AgEcon SEARCH
RESEARCH IN AGRICULTURAL & APPLIED ECONOMICS

The World's Largest Open Access Agricultural & Applied Economics Digital Library

This document is discoverable and free to researchers across the globe due to the work of AgEcon Search.

Help ensure our sustainability.

Give to AgEcon Search

AgEcon Search
http://ageconsearch.umn.edu
aesearch@umn.edu

*Papers downloaded from **AgEcon Search** may be used for non-commercial purposes and personal study only. No other use, including posting to another Internet site, is permitted without permission from the copyright owner (not AgEcon Search), or as allowed under the provisions of Fair Use, U.S. Copyright Act, Title 17 U.S.C.*

No endorsement of AgEcon Search or its fundraising activities by the author(s) of the following work or their employer(s) is intended or implied.

Ser.

AGRICULTURAL OUTLOOK CONFERENCE 1986

AGROCON LANVOKON '86

LANDBOUVOORUITSKOUINGSKONFERENSIE 1986

PRESENTED BY —

- Agricultural Economics Association of South Africa
- Co-ordinating Committee of Agricultural Marketing Boards
- Department of Agricultural Economics and Marketing
- Department of Agriculture and Water Supply
- National Marketing Council
- SA Agricultural Union

CSIR CONFERENCE CENTRE
Pretoria

10 AND 11 FEBRUARY 1986

DOC 328/85

THE SOUTH AFRICAN AGRICULTURAL UNION

AGROCON 1986

THE SOUTH AFRICAN VEGETABLE INDUSTRY

1. INTRODUCTION
2. REVIEW OF THE 1984/85 SEASON
3. PRODUCTION AND SUPPLY CONDITIONS
4. PRICE EXPECTATIONS
5. EXPORTATION
6. OUTLOOK ON THE FUTURE

1. INTRODUCTION

There are approximately 65 kinds of vegetables which annually yield 2 million tons at a gross value of R370 million.

The most important kinds of vegetables are potatoes, tomatoes, cabbage, onions, pumpkin, carrots, beetroot and cauliflower. Jointly, these vegetables represent more than 75 % of the total production volume of the various kinds of vegetables.

The supply of vegetables to the fresh produce markets throughout the country, has been continuous and of the highest quality. Prices have reflected the heavy supply situation. The necessity for an investigation was once again underlined.

2. SURVEY OF THE 1984/85 SEASON

Due to geographic climatic conditions, a sufficient supply of high quality vegetables were available throughout the 1985 production season. Sporadic price increases occurred but due to the entry of a large number of occasional producers there was generally an over-supply of the principal vegetable types, which resulted in relatively low prices.

3. PRODUCTION AND SUPPLY CONDITIONS

The successful vegetable producer is a person who produces a product sought after by the consumer and which provides him with an income which not only covers his costs, but which pays a profit that encourages renewed production.

The following factors influence the producer's choice as to which type of vegetable to produce:

- location;
- expertise;
- price;
- climatic conditions; and
- market information

The specialised vegetable farmer has already investigated the optimum utilisation of his farm, has reckoned with climatic conditions, has accumulated expertise and has acquainted himself with market trends. This producer has probably already pinpointed his markets, and produces the variety, size and quality vegetable demanded by the consumer.

These specialised vegetable producers form the backbone of the vegetable industry.

There are, however, a second type of vegetable producer who produces vegetables on an ad hoc basis, mostly as a by-product. In these cases expertise is often in short-supply, as is the capital needed to put a quality product on the market.

2/...

The third type of vegetable producer falls somewhere between the first and second types described. This producer does have the expertise plus a farm with the right location and climatic conditions, but he is not prepared to submit to the strict discipline required to produce a quality product. This producer primarily produces volume, and queries any criticism of the quality of his product. He furthermore tends to act speculatively.

Given these definitions of three types of vegetable producers, we find that it is only the first type of producer who really markets his product or operates profitably in the long run.

The other types of producer do not market, but produce simply in order to sell. These producers have an increased risk and generally contributes to create an unstable and fluctuating market. Moreover, they are financially vulnerable.

With regard to the supply of fresh vegetables on the national markets it can be said that the industry is stable in spite of ruling economic conditions. A turnover of R350 million on the markets for 1985 as compared to R250 million for 1980 represents a 40 % increase in turnover over a five year period.

Apart from the fresh produce markets as marketing channel for vegetables, freezing, canning and dehydration are further marketing options.

3.1 Outlets

According to a recent survey conducted by the University of Pretoria, vegetables make use of the following channels of distribution:

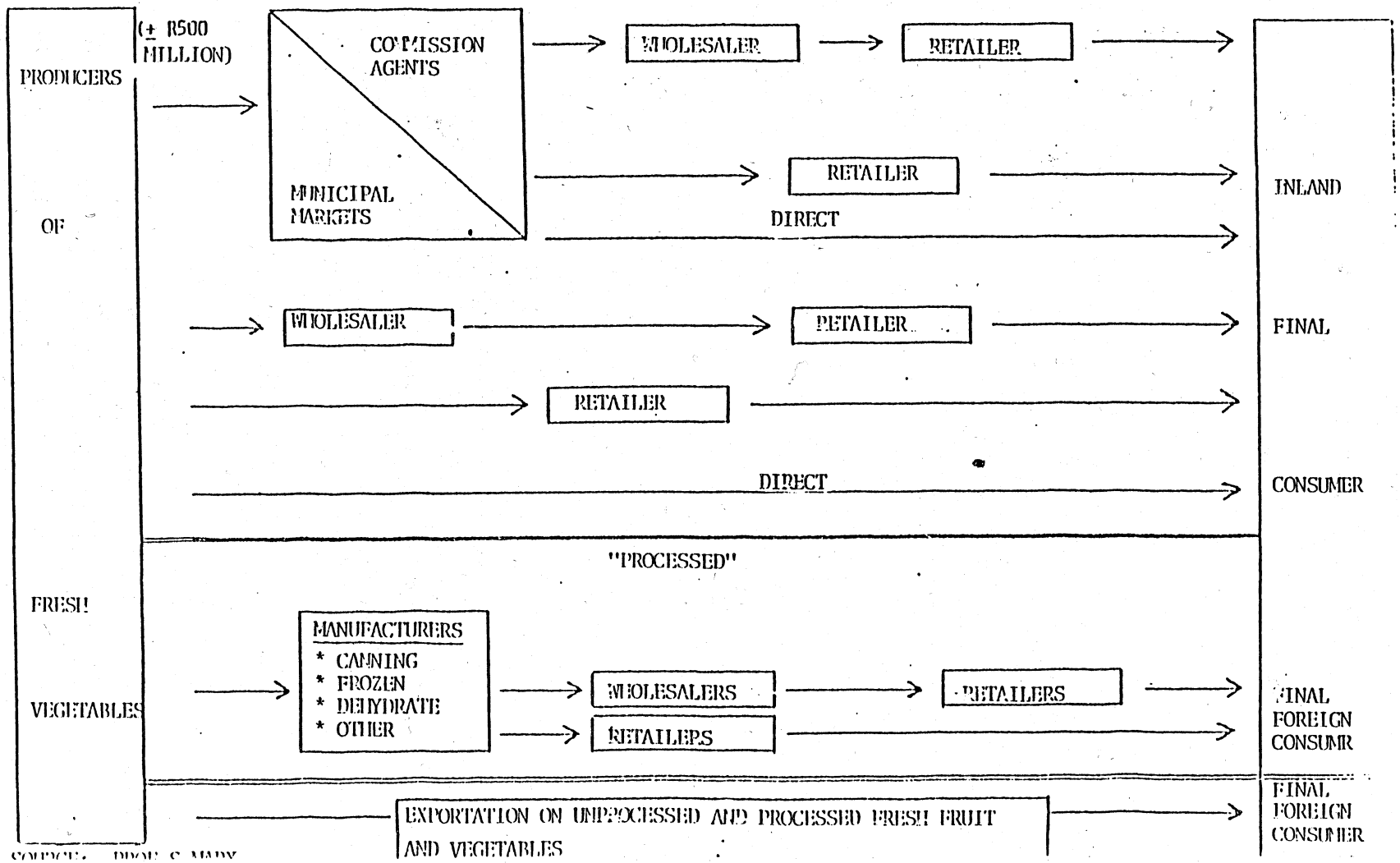
	%
Municipal market	55
Canning	10
Frozen	5
Dehydration	2
Others	28

3.2 Distribution

DISTRIBUTION STRUCTURE FRESH VEGETABLES

INLAND DISTRIBUTION

"UNPROCESSED"



SOURCE: DRDLR & MADY

3.3 Mass and value - three distribution channels for vegetables 1981/82 - 1983/84

Mass and value of vegetables sold on national markets

Year	Mass (t)	Value (R)
1981/82	1 462 650	290 177 377
1982/83	1 396 284	363 501 552
1983/84	1 604 636	329 931 967

Mass and value of canned vegetables

Year	Mass (t)	Value (R)
1981/82	61 838	13 905 675
1982/83	47 868	16 000 000
1983/84	58 207	22 000 000

Mass and value of frozen vegetables

Year	Mass	Value
1981/82	75 256	15 542 768
1982/83	69 206	17 492 616
1982/84	77 894	19 469 652

SOURCE: Division Agriculture Economics Department Agriculture

3.4 Marketing

The elements of vegetable marketing cover everything from production and new plantings to final consumption by the consumer, which stresses the importance of vegetable producers heeding consumer preferences in order that their product may be in demand in the retail trade.

The most important elements of marketing is a compound of production, consumption, promotion, price and distribution. These five functions form the marketing components. They play a decisive role in the planning of that producer who orientates his production planning towards what the consumer wants.

The relation between consumer and producer is therefore of cardinal importance. The consumer has specific preferences that determines the demand. In monetary terms this demand can be described as the price which a consumer is willing to pay for a specific price at a specific time. Opposed to, this, there is the producer who has to produce the product according to a specific variety, size, quality, taste, and volume. For the producer, it is of extreme importance that his net farming income for a specific product is on a level where his costs are covered but more importantly, where he has an incentive to reinvest in the same product by producing more of it the next year. The gain factor is of cardinal importance.

5/...

The Americans, who were the forerunners of this marketing philosophy has expressed it in the following way: "Consumers do not buy products, they buy the expectation of benefits. Such benefits could be colour, size, flavour, taste, texture, keeping quality, or shelf life etc or it could be a combination of these factors".

One should further make sure that the consumer's preferences go hand in hand with his trust in the product concerned. This means that the consumer will increase his demand if the product in question satisfies his requirements as regards quality, taste, size, and so forth. The test of success is therefore the ability of the producer to deliver a product in demand with the consumer.

Production, grading, temperature, inspection, handling and other precautionary measures are therefore very important, as they ensure that the consumer is not only satisfied, but stimulated to come back to buy more.

4. PRICES

As a result of a 21,0 % drop in the rand value per metric ton, the rand value of sales decreased by 9,24 percent, inspite of an increase of 14,90 percent in metric tons handled. (See Table 1). This leads to a lower income per metric ton produced for the producer, and places the producer under immense financial stress if there is an increase in changeable cost items.

Table 1 The turnover in rand value and in metric tons handled by fresh produce markets 1980 ton 1985

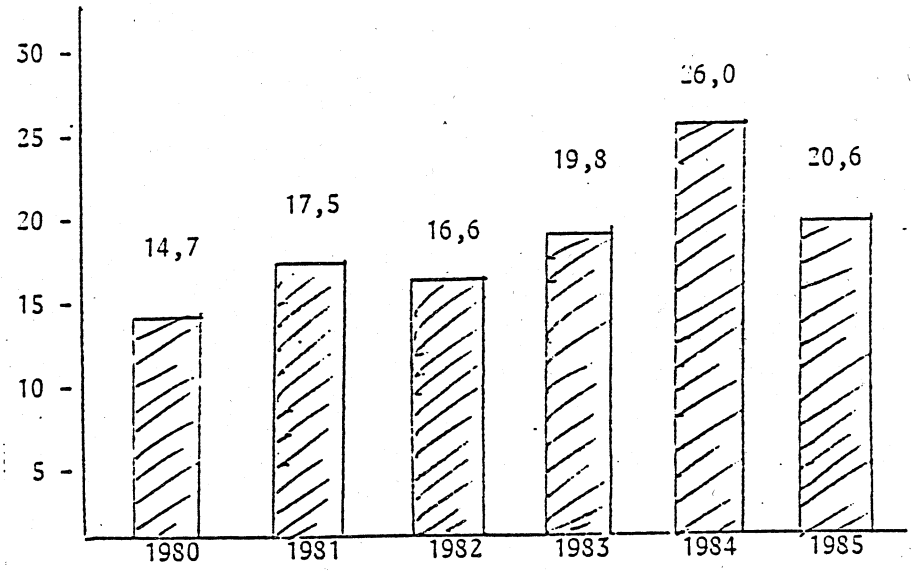
Item	1979/80 (000E)	1980/81		1981/82		1982/33		1983/84		1984/85	
		(000E)	% + Increase - Decrease	(000E)	% + Increase - Decrease	(000E)	% + Increase - Decrease	(000E)	% + Increase - Decrease	(000E)	% + Increase - Decrease
Turnover in R000E	166 645	213 667	+ 28,22	231 503	+ 8,35	290 177	+ 25,34	363 501	+ 25,28	329 931	- 9,24
Turnover in metric tons (000E)	1 130	1 218	+ 7,79	1 391	+14,20	1 462	+ 5,10	1 396	- 4,51	1 604	+ 14,99
Rand per metric ton	147,47	175,42	+ 18,95	166,42	- 5,13	198,47	+ 19,26	260,38	+ 31,2	205,69	- 21,0
Cent per kg	14,7	17,5	+ 18,95	16,6	- 5,13	19,8	+ 19,26	26,0	+ 31,2	20,6	- 21,10

SOURCE: PROF S MARX

7/...

Figure 1

The average price of fresh vegetables 1980 - 1985
cent per kilogram



It is clear from figure 1 that the price of vegetables (in cents) increased relatively slow over the past five years. If the 1980 price per kilogram, viz. 14,7 cent is compared with theat of 1985 which was 20,6 cents, the increase has been 5,9 cents or 40,1 percent.

Given that the producers' price of vegetables had to keep up with an inclation rate of almost 15 persent, the 1985 price should have been 75 % higher, viz 25,7 cents.

Producers' prices

Producers' price indexes of wool and vegetables (1975 = 100)

	82/83	83/84	84/85	% 84/85
				83/84
Wool	222,2	244,2	343,5	140,7
Vegetables	206,8	198,7	189,5	95,4

From the statistics shown above it is clear that the producers' price index of wool indicates an increase of 40,7 % for wool in 1984/85 as against 1983/84. In the case of vegetables, however, this price index dropped by 4,6 %.

The price index for all agricultural products indicated an increase of 8,2 % for 1984/85 as against 1983/84.

Table 2 Mass and value of the ten chief vegetable types sold on the 14 national fresh produce markets

	1980		1981		1982		1983		1984	
	Mass (t)	Value (R)	Mass (t)	Value (R)	Mass (t)	Value (R)	Mass (t)	Value (R)	Mass (t)	Value (R)
Potatoes	500 355	92 769 370	634 127	86 114 136	601 696	129 137 834	500 119	175 565 563	678 103	110 555 8[illegible]
Tomatoes	181 385	49 245 660	175 454	60 563 973	228 032	64 808 097	229 517	78 456 309	237 811	92 931 1[illegible]
Onions	95 609	19 644 786	101 569	22 784 053	107 447	25 272 718	111 915	25 055 253	122 965	32 259 2[illegible]
Cabbage	149 065	9 043 731	171 971	9 982 825	176 362	13 001 854	195 644	14 893 470	119 155	13 925 8[illegible]
Carrots	41 333	5 125 633	47 264	6 377 881	50 390	6 462 889	49 660	7 820 443	50 173	9 173 1[illegible]
Lettuce	29 924	4 447 333	30 178	5 735 901	32 786	6 617 903	31 967	7 564 735	34 234	7 897 3[illegible]
Boer pumpkins	38 568	4 372 519	46 305	5 330 541	48 937	5 297 230	43 124	6 055 659	45 537	6 584 9[illegible]
Green beans	13 343	4 207 802	13 274	4 207 802	14 079	5 263 036	14 234	5 728 676	13 642	6 562 8[illegible]
Gem squashes	32 684	4 117 702	36 295	4 430 476	39 147	4 571 968	36 000	5 330 237	36 573	6 006 9[illegible]
Hubbards	22 085	2 391 635	25 759	3 376 440	34 525	3 603 659	39 011	5 611 403	42 906	5 719 1[illegible]

Table 3 A comparison of the percentage increase or decrease in mass and rand value of the 10 chief vegetable types produced during 1983/84

Vegetables	Rand value % + Increase - Decrease	Mass % + Increase - Decrease
Potatoes	- 37	+ 21
Tomatoes	+ 18	+ 4
Onions	+ 29	+ 10
Cabbage	- 7	- 39
Carrots	+ 17	+ 1
Lettuce	+ 4	+ 7
Boer pumpkin	+ 9	+ 6
Green beans	+ 15	- 4
Gem squashes	+ 13	+ 2
Hubbard	+ 2	+ 2

9/...

5. EXPORTATION

The export possibilities for fresh vegetables remain limited due to the long distances to foreign markets and the high cost of air transport.

Internally, the transportation of vegetables from the production areas to the National Fresh Produce Markets create big problems. Vegetables are low value, high volume products and due to the perishable nature of the product, research on the effective cooling, packing and containering of the product will have to be done if these markets are to be developed and utilised effectively.

6. OUTLOOK ON THE FUTURE

Generally speaking the future of the vegetable industry looks rosy. The vegetable producer will come up against big challenges and only the efficient producer who succeeds in increasing his production per unit and who produces products of outstandingly high quality will survive.

Urgent attention should be given to research with a view to improved irrigation techniques, cultivars, fertilisation and pest control.

The planned inquiry into the Fresh Marketing System should be completed as soon as possible in order that gaps in the system may be rectified, thereby perfecting the idea of decentralised marketing.

The free market system should be retained in the industry at all costs, as healthy competition alone will prevent the buying power of single groups from developing at the expense of the industry.

Communication and the provision of accurate information should be seen as important priorities for the fresh produce markets of the future. This will lead to effective distribution of products which in its turn would ensure a stable price structure for both the producer and the consumer.

COMPILED: HORTICULTURE COMMODITY ORGANISATION
SAAU

DIE GROENTEBEDRYF VAN SUID-AFRIKA

Dr. J.T. Meynhardt, Navorsingsinstituut vir Tuinbou, Pretoria

INLEIDING

Die groentebedryf van Suid-Afrika is so oud soos die Westerse beskawing in hierdie land. Jan van Riebeeck kan dus ook as die vader van die groentebedryf beskou word. Inteendeel die vestiging van die bedryf aan die Kaap was een van die vernaamste redes vir die voortsetting van die Kaapse Halfwegstasie deur die Hollandse Oos Indiëse Kompanje.

Histories is dit ook van belang dat sekere groente cultivars wat vandag nog kommersieel verbou word moontlik afstammelinge van die soorte is wat in daardie dae aan die Kaap geplant was. Die Kaapse Spitz kopkool is duidelik 'n cultivar wat uit natuurlike verbastering uit van die ou cultivars ontstaan het. So ook het Caledon Globe uie blykbaar aan die Kaap ontstaan uit Kaapse Strooi (en moontlik Australiese Bruin). Die De Wildt ui weer was 'n seleksie uit die ou vroeë ui, Kaapse Plat. Dié ui het die basis ~~gesiap~~ gevorm vir die ontwikkeling van uiecultivars vir die Transvaal. Kaapse Mark wortels is 'n ander voorbeeld van daardie tyd se afstammelinge.

BEDRYFSOORSIG

Volgens die gegewens in Tabel 1 is dit duidelik dat tamaties by verreweg die belangrikste groentesoort in Suid-Afrika is, met 'n bruto waarde van R 104 m. Dit word gevolg deur uie, kool ens. Wat egter van belang is om van kennis te neem is die groot styging in die waarde van sommige minder belangrike groentesoorte. Let op die waarde van slaai in 1985, nl. R 13,2 m, teenoor R 1,8 m in 1975. Ook moet daarop gelet word dat aspersies (geklassifiseer in die tabel onder ander groentes) tans R 18,5 m verteenwoordig. Dit is ook interessant om te let daarop dat skorsies nog altyd 'n groot aanvraag is in Suid-Afrika. Dit is duidelik dat babamurgpampoentjies hier 'n groot aandeel in die belangrikheid van skorsies en pampoen speel.

Indien produksiegebiede vergelyk word is dit duidelik dat die Laeveld, en veral Noordelike Laeveld, in belangrikheid toegeneem het. Weens die probleme met tabak in die Brits gebied ondervind, word daar nou meer op groente gekonsentreer. Ook het die Olifantsriviergebied van Wes Kaapland heelwat meer groente geproduseer, veral in die winter en lente, as voorheen.

'n Belangrike ontwikkeling die afgelope paar jaar in die groentebedryf was die ontwikkeling van die saailaai bedryf. Hierdie bedryf het fenomenaal

gegroei en lewer vandag 'n groot deel van die tamatieplante landswyd, ook kool en slaai. Alle aanduidings is dat die bedryf nog verder gaan ontwikkel.

PROBLEME VAN 1985

Die fenomenale verbetering in die vervoerwese in Suid-Afrika het veroorsaak dat sekere gebiede wat eers buite bereik van die mark was, veral t.o.v. varsprodukte, nou daar lewer. Dit is vandag algemeen dat tamaties van die verre Noord Transvaal na die Kaap vervoer word, en dat slaai en selery sekere tye van die jaar na Johannesburg gebring word. As gevolg hiervan het die vereistes van gehalte van die groenteprodukte totaal verander. Sulke groente moet nou die houvermoë besit om sodanige afstande vervoer te kan word. Dit stel nie net groot eise aan produsente nie, maar ook aan telers wat die cultivars ontwikkel.

Daarenteen het daar by die algemene publiek ook 'n bewustheid ontstaan vir voeding- en eetgehalte van groente. Hulle wil smaaklike, vars groente kry met 'n hoë voedingswaarde. Hierdie vereistes staan soms lynreg teenoor goeie houvermoë. Dus word nog hoër eise aan produsente en landboukundiges gestel.

Verder het moderne bemarkingstegnieke en prosesseringsfasiliteite hulle eie vereiste. Voorafverpakkingstelsels vereis sekere produkte t.o.v. grootte, gehalte, ens. Die gehalte en vereistes van groente vir byvoorbeeld inmaak, bevriesing en ontwatering verskil soms geheel en al.

Weens ontwikkeling van sekere subtropiese produksiegebiede het die noodsaaklikheid vir geheel en al ander cultivars 'n vereiste geword. Byvoorbeeld die produksie van tamaties in die winter vereis 'n totaal ander cultivar wat aanpasbaarheid betref as in Wes Kaapland, of selfs vir somerproduksie in die Transvaalse Middelveld.

Wat egter nou meer en meer van belang word vir groenteproduksie is nie net die vinnige verspreiding van sekere siektes na nuwe produksiegebiede nie, maar ook die feit dat nuwe siektes in Suid-Afrika te voorskyn kom. Byvoorbeeld, tien jaar gelede was fusarium ras 2 by tamaties onbekend in Suid-Afrika. Vandag is dit oor die hele land versprei, behalwe Wes Kaapland. Nou het 'n nuwe siekte Verticillium ras 2 ook sy kop uitgesteek in die Laeveld. Drie jaar gelede was die Liriomyza bladmyner onbekend in Suid-Afrika. Vandag is dit 'n ernstige probleem oor die hele Laeveld op tamaties. Al hierdie nuwe siektes verg groter insette van produsente en landboukundiges.

Een van die ernstigste probleme van die groentebedryf is oorproduksie, veral sekere tye van die jaar. Dit is duidelik dat Suid-Afrika tans meer groente kan produseer as wat verbruik kan word. Hierdie probleem is die

afgelope paar jaar vererger met droogte in die saaidele. Baie van die saaiboere het nog 'n bietjie water vir besproeiing. Om vir hulle kontantbehoeftes te voorsien, het 'n groot deel van hulle deels oorgeskakel na groente- (en aartappel-) produksie. Op die wyse het hulle verder bygedra tot die oorproduksie van groente.

Hierdie oorproduksie van groente is verder vererger deur die huidige swak ekonomiese toestand in Suid-Afrika.

TOEKOMS VAN DIE GROENTEBEDRYF IN SUID-AFRIKA

Dit is duidelik dat die groentebedryf alleenlik sal vorder in Suid-Afrika indien verdere ontwikkeling vertikaal geskied. Produksie per eenheid grond sal moet verhoog, en gekoppel daaraan gehalte van die produk. Om hierin te slaag sal landboukundiges beter cultivars en tegnieke moet ontwikkel wat produsente instaat sal stel om produksie van gehalte groentes te verhoog. Produsente sal ook die kundighede wat so 'n verhoogde produksie gaan vereis moet bemeester.

Produsente sal ook kennis moet neem van veranderinge in vereistes van verbruikers. Eetgehalte en voedingswaarde gaan al hoe belangriker word. Kennis sal geneem moet word van verbruikers se verandering in voorkeure vir sekere groentes. Let op hoe babamurgpampoentjies, selery en veral slaai se verbruik toegeneem het.

Produsente sal ook die uitvoermark nie uit die oog moet verloor nie. Dit is duidelik dat die distansie en vervoerkoste na die noordelike halfrond markte te groot is vir sekere varsprodukte. Dog neem kennis van die groei in produksie en uitvoer van die aspersiebedryf.

Ook sal produsente kennis moet neem na die behoeftes van die swart mark. Hierdie mark is 'n snelgroeiende afsetgebied vir groente. Dog dit is 'n mark wat gehalte wil kry en tweedens het die mark sy eie vereistes t.o.v. tipes van groentes. Die mark het 'n besliste voorkeur vir sekere soorte, smake ens. Daarop sal gekonsentreer moet word.

Ten laaste is dit duidelik dat veral sekere groentes basiese voedsel is. Soos die bevolking verstedelik sal hulle meer afhanklik raak van die lewering van groente as bron van noodsaaklike voedsel. Dus word voorsien dat indien gehalte goed en pryse realisties bly, die groenteproduksie in Suid-Afrika sal voortgaan om te groei.

T

WAARDE GORENTEPRODUKSIE 1985

	M. R.
Tamaties	R 104
Uie	R 53
Kool	R 23
Blomkool	R 6,8
Wortels	R 15,2
Pampoen	R 10,8
Skorsies	R 19,5
Beet	R 6,7
Slaai	R 13,2
Komkommers	R 4,8
Patats	R 7,8
Groenbone	R 13,6
Erte	R 4,8
Ander groentes	R 69
Totaal vars groentes	R 353
Prosessering	R 36,8
TOTAAL	R 389,8