



Photograph: Don Borroughs/PictureNET Africa

# Agriculture and Land Affairs

In recent years, the agricultural sector has undergone drastic changes. Several processes have reversed the impact of discriminatory legislation, while other initiatives have been implemented to deregulate and liberalise the sector. The main policy shifts include:

- liberalising agricultural trade and deregulating the marketing of agricultural products
- implementing land reform policies and programmes
- abolishing certain tax concessions and reducing direct subsidisation
- reforming the institutions governing the sector
- mechanisms to introduce a minimum wage for farm workers.

Although these changes have led to increased competitiveness in the sector, certain structural weaknesses still exist. To consolidate the gains and address remaining weaknesses, the departments of Agriculture and Land Affairs, in collaboration with the National African Farmers' Union (NAFU) and Agri SA, have developed a common long-term vision of a united

and prosperous agricultural sector. The medium-term goal is to generate equitable access and participation in a globally competitive, profitable and sustainable agricultural sector.

Planning to achieve this goal began in 2002. Programmes embracing the following basic premises and values will be generated and implemented:

- security of tenure for present and future participants in the sector
- equitable access to resources
- fair reward for effort, risk and innovation
- the sustainable use of natural and biological resources
- market-driven direct business activity and resource allocation
- predictable and consistent policy environment.

In terms of the Constitution of South Africa, 1996 (Act 108 of 1996), agricultural support to farmers is vested in the provincial governments, which provide farmers with a range of services. The national Government retains the overall regulatory and policy functions and agricultural trade and marketing.

◀ Cut flowers, foliage and dried flowers from the Cape floral kingdom (*fynbos*) are supplied to world markets. Cultivation of *fynbos* earns the Western Cape valuable foreign currency. In South Africa, almost 200 000 ha of *fynbos* is harvested from the wild annually, with another 4 200 ha under intensive and extensive cultivation.

The industry accounts for 20 000 direct and indirect job opportunities.

## Sector plan for agricultural policy

In 2001, a Strategic Plan was presented to President Thabo Mbeki. The importance of the

## Exports

	1997	1998	1999	2000	2001	Average: Five years
Total South African products ('000 000)	143,414	147,547	165,143	210,022	253,580	183,941
Total agricultural products ('000 000)	12,509	13,699	14,774	15,820	19,605	15,281
Agriculture as % of total exports	8,72	9,28	8,95	7,53	7,73	8,31

Source: Directorate: Agricultural Statistics, Department of Agriculture

Plan lies in the fact that it unites government and industry in sharing a common perspective on the sector's strategic issues and farmers' organisations.

The vision for the sector implies sustained profitable participation in the South African agricultural economy by all stakeholders. It recognises the need to maintain and increase commercial production, to build international competitiveness and to address the historical legacies that resulted in skewed access and representation.

The Strategic Plan consists of three core strategies:

- equitable access and participation: the objectives of this strategy are to ensure equitable access to and participation in agricultural opportunities; to deracialise land and enterprise ownership; and to unlock the full entrepreneurial potential in the sector.
- global competitiveness and profitability: the aim of this strategy is to enhance profitability through sustained global competitiveness in the agricultural sector's input supply, primary production, agriprocessing and agritourism industries.
- sustainable resource management: this strategy aims to enhance farmers' capacity to use resources in a sustainable manner and to ensure the wise use and management of natural resources.

As a first step to move the Strategic Plan closer to implementation, the role-players identified the following priority programmes and actions:

- implementing a broad-based safety and security strategy for good working and social stability, trust and confidence
- fostering a shared vision on agriculture, good governance and social partnerships
- fast-tracking a programme of land redistribution for agricultural development and processes of empowerment for targeted groups
- transforming agricultural research, transferring technology and education and extension to be more responsive to markets
- redefining the mandate of agricultural marketing and international trade in the post-control board era against great global competition and demands for market access, infrastructure and information
- building credible agricultural statistical and economic analysis systems that will be accessible to all farmers and enterprises
- building an agricultural risk management system to ensure that agricultural enterprises will recover, grow and develop after natural disasters
- developing an effective integrated risk management system for plant and animal health systems, price and income systems and natural disasters
- establishing the integrated rural financial services systems
- targeting investments in rural development nodes to provide livelihoods, infrastructure, irrigation, electricity, telecommunications, transportation, training and skills development
- establishing an agricultural co-operation programme for Africa to spearhead the role



of agriculture in the New Partnership for Africa's Development

- lowering the overall cost of production.
- The following outcomes are expected from the successful pursuit of these strategic objectives:
- increased wealth creation in agriculture and rural areas
  - increased sustainable employment in agriculture
  - increased income and increased foreign exchange earnings
  - reduced poverty and inequalities in land and enterprise ownership
  - improved farming efficiency
  - improved national and household food security
  - stable and safe rural communities, reduced levels of crime and violence, and sustained rural development
  - improved investor confidence and greater domestic and foreign investment in agricultural activities and rural areas
  - pride and dignity in agriculture as an occupation and sector.

The partners commit themselves to providing the necessary time, financial and material resources to see to the successful implementation of the Strategic Plan.

## Agricultural economy

South Africa has a dual agricultural economy, comprising a well-developed commercial sector and a predominantly subsistence-

orientated sector in the rural areas. About 13% of South Africa's surface area can be used for crop production. High-potential arable land comprises only 22% of the total arable land. Some 1,3 million hectares (ha) are under irrigation.

The most important factor limiting agricultural production is the availability of water. Rainfall is distributed unevenly across the country. Almost 50% of South Africa's water is used for agricultural purposes. The country can be subdivided into a number of farming regions according to climate, natural vegetation, types of soil and the type of farming practised. Agricultural activities in these regions range from intensive crop production and mixed farming in winter-rainfall and high summer-rainfall areas, to cattle-ranching in the bushveld and sheep-farming in the more arid regions.

Primary agriculture contributes about 2,6% to gross domestic product (GDP) of South Africa and almost 9% of formal employment. However, there are strong backward and forward linkages into the economy, so that the agro-industrial sector is estimated to comprise 15% of GDP.

Today, South Africa is not only self-sufficient in virtually all major agricultural products, but in a normal year it is also a net food exporter. However, with very low average rainfall and high variability within and between seasons, agriculture is vulnerable to the effects of drought. When there is a major drought, strong downward pressure is placed on GDP. In good years, however, the contribution of agriculture can be vital to lifting the economy.

During 2001, the seasonally adjusted real value added by the agriculture, forestry and fishing industry declined by 3,1% compared with 2000, mainly ascribed to a decline in the production of maize and other field crops.

Despite the farming industry's declining share of GDP, it remains vitally important to the economy, development and stability of the southern African region.

For the past five years, agricultural exports have contributed on average approximately 8% (7% in 2001) of total South African exports.

### Information

The Minister of Agriculture and Land Affairs, Ms Thoko Didiza, announced in October 2002 the introduction of special white maize meal to be sold at Metro Cash and Carry outlets as a temporary price dampener and measure to increase the supply of maize. The special maize meal was sold in 12,5 kg bags at a cost of R25,99 as opposed to the then existing price of normal 12,5 kg white maize meal, which sold for between R45,75 and R47,39.

It was also announced that government had established the Food Monitoring Committee to look at how the value chain functioned and to observe whether opportunistic pricing patterns existed.

Normally, South Africa is a net exporter of agricultural products in Rand value. The largest export groups are raw sugar, fresh grapes, citrus, nectarines, wine and deciduous fruit such as apples, pears, quinces, apricots and peaches. Other important exports include avocados, plums, maize, black tea, ground-nuts, meat, pineapples, tobacco, wool and cotton.

### Information

South Africa doesn't have ideal conditions for crop production. Less than 15% of its land is arable, and serious climatic constraints such as periodic droughts hinder agricultural production. Despite these circumstances, productivity must increase to meet the food needs of its growing population. Recent developments in biotechnology have brought hope in tackling the challenges of increasing food production. Genetic modification provides a way of meeting the growing demand for food without placing even greater pressure on scarce resources.

The Genetically Modified Organisms (GMO) Act, 1997 (Act 15 of 1997), was implemented on 1 December 1999, making provision for the regulation of GMOs in South Africa, particularly new biosafety assessments. In terms of the Act, permits are issued for trials and the commercial release of any GMO crops in the country to ensure contained cultivation and reduced environmental impact. The objectives of the Act are to increase crop yield while protecting biodiversity. By mid-2001, the Department of Agriculture had approved the planting of three commercial Genetically Modified (GM) crops, i.e. insect-resistant cotton, herbicide-resistant cotton and insect-resistant maize. The insect-resistant maize is planted for animal feed.

There are no GM crops planted in South Africa for human consumption. There are no fresh GM fruit and vegetables on sale in the country. Imported engineered soya is used in processed meat and other locally-produced food.

In terms of the GMO Act, 1997, the Advisory Committee, comprising scientific experts, conducts risk assessments to determine if a particular GMO is safe for humans, animals and the environment. The Foodstuffs, Cosmetics and Disinfectants Act, 1972 (Act 54 of 1972), oversees the safety of food in South Africa.

All imported processed foods from the United States of America and Argentina that may contain GM ingredients will soon be regulated through labelling regulations to be promulgated by the Department of Health.

The debate over GM crops nearly caused a strike in February 2002 when the Food and Allied Workers' Union (FAWU) threatened to strike if its talks with the National Economic, Development and Labour Council to ban GM food for a period of five years failed. FAWU had requested a debate with government and business over food safety issues.

## Sustainable resource use and management

South Africa, at most times, is able to meet its own food requirements, with considerable food exportation. However, the inherent limitations of the natural resource base and variable climate require land users to be very circumspect in how they use and manage these resources so as to retain their productive capacity. Ninety percent of South Africa can be regarded as arid, semi-arid and dry sub-humid, and it is these areas where desertification can occur.

Improved information about the potential and limitations of the natural resource base is essential for good management decisions. An inventory of soils, terrain forms and climate (land types) was initiated by the Agricultural Research Council's (ARC) Institute for Soil, Climate and Water. Data from this and more detailed soil and climate surveys are integrated into a comprehensive Geographic Information System (GIS), which allows for assessment of agricultural potential and land suitability.

Although it is generally recognised that soil degradation is a problem, there has been little reliable data collected systematically over time. Soil degradation is largely related to the decline in soil organic matter. Mono-culture cereal production, intensive tillage, short to no fallow and limited crop rotation have contributed to this in the commercial sector. Excessive fuel-wood collection, inappropriate land use, population density and overgrazing are the main causes of soil degradation in the communal areas. In addition, it is estimated that about 60% of the cropland area is moderately to severely acid, and probably at least 15% is affected by subsoil acidity.

Physical degradation of South Africa's agricultural land results in soil erosion, by both water and wind. It has been estimated that water erosion affects about 6,1 million ha of cultivated soil in South Africa, and wind erosion about 10,9 million ha. Another degradation problem is compaction within the soil



profile, especially on fine sandy soils where, for example, maize yields can be adversely affected by some 30% to 40%. Soil crusting causes seedling emergence problems for many crops, and where it has been alleviated results in a 60% increase in wheat yield.

Urban spread, industrialisation and mining also impact on the sustainable use of agricultural land. Opencast coal-mining in Mpumalanga is an example of this pressure.

The Conservation of Agricultural Resources Act, 1983 (Act 43 of 1983), allows the national Department of Agriculture to exercise control over the utilisation of South Africa's natural agricultural resources. This legislation provides for the conservation of natural agricultural resources through maintaining the land's production potential; combating and preventing erosion; and protecting vegetation and combating weeds and invader plants. The Act generally applies to all agricultural land in South Africa, except for the sections dealing with weeds and invader plants that also apply to urban areas.

Specific requirements and prohibitions applicable to land-users are detailed in control measures published as regulations of the Conservation of Agricultural Resources Act, 1983. Certain activities, such as the cultivation of virgin land and burning of veld, are subject to prior approval, while others are prescribed as 'best practice' in the interest of sustainable land use. The Act further provides for the implementation of schemes, of which two are still functioning. These are the Weed Control Scheme that is administered nationally and the Soil Conservation Scheme that is administered by the provinces.

In order to promote natural agricultural resource conservation, policies, norms, standards and guidelines have been developed, as has a national agricultural resource audit division and a conservation GIS. At farmer level, conservation committees can be appointed to promote the conservation of the natural agricultural resources in the area concerned in order to achieve the objectives of the Act. The national Department of Agriculture's

Inspection Service does compliance monitoring on farm level in all provinces.

South Africa is a signatory to a number of international agreements and conventions that require the matter of sustainable resource use and management to be addressed in a responsible way. Agenda 21 is an action plan and blueprint for sustainable development that was one of five documents adopted by more than 178 governments at the United Nations (UN) Conference on Environment and Development (UNCED) in Rio de Janeiro in 1992. Specific to sustainable resource use is Chapter 14 on Promoting Sustainable Agriculture and Rural Development. The international conventions that apply to aspects of sustainable resource use are the Convention on Biological Diversity, the UN Framework Convention on Climate Change and the Convention to Combat Desertification (CCD). The CCD requires South Africa to draw up a National Action Programme, which will be integrated into a regional programme for the Southern African Development Community (SADC) region. All these activities are receiving attention under the leadership of the Department of Environmental Affairs and Tourism, involving all stakeholders including the national Department of Agriculture and the provinces.

One of the key programmes of the national Department of Agriculture that addresses sustainable use and management of the natural resources is the National LandCare Programme (NLP). (See page 77)

Research institutes of the ARC and some universities are contracted to undertake various research projects on matters relating to the sustainable use of agricultural resources. The practices of minimum tillage and no-till crop production are again being actively promoted in KwaZulu-Natal and Mpumalanga, aiming at not only commercial farmers but also smaller and subsistence farmers.

The National Water Act, 1998 (Act 36 of 1998), places a strong emphasis on equity in access to water, including water for agriculture. A feature of the development of water

sources for agriculture has been the lack of co-ordination of initiatives and support interventions.

The draft policy on co-ordinated implementation strategies in support of small-scale farmers was completed in October 2001. It is titled *Mainstreaming the Marginalised through Agricultural Water Use*. The national Department undertook two projects to improve stockwater provision to small-scale farmers. In terms of the projects, existing boreholes are rehabilitated, pumps repaired

and new boreholes will be provided where water audits indicate that additional supplies are needed. Operations commenced in the Sekhukhune Cross-border and Chris Hani districts, and will be expanded to the eastern and Kalahari-Kgalagadi districts. Eventually all the priority nodes will be included. Boreholes equipped with motorised pumps were provided to resettlement farms in the Moretela and Odi areas in the North West.

## Production

In general, the prices of agricultural products increased by 13% from 2000 to 2001. Prices of field crops increased by 23%, horticultural products increased by 6%, and prices of live-stock products increased by 11%. The net income of the farming sector increased from R6,538 million in 2000 to R9,600 million in 2001. The country is self-sufficient where primary foods is concerned, with the exception of wheat, oil-seeds, rice, tea and coffee.

### Field crops and horticulture

The largest area of farmland is planted with maize, followed by wheat and, to an extent, sugar-cane and sunflowers.

The maize industry plays a very important role in the economy. It is the largest locally-produced field crop and most important source of carbohydrates in the Southern African Customs Union (SACU) for animal and human consumption. South Africa is the main maize producer in SACU with an average production of approximately 9,0 metric tons (mt) per annum over the past 10 years.

It is estimated that more than 9 000 producers of maize are responsible for a major part of the South African crop, while the rest is produced by many thousands of small-scale producers.

Maize is produced mainly in the North West, the north-western, northern and eastern Free State, the Mpumalanga Highveld and the KwaZulu-Natal Midlands. Local consumption

### Gross value of agricultural production, 2001\* ('000 t)

<b>Field crops</b>	
Maize	6 497
Wheat	3 097
Hay	1 759
Grain sorghum	160
Sugar-cane	3 578
Ground-nuts	455
Tobacco	621
Sunflower seed	893
Cotton	225
Other	922
<b>Total</b>	<b>1 827</b>
<b>Horticulture</b>	
Viticulture	1 596
Citrus	1 734
Subtropical fruit	697
Deciduous and other fruit	3 662
Vegetables	2 674
Potatoes	1 812
Other	1 010
<b>Total</b>	<b>13 185</b>
<b>Animal products</b>	
Wool	637
Poultry and poultry products	9 297
Cattle and cattle slaughtered	4 078
Sheep and sheep slaughtered	1 317
Pigs slaughtered	807
Fresh milk	2 606
Milk for dairy products	1 132
Other	1 310
<b>Total</b>	<b>21 184</b>
<b>Grand total</b>	<b>52 576</b>

\* Preliminary

Source: Agricultural Statistics, Department of Agriculture



of maize (commercial) amounts to approximately 7,4 mt and surplus maize is usually exported.

Wheat is produced in the winter-rainfall areas of the Western Cape and the eastern parts of the Free State. At present, production in the Free State is the highest, but there are considerable annual fluctuations.

Barley is produced mainly on the southern coastal plains of the Western Cape. The area where barley is planted was estimated at 78 990 ha for the 2001/02 production season, and production was estimated at 157 000 tons (t).

Ground-nuts are mainly grown in the Free State, North West and Northern Cape. Ground-nut plantings decreased by 57%, from 165 250 ha in 2000/01 to 94 160 ha in 2001/02.

South Africa is the world's 11th-largest producer of sunflower seed. Sunflower seed is produced in the Free State, North West and on the Mpumalanga Highveld as well as in Limpopo (formerly the Northern Province).

For many years, Oudtshoorn and De Rust have been the only areas in South Africa where lucerne seed of reasonable quantity was produced. Today, the Oudtshoorn district is responsible for about 90% of the lucerne seed produced in South Africa. A lucerne plant can produce 100 to 120 lucerne bales per hectare every three weeks, provided that

enough water is available.

Sorghum is cultivated mostly in the drier parts of the summer-rainfall areas such as Mpumalanga, Free State, Limpopo and North West.

South Africa is ranked as the world's 12th-largest sugar producer. Sugar-cane is grown in 15 cane-producing areas extending from Northern Pondoland in the Eastern Cape through the coastal belt and Midlands of KwaZulu-Natal to the Mpumalanga Lowveld. An estimated 2,5 mt of sugar is produced per season. About 50% of this is marketed in southern Africa. The remainder is exported to numerous markets in Africa, the Middle East, North America and Asia. Based on actual sales and selling prices in 2000/01, it is estimated that the South African sugar industry contributed R1,9 billion to South Africa's foreign exchange earnings.

Deciduous fruit is grown mainly in the Western Cape, as well as in the Langkloof Valley in the Eastern Cape. Smaller production areas are found along the Orange River and in the Free State, Mpumalanga and Gauteng. This industry's export earnings represent 15% of the country's total earnings from agricultural exports. In 2001, apples made up the largest percentage of the crop (43%), while grapes totalled 21% and pears 19%. Approximately 79% of the total crop was produced in the Western Cape, 11% in the Northern Cape and 8% in the Eastern Cape.

The wine and spirits industry in South Africa is a very important part of the agricultural sector. South Africa is ranked as the eighth-largest wine producer in the world. It is also pioneering an integrated production system, including an environmentally-friendly approach to wine-making. In 2001, South African wine-growers produced a harvest of 7,5 hectolitres of which 65% was used in wine-making. About 106 331 ha of land are under cultivation with about 314 million vines. About 86% of wines are still produced by co-operatives. Some 4 390 primary wine producers employ about 53 000 people. According to the South African Wine and Spirits Export Association, the export of white

**Production of important field crops and horticultural products, 2001\* ('000 t)**

Maize	7 758
Wheat	2 493
Sugar-cane	21 157
Grain sorghum	176
Ground-nuts	184
Sunflower seed	665
Deciduous and other soft fruit	1 373
Citrus fruit	1 894
Subtropical fruit	559
Vegetables	2 060
Potatoes	1 658

\* Preliminary

Source: Agricultural Statistics, Department of Agriculture

wine increased from 20 million litres (m<sup>l</sup>) in 1992 to 177 m<sup>l</sup> in 2001.

The long-awaited Wine and Spirits Agreement between South Africa and the European Union (EU) was signed on 28 January 2002.

It is anticipated that the Agreement will improve market access into the large European market for South African wine and spirits. Applying a duty-free tariff quota of 42 m<sup>l</sup> annually will ensure better access for South African wines. In addition, the EU will make available an amount of Euro15-million for restructuring the South African wine and spirits industry. The signing of these agreements is an essential step in formalising South Africa's co-operation with the EU in the wine and spirits trade.

Since 1 January 2000, the Directorate: Marketing of the Department of Agriculture has issued export permits for sparkling wines in terms of the Trade, Development and Co-operation Agreement (TDCA) between South Africa and the EU for 472 500 litres to be exported at reduced levels of duty to the European community.

Export permits for 42 020 000 litres white and red wine have been issued since March 2002, when the Wine and Spirits Agreement came into effect.

Part of the Agreement involves the phasing out of names traditionally used in South Africa for specific types of wines. The names *port* and *sherry* will be phased out over five years for exports to non-SADC markets, starting from 1 January 2000. It must be phased out for all markets after 12 years. South Africa will also phase out the names *grappa*, *ouzo*, *korn/kornbrand*, *jägertee* and *pacharan* within five years of entry into the agreements. South African GIS will also be recognised and protected by the EU.

The EU is the largest destination for South African wine and spirits accounting for well over 75% of total exports in this sector. At the same time, it is the largest supplier of imported wine and spirits to the South African market.

Citrus production is largely limited to the

irrigation areas of Limpopo, Mpumalanga, the Eastern and Western Cape and KwaZulu-Natal.

Pineapples are grown in the Eastern Cape and northern KwaZulu-Natal. Other subtropical crops such as avocados, mangoes, bananas, litchis, guavas, pawpaws, granadillas, and macadamia and pecan nuts are produced mainly in Mpumalanga and Limpopo at, among other places, Levubu and Tzaneen, and in the subtropical coastal areas of KwaZulu-Natal and the Eastern Cape.

About 40% of the country's potato crop is grown in the higher-lying areas of the Free State and Mpumalanga. Limpopo, the Eastern, Western and Northern Cape and the higher-lying areas of KwaZulu-Natal are also important production areas. About two-thirds of the country's total potato crop is produced under irrigation.

Of the total crop, 45% is delivered to fresh produce markets and a further 16% is processed. The South African potato-processing industry grew by more than 100% over the past five years. This growth took place primarily in the three main disciplines of the processing industry, namely crisps, chips and French fries. Production of frozen French fries (41% of the total processed potato products in South Africa) has increased over the last couple of years due to an increase in fast food consumption. The growth in production is also due to the expansion of existing facilities.

In terms of gross income to the grower (apart from potatoes, which contribute 40%), tomatoes, onions, green mealies and sweetcorn are probably the most important vegetable crops.

These crops contribute 39%, combined, to the income derived from vegetables. Tomatoes are produced country-wide, but mainly in Limpopo, the Mpumalanga Lowveld and middleveld, the Pongola area of KwaZulu-Natal, the southern parts of the Eastern Cape, and the Western Cape.

Onions are grown in Mpumalanga, in the districts of Caledon, Ceres and Worcester in



the Western Cape, and at Venterstad and the adjoining areas of the southern Free State.

Cabbages are also grown country-wide, but are more concentrated in Mpumalanga and the Camperdown and Greytown districts of KwaZulu-Natal.

Cotton is cultivated in Mpumalanga, Limpopo, Northern Cape, KwaZulu-Natal and North West. It constitutes 74% of the natural fibre and 42% of all fibre processed in South Africa. Cotton is grown under irrigation as well as dry-land conditions. Cotton under irrigation usually contributes almost as much to the national crop as dry-land conditions, although the number of hectares under dry-land conditions are much more than hectares under irrigation. Seventy-five percent of local production is harvested by hand.

Virginia tobacco is produced mainly in Mpumalanga and Limpopo, with smaller quantities of Oriental tobacco being produced in the Western and Eastern Cape. There are more than 1 000 growers in the country, who produce an annual average of 33 million kilograms (kg) on about 24 000 ha of land. The crop represents 173 different grades of Virginia and five different grades of Oriental tobacco.

Honeybush tea grows mainly in the coastal and mountainous areas of the Western Cape but also in certain areas of the Eastern Cape. From a small beginning in 1993, the honeybush has grown to a commercial crop, with a production of more than 100 t of processed tea per annum. In the last eight years, the industry has seen an improvement in the quality of tea and the establishment of export standards, construction of a large processing and packaging facility in Mossel Bay, increased consumer awareness, appearance of several brand names on supermarket shelves and a growing overseas market.

The South African Honeybush Tea Association was established in 1999 to enable producers of this beverage to formalise their industry in response to the growing demand for their product.

The ARC is developing a method to create interspecies crosses between different honey-

bush tea species.

*Rooibos* tea is an indigenous herb produced mainly in the Cedarberg area of the Western Cape. In 2001, the demand for *rooibos* was estimated to be 4 000 t up from 2 800 t exported in 2000. The active producers of *rooibos* tea are estimated at 300, ranging from small to large farming enterprises.

Ornamental plants are produced throughout the country, but production aimed particularly at the export market is concentrated mostly in the central part of Limpopo, Mpumalanga and Gauteng. Ornamental plant production includes nursery plants, cut flowers and pot plants. The country's most important plant export products are gladioli, proteas, bulbs, chrysanthemum cuttings and roses.

South Africa is the world's leading exporter of proteas, accounting for more than half of all proteas sold on the world market. Most proteas grown in South Africa are sold on the European market, with Germany being the biggest consumer. Australia, New Zealand and Hawaii are, however, challenging South Africa as the dominant producer of proteas.

Cut flowers, foliage and dried flowers from the Cape floral kingdom (*fynbos*) are supplied to world markets. Cape *fynbos* serves as a gene pool for flowers such as freesias, Guernsey lilies and gladioli. Cultivation of *fynbos* earns the Western Cape valuable foreign currency.

In South Africa, almost 200 000 ha of *fynbos* is harvested from the wild annually, with another 4 200 ha under intensive and extensive cultivation. The industry accounts for 20 000 direct and indirect job opportunities.

Dried flowers are an important section of the *fynbos* industry. A large variety of dry flower species, used for this purpose, such as the everlasting conebrush (*Leucadendron*) and other suitable types, are produced.

Other flowers indigenous to South Africa are also gaining recognition on the international market. In 1999, two of the top flowers sold in the Netherlands were of South African extraction, namely the gerbera

(Barberton daisy) and freesia.

Amaryllis bulbs are also a lucrative export, for instance to the United States of America (US).

## Livestock

Livestock is farmed in most parts of South Africa. Numbers vary according to climatic conditions. Stock-breeders concentrate mainly on the development of breeds that are well adapted to diverse climatic and environmental conditions. The latest estimates for cattle and sheep are 13,5 million and 28,8 million respectively. South Africa normally produces 85% of its meat requirements, while 15% is imported from Namibia, Botswana, Swaziland, Australia, New Zealand and European countries.

Dairy-farming is practised throughout South Africa, with the highest concentration of dairy farms in the eastern and northern Free State, the KwaZulu-Natal Midlands, the Eastern and Western Cape, the Gauteng metropolitan area, and the southern parts of Mpumalanga. Holstein Friesians (76%) and Jerseys (16%) are the predominant dairy breeds, followed by Ayrshires and Guernseys.

The South African Milk Federation coordinates industry matters, including the information and research functions, financed by means of voluntary levies. Market forces determine prices. The dairy industry is an important employer as the some 4 300 milk producers employ about 60 000 farm workers and indirectly provide jobs to some 40 000 people. Milk production for 2001/02 was estimated at 1,97 ml.

Cattle ranches are found mainly in the Northern and Eastern Cape, parts of the Free State and KwaZulu-Natal and Limpopo. The indigenous Afrikaner and Nguni and the locally-developed Bonsmara and Drakensberger are popular beef breeds, but British, European and American breeds, such as Brahman, Charolais, Hereford, Angus, Santa Gertrudis, Simmentaler and Sussex are maintained as pure breeds and used in cross-breeding.

The Taurus Livestock Improvement Co-

operative (in Irene, Gauteng) provides the country's beef farmers with an annual average of some 110 000 units of semen and the dairy industry with 580 000 units of semen for use in artificial insemination.

Sheep-farming is concentrated mainly in the Northern and Eastern Cape, Western Cape, Free State and Mpumalanga, with Ermelo in Mpumalanga being one of the largest wool-producing districts. Most sheep are fine-woolled Merinos (50%). Other breeds include the locally-developed Afrino (a woolled mutton breed adapted to arid conditions), the South African Mutton Merino, the Dohne and the Merino Land Sheep. The minor wool breeds, namely the Dorper, a highly productive, locally developed mutton breed for arid regions, and the Merino account for most of South Africa's mutton production.

The indigenous meat-producing Boer goat accounts for about 40% of all goats, and the Angora goat, used for mohair production, for the remaining 60%. South Africa has about 3 500 Angora farmers.

Compared with the mainly extensive cattle and sheep industries, the poultry and pig industries are more intensive and are located on farms near metropolitan areas such as Gauteng, Durban, Pietermaritzburg, Cape Town and Port Elizabeth. The predominant pig breeds are the South African Landrace and the Large White.

South Africa's poultry meat production is estimated at 980 000 t. Broiler production contributes about 82% to total poultry meat production with the rest made up of mature chicken slaughter (culls), small-scale and backyard poultry production, ducks, geese and turkeys, and other specialised white meat products.

The number of broilers slaughtered by commercial producers during 2001 is estimated at 535 million. The gross value of broilers and other fowls slaughtered during this period is estimated at R9 297 million, which makes it the most important contributor to the value of agricultural production in South Africa.

South Africa accounts for 78% of world sales



of ostrich products namely leather, meat and feathers. The Klein Karoo Co-operative is the world's largest producer and exporter of ostrich products. According to the Co-operative, there is a big increase in demand for ostrich meat abroad.

## Game-farming, aquaculture and bee-keeping

South Africa has more game and a wider variety of game species than most countries. Game-farming has grown over the years, and today it is a viable industry with great economic potential. The main game areas are regions in Limpopo, North West, Mpumalanga, Free State, Eastern Cape, the Karoo, the Kalahari in the Northern Cape, and the thorn scrub of KwaZulu-Natal.

Despite periodic droughts in the past, game numbers have consistently increased. The South African Game Organisation, as well as local organisations in each province, service the industry.

A descriptive game production model has been developed for optimising intensive animal production on game farms. The model has the potential to increase the global produce of the game industry by between 8% and 15%.

The aquaculture industry in South Africa continues to make meaningful progress in cultivation technology, marketing strategy, marketing practice and scientific innovation. Mussels, trout, oysters and *waterblommetjies* (Cape pondweed) are the major aquaculture species. Mussel-farming occurs mainly at Saldanha Bay. The Abalone Farmers' Association of South Africa has been instrumental in formulating product standards.

It was announced in March 2002 that the 111 ha of land formerly known as the Tooth Rock weapons range near Saldanha in the Western Cape had been successfully leased to Clear Seas Aquaculture for the development of an abalone farm.

The property will be leased for a period of 10 years at R875 000 per annum (6% annual

escalation) with an option to purchase the property after a 10-year period at market-related value.

According to their proposal, Clear Seas Aquaculture will, over a five-year period, invest nearly R59 million in the establishment of a 120 t abalone farm for the export market, creating sustainable job opportunities for at least 36 people.

The South African honey industry is still small, worth some R27 million annually. The ARC presents bee-keeping courses and provides on-farm support for between 12 and 18 months.

## Production input

Fertilisers, farm feeds and agricultural and stock remedies are known as agricultural production input. A Draft Bill makes provision for the registration of products such as animal feeds, fertilisers and pesticides to enhance agricultural production and for the registration of persons involved with the application of such products. The Draft Bill will repeal the Fertilizers, Farm Feeds, Agricultural Remedies and Stock Remedies Act, 1947 (Act 36 of 1947), and was expected to be published for comment in 2002.

The internationally proposed classification and labelling systems have been accepted for agricultural and stock remedies. These systems, locally referred to as the RSA Classification and Labelling System, have been in use since 1993. The System also makes provision for the use of CropLife International's pictograms on product labels.

Complaints about a specific agricultural production resource are investigated immediately, and administrative or legal action is taken against offenders when necessary.

Samples of all raw materials and animal feeds are taken regularly and tested for pathogenic contamination. This action, and the steps that follow when contamination is detected, assures the public of food safety.

**Livestock numbers 2000–2001 (million)**

	2000	2001
Cattle	13,5	13,5
Sheep	28,6	28,8
Pigs	1,6	1,6
Goats	6,7	6,8

Source: Agricultural Statistics, Department of Agriculture

## Veterinary services

State Veterinary Services constantly guard against the introduction of animal diseases from outside South Africa, while existing animal diseases, which may be detrimental to the economy of South Africa and to human and animal health, are controlled and combated. Stock in the high-risk areas is inspected at short intervals.

The Directorate: Animal Health of the national Department of Agriculture sets norms and standards for the delivery of veterinary services in South Africa.

The Animal Diseases Act, 1984 (Act 35 of 1984), provides the necessary powers to control diseases such as foot-and-mouth disease (FMD), swine fever, rabies and anthrax. After the outbreak of FMD in September 2000, South Africa is once again applying for recognition as a FMD-free zone, excluding the Kruger National Park and surrounding game reserves.

Surveillance systems are in place to ensure that all agricultural products entering and leaving the country are free of disease and thus safe for human consumption. All ports are thoroughly monitored, making sure that imported and exported goods are disease-free.

Trade with various countries in livestock products has resumed in huge volumes.

Although national livestock disease schemes have reduced the incidence of both tuberculosis and brucellosis since the sixties and early seventies, these diseases are still a big concern. Comprehensive attempts are made to control the increasing incidence of rabies throughout South Africa but especially in KwaZulu-Natal.

A new rabies vaccination policy was instituted whereby all dogs and cats must be vaccinated against rabies.

The Meat Safety Act, 2000 (Act 40 of 2000), stipulates that meat inspections and hygiene control must be carried out by qualified meat inspection personnel at abattoirs to prevent the transmission of diseases through meat to humans and animals.

The Directorate: Food Safety and Quality Assurance prescribes and audits essential standards implemented at provincial level. Imported and exported meat is monitored, and a national residue-monitoring programme was implemented.

The Directorate: Onderstepoort Biological Products (OBP) is a State-owned public company. It has the capacity and the technology to produce veterinary vaccines for the whole of Africa. The OBP is the sole or main producer of at least 15 vaccines for African animal diseases.

It provides large quantities of vaccines to fight major outbreaks of diseases such as CBPP (lung-sickness in cattle), lumpy skin disease, rift valley fever, horse sickness and anthrax. The OBP has joined the Pan African Vaccine Network to supply rinderpest and lung-sickness vaccines for Africa. The OBP is also involved in projects of the *Office International des Epizooties* (OIE), the World Health Organisation and the EU to supply vaccines to African countries.

OBP sales have increased in the last three years from 8% to around 37%.

The ARC is involved in the development of a new generation vaccine against Newcastle disease while major progress has been made towards a recombinant vaccine against heartwater. Heartwater is the most important tick-borne disease affecting livestock in the country.

The ARC is also involved in the development of an ethnoveterinary database.

## Pest control

The Department of Agriculture is involved in the chemical and biological control of invader



plants. In total, 48 000 ha of Queen of the Night infestation has been controlled, partly in co-operation with the Working for Water Programme of the Department of Water Affairs and Forestry.

The Department is active in a campaign to control the weed *Cereus jamacura*, which has invaded an area of approximately 255 000 ha. It involves four provinces stretching from Loskop Dam in the east to Zeerust in the west, and from Modimolle (formerly Nylstroom) in the north to Hartbeespoort Dam in the south. The cactus seriously reduces groundwater supply and the agricultural potential of the land. In some parts, the weed is also being controlled in collaboration with the Working for Water Programme. (See chapter: *Water Affairs and Forestry*).

The Department is actively spreading biological control agents on other weed species such as *Harissia martinii*, *Sesbania punicea* and some aggressive *Opuntia spp.*

The ARC is involved in:

- the successful biocontrol of red water fern and *Acaciapycnantha*
- a new field guide for alien plant invaders
- the registration of Garlon 4 to control *Prosopis spp.* and *Ulex europaeus*.

Host-specificity testing was completed for the leaf-mining fly *Calycomyza eupatorivora*, for the biological control of *chromolaena* in South Africa and permission was obtained to release five new species of biological control agents against their target weeds.

The Plant Pathogenic and Plant Protecting Bacterial Culture has been registered with the World Federation of Culture Collections.

## Migratory pest control

In terms of the Agricultural Pests Act, 1983 (Act 36 of 1983), the Department is continuously involved in the control of migratory pests, such as the quelea, locust and blackfly.

The South African Pest Control Association (SAPCA) is the official representative of the pest, termite and woodborer control industries. All SAPCA-qualified inspectors have to

apply for registration with the Department of Agriculture.

South Africa liaises with other countries and international organisations to ensure technology transfer on the control of pests.

## Marketing

In order to achieve the Government's stated aim with regard to the upliftment of small, medium and micro enterprises (SMMEs) and the commercialisation of the emerging farming sector, the Subdirectorate: Domestic Marketing was created in the Department of Agriculture. One of the first tasks of this Subdirectorate was to plan and organise a marketing course for extension officers. This was done in close collaboration with the Food and Agricultural Organisation (FAO) of the UN. During the course, which ended in February 2002, a total of 914 extension officers and 1 102 farmers were trained in the basic principles of marketing.

In terms of the Marketing of Agricultural Products Act, 1996 (Act 47 of 1996), which replaced the 1968 Marketing Act, all the old control boards (schemes) in terms of the 1968 Act had to be abolished by 5 January 1998.

By the end of 2001, the liquidation process of the schemes had not been completed, as a number of issues pertaining to levy collection and asset ownership still had to be resolved. There is, however, no longer any statutory intervention in terms of the 1968 Act.

Six schemes were extended until 31 July 2002. Liquidation committees had been established for the Meat Board, Wool Board, Maize Board, Deciduous Fruit Board, Wheat Board and Citrus Board.

Some partial deregulation had taken place prior to the implementation of the 1996 Act and some schemes, such as those for bananas, dried beans, eggs, chicory, *rooibos* tea and tobacco, had been revoked before 1997.

In terms of the Act, certain limited statutory measures may be introduced if the object-

ives of the Act are advanced and directly-affected groups are consulted.

Since deregulation, statutory measures in respect of records, returns and registration had been introduced in the maize, cotton, winter cereal, oil-seeds, sorghum, wine, deciduous fruit, citrus, dried fruit and wool industries.

Statutory levies were implemented in the cotton, sorghum, wine, deciduous fruit, citrus, dried fruit and winter cereal industries to finance the information and research functions (also the function of generic promotion in the case of wine and cotton).

Several industries that previously made use of statutory intervention no longer do so, and now operate free of control. The Act also provides for control over the sale of certain agricultural products, of certain imported agricultural products, and of other agriculture-related products.

With the task of closing down the boards almost complete, the National Agricultural Marketing Council (NAMC) is considering the integration of disadvantaged and small-scale participants into agriculture's mainstream. It monitors how the market is operating in order to advise on correctional measures.

The NAMC is a statutory body and primarily provides advice to the Minister of Agriculture and Land Affairs. One of the tasks of the NAMC is to provide the Minister with a report on the current status of a specific industry and to make recommendations to the Minister in order to enhance the viability of the relevant industry. The NAMC also has to propose measures to increase the participation of previously disadvantaged individuals in all facets of the agricultural sector.

One way of conducting investigations is through the establishment of committees in terms of Section 7 of the Marketing and Agricultural Products Act, 1996. The benefit of a Section 7 committee is that in such a committee representatives of all the directly affected groups can discuss relevant issues and compile a report for the NAMC. The NAMC then makes recommendations to the Minister.

In 2000/01, the Council established

Section 7 committees for the fresh produce, deciduous fruit, dairy, maize and red meat industries. In 2001/02, the Council established Section 7 committees for the wine, flower, citrus and ostrich industries.

Attendance at agricultural shows, farmers' days, conferences and workshops offers the NAMC the opportunity to disseminate information to farmers. Operation Outreach continues as a valuable initiative. In 2001, 10 provincial marketing workshops were held under the NAMC slogan of *Market-driven Production Pays*.

The Directorate: Plant Health and Quality of the Department of Agriculture is responsible for setting the standards for certain agricultural and agriculture-related products. This includes aspects such as composition, quality, packaging, marking and labelling, as well as physical, physiological, chemical and micro-biological analyses.

These standards are published in terms of the Agricultural Product Standards Act, 1990 (Act 119 of 1990), and the Liquor Products Act, 1989 (Act 60 of 1989), in the form of regulations for products sold on local markets and as standards and requirements for products that are intended for export. The Liquor Products Amendment Bill was expected to be referred to Parliament during 2002.

The Directorate developed the Production Unit Code Registration of production units for deciduous as well as subtropical fruits. This is aimed at ensuring the traceability of the origin of the products. The production unit codes were issued from 1 May 2000.

Another international development to ensure safe food of good quality through good agricultural and manufacturing practices is the control of management systems. Such systems ensure a more structured approach to the control of identified hazards than what can be achieved through traditional inspection and quality procedures.

The Directorate drafted the Draft Food Security Bill to ensure not only food safety but also the quality of agricultural products, including fresh fruit and vegetables, exported within



the current control system. By implementing the prevention-is-better-than-cure rule, control is transferred from end-product testing to the design and manufacture of such products.

In any international exchange of plants and plant products, there is a risk that pests and diseases might be introduced into the territory of the importing country. In view of this, the South African Government is a signatory member of various multinational agreements. The most important in terms of safeguarding the country's agricultural resources and natural environment are the International Plant Protection Convention (IPLC) and the World Trade Organisation Agreement on the Application of Sanitary and Phytosanitary Measures (WTO-SPS).

## Land administration

The Department of Agriculture, through the Directorate: Farmer Settlement and Development, controls and administers 673 253,1418 ha of State agricultural land.

State agricultural land is divided as follows:

- some 581 864,2735 ha of land expropriated by the South African Development Trust
- some 91 388,8683 ha of commercial land purchased from insolvent estates and properties transferred by the Department of Public Works in terms of Section 7 of the Disposal Act, 1961 (Act 48 of 1961).

The primary goal of the Directorate is the internal administration of State agricultural land with the aim of farmer settlement and ownership reform.

## Food security

A decision was taken at the Cabinet *Lekgotla* of 2000 to design an integrated food security strategy that will streamline, harmonise and integrate actions/programmes that address food security in the country. The Integrated Food Security Strategy was adopted at MinMec (forum of national and provincial

Ministers), resulting in consultative workshops at national and provincial levels with relevant departments.

A joint plan of action was agreed on with provincial departments of agriculture.

National departments provided a list of their existing food security programmes and committees that could be linked to the Food Security Strategy.

The Integrated Nutrition and Food Security Programme targets children under the age of 18 years and was developed within the Social Cluster Working Group led by the Department of Health.

The Food Security Section successfully embarked on a food security awareness campaign where projects were identified. These focused on the 13 nodal areas as identified by the Integrated Sustainable Rural Development Programme (ISRDP) and the Urban Renewal Strategy. The second step of the campaign was the launching of Telefood with a concert that was broadcast internationally to create awareness on the plight of poverty in the country and fund-raising towards food security projects specifically for South Africa and the African continent. This was done in collaboration with the FAO of the UN and the SABC.

A database of non-governmental organisations and community-based organisations has been initiated for rolling out food security projects in 2002.

The Draft Food Security Bill was developed in 2001. During working committee discussions with officials from the Human Rights Commission and UN Council for Human Rights, the document was hailed as the first of its kind to comprehensively address all pertinent food-related issues. The Draft Bill will be used as a basis for discussions in Africa and at the UN. Normal procedures on new legislation and policy guidelines will follow when discussions are finalised.

A workshop on food security information systems was held as a way of networking and collaborating towards the development of a food security information system. Priority is

given to the establishment of information systems in the nodal areas where food security campaigns were held.

The preparation phase of the Special Programme for Food Security has been completed within the three pilot provinces. Preparations are under way towards the implementation and expansion stage.

### Regional issues

South Africa participated in various training programmes of the Southern African Development Community (SADC) Food Security Training Programme. The country also participates in the Regional Advisory Committee (RAC) of the Programme.

A Regional Food Security Training Programme (RFSTP) has been developed over a five-year period as endorsed by the RAC. As from January 2000, the activities of the RFSTP focus on three main areas: strengthening the supply of food security training services; strengthening the effective demand for training; and developing and sustaining regional markets for food security-related training services.

The SADC has instituted a Subcommittee for Plant Protection, tasked with harmonising phytosanitary requirements in southern Africa. South Africa is also one of some 52 members of the Inter-African Phytosanitary Council which was established in 1954. Regional plant protection organisations such as these are able to provide valuable co-ordination on a localised level for the activities and objectives of the IPPC.

### International issues

As a signatory to the Rome Declaration, South Africa has committed itself to the implementation of the World Food Summit Plan of Action. For this purpose, South Africa reports annually to the World Committee for Food Security. South Africa is also collaborating with the FAO on the implementation of the SPFS within the context of the ISRDP.

South Africa is an active participant in other

international standard-setting bodies vital to its global market share, such as the IPPC and Codex Alimentarius.

## Risk management

The Department of Agriculture was expected to implement risk management strategies for the agricultural sector in South Africa in 2002.

These strategies cover awareness, avoidance, mitigation and transfer of risks.

## Drought management

There is an overall shift in the orientation of policy to place the responsibility of coping with drought back on the normal production system. This will cause farmers to exercise greater prudence and make themselves less vulnerable to the effects of drought.

A working group to devise a drought strategy has been established.

## Crop insurance

Government is investigating the introduction of a national crop insurance policy to assist farmers to recover from national disasters. Pilot programmes were implemented in 2002.

## Credit and assistance

The agricultural sector has, to date, been a net borrower, in that it borrows more than it saves. In fact, the total debt of South African farmers has grown by about 10% a year since 1995 – reaching R29,826 million by the end of 2000, compared with R9,495 million at the end of 1984.

The six major sources of credit for farmers are: banks (37%), agricultural co-operatives and agribusinesses (15%), the Land Bank (32%), private creditors (7%), other creditors and financial institutions (6%) and the State (3%).



## Agribusiness Promotion and Industry Relations (APIR)

The Directorate: APIR is a newly-established unit in the Department of Agriculture, charged with promoting participation and equity sharing towards an inclusive, equitable and prosperous agricultural sector.

The ultimate aims are:

- unlocking the economic potential of idle to underutilised resources of emergent groups by
  - instilling self-confidence and self-esteem through organisational skills, basic business management principles and technical skills.
  - encouraging and supporting them to take charge of their life by facilitating the opening of opportunities/markets and accessing productive resources.
  - allowing/affording them the opportunity to contribute to the growth and wealth of their economy. This will be achieved in two ways. At each value chain level, niche enterprises and possible partnerships will be developed. Special training, mentorship support and incentive support packages will be utilised.
- facilitating restructuring/expansion of existing agribusinesses to enhance their competitiveness and contribution to the sector as well as the sector's contribution to the economy as a whole.

The objectives are to:

- develop a national agribusiness policy

framework for an inclusive, equitable and prosperous agricultural sector

- establish a legislative framework for managing relationships/partnerships within the sector
- provide co-ordinated support packages in niche enterprise development; project establishment/maintenance support; incentive schemes towards reducing transaction costs and risk management; skills development; and capacity-building/mentorship support
- co-ordinate development and implementation of relevant programmes
- monitor and evaluate progress towards set targets.

## National LandCare Programme

The vision of the Department's NLP is to have communities and individuals adopt an ecologically sustainable approach to the management of South Africa's environment and natural resources, while improving their quality of life. This means people use the soil, water and vegetation resources in a responsible manner to ensure that future generations will also be able to use them to their benefit. It also implies that cultivation, livestock grazing and harvesting of natural resources should be managed in such a manner that no further degradation (such as soil erosion, nutrient loss, loss of components of the vegetation and increased run-off of water) occurs.

The NLP's objectives are to:

- promote partnerships between communities, the private sector and government in the management of natural resources
- establish institutional arrangements to develop and implement policies, programmes and practices that will encourage the sustainable use of natural resources
- encourage opportunities for the development of business enterprises that focus on sustainable resource management
- enhance the long-term productivity of natural resources.

LandCare themes are grouped into two areas,

### Information

At the end of August 2002, the Minister of Agriculture and Land Affairs, Ms Thoko Didiza, and Dr David Kemp, the Australian Minister for Environment and Heritage, signed a Memorandum of Subsidiary Agreement on the LandCare project.

There are 42 LandCare projects registered in KwaZulu-Natal alone, focusing on a wide range of agricultural land-use options. The objective is to empower land users, engaging them in agricultural activities in a sustainable and profitable way. These activities include cropping, fruit production, animal production, wetland care, craft production, tourism, alien and invasive plant control and the rehabilitation of erosion.

namely focused investment (Watercare, Veldcare, Soilcare and Juniorcare) and small community grants.

LandCare is developing and implementing integrated approaches to natural resource management in the country, which are efficient, sustainable, equitable and consistent with the principles of ecologically sustainable development. LandCare partners have consequently designed key strategies for sustainable natural resource management.

Serious concerns about land and water degradation, which impact on sustainable resource use, are identified in each province, and specific projects address these issues.

In cases of serious catchment-wide degradation and erosion, the root causes are investigated. In some cases, physical control structures are needed to ensure that water run-off control takes place. The Department of Agriculture's Subdirectorates: Key Soil Conservation Works designs and constructs such structures in terms of the Conservation of Agricultural Resources Act, 1983.

Projects are in progress in Limpopo, KwaZulu-Natal, Eastern Cape, Free State and the Western Cape.

The purpose of this strategy is to empower resource-poor communities to develop LandCare groups and activities through awareness, training and education. This includes communication strategies directed towards rural community groups and young people. The strategy formulates policy and legislation to develop incentives for natural resource management.

Research and evaluation wants to establish and implement a monitoring system to evaluate progress, assess contemporary issues and provide a basis for planning and research.

The Department also aims to promote its National Policy on Agricultural Land and Resource Management to all spheres of government and other stakeholders.

### **Focused investment**

The Watercare theme targets Limpopo in particular, because of water shortages and the

importance of water for irrigation in the province. This theme establishes a framework for managing land and preventing the silting up of dams for irrigation. Watercare works in partnership with the community to develop action plans for managing and restoring irrigation schemes. The rehabilitation of irrigation schemes increases water supply and household food security. Furthermore, Watercare promotes the development of techniques for water resource management and encourages opportunities for training in this field.

Veldcare promotes best grazing systems and erosion-prevention practices to improve production. It develops and maintains agricultural activities in accordance with the principles of ecologically sustainable development within North West. Economic and social development opportunities are realised by improving grazing areas and maintaining viable grazing areas throughout rural communities.

Soilcare encourages rural farmers in KwaZulu-Natal, the Eastern Cape and Mpumalanga to build innovative structures to combat soil erosion. This includes reducing the depletion of soil fertility and soil acidity. Through Soilcare, sustainable agricultural production systems are introduced, such as diversification, management of input and conservation tillage.

The objectives of Juniorcare are to empower previously disadvantaged youth through training in facilitation and leadership skills.

This includes the promotion of food security at home and at schools, awareness of sustainable agriculture, stimulating the formation of youth clubs and projects that aim to promote other components of LandCare. Juniorcare addresses the needs of young people in an integrated way and involves interdisciplinary approaches.

### **Land Bank**

The Land Bank is a statutory body with a mandate from government to support the development of the agricultural sector as a whole. The Bank's key strategic intent is to achieve financial sustainability focused on social and development impact. Meeting client needs with



cost-effective and competitive products and services, building an efficient, representative and committed workforce, and good relations with stakeholders are critical elements of this strategy. The Bank provides a comprehensive range of retail and wholesale financial products and services designed to meet the needs of commercial and developing farmers and agriculture-related businesses.

The total loan portfolio increased to R16,5 billion at the end of 2001, up from R14,7 billion in 2000.

Net interest income increased to R766,5 million in 2001 from R749,5 million in 2000 while there was a 10% increase in operating income to R885,7 million.

The net surplus for 2001 was R344 million after making all the necessary provisions – a decline of 15% due to increased provisions for irrecoverable debts. Cost-to-income ratio was 35% for 2001.

The Land Bank Act, 1944 (Act 13 of 1944), as amended, made it possible for the Bank to extend loans to agribusiness and to make equity investments, opening the way to diversify and grow the portfolio. Diversification is important for long-term financial sustainability. The Bank receives no ongoing grants or subsidies from government. It raises its funds on the local and international money markets. The Bank's conservative financial approach and good results are reflected in a premium risk rating, enabling it to access funds at favourable rates.

Legislation to replace the Land Bank Act 1944, namely the Land and Agricultural Development Bank Bill, was promulgated in June 2002.

### **Products and services**

The Land Bank provides low, medium and high-risk clients with access to a full range of long, medium and short-term loans to meet all their financial needs, including land and equipment purchases, asset improvement and production credit. During 1999, the Bank added Gold Premium and Platinum risk categories to its existing Gold low-risk category.

Clients who qualify on the basis of exceptional security and high-loan values pay reduced interest rates. Specific criteria for medium and high-risk clients with limited security increases access to credit while minimising the risk of default. These clients pay competitive interest rates, but on-time repayment earns them a bonus that reduces their rate to that paid by Gold low-risk category clients. To manage risk effectively, funding for these loans comes from a separate Development Finance Fund.

### **Corporate and development finance**

The Bank has set up a Corporate Finance Unit, which provides a range of wholesale products to intermediaries and finance to corporate clients involved in agriculture-related business in South Africa. Agribusiness is defined as up-and-downstream activities, comprising input manufacturing, and supply and output-processing activities. The Unit works closely with the Development Projects Unit. Many projects do not get off the ground because businesses cannot afford loan repayments in the early years. The Development Projects Unit overcomes this by investing in projects and taking a share of the eventual profits, rather than charging interest. The Land Bank is developing monitoring mechanisms, principles and criteria for project selection. Coupled with this is an existing strategy where the Bank gives the clients total control.

### **Black Economic Empowerment (BEE)**

The high price of farmland in South Africa makes it impossible to finance the purchase of land solely from returns on farming activities. In a bid to assist historically disadvantaged people to gain entry into farming, the Land Bank has introduced a low-interest loan for historically disadvantaged, first-time buyers of agricultural land. The interest rate is set at 10% and is reviewed after 24 months. The Bank is committed to keeping the interest rate as low as market circumstances allow. Many of the Bank's activities come together to support its BEE Initiative. These include pricing based on risk, wider access to credit,

new product lines, new risk criteria, Step Up micro-finance, equity investments, preferential access to bought-in properties and increased use of black service-providers.

### **Microfinance**

To address the widespread need for micro-finance in rural areas, the Land Bank introduced the Step Up scheme in April 1998. This enables people with no security to borrow an initial amount of R250. If clients repay on time they can 'step up' to a R500-loan, continuing to a maximum loan of R18 000.

At this stage, Step Up clients have a track record that qualifies them for the Land Bank's high to medium-risk categories.

By mid-2002, the Land Bank had lent R117 million to over 70 000 clients of which the majority were women.

Between December 2001 and mid-2002, the repayment rate was 86%.

### **Agri SA**

Agri SA is an independent producer organisation consisting of provincial agricultural unions, commodity organisations and businesses owned by farmers, such as co-operatives and agricultural businesses. The main objective of Agri SA is to negotiate the best possible economic and social conditions for agricultural producers within the South African community. To attain this objective, it strives to organise the farming population and agricultural business into a united front.

The highest authority within the structure of the organisation lies with the Agri SA Annual Congress, where all three legs of organised agriculture are represented.

The General Council of Agri SA, which consists of representatives from the Provincial Chamber, Commodity Chamber and Agribusiness Chamber, gives continuous attention to matters of general interest concerning the farming community. An executive committee, consisting of Agri SA's President, Deputy President and the Chairpersons of the three Chambers, makes the day-to-day decisions

within the accepted policy of the organisation.

Agri SA also has a number of functional committees specialising in matters which are relevant to the farming community such as economic issues, safety, labour, land affairs, etc. In addition, they are major employers, developers and sources of added value.

### **Agricultural Business Chamber (ABC)**

The ABC is a sectoral body representing an important component of South Africa's business life. The ABC's members represent total assets of almost R30 billion and an annual agricultural business turnover of approximately R50 billion.

ABC members together operate more than 2 000 service centres country-wide and have a total employee complement of more than 100 000. In many rural areas, members of the ABC are the business hub of the community and make a key contribution to maintaining the rural infrastructure.

The ABC is an integral part of the Agri SA Group and associate with Business South Africa and international bodies such as the International Federation of Agricultural Producers, the International Chamber of Commerce and the International Agribusiness Management Association.

The ABC strives to support its member organisations by creating an environment within which they are enabled to operate as competitive and innovative business enterprises.

The Chamber represents agricultural companies, agricultural co-operatives, agricultural co-operatives in the developing agricultural sector, companies which arose out of the conversion of agricultural co-operatives, and other agricultural business enterprises and organisations.

Agricultural businesses play a significant role in the economy of South Africa as handlers, processors and marketers of agricultural products, and as suppliers of production input and services.



### **Agribusiness as an economic sector**

Agribusiness can be divided into two categories: non-co-operative business ventures and co-operatives or transformed co-operatives.

Non-co-operative business ventures, normally known as profit companies, are involved in the production and distribution of agricultural equipment and production requisites and the marketing of agricultural products.

Co-operatives dominate the distribution of intermediate requisites and the handling, processing and marketing of agricultural products.

Agricultural co-operatives or agribusinesses are regarded as the farmers' own independent business organisations. There are close to 1 000 primary agricultural co-operatives and agribusinesses throughout the country. They supply their members with production input such as seed, fertilizer, fuel and repair services. They also provide credit and extension services, and handle a large percentage of their members' produce.

There are more than 15 central co-operatives in the country, which aim to supply the primary co-operatives with specific services, such as processing and marketing of agricultural products, insurance services for crops, short-term cover and farming requisites. The structure of agribusiness changed substantially since the deregulation of the agricultural sector to a free market economy in 1994. Many co-operatives transformed into private companies, consolidations and mergers occurred, international groups entered South Africa, and agribusinesses are today listed on the Johannesburg Securities Exchange. OTK, an agri-service group, was rated number 11 in the top 100 South African companies in 2001. The group's name was changed to Afgri in June 2002.

Agribusinesses are involved in the production and distribution of agricultural equipment and production requisites and in the marketing and processing of agricultural products. The expenditure on agricultural input and services in 2000 amounted to more than R21 billion, with farm feeds, fuel, fixed

improvements and fertilizer being major items handled by agribusinesses.

South African agribusiness is increasingly challenged to perform competitively and the ABC's Competitive Index indicates an upward trend, especially since 1998. This implies that value-adding processes in South African agriculture are becoming more competitive. The input sectors also indicate a positive trend in competitiveness. These positive trends are supported by upward agricultural exports and sustained increases in the Agribusiness Confidence Index.

The co-operative movement in South African agriculture is expected to grow. A new Co-operative Bill is under consideration and it is envisaged that this enabling legislation will make co-operatives accessible to all communities through outgrower projects, contracting and share equity schemes. The second draft has been completed and approved by Cabinet in December 2001. It has been referred to the State Law Advisors office for review and certification.

The Co-operative Development Initiative is one of many efforts to facilitate such linkages and support a 'growth-with-equity' development path for South African agriculture.

### **National African Farmers' Union**

NAFU strives to promote the interests of the disadvantaged farming sector by lobbying for access to support services and empowering its members through effective communication and capacity-building programmes.

### **Economic empowerment**

The Department of Agriculture funds NAFU's capacity-building programme. Further funding is provided by the US Department of Agriculture.

Bergville Maize Milling Co-operative was also co-ordinated and funded by the national Department of Agriculture.

The Zijamele Farmers Co-operative's training programme was co-ordinated by the

Department and rendered by Africare as an implementing agent.

The Department co-ordinates the Presidential Mechanisation Lead Projects.

### **Institutional capacity-building**

The Department of Agriculture has developed a databank for agricultural human resource capacity for South Africa.

In collaboration with the Economic Development Institute of the World Bank, the Department has designed and developed training courses for rural restructuring and development. The Youth Entrepreneurship Programme was launched in 1999.

The Department has co-ordinated and funded the development of the National Emerging Red Meat Producers' Organisation. This includes the formation of provincial structures and the provision of organisational leadership training.

### **Training and research**

South African agriculture has a strong research component. Many of the people involved are world leaders in their respective fields of expertise. The ARC, an autonomous statutory body set up in terms of the Agricultural Research Act, 1990 (Act 86 of 1990), is the largest agricultural research organisation in Africa. Since its establishment, the organisation has transformed and consolidated, reducing the total number of research institutes from 16 to 13 in 1999.

The ARC provides research support to the Department of Agriculture and the nine provincial departments of agriculture. ARC scientific expertise supports most of the Department of Agriculture's regulatory directorates such as the Directorate: Public Veterinary Health, the Directorate: Animal Health, the Directorate: Plant Health and Quality, the Directorate: Agricultural Resource Conservation and the Directorate: Agricultural Production Inputs. The ARC also supports

other agricultural institutions such as the Registrar of Livestock Improvement and Identification, the Registrar of Brands as well as the South African Veterinary Council and the Perishable Products Export Control Board.

The ARC serves the whole continuum of farmers, from the small-scale subsistence sector, through the emergent commercial sector, to fully-fledged commercial farmers. Research can be scale-neutral or directed to the specific needs of small-scale or commercial farmers.

The ARC publishes various reports, field guides and other multimedia information products directed at all levels of agriculture in South Africa and the rest of Africa. Various specialised training courses and information days are regularly presented and attended by farmers and delegates from South Africa and neighbouring countries. Participatory research, specialised exhibitions, training courses and open days (with practical demonstrations) are used to reach the small-scale farmer.

South Africa has a number of specialised agricultural high schools or regular schools offering a comprehensive range of agricultural subjects. Prospective farmers are trained at 11 agricultural colleges: Elsenburg (Western Cape), Cedara and Owen Sitole (KwaZulu-Natal), Grootfontein Agricultural College at the Grootfontein Agricultural Development Institute (Department of Agriculture), Glen (Free State), Potchefstroom (North West), Lowveld (Mpumalanga), Fort Cox and Tsolo (Eastern Cape), and Tompi Seleka and Madzihandila (Limpopo). Diploma courses are also offered at various technikons. Degree courses are offered at the faculties of agriculture of various universities.

Veterinary surgeons are trained at the University of Pretoria's Faculty of Veterinary Sciences at Onderstepoort. The former Faculty of Veterinary Science at the Medical University of South Africa has amalgamated with the University of Pretoria. State veterinarians are assisted country-wide by animal health technicians who have a National Diploma in Animal Health from Technikon SA, the



University of the North West and various other colleges of agriculture. A National Diploma in Veterinary Technology is offered by Technikon Pretoria to enable student veterinary laboratory technicians of the Department of Agriculture and the private sector to become fully qualified. Meat inspectors in the provincial Directorate: Veterinary Services assist State veterinarians at abattoirs in South Africa with meat inspections.

They complete a three-year diploma course at any technikon to become environmental health officers and are designated by the Directorate to become meat inspectors. Meat examiners complete a course at technical colleges to receive a National Certificate in meat examining for red meat or poultry.

Over a period of about five years, a course has been developed to train poultry meat examiners for a National Certificate. A similar course for the ostrich industry is being developed.

The marked lack of interest in agricultural engineering as a career choice has been widely debated. Food processing, packaging, storage and transport, computers, and sales and service opportunities, are all off-farm activities that fall within the ambit of the agricultural engineer. The technikons at Pretoria, Bloemfontein and Cape Town offer civil engineering with agricultural courses. The universities of Pretoria and Natal offer degree courses in agricultural engineering.

## Trade relations

The Department of Agriculture has reviewed its foreign representation. All previous foreign representatives of the Department and the ARC have been recalled. Foreign offices have been reopened in Washington DC (US), Beijing, (People's Republic of China), Brussels (Belgium) and Rome (Italy). The main functions of these foreign representatives are to provide South Africa with information on agricultural developments, particularly issues that impact on policy, and to liaise with all agricultural

organisations in host and neighbouring countries on matters of mutual interest.

The Directorate: International Relations of the Department facilitates and co-ordinates international activities on both multilateral and bilateral bases. The Directorate: International Trade analyses international trade and marketing policies and advises on multilateral and bilateral agricultural trade policy. The Department is responsible for dealing with matters concerning agricultural relations with other countries and organisations, such as SACU, the trade and industry sectors of the SADC, the World Trade Organisation (WTO) and the International Grains Convention. The Department maintains bilateral trade agreements with countries in Africa, including Lesotho, Malawi, Swaziland and Zimbabwe. The Department is also involved in negotiations with the EU and the Cairns Group.

International phytosanitary agreements that the Directorate: Plant Health and Quality has concluded over the past year include Memoranda of Understanding between South Africa and the PRC as well as Algeria. Further input regarding draft bilateral agreements were made in respect of various other countries.

Work relating to agricultural relations in the field of trade is done in co-operation with the departments of Trade and Industry and Foreign Affairs. The Department of Agriculture is a member of the FAO of the UN; the Consultative Group on International Agricultural Research; the Food, Agriculture and Natural Resources Sector of the SADC; the International Seed-testing Association; the Organisation for Economic Co-operation and Development's Seed Schemes; the Union for the Protection of New Varieties of Plants; and the Cairns Group.

The Directorate: International Trade is responsible for the implementation of South Africa's commitments in terms of the WTO Marrakech Agreement. These commitments include the reduction of tariffs, export subsidies and domestic support given to agriculture. Almost all of these commitments were met with the finalisation of the conversion of

quantitative import restriction to tariffs, as well as the deregulation of the agricultural marketing system. In addition, the Department is creating market access opportunities by implementing minimum market access commitments agreed to in terms of the agreement.

WTO agricultural negotiations entered its third phase in March 2002. The negotiations have been incorporated into a broad WTO Round at the 4th Ministerial meeting of the WTO in Doha, Qatar, in November 2001.

The Directorate: Marketing issues import permits for various agricultural products at reduced levels of duty.

South Africa's objectives in the agricultural negotiations arena are to achieve a substantial reduction in domestic support and export subsidies mainly by developed countries. Another objective is to achieve a substantial improvement of market access for South African agricultural exports and to ensure that South Africa's commitments in terms of domestic support fully covers the development needs of the country.

The Department is developing trade relations with other countries. Aspects attended to include the renegotiations of the SACU Agreement, finalising the SADC Protocol on Trade, as well as implementing the SA-EU TDCA.

The SADC Protocol on Trade was implemented on 1 September 2000. The Department is part of the Government team dealing with the implementation of this Agreement, while it also participates in discussions aimed at resolving some outstanding issues such as the rules of origin for wheaten flour and related products.

The SA-EU TDCA was implemented on 1 January 2000. The Department has introduced a system whereby market opportunities under the Agreement can be fully utilised. This includes an information campaign, as well as the administration of export quotas granted to South Africa under the Agreement. Since 1 January 2000, the Department has issued export permits for various products such as wine, canned fruit, fruit juices, orange

juice, cut flowers, proteas, cheese and frozen strawberries to be exported to the EU at reduced levels of duty.

The South African Government has signed a framework agreement with MERCOSUR (a treaty establishing a common market between Argentina, Brazil, Paraguay and Uruguay). This agreement lays down the framework for negotiations of a free trade agreement (FTA). The first round of negotiations took place in Uruguay in October 2001. The Department is part of the Government negotiating team, representing agricultural interest. The Department is also preparing its position regarding possible FTAs with China, the European Free Trade Area, India and the US.

In addition to these agreements, the Department represents the Government on the International Grains Convention. It is responsible for implementing and administering the agricultural components of the bilateral agreements with Zimbabwe, Malawi and Mozambique. Import permits for agricultural products are issued in terms of the trade agreements with Zimbabwe and Malawi.

The Department is investigating and evaluating export opportunities for agricultural products on world markets. A subdirectorates was formed to deal specifically with issues related to the strategic repositioning of the agricultural export sector. Strategic market research and working on industry strategies for exports, is a key focus. Export-led development projects are also looked at as a means to alleviate poverty.

Scientific co-operation with the US, initiated under the former South Africa-US Binational Commission (BNC), continues under the auspices of the newly established Co-operation Forum (CF). Several joint projects on, among other things, landcare, food safety and biotechnology have been completed, while others are ongoing.

The Department of Agriculture will act as co-ordinator for the entire agricultural sector in its dealings/relations with the US in order to ensure regular reporting on activities that fall under the scope of the CF.



The outstanding zoosanitary and phytosanitary-agreements proposed in the past were discussed by DEXCO and various decisions regarding each individual draft proposal were taken. Instead of approving the signing of the outstanding bilateral agreements, the Department has opted to undertake public relations exercises involving the relevant foreign missions in South Africa to strengthen/build relations in the field of plant and animal health co-operation to enhance trade opportunities.

Discussions with Lesotho regarding the identification of livestock to prevent theft are ongoing.

The Department of Agriculture also participated in the first BNC meeting with the PRC and several issues are being followed up.

During the BNC between South Africa and Nigeria, held in Abuja in March 2001, an Agreement on Institutional Co-operation in the Field of Agriculture was signed. This Agreement was ratified by both countries during the 4th Session of the BNC held in Pretoria on 25 March 2002.

An Agreement on Phytosanitary Matters was signed on 19 October 2001 between South Africa and Algeria.

During the BNC between South Africa and Egypt, held in Cairo in October 2001, the Department of Agriculture successfully negotiated the lifting of the ban on animals and animal products by the Egyptian authorities.

The Department hosted the Deputy Minister of Agriculture of Tanzania in March 2002. The official visit concentrated mainly on livestock development for Tanzanian animal husbandry.

The ARC participates in various co-operative research agreements, international organisations and networks. These include the Special Programme for African Agricultural Research and the FAO of the UN. South Africa was accepted as a partner in research projects that are funded by the EU under its 4th Framework Programme. The Biotechnology Action Committee of the UN's Educational, Scientific and Cultural Organisation established its Biotechnology Education and

Training Centre for Africa at the ARC-Roodeplaat Vegetable and Ornamental Plant Institute. The ARC-Onderstepoort Veterinary Institute is the OIE Regional Collaborating Centre and the Reference Centre for FMD.

At national level, the ARC supports various government departments in deliberations regarding international agreements and disputes, for example the Convention on Biodiversity, the Kyoto Protocol on Global Change, the Montreal Protocol, GMOs and Indigenous Knowledge Systems.

## Import and export control

The aim of the Import Export Policy Unit of the Directorate: Animal Health is to formulate and support policy to reduce sanitary (health) risks in the import and export of animals and animal products.

Applications to import animals and animal products are evaluated in accordance with the Animal Diseases Act, 1984, the Meat Safety Act, 2000, and international standards (e.g. the OIE Code and Codex Standards). Import requirements vary according to the product and the animal health situation in individual countries.

South Africa is an active member of the OIE. Disease reports are received from the OIE and by direct contact with the veterinary administration in the exporting countries.

Trade in animal and animal products is based on a series of requirements, which the importing country considers appropriate to prevent the entry of diseases.

South Africa is a signatory member of the WTO-SPS. As a signatory member of the IPPC, South Africa subscribes to the principles of equal market access and international co-operation in protecting human, animal and plant health. The WTO-SPS acknowledges the IPPC as the relevant organisation to draft and adopt standards for phytosanitary measures. These international organisations promote free trade in plants and plant products, and at the same time acknowledge the rights of

member countries to protect plant health.

The Directorate: Plant Health and Quality of the Department of Agriculture is the designated National Plant Protection Organisation of South Africa and has the obligation to fulfil the requirements of the WTO-SPS and the IPPC.

The Department is one of the key regulatory State departments with the responsibility to enforce laws enacted by Parliament to protect the South African consumer, the environment and other national interests. The Department's regulatory activities with regard to plants and plant products are primarily enforced by the Directorate: Plant Health and Quality and the Directorate: Genetic Resources. In addition, South Africa's Customs Service participates in this effort by detaining imported goods when requirements have not been met.

The Directorate: Plant Health and Quality promotes and regulates the availability of healthy and productive plant material and the quality of agricultural products in South Africa. It administers the Agricultural Pests Act, 1983, the Liquor Products Act, 1989, and the Agricultural Product Standards Act, 1990. Import control is vital to prevent the introduction of potentially harmful foreign pests. Prospective importers of plants and plant products have to apply for an import permit for those controlled goods not published in *Government Gazette* R1013 of 1989. A pest risk analysis, based on scientific data, is conducted, and specific phytosanitary requirements are set according to the phytosanitary risk(s) involved. These conditions are then stipulated in the permit issued to the importer. Importers are obliged to present the material for inspection to the Executive Officer of the Act or the official representative. Should the imported material comply with all set conditions, permission will be granted for release to the importer. In cases of non-compliance, the risks will be evaluated and managed by a decision on mitigation, destruction or return to the country of origin.

Should any potentially harmful pest be introduced into and established in South Africa, the Directorate: Plant Health and

Quality will conduct a survey to determine the distribution of the organism, drafting an eradication programme, liaising with other relevant parties and possibly co-ordinating and participating in the eradication programme.

Despite strict precautions in the past, several harmful alien organisms have become established in specific production areas in South Africa, causing substantial losses to agriculture. Control measures are published to prevent or combat the spread of these organisms to other areas in the country. Quarantine services ensure imported plant material and biological control agents are appropriately handled, to guarantee that harmful alien organisms do not enter and are not established in the country.

In export control, South Africa has to comply with the import conditions of the specific country or group of countries it is exporting to, by issuing phytosanitary certificates. The Directorate furthermore maintains a database on the import conditions and procedures of various countries and the occurrence of harmful organisms within South Africa. It renders advisory and identification services, carries out field inspections, and conducts laboratory tests as requested by the importing country.

All consignments of plants and plant products intended for export are inspected, evaluated and certified by the Directorate.

This ensures a high standard of phytosanitary control, which contributes to and achieves international credibility and phytosanitary accountability and is conducive to the promotion of international trade in agricultural products. Close international liaison with regard to export programmes and their execution is very important to establish and maintain world markets for South African produce. Export control is further supported by the analysis of fresh produce for chemical residues to ensure it complies with international standards and norms and that international trade is enhanced. These procedures include the sampling of commodities presented for export, and highly specialised and sophisticated methods to determine the sta-



tus of the products. These analytical results are used as inputs when deciding to release products for export.

The Department of Land Affairs is responsible

## Land Affairs

- cadastral surveys
- surveys and mapping
- spatial planning and information
- land reform, implementation management and co-ordination
- land reform systems and support services.

### Deeds registration

The registration of deeds is a national competency. The aim of the Deeds Registry is to maintain a public register of land as well as an

#### Information

The Deeds Registry of the Department of Land Affairs has a proud record that goes back to the preservation of land records on paper since 1666. With the rapid increase in the popularity of the Internet as a global information tool, the Deeds Office recognised an opportunity to expand its clients to also include the Internet browser. The Chief Registrar of Deeds developed a less expensive method of giving the public access to deeds registration information called DeedsWeb.

DeedsWeb was officially launched by the Deputy Minister of Agriculture, Prof Dirk du Toit, on 4 December 2001. With DeedsWeb, any person with the necessary web browser software can access the Deeds Office database and obtain up-to-date registration information upon payment of the prescribed fee. DeedsWeb has many advantages for service delivery and has the potential for generating additional revenue for the Deeds Registration Trading Account. A characteristic of DeedsWeb is that it paved the way for an electronic network that will ultimately also be used by the Department's proposed electronic Deeds Registration System (e-DRS). The e-DRS will provide a revolutionary method for electronically lodging, processing and registering statutory land rights as well as full ownership of land ('freehold'). This System will primarily benefit previously disadvantaged sectors of the community living in rural areas, informal settlements, or low-cost housing schemes. Deeds offices have maintained their service delivery record by keeping the turn-around time for deeds from lodgement to registration at an average of 10 days in spite of the annual increase in lodgements.

for the following functions:

- financial management
- corporate services
- deeds registration

efficient system of registration aimed at affording security of title to land and rights in land.

There are nine Deeds Offices in South Africa, situated in Pretoria, Cape Town, Johannesburg, Pietermaritzburg, Bloemfontein, Kimberley, King William's Town, Vryburg and Umtata. A Deeds Office is planned for Nelspruit in Mpumalanga.

The aim of Deeds Offices are the:

- registration of real rights in land
- maintenance of land registers
- provision of land registration information
- preservation of registration records for archival purposes.

The Chief Directorate: Deeds Registration has developed a bar-code based document tracking system (DOTS) for implementation in Deeds registries. DOTS was born out of the need to eliminate the disappearance of deeds and documents during the registration process. DOTS's ability to track deeds and documents through the various processes within the Deeds Registry has repeatedly proved its worth. In addition, the system provides Deeds registries with valuable statistical information which is being used for managerial purposes.

Deeds offices supply registration information in support of all units in the Department conducting research for land reform purposes.

### Cadastral surveys

The Chief Directorate: Cadastral Surveys' project for the upgrading of townships surveyed under the former Department of Development Aid has made it possible for thousands of people to register their properties as freehold where previously they had only held lesser land rights. The upgrading process has been

completed in the Western and Eastern Cape as well as in KwaZulu-Natal. Progress within the remaining provinces has been steady and the entire process will be completed in 2003.

The development of the Cadastral Information System (CIS) continued during 2002 and a total information system is becoming a reality. The available spatial data relating to informal rural settlements was embedded into the formal cadastral spatial data, allowing the CIS to depict a fuller picture of land rights throughout the country. Focus was placed on making cadastral spatial information more accessible to the clients of the offices of the Surveyors-General. Much has been achieved in this regard by offering an order-and-deliver-by-e-mail service for both bulk and single extracts of data.

Progress with regard to the upgrading process is steady and the full project should be completed on target.

Service delivery has been improved and good turn-around times have been maintained in the four offices of the Surveyor-General. Ease of access to accurate spatial data has been provided through the enhanced usability and continual updating of the spatial database. Clients have ready access to such data, both in electronic and hard copy format.

The compiling of a National Feature Catalogue for cadastral spatial features was completed during 2001/02. The migration of the cadastral spatial data to a more powerful database structure (Oracle Spatial Object) has been successful and a national database of the South African spatial data is available

on the Chief Surveyor-General website (Internet at [www.csg.org.za](http://www.csg.org.za), or Intranet at <http://cis.pwv.gov.za>).

The website of the Chief Surveyor-General contains information and links to a number of other related sites. Information can be downloaded from the site and spatial data contained within the offices of the Surveyor-General can be viewed.

Usage of cadastral spatial data increases continuously and is also being used as overlays in aerial photography.

The formal and informal cadastral spatial data has proved invaluable in providing assistance to components dealing with land reform and restitution. Enhancements to the spatial data will continue to be made with a view to providing services in support of land reform and orderly development.

## Surveys and mapping

The aim of the Chief Directorate: Surveys and Mapping is to maintain an integrated national control survey system, a national mapping programme, a national aerial photography programme and associated geospatial products. The Chief Directorate's spatial data is a valuable resource, essential for orderly and sustainable development.

The Chief Directorate contributed to the process of spatial development and in particular to the land reform programme by supplying accurate and up-to-date spatial data. To increase sustainable land use, the Chief Directorate renders support in the form of assistance with land restitution/reform research. During 2001/02, the departmental land reform programme was supported by conducting cadastral surveys and pointing out beacons. Assistance was provided with 25 cases and a total of 35 land parcels were surveyed. It also provided spatial information to other departments and parastatal organisations that required spatial data for their own development programmes. The Chief Directorate provided assistance for land

### Information

A special bursary scheme, focusing on providing financial assistance to previously disadvantaged candidates wishing to study towards tertiary qualifications within the geomatics/surveying field, has been established.

The scheme will make provision for the inclusion of suitably qualified individuals in the staff of the Chief Directorate: Cadastral Surveys, providing them with a career path leading to various management positions.



### Total number of deeds lodged for registration

Deeds Office	2000/01 Number of Deeds	2001/02 Number of Deeds
Pretoria	440 359	567 518
Cape Town	391 349	422 752
Johannesburg	263 075	289 345
Pietermaritzburg	196 159	216 781
Bloemfontein	138 295	103 060
Kimberley	16 290	12 839
King William's Town	24 826	27 562
Vryburg	12 562	11 601
Umtata	10 174	8 914
Total	1 493 089	1 660 372

reform projects during 2002 by supplying maps, aerial photography and other essential geospatial information. Direct assistance was also provided for restitution research and land reform projects.

The Chief Directorate aligns its aerial photography and map production programmes to the requirements of local, provincial and national government departments through the National Advisory Survey Committee. In 2001/02, the aerial photography and orthophoto mapping production programmes were aligned to cover the nodal areas defined by the ISRDP and URS.

The change to digital map production methods continued. Almost all data capturing

and cartographic processes are now digital. The major features of the entire 1:50 000 national map series are available in digital format. This asset is continually being improved upon and maintained to satisfy the nation's need for current information.

The integrated national control survey system consists of a country-wide network of control points with accurately-determined positions and/or heights. This network provides the spatial reference framework for the country.

The Chief Directorate is in the process of installing a network of 38 active GPS (global positioning system) base stations, known as TrigNet. By mid-2002, 25 stations had been

### Total number of properties on the Deeds Registration System Database

Deeds Office	Township Erven	Scheme Units	Agricultural Holdings	Portions of farms	Total
Pretoria	1 702 238	164 266	47 232	199 447	2 133 183
Cape Town	1 527 211	137 827	Nil	135 629	1 800 667
Johannesburg	896 535	100 844	Nil	Nil	997 379
Pietermaritzburg	783 804	121 928	Nil	92 416	998 148
Bloemfontein	438 452	19 105	6 989	59 470	524 016
Kimberley	84 532	641	872	4 912	90 957
King William's Town	150 396	5 571	Nil	11 525	167 492
Vryburg	7 102	179	3 987	11 348	85 536
Umtata (under construction)	51 399	18	Nil	90	51 507
Total 2000/01	5 484 320	532 302	59 091*	525 898	6 601 611
Total 2001/02	5 707 437	550 404	59 080	514 837	6 831 758

\* Reduction can be ascribed to the fact that townships have been laid out on agricultural holdings

installed and operationalised. The data generated by the network provides users with the means to achieve high position accuracy using stand-alone GPS receivers.

Capacity-building is given high priority by the Chief Directorate. The MapAware Project, the Chief Directorate's national map awareness and map literacy campaign, continued to conduct workshops throughout 2001/02. The Project strives to develop and enhance the map skills of people using spatial information in both the workplace and schools.

Mapping is a crucial resource for decision-making and development and one of the most important deliverables of the Chief Directorate to support orderly spatial planning and sustainable land use. Of the national mapping series, the 1:50 000 topographical map series is the largest scale map series providing full coverage of South Africa. Small scale maps, 1:250 000 and 1:500 000, are produced from the 1:50 000 map series. The popular large-scale 1:10 000 orthophoto map series provides coverage of predominantly built-up areas, areas of economic importance and areas experiencing rapid development. This series currently covers approximately 25% of the country. Aeronautical charts and other wall maps are also produced. All these maps must be continuously revised to reflect the change in landscape and other geospatial features.

The digital cartographic mapping system is in full operation. This has sped up production considerably. To improve service to clients, the rapid partial updating technique has been introduced. This resulted in an increase of the production targets of medium-scale maps from 60 in the previous year to 90 in 2002, and an increase of the production targets of orthophoto maps from 500 in 2001 to 700 in 2002.

The Chief Directorate is a full member of the National Air Space Committee and produces aeronautical charts for the southern African region that are vital to the interests of air safety. The Chief Directorate provides up-to-date charts that reflect changes to airspace with respect to the Future Airspace Management

Efficiency Programme.

The Chief Directorate enhanced effective government empowerment by building capacity through active assistance to other national departments. The Department of Environmental Affairs and Tourism was assisted with the mapping of Antarctica and Marion Island and the Wetlands GIS project.

## Surveys

The aim is to undertake field surveys in order to acquire control survey, mapping and specialised survey data; to acquire aerial photography and ancillary data; to process the survey and mapping data collected through the processing of network adjustments, aerial triangulation, photogrammetric compilation and map data processing; to maintain national control survey network monuments; and to collect and provide permanent GPS base station network data.

The integrated national control survey system is the backbone of the survey and geospatial industry. The system consists of a network of approximately 62 000 control points distributed throughout the country. The network is made up of about 28 000 trigonometric beacons, 24 000 town survey marks and 10 000 elevation benchmarks. The co-ordinates of these marks are referenced to the Hartebeesthoek 94 datum, which, in turn, is referenced to the International Terrestrial Reference Frame. Cadastral, engineering and mapping surveys are referenced to this datum, which facilitates the exchange of data, uniform standards of accuracy and reduced costs of survey and spatial data to the public.

The Chief Directorate's archive of aerial photography, dating back to 1934, is expanded annually with the acquisition of new photography covering approximately 20% of the country. Aerial photography programmes and priorities are determined in co-operation with local, provincial and national government departments. The archive is used for mapping, land resource planning, infrastructure development and legal and land restitu-



tion matters.

The Chief Directorate maintains a topographic information system that contains the major features (roads, railways, built-up areas, contours and rivers) of the entire 1:50 000 national map series in digital format. A digital elevation model is available in horizontal intervals of 400 m and 200 m in mountainous areas and 50 m for the major metropolitan and development areas.

The Chief Directorate is a permanent member of the South African Geographic Names Council. New names collected during field work for mapping are submitted to the Council for consideration. The Chief Directorate also completed a digital database of geographic names and prepared draft digital gazetteers of each province. Some 57 000 previously acquired geographical names were also submitted for approval.

## Spatial planning and information

Part of the transformation of South Africa as a country and as a society requires fundamental restructuring of settlement patterns to ensure greater equity and efficiency. It is common knowledge that the effluences of colonialism, apartheid and the modernist society have left acute anomalies to the form and function in settlement pattern. Among the manifestations of this challenge are:

- racially segregated settlements
- urban sprawl
- disintegrated land-use patterns
- unsustainable service costs (transport subsidies alone account for R2 billion annually).

In addressing these challenges, the Department is focusing specifically on aspects within its statutory mandate, i.e. spatial planning, land-use management and spatial information. The *White Paper on Spatial Planning and Land-use Management* was completed and approved by Cabinet on 27 June 2001. As a spin-off from this, the Land-use Management

Bill was drafted and consultation with relevant stakeholders has taken place.

In addition, the Planning Profession Bill was submitted to Parliament in August 2001 and the Spatial Information Bill was presented to the Governance and Administration Cluster of the South African Directors-General Forum in September 2001.

Policy and guidelines for the incorporation of environmental planning into land reform and development were completed and approved by the Director-General in mid-2001. The Environmental Implementation and Management Plan of the Department of Land Affairs was successfully completed and submitted in accordance with the provisions of the National Environmental Management Act, 1998 [Act 107 of 1998].

The *White Paper on Spatial Planning and Land-use Management* sets out the policy directives that will guide the legislation necessary to regulate spatial planning and land-use management. The core tenets of both the White Paper and the Bill are that:

- development plans from all spheres of government must be reflected in a spatial development framework. This will enhance interpretation, implementation and monitoring
- development plans must include an analysis of strategically-located land and how best such land should be utilised, in the attempt to make settlement patterns more equitable and efficient
- the principles of equity, efficiency, integration, environmental sustainability and good and fair governance should guide all development planning decisions.

## Land reform implementation management and co-ordination

The Chief Directorate: Land Reform Implementation Management and Co-ordination is located in the Branch: Land and Tenure

**Claims settled as at 30 September 2002****Settled Restitution Claims**

Number of claims settled	34 365
Households involved	73 662
Beneficiaries	394 442
Land restored: Hectares	505 606

**Financial Details**

Land cost	R428,614,385,39
Financial compensation	R1,208,116,066,83
Restitution discretionary grant	R133,539,000,00
Settlement and planning grant	R46,718,862,01
Solatium	R6,155,000,00
Total grant cost	R1,823,143,314,23

Reform.

The Chief Directorate's aim is the actual delivery of land and tenure reform. This is primarily done through nine provincial Land Reform offices and 36 operational regions (district and/or satellite Land Reform offices).

Important policy and systems developments that have enhanced delivery and will further broaden its scope are the following:

- the approval of version seven of the Grants and Services Document that regulates the use of grants. This version enables spending against Land Redistribution for Agricultural Development (LRAD) and the new grant structure.
- financial and responsibility management delegations in terms of the Provision of

**Settled Restitution claims as at 31 March 2002**

Number of claims settled	29 877
Households involved	62 245
Beneficiaries	332 243
Land restored: Hectares	427 337

**Financial Details**

Land Cost	R377,117,102
Financial Compensation	R951,442,392
Restitution Discretionary Grant	R119,919,000
Settlement and Planning Grant	R39,709,482
Solatum	R6,155,000
Total award cost	R1,494,342,976

\* Source: Department of Land Affairs

Land and Assistance Act, 1993 (Act 126 of 1993), as well as the related structures for project assessment and approval at district and provincial level respectively, which were finalised in 2001.

- the LRAD planning agreement with the Land Bank in August 2001.

The LRAD Programme was officially launched by the Minister of Agriculture and Land Affairs, Ms Thoko Didiza, at Nkomazi in Mpumalanga in August 2001 and paved the way for implementation in other provinces.

The Nkomazi Project involved 241 LRAD grant beneficiaries. The main objective of the LRAD, in line with the Department's mission to provide access to land and to extend land rights to the previously disadvantaged communities, is to redistribute white-owned agricultural land to black people.

By June 2002, 4 823 beneficiaries had received the LRAD grant that had delivered about 100 000 ha of land amounting to about 164 farms. There were also 136 beneficiaries who had received a combination of grant and loan components from the Land Bank with the delivery of 2 203 ha of land.

Delivery by provincial Land Reform offices for the 2001/02 financial year involved 418 projects that benefited in access of 83 530 beneficiaries and/or households to about 365 993 2536 ha.

The Land Bank received a total of 450 applications for loans. Of these applications, 152 were approved and of these approvals 14 transferred/actually received their loans by 31 March 2002.

The approved projects involve 14 091 ha, while the transferred projects involve 2 203 ha and 36 beneficiaries.

**Land-reform systems and support services**

The objectives of the Land and Tenure Reform Programme are:

- increased sustainable land use
- better access to land administration services
- reaching land redistribution targets
- decrease in State-owned land



- increased State-land vesting
- increased security of land tenure.

A highlight was the hosting of the National Land Tenure Conference in November 2001 that resulted in the participation of a variety of stakeholders, including traditional authorities and communities. A key issue that was debated at the Conference was the broad area of land administration in communal areas and the finalisation of the Communal Land

Rights Bill. The need to improve tenure security for farm dwellers on private land was seen as critical to this process.

A Draft Communal Land Rights Bill is available and enactment was expected at the end of 2002. A cross-functional national review team, examining the functioning of communal property associations, was also initiated while provincial teams were established to oversee the process in their respective provinces.

## Acknowledgements

Agricultural Research Council  
Department of Agriculture  
Department of Land Affairs  
Land Bank  
National Agricultural Marketing Council

## Suggested reading

- African Farm Management Conference (1998: Stellenbosch, South Africa) *Farm and Farmer Organisation for Sustainable Agriculture in Africa*, 26 – 30 January 1998, Stellenbosch, South Africa.
- Agriculture in South Africa*. 5th ed. Johannesburg: Chris van Rensburg, 1994.
- Agricultural Land Reform in South Africa: Policies, Markets and Mechanisms*. Cape Town: Oxford University Press, 1996.
- van Rooyen, J., Groenewald J. and Kirsten, J eds. *Agricultural Policy Reform in South Africa*. Pretoria: University of Pretoria, 1998.
- Auerbach, R.M.B. *Design for Participation in Ecologically Sound Management of South Africa's Mlazi River Catchment* – Wageningen: Landbouwwuniversiteit, 1999.
- Bundy, C. *Rise and Fall of the South African Peasantry*. 2nd ed. Cape Town: David Philip, 1988.
- Levin R. and Weiner, D. eds. *Community Perspectives on Land and Agrarian Reform in South Africa*. Chicago: MacArthur Foundation, 1994.
- Environmental Development Agency. *People's Farming Workbook*. 3rd revised ed. Cape Town: David Philip, 1999.
- Employment trends in Agriculture in South Africa/Statistics South Africa and national Department of Agriculture*. Pretoria: Stats SA, 2000.
- de Klerk, M. ed. *Harvest of Discontent: The Land Question in South Africa*. Cape Town: Institute for a Democratic Alternative for South Africa, 1991.
- Jiggins, J. *Breaking New Ground: Options for Agricultural Extension and Development in South Africa*/Janice Jiggins. Johannesburg, South Africa: Land and Agriculture Policy Centre, 1997.
- Johnson, R.W. *Farmers and Farm Workers in KwaZulu-Natal: Employment Conditions, Labour Tenancy, Land Reform, Attitudes and Relationships*. R.W. Johnson and L. Schlemmer. Johannesburg: Helen Suzman Foundation, 1998.
- Johnson, R.W. and Schlemmer, L. *Attitudes and Relationships*. Johannesburg: Helen Suzman Foundation, 1998.
- Keegan, T.J. *Facing the Storm: Portraits of Black Lives in Rural South Africa*. Cape Town: David Philip, 1988.
- Kok, P. and Pietersen, J. *Agriculture and Agroprocessing*. Pretoria: Human Sciences Research Council, 2000. (National Research and Technology Foresight Project).
- Kruger E. *Farmer to Farmer: A Story of Innovation and Solidarity*. Scottsville: Farmer Support Group, University of Natal, 1998.
- de Villiers, B. ed. *Land Claims and National Parks*. Pretoria: Human Sciences Research Council, 1999.
- Land Reform and Agrarian Change in Southern Africa: An occasional paper series*. Bellville, RSA: University of the Western Cape. No. 10, 12(1999).
- Letsoabo, E.M. *Land Reform in South Africa: A Black Perspective*. Johannesburg: Skotaville, 1987.
- Book: von Kotze, A. and Holloway, A. *Living with Drought: Drought Mitigation for Sustainable Livelihoods*. Video: A. Holmes and L. Dworkin. Project co-ordinated by the Disaster Management Project (UCT). Cape Town: David Philip, 1999.
- Marcus, T. *Commercial Agriculture in South Africa: Modernising Super Exploitation*. London: Zed Books, 1989.
- Marcus, T., Eales, K. and Wildschut, A. *Land Demand in the New South Africa*. University of Natal: Indicator Press, 1996.
- Meer, S. ed. *Women, Land and Authority: Perspectives from South Africa*. Cape Town: David Philip in association with the National Land Committee, 1997.
- Nemutanzhela, T. *Ploughing Amongst the Stones: The Story of 'Betterment' in the Zoutpansberg 1939 – 1944*. Johannesburg: Ravan Press, 1999.
- Palmer, R. *Contested Land in Southern and Eastern Africa: A Literature Survey*. London: Oxfam, 1997.
- People's Farming Workbook*. Cape Town: David Philip, 1995.
- People's Farming Workbook*. 2nd ed. Cape Town: David Philip for Environmental Development Agency Trust, 1998.
- Southey, J. *Footprints in the Karoo: A Story of Farming Life*. Johannesburg: Jonathan Ball, 1990.



- Tainton, N, ed. *Pasture Management in South Africa*. Pietermaritzburg: University of Natal Press, 2000.
- Kirsten, J., van Zyl, J. and Vink, N. *The Agricultural Democratisation of South Africa*. Project co-ordinators: Cape Town: Published for Africa Institute for Policy Analysis and Economic Integration by Francolin Publ., 1998.
- Compiled by Nitsekhe, W.P. and Farrell, J. *The Conservation Ideal: The Fourth Decade: Being the SARCCUS Record for the Period 1981 to 1990*. Pretoria: SARCCUS, 1998.
- The Dynamics of the South African Export Basket*. Compiled by the Department of Economic Research and Development, Industrial Development Corporation of South Africa, Ltd. Sandton, RSA; Industrial Development Corporation of South Africa, 1996.
- The Nutritional Content of South African Beef*. Compiled by H.C. Schönfeldt [et al.] – Pretoria: South African Meat Board, 1996.
- Cross, C.R. and Haines, R.J. eds. *Towards Freehold: Options for Land Development in South Africa's Black Rural Areas*. Cape Town: Juta, 1988.
- Thomson, J. *Genes for Africa*. Cape Town: UCT Press, 2002.
- Van der Walt, A.J. *Land Reform and the Future of Land Ownership in South Africa*. Cape Town: Juta, 1991.
- Van Onselen, C. *The Seed is Mine: The Life of Kas Maine: A South African Sharecropper, 1894 – 1985*. Cape Town: David Philip, 1996.
- Wethli, E. *The South African Chicken Book: How to Start a Small Business Keeping Chickens*. Berold, R. ed; illustrator: Gilbert, L. Kenwyn, RSA: Juta, 1999.
- Winburg, M. *Back to the Land*. Johannesburg: Porcupine Press, 1996.
- Jeeves, A.H. and Crush, J. eds. *White Farms, Black Labour: The State and Agrarian Change in Southern Africa, 1910 – 1950*. Pietermaritzburg: University of Natal Press, 1997.