of this trend into the 21st century. Vanuatu, a country with rich agricultural resources, was able to improve agricultural export performance slightly from the 1960s to the 1970s, but performance in the final two decades was inferior to

that in the first two decades, declining significantly during the 1980s before recovering slightly in the 1990s.

Table 1 Linear Trends in Annual Values of Total, Agricultural and Non-Agricultural Exports, 1960 to 1999

| | _ | | | | | | | | |
|--------------|---|------|----------------|---------|--------------------------|------|--|--|--|
| | Trend coefficients in values (t-ratios) and annual percentage changes | | | | | | | | |
| Country | Total exports | | Agricultural e | exports | Non-agricultural exports | | | | |
| - | | | | | | | | | |
| | US\$000 | % | US\$000 | % | US\$000 | % | | | |
| Cook Islands | -204.4 | -3.5 | -225.9 | -8.5 | 21.5 | 1.3 | | | |
| | (-8.31) | | (-12.69) | | (1.62) | | | | |
| Fiji | 7168.6 | 2.6 | -65.9 | 0.0 | 7234.5 | 7.3 | | | |
| | (8.94) | | (-0.16) | | (9.86) | | | | |
| Kiribati | ribati -731.0 | | -102.9 | -3.1 | -628.1 | -8.6 | | | |
| | (-3.43) | | (-3.43) | | (-3.08) | | | | |
| Niue | -12.2 | -4.2 | -4.8 | -2.6 | -7.4 | -8.3 | | | |
| | (-4.87) | | (-2.22) | | (-5.67) | | | | |
| Papua New | 45 937.6 | 6.1 | 4513.0 | 1.8 | 41 424.6 | 9.6 | | | |
| Guinea | (14.23) | | (3.16) | | (13.66) | | | | |
| Samoa | -535.3 | -3.6 | -617.8 | -5.0 | 82.5 | 3.3 | | | |
| | (-7.78) | | (-11.17) | | (2.73) | | | | |
| Solomon | 3028.3 | 5.5 | 279.3 | 1.3 | 2749.0 | 10.7 | | | |
| Islands | (14.05) | | (2.79) | | (16.14) | | | | |
| Tonga | -112.8 | -1.0 | -205.3 | -2.2 | 92.5 | 6.2 | | | |
| | (-2.53) | | (-4.95) | | (9.73) | | | | |
| Tuvalu | -0.7 | -2.0 | -8.1 | -12.1 | 7.32 | 17.3 | | | |
| | (-0.11) | | (-4.87) | | (1.18) | | | | |
| Vanuatu | -244.1 | -1.1 | -247.5 | -1.5 | 3.4 | 0.7 | | | |
| | (-2.11) | | (-2.32) | | (0.13) | | | | |

Table 2

Inter-Decade Trends in Stochastic Dominance for Total, Agricultural and Non-Agricultural Export Values, 1960s to 1990s

| Country | 1960s to 1970s | | | 1970s to 1980s | | | 1980s to 1990s | | |
|------------------|----------------|----------|---------------|----------------|--------------|----------|----------------|----------|----------|
| Country | Total | Agric | N-Ag | Total | Agric | N-Ag | Total | Agric | N-Ag |
| Cook Islands | ↓ | \ | \ | ↓ | \ | 1 | ↓ | \ | ↑ |
| Fiji | 1 | 1 | 1 | 1 | \downarrow | 1 | 1 | 1 | 1 |
| Kiribati | 1 | \ | 1 | \ | \ | \ | 1 | 1 | ↑ |
| Niue | ↓ | 1 | \ | → | \ | 1 | → | 1 | \ |
| Papua New Guinea | 1 | 1 | 1 | 1 | \ | 1 | 1 | \ | 1 |
| Samoa | \ | \ | 1 | \ | \ | 1 | \ | \ | 1 |
| Solomon Islands | 1 | 1 | 1 | 1 | 1 | 1 | 1 | 1 | 1 |
| Tonga | \ | \ | 1 | \ | \downarrow | 1 | 1 | 1 | 1 |
| Tuvalu | 1 | | \rightarrow | 1 | \ | 1 | → | | ↓ |
| Vanuatu | 1 | 1 | \ | \ | | \ | 1 | | 1 |

Note: Shaded cells signify the decade of overall stochastic dominance.

A feature across all countries but Kiribati and Niue was the dominance of the 1990s in non-agricultural export values, as observed in Table 1. Even in these two countries, there are extenuating circumstances. The decline in Kiribati was due to the cessation of phosphate exports in 1979. In fact, non-agricultural export values experienced a significantly increasing trend over the final two decades. Non-agricultural exports in Niue during the 1960s were dominated by re-exports that could not be separated from domestic exports. If they could have been removed from the analysis, it is possible that the decline would not have taken place although it has not proved possible for Niue to develop any new non-agricultural exports. Unfortunately, this general improvement in non-agricultural export performance was from a very low base in less

well endowed countries where it was far from sufficient to offset worsening agricultural export performance.

2. Factors Influencing Commodity Export Performance

Countries enhance their export competitiveness by exploiting their comparative advantage. A country's export base may be seen as its natural resources and human and physical capital that can be potentially converted into export revenue. Increasingly, though, comparative advantage is modified by institutional and technological factors, standards of governance, product quality, information asymmetry, the presence of increasing returns to scale and the nature of the competitive environment.

Six factors have exerted, and continue to exert, significant influences on comparative advantage and export performance in South Pacific countries: geographical factors; the accumulation of physical and human capital; changes in the relative desirability of primary and manufactured exports; the policy orientation of governments; governance issues; and export market access.

2.1 Geographical factors

Frankel and Romer (1999:304) found that geographical factors influence the level of trade a country undertakes. In South Pacific countries, geographic factors influence export activity in five main ways: natural resource endowments; changes in the condition and availability of these endowments through human activity; the interaction of small size with fragmented landmass, remoteness and limited domestic market size; external economies; and the prevalence of natural and biological disasters. Each of these five factors is now discussed briefly.

2.1.1 Natural resource endowments

We modify a classification of natural resource endowments among small South Pacific countries by Mellor (1997a:70-71) to include four categories:

 Countries richly endowed with natural resources, in which category we include Papua New Guinea, are well placed in terms of natural resource endowments to achieve sustainable levels of economic development.

- Comparatively well endowed countries include Fiji, Solomon Islands and Vanuatu, which have 'adequate natural resources to aspire to sustainable levels of economic development' (Mellor 1997a:71).
- Marginally well endowed countries such as Samoa and Tonga have 'some prospects for economic development, but [are] likely to need ongoing external support to be sustainable' (Mellor 1997a:71).
- Inadequately endowed countries such as Cook Islands, Kiribati, Niue and Tuvalu
 are 'seen as having insufficient natural resource endowments for sustainable
 economic development (in the absence of permanent international support)'
 (Mellor 1997a:71).

The results reported in Tables 1 and 2 for export performance correlate quite closely to the above classification of endowments. Overall results are suggestive of a strong influence of natural resource endowments on export values in South Pacific countries. They appear to be necessary but not sufficient for improved overall export performance. Prospects for export development would be expected to be similar to those for economic development. Without a rich supply of natural resources, abundant cheap labour or a highly educated and healthy work force upon which to form an export base, limited avenues exist to exploit comparative advantage through export activity.

2.1.2 Changes in the condition of the natural environment

South Pacific countries experience environmental disasters that occasionally disrupt exports but, more insidiously, are facing chronically worsening situations in their natural environments that have not been manifested in trends in export values during the study period. In fact, quite to the contrary in some industries, production practices have led to accelerated growth in exports in the short term while reducing long-term industry sustainability. The exploitation of agricultural, forestry and fishery resources has often been unsustainable. The implications of such behaviour have yet to be fully realised in terms of decreased national output and export volumes and values, but will increasingly become apparent in the future.

Agricultural producers will encounter increasing pressures to intensify production and engage in continuous-cropping monoculture, associated with rising aspirations,

greater population pressure and a dwindling supply of land available for clearing. Increasing urbanisation, poor resource management practices, inadequate planning and management of infrastructure and services, and excessive use of chemicals have led to increased pollution. Agricultural activities, especially on steep slopes, have suffered from soil erosion, loss of windbreaks, siltation of waterways and falling soil quality that has been exacerbated by pig damage and indiscriminate burning, making them more prone to damage from natural and biological disasters (McGregor and McGregor 1999:9). Bourke (2001:11) underscored the threat posed by land degradation in Papua New Guinea, arguably the country with the greatest agricultural land resources, resulting in environmental degradation and poor crop performance. McGregor and McGregor (1999) related similar stories for Samoan and Fijian agriculture. This threat varies among countries under study (McGregor and McGregor (1999) observed that Vanuatu is less prone to environmental degradation) and even within countries; it is most notable in areas of high population density and on small islands. Bourke's (2001) message is that there is little room for complacency because, just as the symptoms of natural resource degradation take some time to become evident (for example, in measures such as export volumes and values), so solutions to environmental degradation take a long time to put into effect. Smallholders, in particular, will have to improve their farm management skills if they are to remain competitive in the face of declining yields, increasing costs and cultivation difficulties. But, increasingly, they will depend on results from research into sustainability to enable them avoid practices that degrade their production systems.

In Melanesian forestry sectors, a combination of bad government policies, inappropriate contract systems and ineffective monitoring and follow-up of infringements of laws have encouraged foreign logging companies to 'log as much as possible while prices continue to be high and have little regard for sustainable logging practices' (Duncan 1994b:22). Similar observations are being made about increasing environmental problems and lack of sustainability in fishery sectors in virtually all countries under study.

2.1.3 Fragmentation and remoteness

South Pacific countries tend to have higher production and marketing costs than many other developing countries. This situation is due in large part to smallness of size and the relatively high standards of living by developing country standards that make the reservation price of labour high. But the fragmented nature of internal markets is also a major factor in making the costs of doing business high. The archipelagic nature of many South Pacific countries makes for segmented domestic markets that are not suitable stepping stones to the development of an export industry. This segmentation imposes barriers to extensive agricultural and resource-based developments, in particular, making internal transport costs high.

The South Pacific region is also located relatively far from the world markets, especially the large trading blocs of the European Union and USA. This isolation, when combined with small export volumes, results in high external transport costs per unit of export. The constraint imposed by remoteness has become a greater disadvantage to South Pacific countries over time as scale economies in shipping have enabled technological improvements to have a greater impact in reducing international transport costs on the major shipping routes.

2.1.4 Smallness and external diseconomies

Small populations lead to small domestic markets and difficulties in achieving critical mass and scale economies that constrain the development of international trade and investment flows. The costs to producers and marketers of export products of services provided by the private sector and public utilities in South Pacific island countries are high by international standards. For example, Falvey (1991:3) compared the electricity costs in Fiji, Papua New Guinea and Vanuatu with those in USA and found them to be two to three times higher. High production costs mean that South Pacific countries tend to have a comparative disadvantage in manufacturing and the processing of raw materials produced by their primary industries.

Increased export activity is often associated with the agglomeration of industries that yield relatively high rates of return from internal and external economies and an ability to overcome indivisibilities associated with lumpy inputs. Agglomeration economies are manifested in efficiency gains and cost reductions by firms or industries at the core of the agglomeration that can achieve and sustain a critical mass of expertise and experience in their particular area of economic activity. Examples are economies in the use of infrastructure, especially transport, electricity and

communication, access to other public services, size of the local output market, access to well-developed capital and labour markets and pools of managerial talent, and the influences of competitive market organisation and industry structure (Butler and Mandeville 1981:49, Richardson 1969:70-73).

Large corporations can internalise agglomeration economies whereas small firms find it more difficult to sustain the inputs into the technological development, market research and quality control necessary to develop the production and export of a product and defend its market position. Firms in small developing countries suffer a 'double whammy'. They themselves tend to be small, making it difficult to internalise agglomeration economies. At the same time, they are more likely to suffer from external diseconomies, especially in rural areas where they typically face high transaction and communication costs, and lack affordable access to venture capital.

In these difficult circumstances, a strong case can be made for regional specialisation to encourage international competitiveness, with a heavy reliance on products and markets for which the required knowledge and experience already exist. Timmer (1997:625-626) proffered two reasons why regional specialisation might be crucial for rural development and, one could add, export development in general. The first and most obvious reason is that agronomic and climatic factors sometimes strongly favour one industry over others. This is evident, for instance, in the cases of the sugar industry in Fiji and all four major tree crops (coffee, cocoa, oil palm and copra) in Papua New Guinea. The second reason, according to Timmer (1997:626), is more easily overlooked but may be just as important: the formation of 'extensive backward and forward linkages from the producer level [that] can be both technological ... and financial'.

The problem of small size also extends to many forms of government activity. There are strong diseconomies of scale and scope in regulation and facilitation in small countries because these activities require a thorough knowledge of the environment in which an intervention is to be made and the likely responses to the regulation and assistance by people affected by them. Substantial fixed costs are customarily incurred in gathering this knowledge, which can result in decreasing-cost activities. The wider the array of regulations over which a resource-strapped government

department has to spread itself, the less likely it is that each regulation will be effective and the more likely that it will lead to unanticipated negative consequences.

2.1.5 Natural and biological disasters

Natural disasters include drought, cyclones, flooding, frosts, volcanic eruption, earthquakes and landslides while biological disasters cover pest and disease outbreaks. Their adverse effects on agricultural exports, in particular, are evident in virtually all countries under study. Chung (1996, cited by McGregor and McGregor 1999:5) assessed the degree of vulnerability to various natural disasters of all Pacific island countries, including the ten under study.

Primary commodity exports, as might be expected, tend to be more affected than manufactured exports by natural and biological disasters in South Pacific countries. Agricultural systems are particularly prone to damage, yet they are surprisingly resilient to natural disasters. Where natural disasters have led to the termination of an agricultural export industry, pre-existing maladies of the industry were the underlying reasons for failure; the natural disaster tended to be 'the straw that broke the camel's back'. Where an industry was otherwise healthy, exports rebounded quite quickly.

In general, agricultural systems in the South Pacific tend to recover more quickly and at lower cost from natural disasters than they do from biological disasters. This is evident from the calamitous impact in Samoa in 1993 of taro leaf blight on the taro industry that had recovered quickly from the earlier effects of Cyclones Ofa and Val in 1990 and 1992. But a worrying consequence of export expansion through the commercialisation of agricultural production is that it can leave farming systems more prone to damage from both natural and biological disasters. McGregor and McGregor (1999:23), for example, contended that the move towards taro monoculture in Samoa, abetted by Cyclones Ofa and Val, caused imbalances in the agroecological system that triggered the outbreak of taro leaf blight. They also observed that the disappearance of the robustness that characterises traditional farming systems exposes agricultural systems to greater environmental disasters and degradation, and retards their ability to recover from them (McGregor and McGregor 1999:9).

2.2 Accumulation of capital

2.2.1 Infrastructure

All commodity export industries in the South Pacific depend heavily on a sound internal infrastructure such as road transport, port and communication facilities, and the associated services they provide that are largely the responsibility of governments. Lanjouw and Feder (2001:26) observed that 'the importance of infrastructure in supporting the expansion of the non-farm economy is a fairly robust finding from many studies throughout the developing world'. In respect of rural-based export industries, they viewed rural infrastructure as 'an essential requirement for growth of the rural non-farm economy: inadequate and poor quality infrastructure imposes serious costs on virtually all economic activity'.

Many infrastructure projects created the impetus for greater export opportunities in South Pacific countries from the 1960s. They played an especially crucial role in linking rural areas to commercial centres and ports. Despite these early advances, the impacts of infrastructure projects petered out. High transport costs and unreliable transport services, exacerbated by substantial distances between islands that make inter-island transport difficult, suggest investment in infrastructure is currently well below its socially optimal level in South Pacific countries, resulting in a limited transport network that hinders economic progress. This situation has been exacerbated by the inefficiency of public corporations operating services that use the infrastructure, and complicated by the strategic decision whether to invest in new infrastructure or use the funds to upgrade and maintain existing infrastructure. A strong case can be made for the latter approach where public funds are limited, and indeed apparently most governments face a chronic problem of insufficient public funds to operate, maintain and rehabilitate existing infrastructure.

Analysts nevertheless need to be cautious in recommending infrastructural development as a solution to a lack of export success in all circumstances, apart from the obvious reason that these facilities are costly to build and maintain. The Agricultural Planning Unit (1993:12) issued a caveat about placing the blame for deteriorating agricultural export performance in Cook Islands on infrastructural deficiencies, pointing out that exports had declined markedly even though there had been substantial improvements in infrastructure over the same period.

2.2.2 Domestic saving and investment

South Pacific countries have found themselves in a cleft stick in their efforts to diversify away from a heavy dependence on primary commodity exports into manufactured exports because of the obstacles they have encountered in developing manufacturing industries in which they have a comparative advantage. Their export industries have displayed limited ability to raise capital domestically that would enable them to develop more capital-intensive industries, a plight worsened by relatively low and declining marginal efficiency of capital (Thirlwall 1991:60, Economic Insights 1994:39). The main escape route from this predicament has been, and remains, foreign direct investment, which is dealt with in the next section. A low or negative domestic saving rate has been one of the reasons why manufacturing industries have failed to raise adequate capital domestically (World Bank 1991:10). A poorly performing financial sector has also been proffered as a reason.

The issue of financial development and its impact on economic development in South Pacific economies is a vexed and complicated one. The complaint is commonly heard that financial services for borrowers are inadequate for them to expand their productive activities, and that the financial systems are shallow (for example, World Bank 1991:10). Yet the available evidence does not provide strong support for this proposition. Skully (1997) undertook a thorough review of the funding situation for private-sector borrowers, among other matters concerning financial systems, in seven South Pacific countries (Papua New Guinea, Niue and Cook Islands were excluded among the countries under study). Some of the conclusions of his review are:

- Borrowers in South Pacific countries are not badly treated in terms of availability of financial services.
- Most borrowers have had a range of choice of financial institutions.
- In the main, banks have been able to re-lend the deposits they had raised.
- Most of the reasons why banks have not lent more come back to shortcomings of the borrowers rather than lending constraints. Specifically, they reflect a lack of 'interest or willingness of the South Pacific people to engage in formal business activities' (Skully 1997:45).
- The legal system has caused only minor delays in most financial dealings.

• The regulation of banks has been generally acceptable.

The one area identified by Skully (1997:23-25) as having room for improvement is the availability of finance to customary landowners who find it impossible to provide collateral to borrow funds for agricultural development (an issue we return to below).

2.2.3 Foreign direct investment

Foreign direct investment is a controversial issue in most developing countries, but it is essential if economic development is to be driven by increased export activity. The situation of low domestic saving rates in South Pacific countries has meant that foreign direct investment has been the major source of venture capital for export expansion. It has been an integral part of numerous successful commodity export development processes.

But while foreign direct investment has often led to the development of competitive export industries in South Pacific countries, governments have not always done well in encouraging suitable foreign investors, particularly given the capriciousness in their policies (Duncan 1994c:22). Cole (1988:48), McMaster (1992) and Mellor (1997a:93) summarised the main issues relating to the encouragement of desirable foreign direct investment in South Pacific countries. Investors face a number of constraints, notably small market size, isolation, lack of managerial skills, inappropriate government policies, ineffectively operating institutions, lack of awareness of business opportunities, capital shortage, limited human capital and, for some countries at least, difficult internal transport. Cole (1988) identified five goals for South Pacific governments to aim for: suitable macroeconomic environment; openness to foreign trade and investment; flexible labour markets and internationally competitive wages; adequate infrastructure; and an effective and equitable legal framework. He downplayed the importance of tax incentives and concessions, arguing that these inducements to foreign investors were less important than an attractive business climate brought about by successfully addressing the five issues listed above (see also McKee and Tisdell 1990:23). One thing missing from Cole's (1988) list is the quality of human resources in the host country if full advantage is to be made of foreign investment, a matter taken up in the next section.

The case for collaboration with foreign corporations and encouragement of foreign direct investment (the so-called merging of globalisation with localisation) rests to a large extent on the desire of South Pacific governments to add value to their existing exports, especially food products. Yet beyond their shores an unremitting march is taking place in production and market research in food industries. The research resources of transnational food corporations (Anon. 2001:79), in particular, are such that it is virtually impossible, without outside help, for domestic South Pacific companies to compete by adding value to their own products. The one area of exception is high-value non-traditional (HVNT) products in small markets or, more likely, market segments such as seasonal windows.

Joint ventures offer potential for the effective use of foreign direct investment to generate export development but the track record has not been promising in the South Pacific. Success has been more conspicuous in the large-scale exploitation of natural resources where scale economies and technology are important, but even here performance has been patchy to date. Most joint ventures have been oriented towards public sector partners rather than domestic private corporations. The most prominent examples have been in industrial fisheries where the performance of joint ventures in the region has been poor thus far (Doulman 1989, Maxwell and Owen 1995).

2.2.4 Human capital investment

One of the most important lessons of development experience is that the rate of human capital formation must be raised to sustain high rates of growth of output over long periods of time (Naqvi 1997:9-10). By increasing total factor productivity, human capital formation is becoming an ever more vital ingredient for export competitiveness. Unfortunately, industries in the South Pacific do not have a comparative advantage in the production of exports that are intensive users of labour, technology or knowledge, especially given their low labour productivity (for example, Economic Insights 1994:39), especially in manufacturing (Falvey 1991:3).

It is not sufficient, therefore, that governments simply ensure that flexible labour markets and internationally competitive wages exist, as Cole (1988) inferred, to encourage the sort of investment that will generate improved export performance. They also have an important role to play in overcoming the shortage of human capital

that has been manifest in South Pacific countries to date. This shortage has been a defining factor limiting export industries from taking up improved technologies, reducing production costs and being sufficiently flexible to meet changing consumer demands. It has been especially evident in the numerous failures of HVNT products.

That South Pacific countries have suffered from a lack of human capital has been due mainly to low education levels. For example, the most recent rankings for South Pacific countries included in the international human development statistics place Fiji in 72nd position, Samoa 101st, Solomon Islands 121st, Vanuatu 131st and Papua New Guinea 133rd (UNDP 2002). The low rankings have been due in part to low combined primary, secondary and tertiary gross enrolments ratios, for example, 65 per cent for Samoa, 50 per cent for Solomon Islands and 38 per cent for PNG (no figure was registered for Vanuatu). Fiji was an exception among the countries included, with a ratio of 83 per cent (UNDP 2002), but education standards there are declining. Lack of skilled labour is also due to high emigration rates of skilled professionals in some countries.

Low labour productivity, limited uptake of improved technologies and high production costs relative to competing countries have often meant that a strong comparative advantage in agricultural production has been heavily diluted by a comparative disadvantage in adding value through further processing of the agricultural raw material. Comparative advantage still lies mainly with raw or slightly processed primary commodities that may in some cases have suffered declining real prices (see below). A common response to this concern has been for governments, and industry organisations in agriculture (for example, CIC 1992), to argue for a containment of wage increases in order to maintain competitiveness. Yet lowering real wages is 'not victory, that is defeat' (Porter 1998:2). The most effective way to achieve this goal without artificially depressing the living standards of wage earners is to keep down the cost of living. This outcome can best be achieved by improving local food production through productivity gains that keep domestic food prices low while increasing the real wages of (generally lower-paid) agricultural labour.

It is interesting to observe the important role played by women in many of the agricultural and manufacturing export industries that have succeeded (Ironmonger and Hill 1998:18-26). Examples where women workers predominate include vanilla and

squash production in Tonga, fish canning in Fiji and Solomon Islands, the garments industry in Fiji, and automotive parts production in Samoa. In addition, women have played strong supporting roles in successful agricultural export industries such as copra production in various countries, and coffee, cocoa and oil palm production in Papua New Guinea. We suspect that these successes are not a set of coincidences.

International research linkages and foreign direct investment can supplement domestic investment in human capital. One option for export development is to mobilise local and overseas knowledge and experience by tapping sources of technical and market information through international research systems. Foreign investment by multinational corporations can provide the skills and experience needed by local producers and marketers to meet the international benchmarks in productivity and quality required to obtain or retain a particular competitive advantage.

2.3 Relative merits of primary and manufactured exports

The evidence on trends in agricultural and non-agricultural export values presented in Tables 1 and 2 suggests that the countries under study have had greater export success with non-agricultural exports than agricultural exports. However, this does not mean that governments should favour non-agricultural exports when drafting their development strategies. Doubts persist about the viability of many manufactured export industries and the major impetus to export growth has come in the main from non-agricultural primary exports whose long-term futures are also not assured. Casting aside concerns about the problematic future of non-agricultural exports, there is nevertheless a lingering suspicion that primary commodity exports are susceptible to undesirably large fluctuations, and secular declines, in export prices that inhibit their export performance. Are these suspicions valid?

2.3.1 Is there a secular downward trend in primary commodity prices?

South Pacific island countries still rely heavily on primary commodity exports, which means that world commodity prices have had a significant influence on each country's export earnings growth and stability. Export price fluctuations have had marked and widespread short-term effects on export values, but what of long-term price movements? There has been fairly general agreement that, although their trends have not been consistent, the real prices of primary commodities have generally been

declining over the past few decades. Countries unable to substitute new exports for their traditional primary commodity exports with declining real prices would have experienced a falling aggregate value of exports if this proposition were true.

The issue of trends in real prices of primary commodities, however, is not straightforward. Duncan (1994a:56-57) pointed out that the measurement of the net barter terms of trade of primary commodities is fraught with difficulty. This is particularly so in measuring its denominator, the export unit value of manufactures. It is quite possible that the net barter terms of trade have not been trending downwards if proper account is taken of the effects of changes in the quality of manufactures. The fact remains, however, that the potential to add value through quality improvements is much greater for processed primary and manufactured exports than it is for slightly processed or unprocessed primary exports. This matter is taken up in more detail in section 2.3.3.

Another factor that has to be taken into account in assessing the future long-term trend in primary export prices is that there is a worldwide tendency towards the so-called 'commoditisation' of a number of manufactured products. So, even if the conventional wisdom were true that primary products have suffered a long-term decline in prices relative to the prices of manufactured products in the past, the commoditisation of many manufactured products has meant that their prices have started to decline in real terms. This decline could thereby offer the prospect of some respite from declining real prices for exporters of primary products in the future.

2.3.2 Translation of unstable primary commodity prices into variable export earnings

South Pacific countries have export characteristics that are associated with highly variable export earnings. These characteristics include a heavy reliance on primary exports with variable world export volumes, which in South Pacific countries are highly concentrated, and price-inelastic export supply and highly price-elastic export demand (Onguglo and Ito (2001:3) estimated that Pacific island countries have a share of world trade that is less than 0.1 per cent). Because of these characteristics, all countries under study experience fluctuating export prices that make exporting activities risky. Results of a number of stochastic dominance analyses hinge on differences in the level of export revenue variability between decades. But it is

unlikely that government intervention to reduce this variability has enhanced export performance in South Pacific countries.

Governments in most countries have had a history of operating price stabilisation schemes in major agricultural export industries (mostly export tree crops) to stabilise the macroeconomy and the returns to producers. While this intervention does not influence f.o.b. export values directly, it can do so indirectly by altering the behaviour of suppliers through their planting and supply response to price and price risk. However, price stabilisation has not necessarily translated into significantly more stable export and producer revenue (Onchoke 1996). Movements in world commodity prices are impossible to predict, making the effective operation of price stabilisation schemes difficult and leading to incorrect forecasts of price trends that send the wrong price signals to producers, compounded by lags in export supply response. Difficulties also arise in setting appropriate levels of stabilisation funds, levies and bounties, and ensuring the latter are transferred back to producers. Finally, undue political pressures can be placed on managers of stabilisation schemes who can also find it difficult to quarantine stabilisation funds.

2.3.3 Scope for adding value to exports

Value adding is a highly popular strategy with governments in the South Pacific, but it is an elusive target in most export industries. Successful initiatives to achieve higher value adding by establishing new export-oriented manufacturing industries have been few and far between. Current success stories such as the garment and footwear industries in Fiji and the automotive component parts industry in Samoa lead a precarious existence.

A more common route to higher value-adding activities has been to add value to raw or partly processed agricultural products through further manufacturing processes prior to export. South Pacific is littered with failed ventures of this ilk. Even those that have managed to survive for a lengthy period—sugar milling in Fiji, coconut cream processing in Samoa, coconut oil milling in a number of countries and beef processing in Vanuatu—face ever-present dangers to their financial viability. The same is true of industries based on the processing of other primary products, such as sawmilling and

fish canning. More lasting success has been achieved in simple post-harvest valueadding processes despite low returns to labour in activities such as copra drying.

The record of governments participating in, or encouraging, value adding through marketing and processing has been discouraging. Almost every surviving processing industry is in private hands. Value-adding activities for export need not be doomed to failure in South Pacific countries, but governments should not assume that almost any value-adding activity is good and deserves government support. They need to remember that so-called value-adding industries can quickly become value-subtracting industries if unprofitable. So, should a government persist in helping higher value-adding industries succeed in export markets? The answer is probably yes, but in facilitating the activities of those industries with a proven track record rather than directing them or trying to pick new 'winners'.

An important point to note is that governments should not base their decision to support industries on the criterion of the largest potential amount of value added. Rather than trying to create new high-tech industries, countries need to build on their current strengths, even if they are in agriculture or other primary industries, and governments should provide an economic environment that encourages private firms constantly to invest in and upgrade these industries. This should lead to the development of other new products, skills and companies with higher value-adding potential (Porter 1998).

2.3.4 Maintaining niche markets

The struggle to move up the product value chain in export markets is exemplified by the challenge in HVNT industries to meet the changing demands of foreign consumers, enhancing product quality and developing collaborative ventures with foreign corporations. Changes in consumers' needs are typically either towards higher-value raw materials or changes in the form, timeliness of supply and location of the final product. Some modest value-adding activities are possible through food exports. Recent trends in food marketing have been towards adding consumer value through the incorporation of various attributes that add convenience or other desirable characteristics, such as nutritional qualities ('low fat' or 'organically grown'), food

safety attributes ('clean and green'), or other attributes that are not very sensitive to the scale of operations.

Penetrating and defending these niche markets can be profitable but difficult. Their high value-adding activities require additional inputs, particularly human knowledge and skills for product design and marketing talent, that are in short supply in the countries under study. This largely explains the lack of success that most of these countries have so far achieved in higher value-adding export industries. Another problem frequently experienced with HVNT market segments is that the international competition within them can be quite intense given the limited market size.

Product quality in its various forms (physical attributes such as texture, taste, smell and appearance, consistency, regularity of supply, and so on) becomes increasingly important to producers as they supply the markets of HVNT products. With their limited resources, governments need to choose carefully their activities in market research. The four most suitable interventions are associated with analysing and understanding how best to provide services of a public-good nature to private agricultural marketers endeavouring to export these products. They are: quarantine, and product quality and safety; facilitating the transport, handling, processing and storage activities of private firms; the crucial acquisition of specialist market information and knowledge; and support of cluster development and contractual systems as effective ways in which a government can assist in the development of regional specialisation, given that these firms commonly suffer from agglomeration diseconomies.

It has proven more difficult for South Pacific countries to maintain markets for HVNT exports than it has to break into new markets in the first place. As a consequence, HVNT products have frequently succeeded for only short periods before failing. Major problems with niche markets, apart from their limited volumes of throughput, are that they are volatile and have relatively short life spans.

Some lessons learned from the experiences of HVNT export industries are:

Knowledge of production processes, product attributes and consumer preferences
are critical to achieving export success, and can even overcome seemingly
insurmountable barriers to export imposed by product perishability and low value-

weight ratios. Successful entries into markets such as New Zealand, Australia and USA occurred because these market sectors were, and still are, ones with which exporters are familiar and costly travel is not required in order to establish and service them.

- The cultural importance of a traditional crop need not be a barrier to commercialising its export.
- Entrepreneurship can flourish within village-based export production and marketing systems, but the ability to 'quarantine' profits may be crucial.
- Export marketing efficiency is enhanced by a strong private marketing network, which is often effected by vertical integration or coordination in marketing channels.
- Intensification of production of traditional crops carries with it an increased risk of damage to the agroecosystem.
- A pest- and disease-free status can be critical to export success and needs to be rigorously protected.
- Research into export products, market penetration and defence of export markets is
 difficult but necessary with high-value niche markets. Agricultural research
 institutions and policy makers have failed to provide direction to those aiming to
 diversify the agricultural export base into high-value products.
- Decisions to quit HVNT markets need to be made expeditiously when they are no longer profitable.
- HVNT niche markets require high levels of export management skills, of which there has been a lack in South Pacific countries.

Adding value is inextricably linked to other factors influencing export success, such as the potential role of foreign direct investment in developing higher value-adding industries, discussed above.

2.4 Policy orientation

2.4.1 Nature of government intervention

The public and private sectors play different but interrelated roles in creating competitive industries capable of penetrating new export markets and adding greater value to their exports in existing markets. Hence, maximising income and welfare growth in the South Pacific depends importantly on the development of private sector activity complemented by appropriate development strategies and policies formulated by governments. Economic Insights (1994:37-60) formulated a 'market-oriented approach to development' for Papua New Guinea to enhance growth performance that would be an appropriate model for all except perhaps the marginally endowed countries under study. Economic Insights (1994:61-150) also outlined the appropriate role of government in specific sectors of the economy and the processes for improving the public sector for this approach to be successful.

This strategic approach is consistent with the 'new orthodoxy' for development strategies that emerged in the latter part of the 1980s (Lewis 1986:9). It was driven by recognition of the acute limits to effective state intervention in order to direct development activities, and a rediscovery of the power of markets. At the same time, market-oriented development strategies were to be implemented with a more realistic appreciation of market failure and the need to develop institutions and standards of governance that minimise its occurrence and damaging effects. The degree of fervour with which people have taken to this so-called new orthodoxy varies tremendously, and strong resistance to its implementation can still be found among policy makers and those responsible for implementing policy reforms in South Pacific countries.

A high proportion of the development initiatives supporting export activity that succeeded during the study period were facilitatory programs and projects. Governments are more likely to improve export performance through facilitation and fundamental regulatory functions because only they can effectively provide services such as these that possess public-good attributes. It is far better for South Pacific governments to deliver key services effectively and create a properly operating and fair legal framework that helps exporters than to be involved in broad-ranging interventions in export marketing that stretch public resources to breaking point.

The mix between regulation and facilitation can be improved, and important facilitative functions could be integrated better. McMaster (1992:17–18) found that most South Pacific countries had not adopted an integrated approach to private-sector development. He spelt out seven plan components necessary for an integrated private sector development program, beginning with a set of clear and quantifiable objectives. In agriculture, in particular, there is considerable scope to integrate research and extension activities and to tailor recommendations better to the circumstances of individual farm households or groups of households.

2.4.2 External orientation

All countries have now either adopted export-led strategies or recognised the need for reform in development strategies to encourage greater export orientation. But the policies implemented have not always been consistent with an export-oriented strategy. The strong export performance in Fiji in the 1990s is an example of the benefits of having switched from a trade-protectionist policy with a high degree of government intervention to an export-oriented strategy based on private sector-led development. Even here, some backsliding on agricultural policy reform occurred in the 1990s (ADB 2000:159-162) that may well have caused the stochastic dominance of the 1980s over that decade for agricultural exports.

Varying degrees of success in implementing policy reform and the transition costs during adjustment periods are the likely reasons why not all countries have yet realised the same gains achieved by Fiji. There are also risks associated with privatisation in small South Pacific countries where a lacuna forms in the wake of a withdrawal of government services. Dorward (2001:59-60) noted that private traders were slow to enter produce markets and to provide input supply and financial services efficiently. He attributed this phenomenon partly to the high transaction costs of market participation. Other factors that could suppress full-scale private-sector activity include the presence of imperfect markets, imperfect information and pecuniary external economies (Naqvi 1997:17), and the possibility that the private sector could make greater gains from rent-seeking activities than productive activities aimed at the export market.

2.4.3 The MIRAB hypothesis and Dutch disease effects

South Pacific economies, particularly the smaller ones, have been characterised as MIRAB societies (Bertram and Watters 1985) that suffer from substantial Dutch disease effects. Laplagne (1997:86) identified three strands of Dutch disease effects that might be present in South Pacific countries: the monetary effect; the spending effect; and the resource movement effect. The monetary effect entails an expansion of money supply and higher inflation.

The spending effect is characterised by expenditure of rent income that causes the exchange rate to appreciate and bureaucracies to feed off rent flows. Examples are the aid flows in all countries, remittances in Polynesian countries, resource rents in Solomon Islands and Papua New Guinea, and trust funds in Kiribati and Tuvalu. Bureaucracies in the South Pacific have been large relative to the size of the economy and generally inefficient. They have 'crowded out' the private sector in terms of competition for skilled labour and resources. Aid and concessional loan flows (substantively, geopolitical rent) in South Pacific countries have been at very high levels per capita, and generally exceed their absorptive capacity (Fleming and Hardaker 1995:10). Governments can ease the strain on their limited domestic absorptive capacity by tilting the balance of inflows more in favour of foreign direct investment around areas of specialisation.

The resource movement effect is exemplified best by the 'booming sector' whereby one sector expands and bids up the prices of factors of production that it shares with the tradeable sectors. Examples include the tourist industries in Cook Islands, Fiji and Vanuatu, and mining and energy industries in Papua New Guinea. There are also the dominant and distorting labour-exporting effects of remittances in some Polynesian countries that are related to high emigration rates.

Laplagne (1997) explored the empirical evidence of Dutch disease in the 1980s and 1990s in a sample of countries that covered all those included in the current study. He concluded that 'Dutch disease appears to have been a significant factor underlying structural change in some countries at least' (Laplagne 1997:84). In particular, large inflows of foreign exchange from rent flows and booming sectors have caused currency appreciations that have made commodity exports less competitive. This

condition explains in part the weakness of commodity production and the failure of many development initiatives.

A fundamental strategic issue for the marginally endowed South Pacific countries is whether the MIRAB effects are so large as to prevent them from ever exploiting their comparative advantage to achieve export growth that enables their people to satisfy their aspirations. The chief alternative strategy to export-led growth is a 'rent-seeking development philosophy [whereby] a country relies predominantly on foreigners or expatriates to pay rents to finance improved welfare of its people rather than on the productive use by those people of national resources' (Fleming and Hardaker 1995:189). These rents come mainly from aid, remittances, exploitation by foreign corporations of mineral, forest and marine resources, and geopolitical capital. Bertram (1986) appears to hold the view that such an orientation is inevitable, perhaps even rational for very small South Pacific countries. It is conceivable that these countries could survive for quite some time into the future as rentier societies, but we doubt whether they would be able to maintain rents sufficient to satisfy aspirations. Nor, in the long term, would a heavy reliance on rents to maintain the welfare of their populations be a risk-free proposition given that the sources of rent are likely to become increasingly unreliable.

Recent events suggest that one resource, fisheries, may hold the key to whether MIRAB economies can transform themselves into productive ones by the domestication of their marine industries. That is, they would exploit the extensive marine resources within their EEZs to develop their own domestic fishing and other marine industries rather than rely on rents from licensing foreign fishing vessels.

2.4.4 Exchange rate policy

Until the early 1980s, all countries under study had exchange rates on a parity with, or higher than, the US dollar. This meant that one US dollar would generally buy less than one unit of local currency (or, for Vanuatu, 100 vatu), making the exports of South Pacific countries relatively expensive in world markets. These high exchange rates relative to the US dollar were often the result of a government's financial policy to keep exchange rates overvalued, such as the 'hard kina' policy in Papua New Guinea until the early 1990s (Economic Insights 1994:5), or to link the local currency

to that of a developed country, such as the French franc in Vanuatu. Alternatively, some countries use the currency of a developed country as their local currency (Australian dollar in Kiribati and Tuvalu, and New Zealand dollar in Cook Islands and Niue).

After the early 1980s, almost all economies underwent significant currency devaluations. By the end of the 1990s, they had devalued their currencies to levels 20 per cent to 50 per cent of their 1960 values. These depreciations resulted from balance of payments problems, crises in public finance and currency deregulation policies in South Pacific countries themselves or in Australia and New Zealand that increasingly outweighed the effects that had kept the values of local currencies high.

Lower real values of the South Pacific currencies against other currencies would have made exports more competitive, resulting in larger quantities and values of exports. Graham (1998:163) noted that a depreciating real exchange rate accelerated economic growth in Papua New Guinea and an appreciation dampened growth. Gani (1997:129) concluded from his study in Fiji that a rising real exchange rate could undermine export-led growth. Costs of imported goods and production costs tended to rise throughout the economy when devaluation took place, but are unlikely to have risen sufficiently to offset the benefits of the devaluation to exporters. As parsimonious users of imported inputs, agricultural smallholders tended to suffer less from these cost increases than estates and producers of manufactured exports, which were much more intensive users.

We follow Bhagwati (1986:92) in recommending an export promotion strategy that creates a situation where 'the effective exchange rate for exports ... is not significantly different from that for imports', thereby eliminating any bias against exports.

2.5 Governance

2.5.1 'Africanisation' of the South Pacific

The creation of sound and stable macroeconomic, political and legal environments and well-functioning markets is a necessary, if not sufficient, condition for a government to encourage the emergence of internationally competitive industries and enhance their longevity. Concomitant with the pursuit of export-oriented strategies and a reliance on the private sector for development, governments must ensure that

'the rules of competition in the society stimulate investment, upgrading, and innovation' (Porter 1998:8). Governments in most of the countries under study have progressively failed to satisfy these requirements over the study period.

Reilly (2001) coined the term, 'Africanisation', to indicate a trend in South Pacific countries towards the problems that have plagued sub-Saharan countries in Africa. Over the past 20 years, the stable nature of democracy in a majority of South Pacific countries that had been remarkable by international standards has come under threat. This trend was exemplified by the overthrow of the elected Indo-Fijian government in Fiji, while Cook Islands, Papua New Guinea, Samoa, Solomon Islands and Vanuatu have all experienced a degree of political disorder recently (see, for example, Tuhanuku 1995, Ambrose 1997, Mellor 1997b, Forbes 2001).

Africanisation suggests a weakening of democracy and the potential for increased internal conflict, typified by four phenomena (Reilly 2001:4-6):

- Tension has grown between civil regimes and military forces.
- There is an intermixture between ethnic identity and the competition for the control of exploitable and exportable natural resources that drives violent conflicts, notably in the exploitation of the timber industry and conflict over land.
- Weak basic institutions of governance have resulted in long-standing government institutions collapsing under a civilian minority. Public services have been declining in almost all South Pacific countries. This has been especially marked in the institutional support for agriculture, with government agricultural departments considered among the least desirable sources of employment in the public service.
- Increasing centrality of the state is used as a means to gain wealth and exploit resources. Control of the state thereby becomes more than just access to political power; it is also access to considerable financial resources that are effectively unattainable elsewhere.

Weak governance includes undesirable management practices, corruption, ineffective operation of public services and lack of security of government institutions from political interference. Poor management from within the public sector has been increasing, although affecting the countries under study to differing extents. This is not the sort of political environment that encourages export success. Lack of

protection of those responsible for delivering policy reforms that would have encouraged investment and export activity (Duncan 1994c:22) has been of special concern since the late 1980s. Governments have been hostage to the machinations of groups concerned with preventing reform in order to protect their own interests. When these outcomes prevail, circumstances are ripe for rent seeking and the damage it causes to incentives to undertake productive activity in export industries. Producers find it more rewarding to seek rents from governments than to undertake activities that improve export competitiveness.

Damage can be limited in a couple of main ways. Duncan (1994c:24-26) outlined some practices to protect policy reforms and reduce the likely success of those resisting reforms by building adequate 'social safety nets' and independent institutions. Also, development projects to increase economic activity can be designed so that they carefully target beneficiaries and exhibit transparency and trust in their planning and implementation. Governments can ensure that substantial commitment and effort has to be made by beneficiaries before any rewards of the project or policy support can be reaped. Fleming (1998:291-296) outlined a number of other measures at various planning levels that also can inhibit rent seeking and limit its social costs.

Development programs and projects in South Pacific countries funded by aid and concessional loans were fundamental to effective government development efforts in the 1960s to expand export activity because they were implemented in the context of sound governance. As the study period proceeded, however, aid funds became increasingly ineffective in generating exports. Despite their potential to support development initiatives, and the occasional success story, the impacts of many public development projects were ephemeral, not least because of a failure to service capital investments arising from project implementation. Those projects that involved extensive government intervention in economic activities were especially prone to failure soon after they were completed. Hughes (1990) urged a return to 'first principles' in project design in order to make aid an effective weapon for economic development and, one could add, export growth.

2.5.2 Property rights and security of land tenure

Secure property rights are associated with higher levels of investment and productivity (North 1979, de Soto 2000), and accordingly higher rates of export growth. A lack of property rights has militated against export growth in South Pacific countries in three main directions. First, foreign investors have been discouraged from developing domestic export industries in instances where they have been unable to secure long-term leasehold on land. Second, the decline in prominence of the estate sector in agriculture is due in no small part to an attenuation of their property rights. This trend has meant that smallholders have become the dominant force in agricultural export industries but, here too, difficulties have been encountered in undertaking agricultural development on communally owned land.

The future of the ubiquitous customary communal land tenure system and its impact on smallholder production is at the centre of the debate on land reform. Because the agricultural products of smallholders still feature strongly in the export composition of all countries under study, agricultural land use remains a key issue in production for export and the development of export industries. The view has often been expressed that customary communal land tenure arrangements retard agricultural development (for example, World Bank 1988), not least because they are an integral part of communitarian systems. In addition, an inability to offer security for bank loans has been foremost among disadvantages facing smallholders trying to obtain affordable rural credit to expand their farming operations.

The land tenure system has also been blamed for inadequate use of existing land resources (for example, Chandra 1983:20-21, Syed and Mataio 1993:93-98, Economic Insights 1994:51-53). Economic Insights (1994:50) highlighted an apparent paradox in Papua New Guinea where the area of land per head is very high by developing country standards whereas the area of agricultural land per worker is very low, attributing this discrepancy to the effects of land tenure arrangements.

On the other hand, apart from the political difficulty of discarding communal land tenure systems in South Pacific countries, there are strong arguments in favour of retaining and improving them. This is an issue of enormous contemporary importance in Fiji. Binswanger and Deininger (1997) presented a summary of the evidence on welfare gains from land reform involving the assignment of property rights in

developing countries that is pertinent to the countries under study. Their findings suggest that customary tenure should not deter the economic development of agriculture to any significant extent. It can provide security of tenure at a relatively low cost and offers advantages that would be lost with the introduction of private property rights. Furthermore, tenure systems in South Pacific countries often work much better in practice than might be expected from a literal interpretation of the regulations (Hardaker and Fleming 1994:43).

The above arguments do not rule out improvements in the operations of land tenure systems within the context of customary land ownership and use. Various initiatives, legal or otherwise, often lead to better use of the land, and suggest that a gradualist approach to tenure reform is preferable. For example, Allen (1993:17) identified initiatives resulting in marginal improvements that would enable more secure and longer-term tenure to the users of land. Such improvements are only likely to be achieved following the implementation of 'a long-term project demanding specific cultural knowledge' and 'understanding in minute detail the practical rules' (Anon. 2003:58) governing the existing tenure system. A gradualist approach could also help alleviate the problem of lack of access by smallholders to affordable rural credit. Skully (1997:23-25) contended that this has been a problem of absence of an effective leasehold title system rather than the communal land tenure system itself.

2.6 Export market access and international trade agreements

The success of an export-oriented development strategy depends heavily on market access, which has been a powerful determinant of economic activity in the countries under study and is likely to remain so well into the future. Onguglo and Ito (2001) provide a comprehensive overview of the conditions in the world trading system as they affect all countries under study. Schemes of relevance to South Pacific exporters include the Generalised System of Preferences of major developed countries, ACP-EU Cotonou Agreement, SPARTECA, Pacific Regional Trading Agreement, special preferences for least-developed countries (which include Kiribati, Samoa, Solomon Islands, Tuvalu and Vanuatu), and some reciprocal regional trade agreements.

Onguglo and Ito (2001) noted that South Pacific countries depend heavily on their exports for economic development, and that their export bases are typically narrow.

They encouraged policy makers to evaluate existing market access opportunities and other implications of the operations of the World Trade Organisation, and use the instruments available, to diversify their commodity exports profitably.

3. Comparative Influences of Geographic Endowments, Institutions and Policies on Export Development

In drawing conclusions from the study, it is interesting to examine the factors outlined in the previous section in the context of the findings of Easterly and Levine (2002) on the comparative influences of geographic endowments, institutions and policies on economic development. Easterly and Levine (2002) concluded from their empirical study of 72 countries that institutions matter most, that geographic endowments are only important in that they foster long-lasting institutions, and policies do not affect economic growth in the long run after accounting for endowments and institutions.

In examining the factors influencing export growth in the ten South Pacific countries under study, the elements Easterly and Levine (2002:17) included in their institutions index—voice and accountability, political stability and absence of violence, government effectiveness, light regulatory burden, rule of law and freedom from graft—certainly have had an impact on sustained export growth in the South Pacific. All components of the index would have deteriorated over the study period in most countries under study. Another institutional dimension discussed above—insecure property rights—is also likely to have adversely affected export growth, particularly in the primary industries. But it is unlikely that its adverse effects have hindered export growth anywhere near as much as those included in the institutional index of Easterly and Levine (2002).

Institutional reform will not come easily, especially as it must be undertaken hand-in-hand with political reform. Stiglitz (2000:11) emphasised that, although it would take longer to achieve, this reform must be seen as a local product that addresses local needs, and comes from within. Change agents have to marry this approach with a shift towards a more meritocratic society that promotes export growth by encouraging the allocation of resources and tasks in an efficient manner, and is therefore consistent with competitive endeavour in a market-driven economy. But it is inconsistent with the communitarian ethos that pervades most South Pacific countries. The challenge is

to introduce greater meritocracy through change from within, without losing the social benefits that derive from a communitarian ethos.

What of Easterly and Levine's (2002) contention that geographic endowments do not directly affect economic development? The sorts of elements that they identified as discouraging the 'planting' and growth of long-run institutions—climate, pests and diseases, and inhospitable farming environment for crops—did not have adverse effects on the early development of institutions in South Pacific countries anywhere near to the extent that they did in much of Africa, Asia and Latin America. As a consequence, institutions in most South Pacific countries became reasonably well-entrenched and functioned quite effectively in the early years of the study period. Some institutions that managed to retain a strong degree of independence, such as many central banks, continue to operate effectively and independently. But, as pointed out in section 2.5, many institutions critical to export growth have undergone substantial deterioration in structure and performance over the study period. This has had a deleterious effect on the ability to implement policy reforms effectively.

On the other hand, geographic factors, especially those associated with small size, have played a more decisive role in export and general economic performance in South Pacific countries than they have in most developing countries. It is likely, therefore, that the conclusions drawn by Easterly and Levine (2002) might not prevail in respect of the lack of a direct effect of geographic factors on export and economic growth in the countries under study.

Easterly and Levine (2002:32) contended that policies do not influence GDP per capita in the long term once account is taken of the influence of institutions. Policies rely heavily on effective institutions for their successful implementation. Herein lies the key to why policies tend not to show up as factors influencing economic performance. The evidence over the past 40 years in the South Pacific is that export and general economic growth do not respond positively to good policies unless those policies are properly implemented. To be satisfactorily implemented, they require soundly operating and effective institutions.

Finally, consider the potential for creating a virtuous cycle between export growth and two factors identified in section 2.2: investment in physical and human capital. Frankel and Romer (1999:394) concluded from their empirical study that trade

'appears to raise income by spurring the accumulation of physical and human capital and by increasing output for given levels of capital'. In turn, these outcomes feed back to enhance the competitiveness of firms operating in export markets.

References

- ADB 2000, Republic of the Fiji Islands: 1999 Economic Report, Pacific Studies Series, Asian Development Bank, Manila.
- Agricultural Planning Unit 1993, *Policy Paper on Agricultural Development in the Cook Islands*, Ministry of Agriculture, Rarotonga.
- Allen, B.J. 1993, 'Issues for the sustainability of agriculture systems in Papua New Guinea, 1990-2015', in *Issues in Papua New Guinea Agriculture*, Australian International Development Bureau, Canberra.
- Ambrose, D. 1997, 'Vanuatu politics: two into one won't go', *Pacific Economic Bulletin* 12(2):115-122.
- Anon. 2001, 'The technology of taste: food for thought', *The Economist* 360(8229):79-80.
- Anon. 2003, 'The economist versus the terrorist', *The Economist* 366(8309):58
- Bertram, G. 1986, "Sustainable development" in Pacific micro-states', World Development 14(7):809-22.
- Bertram, G. and Watters, R.F. 1985, 'The MIRAB economy in South Pacific microstates', *Pacific Viewpoint* 26(3):497-519.
- Bhagwati, J.N. 1986, 'Rethinking trade strategy', in J.P. Lewis and V. Kallab (eds), *Development Strategies Reconsidered*, U.S.-Third World Policy Perspectives No. 5, Overseas Development Council, Transaction Books, New Brunswick, 91-104.
- Binswanger, H.P. and Deininger, K. 1997, 'Explaining agricultural and agrarian policies in developing countries', *Journal of Economic Literature* 35(4):1958-2005.

- Bourke, R.M. 2001, 'An overview of food security in PNG', in R.M. Bourke, M.G. Allen and J.G. Salisbury (eds), Food Security for Papua New Guinea: Proceedings of the Papua New Guinea Food and Nutrition 2000 Conference, PNG University of Technology, Lae, 26-30 June 2000, ACIAR Proceedings No. 99, Australian Centre for International Agricultural Research, Canberra, 5-14.
- Butler, G.J. and Mandeville, T.D. 1981, *Regional Economics: An Australian Introduction*, University of Queensland Press, St Lucia.
- Chandra, S. 1983, *Agricultural Development in Fiji*, Australian Universities' International Development Program, Canberra.
- Chung, J. 1996, Mitigating disasters in agriculture: South Pacific Disaster Reduction Programme, Paper presented to the South Pacific Commission PHALPS Conference, Rarotonga.
- CIC 1992, Assistance to the Coffee Industry: A Submission by the Coffee Industry Corporation Ltd, Coffee Industry Corporation, Goroka.
- Cole, R.V. 1988, 'Foreign investment in the South Pacific', *Pacific Economic Bulletin* 3(1):47-48.
- De Soto, H. 2000, The Mystery of Capital: Why Capitalism Triumphs in the West and Fails Everywhere Else, Basic Books, New York.
- Dorward, A. 2001, 'The effects of transaction costs, power and risk on contractual arrangements: a conceptual framework for quantitative analysis', *Journal of Agricultural Economics* 52(2):59-73.
- Doulman, D.J. 1989, 'A critical review of some aspects of fisheries joint ventures', in H. Campbell, K. Menz and G. Waugh (eds), *Economics of Fishery Management in the Pacific Islands Region: Proceedings of an International Conference Held in Hobart, Tasmania, Australia, 20-22 March 1989*, ACIAR Proceedings No. 26, Australian Centre for International Agricultural Research, Canberra, 29-36.
- Duncan, R, 1994a, 'A fresh look at some long-held beliefs about primary commodities', *Pacific Economic Bulletin* 9(1):53-57.

- Duncan, R, 1994b, 'Timber contracting in Melanesia: a system in need of change', Pacific Economic Bulletin 9(2):20-26.
- Duncan, R, 1994c, 'On achieving sound and stable economic policies in the Pacific islands', *Pacific Economic Bulletin* 9(2):20-26.
- Easterly, W. and Levine, R. 2002, *Tropics, Germs and Crops: How Endowments Influence Economic Development*, NBER Working Paper No. 9106, National Bureau of Economic Research, Cambridge, MA.
- Economic Insights 1994, *Papua New Guinea: The Role of Government in Economic Development*, International Development Issues No. 33, Australian International Development Assistance Bureau, Canberra.
- Falvey, R. 1991, 'Current economic trends in selected South Pacific countries', *Pacific Economic Bulletin* 6(1):1-12.
- Feder, G. 1983, 'On exports and economic growth', *Journal of Development Economics* 12(1/2):59-73.
- Fleming, E.M. 1998, 'A survey of measures to reduce the susceptibility of rural development projects to rent-seeking', *Journal of International Development* 10:277-299.
- Fleming, E. 2001, 'The case against reintroducing price stabilisation schemes in Papua New Guinea: a study of cocoa', *Pacific Economic Bulletin* 16(2):53-62.
- Fleming, E. and Hardaker, J.B. 1995, *Strategies for Polynesian Agricultural Development*, National Centre for Development Studies, Canberra.
- Forbes, M. 2001, 'My government is corrupt, PNG leader admits', *Sydney Morning Herald*, 27 July, pp. 1,9.
- Frankel, J.A. and Romer, D. 1999, 'Does trade cause growth?' *American Economic Review* 89(3):379-399.
- Gani, A. 1997, 'The relationship between Fiji's exchange rate and trade balance: some policy implications', *Pacific Economic Bulletin* 12(1):126-130.
- Graham, B.S. 1998, 'Economic growth in Papua New Guinea: some empirical evidence', *Pacific Economic Bulletin* 13(2):158-165.

- Hardaker, J.B. and Fleming, E. 1994, *Strategies for Melanesian Agriculture for 2010: Tough Choices*, National Centre for Development Studies, Australian National University, Canberra.
- Hughes, A.V. 1990, 'Back to first principles: project design as the best defence against aid addiction', *Pacific Economic Bulletin* 5(1):20-28.
- IMF 2002, *International Financial Statistics* (and previous issues), International Monetary Fund, Washington, D.C.
- Ironmonger, D. and Hill, H. 1998, *Women's Economic Participation in Five Pacific Island Countries*, International Issues No. 50, Australian International Development Assistance Bureau, Canberra.
- Lanjouw, P. and Feder, G. 2001, Rural Non-Farm Activities and Rural Development: From Experience Towards Strategy, Development Economics Research Group, World Bank, Washington, D.C.
- Laplagne, P. 1997, 'Dutch disease in the South Pacific: evidence from the 1980s and beyond', *Pacific Economic Bulletin* 12(1):84-96.
- Lewis, J.P. 1986, 'Development promotion: a time for regrouping', in J.P. Lewis and V. Kallab (eds), *Development Strategies Reconsidered*, U.S.-Third World Policy Perspectives No. 5, Overseas Development Council, Transaction Books, New Brunswick, 1-33.
- Maxwell, J.G.H. and Owen, A.D. 1995, *South Pacific Tuna Fisheries Study*, International Development Issues No. 37, Australian Agency for International Development, Canberra.
- McCarl, B.A. 1996, RISKROOT program documentation, Department of Agricultural Economics, Texas A&M University, College Station. [http://ageco.tamu.edu/faculty/mccarl//riskclas/stodom.pdf]
- McGregor, A. and McGregor, I. 1999, *Disaster and Agriculture in the Pacific Islands*, South Pacific Disaster Reduction Program, UN Department for Economic and Social Affairs, New York.
- McKee, D.L. and Tisdell, C. 1990, *Developmental Issues in Small Island Economies*, Praeger, New York.

- McMaster, J. 1992, Strategies to stimulate private sector development in the Pacific island economies, Paper presented at a conference on The Future of Asia-Pacific Economies: Pacific Islands at the Crossroads?, 10-12 November, Brisbane.
- Mellor, C.S. 1997a, 'Small Pacific island states: development of international trade', *Pacific Economic Bulletin* 12(1):70-83.
- Mellor, C.S. 1997b, 'Economic restructuring in Cook Islands', *Pacific Economic Bulletin* 12(2):17-24.
- Naqvi, S.N.H. 1997, The growth of development economics, Paper presented at the World Bank Workshop on Emerging Issues in Development Economics, 7-11 July, Washington, D.C.
- North, D.C. 1979, 'A framework for analysing the state in economic development', Explorations in Economic History 16(3):249-259.
- Onchoke, S.N. 1996, An economic analysis of commodity export revenue and variability in the South Pacific island nations, Ph. D. thesis, University of New England, Armidale.
- Onguglo, B. and Ito, T. 2001, Challenges and opportunities in multilateral and regional trade policy environment for commodity-based development of Pacific island countries, Paper presented at the UNCTAD Workshop on Commodity-Based Development in Pacific Island Countries, Nadi, 18-20 September.
- Porter, M.E. 1998, Public address regarding the development of a knowledge society, Catching the Knowledge Wave Project. [www.knowledgewave.org.nz/porter]
- Reilly, B. 2001, 'Trouble in paradise: the Africanisation of the South Pacific', *Policy* 17(1):3-7.
- Richardson, H.W. 1969, Elements of Regional Economics, Penguin, Harmondsworth.
- Skully, M.T. 1997, *The South Pacific: Finance, Development and the Private Sector*, International Development Issues No. 48, Australian Agency for International Development, Canberra.

- Stiglitz, J. 2000, 'Scan globally, reinvent locally', *Development and Change* 4/2000:8-11.
- Syed, S. and Mataio, N. 1993, *Agriculture in Cook Islands: New Directions*, Institute of Pacific Studies and the Cook Islands Centre of the University of the South Pacific, Suva and Rarotonga.
- Thirlwall, A.P. 1991, *The Performance and Prospects of the Pacific Island Economies* in the World Economy, Research Report Series No. 14, Pacific Islands Development Program, East-West Center, Honolulu.
- Timmer, C.P. 1997, 'Farmers and markets: the political economy of new paradigms', *American Journal of Agricultural Economics* 79(2):621-627.
- Tuhanuku, J. 1995, 'The reality of governance in Solomon Islands today', *Pacific Economic Bulletin* 10(2):66-69.
- UNDP 2002, *Human Development Report 2002*, United Nations Development Programme, New York.
- World Bank 1988, *Papua New Guinea: Agricultural Assessment Review—Volume 2 Annexes*, Washington, D.C.