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# Regional Manpower Development

**SADCC  
Blantyre 1981**

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SOUTHERN AFRICAN DEVELOPMENT CO-ORDINATION CONFERENCE:

Blantyre, Malawi; 19 - 20 November, 1981

REGIONAL MANPOWER DEVELOPMENT

## I. INTRODUCTION

At SADCC's inaugural Summit Conference, which took place in Lusaka on 1st April 1980, the Government of Swaziland was charged with the task of developing a regional approach to Manpower Development. The Heads of State gave Swaziland the following mandate:

"...to carry out a review of existing training facilities in the region and to make recommendations for better regional utilisation of these facilities."

Since the Lusaka Summit Conference Swaziland has made considerable progress in reviewing, in consultation with all Member Countries, the needs and opportunities for regional cooperation in training in key areas. The SADCC Council of Ministers considered a Report on Manpower Development at their meeting in Maputo in November 1980 and again at their meeting in Mbabane in June 1981. At the Mbabane meeting the Council noted:

"...that shortage of technical skills at all levels is the greatest single constraint affecting economic development throughout the region. Accordingly, they agreed that the creation of training programmes was a matter of the highest priority and greatest urgency and directed the subcommittee on Manpower to proceed accordingly."

At that meeting the Council also agreed to the establishment of a Regional Training Council, under the Chairmanship of the Government of Swaziland, as a subcommittee of the SADCC Standing Committee of Officials to coordinate regional manpower development. The Government of Swaziland was responsible for servicing this Council.

## II. CONSULTANCIES

The following nine consultancies were also approved by the Council of Ministers:

- Consultancy (1): Veterinarian and Veterinary assistance training programme; suggested location: Botswana; consultants to adapt proposals to regional animal disease control programme.
- Consultancy (2): Veterinary medicine and livestock production centre; suggested location: Zimbabwe, Zambia or Botswana; to include veterinary training, disease control and livestock production training.
- Consultancy 3: Sugar cane agronomy; suggested location: Swaziland; to include training for senior personnel and research facilities.
- Consultancy (4): Port management; study to be undertaken by the East African Management Institute; to give special consideration to language, expansion plans and relevant railway training.
- Consultancy 5: Mining engineering and specialised technicians; expansion of Zambian and Zimbabwean facilities suggested; numbers requiring training and a regional training plan are needed.
- Consultancy 6: Health; to consider potential for regional cooperation in training of nurses, medical doctors, para-medics and nurse and doctor specialists.
- Consultancy 7: Teacher educators; to determine the numbers required; ascertain whether regional training is appropriate and to recommend suitable training facilities in particular in science and technical subjects.
- Consultancy 8: Comparability of education levels in SADCC countries.
- Consultancy 9: Manpower information; to review the regional manpower situation with a view to harmonizing the methodologies used in collecting manpower data.

Detailed terms of reference for the above consultancies will be made available to participants at the Blantyre Conference.

### III. PROJECT PROPOSALS

It is anticipated that a number of project proposals in the field of Manpower Development will be presented to the Conference for consideration. Appendix I of this report contains a complete project document for one such institution, the Mananga Agricultural Management College in Swaziland. The College has a five year programme of three courses per year. The courses run from one to three months and scholarships are available for SADCC nationals. The College provides training for middle and senior level management in agriculture. Training is also provided for people in related institutions such as commercial and parastatal estates, credit and development banks, extension services and cooperatives.

Appendix II provides a brief project document for civil aviation training at the Zambia Air Services Training Institute (ZASTI). The project includes the purchase of equipment and the construction of student accommodation to allow rapid expansion of intake to various courses. It is hoped to train from 50-60 non-Zambian SADCC nationals per year. The institution's programme includes courses on flying, meteorology, engineering, fire services etc.

It is hoped that support for these and other projects presented to the Blantyre Conference in the field of Manpower Development will be forthcoming from SADCC international cooperation partners.

October 1981

The Mananga Agricultural Management Centre (MAMC)

## An SADCC Regional Management Training Project

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## The Mananga Agricultural Management Centre (MAMC)

### 1. Immediate Objective

The project will provide agricultural management training mainly at middle and senior levels to meet the needs of government, para-statal and commercial agencies operating in the agricultural sectors in Angola, Botswana, Lesotho, Malawi, Mozambique, Swaziland, Tanzania, Zambia and Zimbabwe over a period of five years.

The facilities for this training already exist at Mananga Agricultural Management Centre (MAMC) in Swaziland, where many nationals from SADC member countries have received training since 1973. Details of this prior participation in MAMC training programmes are given in Table 1.

The proposed project will provide places on training courses for managers with potential for senior positions and for whom the experience at an international centre will be valuable. It will also make available to the participating countries an evaluation service to monitor the effectiveness of the training programmes and a consultancy service for appraising, planning and implementing each country's needs for agricultural management training.

This project will thus consolidate and extend existing work carried out by MAMC for SADC countries.

The objective is to increase the management skills of people organising and managing projects in the agricultural sectors in the countries listed above. This will be achieved through participation in job-oriented, intensive courses of up to 3 months duration aimed at personnel with several years work experience. The training is designed for three main categories of managers:

- i) production managers on commercial or para-statal farms and estates, and in processing plants concerned with the production and processing of food or fibre;

Participation in MAMC post experience management courses  
by country, April 1973 - July 1981

Bangladesh	6
Barbados	3
Belize	7
Botswana	16
Cameroon	26
Cook Islands	1
Egypt	13
Ethiopia	1
Fiji	3
Gambia	3
Ghana	54
Grenada	1
Guyana	4
Jamaica	11
Kenya	76
Lesotho	21
Liberia	14
Madagascar	1
Malawi	75
Malaysia	15
Mauritius	4
Montserrat	1
Nigeria	107
Papua New Guinea	6
St. Lucia	2
St. Vincent	1
Sierra Leone	10
Solomon Islands	7
Somalia	3
Sudan	28
Swaziland	43
Tanzania	86
Trinidad	1
Uganda	2
W. Samoa	1
Zambia	97
Zimbabwe	2

ii) managers and organisers in government agencies concerned with land settlement, rural development, crop rehabilitation programmes, extension etc;

iii) planners and controllers of credit for farmers, employed by development banks, co-operatives, agricultural finance corporations etc.

By improving managerial capability within agriculture, the project will (a) improve the effective administration of current agriculture and rural development programmes, (b) increase the ability of the sector to achieve change and development in the future and (c) make a lasting contribution to the institution building process in the nine countries.

## 2. Background and Justification

### 2.1 Background

The African continent enters the 1980s with a profound food crisis - the continent can no longer feed itself. Although two thirds of Africa's population is engaged in agriculture, per capita food production has declined since 1960. In 1978 African countries imported about 11 million tons of grain. Current estimates suggest that this figure could be over 50 million tons by 1990. (For details of SADC countries' agricultural economies, see bibliography in Annex 1). This situation becomes increasingly serious for SADC countries when limited reserves are being increasingly diminished through inflation and rising food imports.

However, governments are acutely aware of the need to improve performance in agriculture, and public and private investment in the sector has risen dramatically in recent years. Despite this productivity remains low.

Increased physical inputs have led to disappointing improvements in output, while schemes designed to encourage production from small farmers have frequently failed to produce the hoped-for results.

This huge programme of investment in the agricultural sector, together with the intensification of agricultural practices and the expansion and development of support services, clearly calls for a substantial strengthening of management capacity within the sector. Management, and in particular senior level management, is emerging as a major constraint on the effective execution of this investment programme.

For the most part, colleges and universities in the region have provided sufficient numbers of people who have been technically trained in agriculture, to meet the demand for technically skilled managers from government service, para-statal and commercial projects. These institutions are not, however, staffed or equipped further to develop agricultural managers' skills. Colleges which are involved in management training are either oriented towards the needs of commerce, industry and the civil service administration system, or towards the administration, management and business components of degree/diploma studies (for details of available training within the SADC Region see Annex 2). There is, therefore, an urgent need to provide suitable training for senior management staff in the agricultural sector.

It is becoming generally accepted that knowledge of agricultural techniques does not by itself equip an agricultural manager. Effective management requires improved abilities in organising men, machinery, material and money. Experience at MAMC suggests that these skills can be further developed, especially in those who have practical experience of the problems encountered in work situations.

## 2.2 Justification

### 2.2.1 The Demand for Senior Management Training

Previous participation by SADCC countries in MAMC international post experience management courses is given in Tables 2 and 3. (A breakdown between type of courses is shown in Annexes 3 and 4).

Table 2 details attendance by country, comparing and contrasting course attendance with other regions of Africa and elsewhere, whilst Table 3 details the proportional participation of SADCC countries as a region in comparison to all others on MAMC courses.

Early years, 1973 - 77, in MAMC operation show an average participation by SADCC countries of just over 50% of total participants, whilst more recently this figure has fallen to about 30% during 1980/81. It is clear from the number of applications received, however, that this decline has not been due to any lack of willingness to participate. Rather falling participation has been the result of financial constraints, occasioned by the twin problems of SADCC countries' strained economics and the falling off of Commonwealth (CFTC) and British financial support (scholarship awards). Requests for total places from SADCC countries, conditional, of course, on obtaining necessary support, have continued to run at a high level as shown in Table 4. Further, these figures certainly underestimate the real demand from SADCC members as countries knowing they cannot obtain funding may not even enquire about the availability of places.'

The management training needs of the nine SADCC countries is certainly as great and probably greater than those of many of the countries currently able to participate in MAMC courses. Such needs cannot, however, be met without the wherewithall to finance key staff on.

MAMC Course Attendance on its Middle/Senior International Management Courses

April 1973 - July 1981

	1973	1974	1975	1976	1977	1978	1979	1980	1981
Botswana					1	1	4	4	6
Lesotho	1			3	6	4	2		5
Malawi		10	15	14	12	9	7	5	3
Swaziland	4	3	6	7	6	5	4	3	5
Tanzania	5	13	1	6	7	16	17	14	12
Zambia	3	8	14	17	14	13	13	6	5
Zimbabwe									2
<b>Total</b>	<b>13</b>	<b>34</b>	<b>36</b>	<b>47</b>	<b>46</b>	<b>48</b>	<b>47</b>	<b>32</b>	<b>38</b>
Caribbean	1	4	2	5	3	5	6	2	3
SE Asia/Pacific		3	1	2	4	7	6	8	10
East/North Africa	1	9	10	11	12	15	16	30	24
West Africa	8	13	15	17	19	39	31	32	41
UK	1			3		5	3	4	
<b>Total</b>	<b>11</b>	<b>29</b>	<b>28</b>	<b>38</b>	<b>38</b>	<b>71</b>	<b>62</b>	<b>76</b>	<b>78</b>

Proportional Participation of SADCC Countries in MAMC International Management Courses

April 1973 - July 1981

	1973	1974	1975	1976	1977	1978	1979	1980	1981
SADCC	54	54	56	55	55	40	43	30	33 <sup>1</sup> /29 <sup>2</sup>

1. Actual up to July 1981
2. Probable for the whole of 1981

the required training programmes. Requests for bookings for 1981/1982 from SADCC countries (see Table 4) are currently running at a level of over one hundred places per annum (lack of funding mentioned above will drastically reduce and will continue to reduce actual attendance). Planned developments within the agricultural sectors of SADCC member countries (see bibliography Annex 1) indicates that this level of demand will at least continue to be stable in the short and medium term. In addition increased participation by Angola and Mozambique over the next 5 years suggests that the overall level of demand for training courses of the MAMC type from the SADCC region will rise. The project envisages allocation of a minimum of 90 places per annum for SADCC member countries on MAMC programmes.

#### 2.2.2 Rationale for Senior Management Training

The project will focus on training for senior level managers and for managers working in the range between middle and senior levels. The cost implications of training large numbers of junior managers regionally indicate that this level of training should take place within each individual country, and mainly on the job. In addition, junior managers are often young and inexperienced and on returning from an intensive training course can have their morale severely damaged, and can considerably impair the effectiveness of their section or department when prior expectations of increased autonomy and discretion are not realised.

The smaller number of middle to senior level managers benefit greatly from wider contact and shared experiences with managers from a range of countries and backgrounds rather than only from a single country. Many problems experienced by different countries in the further development of the agricultural sector have a similar basis. The opportunity to compare and contrast modes of problem solving across the developing countries, as well as to consider different strategies of institutional building must

stimulate cross fertilization of ideas so essential for successful administrative and management practice. Such an opportunity is available from attendance on an international course held at MAMC.

3. Outputs:

The aims of the project are (a) to improve the performance of senior and middle level managers in the agricultural sector in the participating countries, (b) to raise SADCC countries' participation in MAMC management training courses and (c) to further develop SADCC countries own management development activities through consultancy help from MAMC staff. In each of the five years of the scheme there will normally be three courses of eleven weeks, one of five weeks, and one of six weeks. Thus, in each of the five years, courses will cover a period of 44 weeks.

The current residential capacity at MAMC is for a course size of 35 members. To meet the second of these objectives the intention is to bring participation of SADCC countries up to the proportional level of at least 50% of total course attendance, thus an allocation of 18 places per course to the nine SADCC countries. 18 places per course would give 90 places per year. The total number of training places over the whole five years available for the nine SADCC countries would be 450. In practice it may be desirable to vary the number of places available annually and it is important that a degree of flexibility should be retained so that training can be designed to meet changing situations. Apart from flexibility in content, flexibility in timing is also important, so that courses take place when participants can best be spared from their duties.

Vacancies are clearly wasteful and uneconomic but may arise, e.g. because the seasonal cycle of agricultural activities can prevent some managers from being released to attend a specific course. It is therefore desirable for MAMC to retain the right to fill such casual vacancies with students from outside the region. This would also provide latitude for such regional managers to be accommodated at more convenient times.

#### 4. Activities

##### 4.1 Courses

The following three courses comprise the main portfolio of MAMC residential work and are likely to form the basis for the project over the five year period.

For senior managers the course offered is 'Senior Management in Agricultural Development' (see Annex 5). Senior managers include general managers and directors of agricultural projects and their deputies; training at the same level is also appropriate for other managers who are about to be promoted to the most senior positions. Normally the course will be of five weeks duration, held annually, and those attending will be of 35 to 50 years of age. A major objective of this course is the consideration of problems in developing and running agricultural development projects.

For middle to senior managers the course offered is 'Planning and Control in Agricultural Management' (see Annex 6). Middle to senior managers carry most of the responsibility for carrying forward the policy determined at a higher level and they operate under the broad supervision of the most senior managers. It is at this stage of a manager's development that management training can be most usefully given. Their work experience will usually cover 7 to 15 years, and they will be 30 to 40 years of age. Courses will be of 11 weeks duration and held three times each year.

a three month period, has a significant impact on the potential of individuals attending such a course.

The course 'Credit for Development' (see Annex 7) is designed for the needs of senior and middle staff employed by lending agencies involved in agricultural and rural development. The duration of this course is six weeks and, like the senior programme, is held once per year.

The design of these courses and philosophy underlying the teaching methodology are seen as fundamental to the effectiveness of MAMC work.

Options, special areas of study and a tutorial system enable training to be adjusted to meet the needs of the individual of a particular organisation or a particular country. Thus one course can cater for a range of special interests.

Studying together and working in groups are the basis of the Mananga approach to training (See Annex 6 for a full statement of this philosophy).

#### 4.2 Assessing Training Needs

MAMC staff have an extensive programme of consultation with agencies working in the agricultural sector within the SADCC region and elsewhere to review management problems and to ensure that MAMC training programmes meet the specific needs of member governments. This consultation programme is utilised first to discuss with clients their training needs, how such needs can best be reflected in MAMC course design and in the type of manager who should attend MAMC, and secondly to monitor the effect, as shown by performance back at work, of MAMC courses on students sent for management training at MAMC.

#### 4.3 Consultancy

Staff from MAMC have prepared plans for national management training institutions in Indonesia, Nigeria, Egypt and Zambia. It is the policy of MAMC to encourage individual countries to develop their own agricultural

Requests for places on MAMC International Management Courses  
in 1980 and 1981 by SADCC countries as against actual participation

Course	1980				1981					Total
	PC22	PC23	SM3	PC24	PC25	CD1	SM4	PC26	PC27	
Requests for places	19	16	23	14	15	31	24	25	26	193
Actual Attendance	14	8	6	8	10	15	7	6	?	

management training capability and to offer help to achieve this. By maintaining a high standard and by practising improved teaching methods, MAMC provides leadership in agricultural management training in general, as well as providing the facilities of an international centre for training at middle/senior levels.

Under the project consultation and assistance will be provided to countries within the SADC region to help them establish management development schemes suited to their own requirements. It is envisaged that MAMC will be involved both in the preparation of plans and also in the implementation phase. Assistance will also be given in training suitable teaching staff, either by attendance at a special course at MAMC or by secondment to serve as a member of MAMC staff for a period of up to one year.

## 5. Inputs

There are two main inputs into the project, (a) the centre itself with its educational and social facilities and (b) the resident and visiting teaching staff of MAMC.

### 5.1 The Management Centre

Mananga Agricultural Management Centre (MAMC) since 1973 has offered agricultural management training to the three categories of managers referred to in paragraph 2 above. It is an international centre for residential post experience management training courses within the tropical and sub-tropical agricultural, agribusiness and rural development sectors. It has drawn students from 37 countries, of which 29 are ACP countries (see student/country list in Table 1).

MAMC, which at present, is funded and managed by the Commonwealth Development Corporation, has offered a range of courses varying in duration from one week up to three months. These have been designed to meet the needs mainly of middle and senior managers, but the occasional course has been arranged for junior managers with limited work experience.

Student accommodation for 35 is in single study-bedrooms, with central dining arrangements and a competent chef in charge of food preparation. Leisure and sport facilities are of a high standard. Apart from lecture rooms and smaller syndicate rooms, there is a well-stocked library. Teaching equipment includes projectors (cine and overhead) and video-tape equipment. The video equipment consists of TV cameras as well as monitor screens.

## 5.2 MAMC Teaching Staff

There is a resident teaching staff of six, all with experience in developing countries in a range of tasks outside teaching. Teaching expertise covers not only the broad management fields of economics, finance, general management, human relations and organisation, but also the agricultural organisation strategies of estates, settlement schemes, outgrowers, extension and special rural development programmes (see Annex 8 for MAMC staff list).

For senior managers' and specialist courses it is desirable to supplement full-time, resident staff with one or more visiting lecturers from outside Swaziland. Depending on the nature of the course and the expertise required, such visiting lecturers are invited to participate in a course for up to six weeks, and may come from Europe (Britain or other EEC countries) or from an African country. For middle level managers' courses, managers and directors of projects within Swaziland are invited to spend a day, or part thereof, discussing their plans and problems; this would normally be associated with a visit to their project.

## 6. Work Plan/Schedule of Activities

The project will cover a period of 5 years beginning in 1982. Consultation with the nine countries for place allocation can start immediately the project is accepted for funding.

There are three basic activities in the required work plan.

- i. Selection of candidates/assessment of training needs.
- ii Course operation
- iii Evaluation.

It is envisaged that the initial allocation of places, selection of candidates and assessment of training needs will cover a period of three months. Thereafter these processes will operate in sequence with course operation throughout the five years of the scheme. This initial activity of allocation and selection will require travel by MAMC staff to the nine countries as is described in paragraph 5.2

As stated in paragraph 4, in each of the five years of the scheme there will normally be three courses of eleven weeks (PC courses), one of five weeks (SM course) and one of six weeks (CD course). A plan of the sequence of courses throughout a given year, in this example 1982, is given in Table 5.

Evaluation of a particular course's effectiveness in meeting individual training needs cannot be undertaken until a Mananga candidate has had adequate opportunity to re-settle back into his work situation. Evaluation of achievement will normally be initiated six to nine months following participation in a course.

A work plan, in diagrammatic form, to describe the initial stage is shown in Table 6, whilst Table 7 develops these activities for the full 5 years of the scheme.

Probable 1982 MAMC Course Programme

11.1.82 - 26.3.82		5.4.82 - 14.5.82		24.5.82 - 6.8.82		23.8.82 - 24.9.82	4.10.82 - 17.12.82
PC 28		CD 2		PC 29		SM 5	PC 30

Work Plan to Initiate the Scheme

| < 3 months > | < 3 months > | < 6 - 9 months >

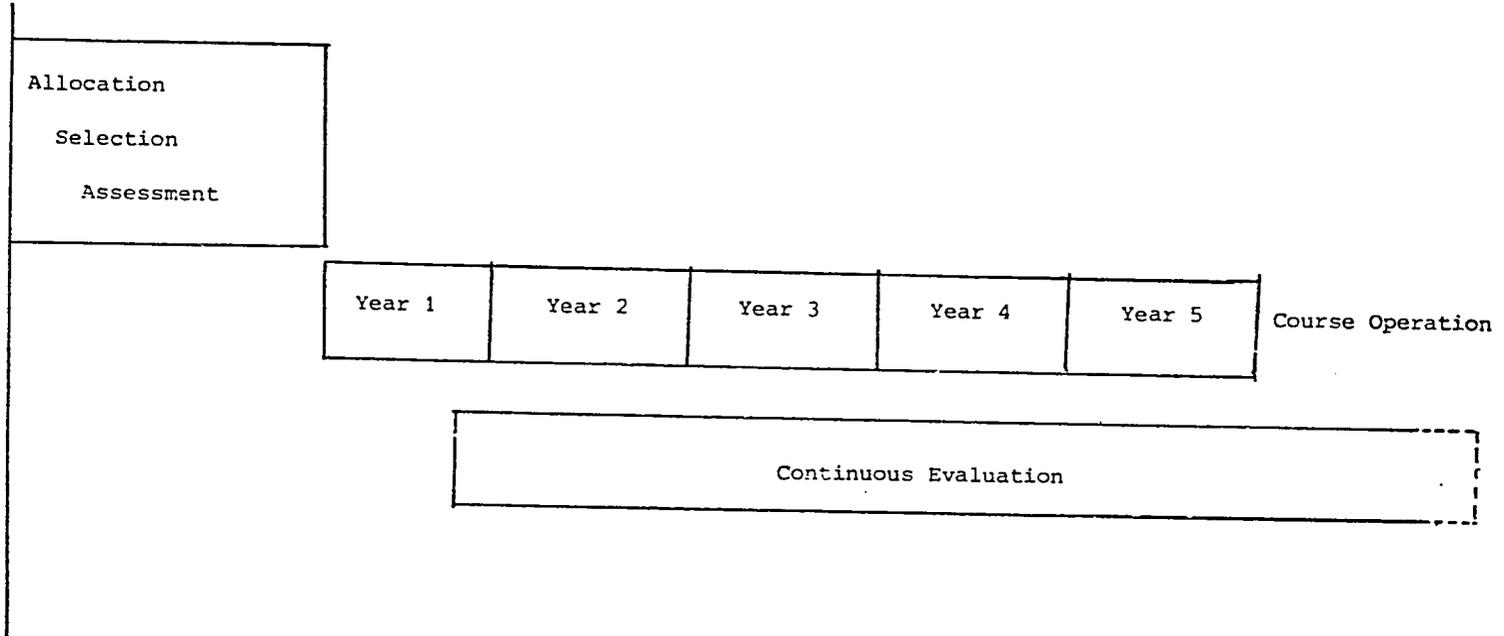
Allocation  
Selection  
Assessment

Course  
Operation

Evaluation

Work Plan for Overall Scheme

< 3 months >



## 7. Pre-requisites for Project Implementation

Once the financial agreement is signed the crucial pre-requisites for project implementation will be (a) an agreement on the allocation of the 90 places per year within the scheme across the nine SADC countries, and (b) the development of a working relationship between each country's manpower development sectors, the SADC Regional Training Council and MAMC. In the case of six of the nine countries such a relationship is already available. (c) an agreement between the individual countries and MAMC on criteria for selecting candidates to benefit from the scheme.

MAMC is well used to operating scholarship/award schemes with international agencies and has an internal administration system designed to administer such awards.

## 8. Evaluation, Monitoring and Review

Evidence gathered from past course members and client organisations, plus a formal evaluation investigation by MAMC teaching staff into two major courses, and the continuing commitment to MAMC of a large number of major clients, show clear indications of benefits to those who have participated in MAMC training programmes.

MAMC will develop and extend the evaluation scheme currently in operation particularly in the direction of closer involvement with employers. Effective evaluation requires a collaborative effort by teachers, trainees and employers. It is important that employers should realise that assessment of success can only be done on the job and not by measuring achievement in the classroom.

It is anticipated that, after training, individual managers will show a better understanding of their role in their employing agency and a better performance in their job. When significant numbers of managers within one agency have been effectively trained, an improvement in the overall efficiency in utilizing resources becomes apparent. Changes in an on-going organisation as a result of training of personnel are slow and difficult to measure independently of changes that occur for reasons other than training. Evaluation is therefore a crucial component of the implementation of the whole project. It is the device for measuring the success or otherwise of the overall investment.

A formal and continuing evaluation programme will be designed into the scheme. This will entail the monitoring of course participants in their jobs at specific periods prior to and following their participation in a course at MAMC. This evaluation programme will consist of five stages (see Table 8) in the implementation process. The first step involves the detailed appraisal of the potential course candidate in his position at work and his, and others', perception of his training needs. Thus a clear and unambiguous training objective or objectives will be required for each and every candidate prior to participation in a MAMC course. The second step will be to marry the content of a given course to a candidate's training objectives. This will be accomplished by a joint tutor/candidate selection of option/project programme, as well as well as the type of course to attend.

The third step is the continuous monitoring, through the close MAMC tutor/course member relationship, of the learning experience at MAMC.

The fourth step comprises the end of course review. Have the individual training objectives been achieved, in part or in whole? To what extent does the course member perceive his training need to have been met at this stage?

Evaluation, Monitoring and Review

Phase 1	Phase 2	Phase 3	Phase 4	Phase 5
Identify Individual Training Needs	Course Selection. Option/ Project Selection.	Monitor Progress throughout course through tutor/course member relationship	Review of achievement of training objectives at end of course	Evaluation of transfer of training to the work situation

The monitoring, review and evaluation process

The final step in the evaluation process requires an assessment of the degree of transfer of training from the experience at the training centre back into the work situation. This component is clearly the critical assessment of the worth of the whole scheme.

#### 9. Budget

Cost estimates have been prepared based on MAMC 1981 revised estimates, and then assuming and incorporating a continuing inflation rate in Southern Africa over the five year period of the project of 15% per annum. Details are given at Annex 9. The three courses described in paragraph 5 have been used as the basis for the costing - the 5-week course for senior managers, the 11-week course for middle/senior managers, the 6-week course for credit/loan managers. The figure of 90 places (18 per course) within the project annually is used for purposes of estimating annual costs. In fact, a total of 450 places over the 5 years of the scheme may be distributed somewhat unevenly each year to meet particular needs.

Summary project costs for 1982 and over the period 1982-86 are given below.

	1982	1982-86
Senior Course - 5 weeks	61,200	412,633
Middle/Senior - 11 weeks	365,580	2,467,878
Credit Course - 6 weeks	74,180	500,149
Staff Travel in Region for Consultation	12,550	84,616
Students Travel/Air Fares to Manzini	34,200	230,589
Students' Allowances	15,480	104,372
Total	<u>563,190</u>	<u>3,797,237</u>

Annual estimates will be prepared, with specific estimates of cost and training content for each course, normally from three to six months in advance. MAMC will finance all internal costs (including students' air fares and allowances) and present a final accounting for payment on completion of each course. An annual report and accounts will also be provided.

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Agricultural Management Training  
within SADCC Countries

Botswana

Quoting the Botswana 1979-85 National Plan, 'the constraint on implementation of the agricultural development programme is likely to be not finance but the capacity of the Ministry of Agriculture to prepare and implement projects. Accordingly, very high priority will be given to staff training and development, and efficient manpower deployment. The Ministry of Agriculture will be allowed to expand its staffing, particularly at the diploma and graduate level, faster than most other ministries. The Botswana Agricultural College is being expanded to increase the intake of agricultural certificate and diploma holders. Much of the expansion, however, must come from retraining and upgrading of existing staff if it is to be consistent with continued localisation'.

Currently the Botswana Agricultural College offers courses in agriculture for junior technical officers, whilst diploma courses are undertaken through the College's association with the Agricultural Faculty of the University of Botswana and Swaziland at Luyengo in Swaziland. Basic degree training is also given at Luyengo.

Administration and management training in Botswana is offered, through a range of courses, by the Institute of Development Management (an institution jointly owned by Botswana, Lesotho and Swaziland). Other than a one week course called 'Programme Management in Agriculture' and a one week course called 'Project Management in Agriculture' both held in 1979, specific training programmes for agricultural managers have not been mounted. There is thus no institutional framework at present in Botswana to satisfy the requirements of the current demand for formal management training for experienced agricultural staff to operate in the new strategies earmarked in the Government's development plan.

### Lesotho

The Lesotho Agricultural College offers diploma and certificate courses in agriculture, rural domestic economy and agricultural engineering. It is the training centre for all junior extension agents in the country.

The Lesotho Institute of Public Administration, besides offering a diploma in public administration runs short in-service courses on administration for the Civil Service.

Lesotho is one of the participating countries in the Institute of Development Management (centred in Gaborone, Botswana) and the comment as given in the previous paragraph on Botswana also holds true for Lesotho. Thus Lesotho has at present no formal management training facilities specifically designed to cater for the needs of experienced agricultural officers.

### Malawi

Agricultural training in Malawi is available at degree and diploma level from the Bunda College of Agriculture (a constituent college of the University of Malawi) and at certificate level from the Colby College of Agriculture. Specialised forestry training to certificate and diploma level is available at the Malawi College of Forestry (Dedze).

Administration and management training is offered in the form of a 3-year diploma in Business Studies or a 5-year B. Comm. programme at the Malawi Polytechnic. Courses are also organised in the areas of management to cater for the needs of commerce and industry. The Government Staff Training College offers industrial, commercial and administration in-service courses for the Civil Service. Whilst the Department of Public Administration of the University, besides offering a 3-year diploma and 4-year degree course in public administration conducts ad hoc courses in development administration as required.

There are no programmes or courses offered by any educational institution specifically for the further training and development of experienced agricultural staff in the areas of administration and management.

#### Swaziland

Currently all certificate, diploma and degree agricultural training is centred at the Luyengo Agricultural College campus of the University of Botswana and Swaziland.

In-service administrative training within the Civil Service is available to some extent at the Swaziland Institute of Management and Public Administration, whilst more comprehensive facilities for such training are available at Gaborone through Swaziland's involvement (as one of the three owners) in the Institute of Development Management. Such institutions do not cater specifically for the development and training needs of experienced agricultural staff.

#### Tanzania

Tanzania's aim is to achieve self sufficiency during the 1980s in higher and middle level manpower. To this end the Ministry of Agriculture has expanded training facilities for field assistants. At the certificate/diploma level five training institutes provide three-year full-time courses as well as in-service training. The Forestry Training Institute provides certificate and diploma courses whilst the Faculty of Agriculture of the University of Dar-es-Salaam offers a first degree course in agriculture together with a 3-year diploma programme.

The Co-operative College offers a 2-year diploma course in management and accountancy as well as a one-year certificate course. Both programmes are designed to develop basic training in co-operative management.

A 3-year diploma course in Community Development is offered by the Institute of Development Management besides its normal 3-year diplomas in

public administration and business studies. A number of short courses are offered across a range of management and administration subjects.

Though the Eastern and Southern African Management Institute offers a range of programmes and courses in administration and management, other than a course called "Industrial and Agro-Industrial Projects. Project Planning and Implementation", none seem to be designed specifically with the needs of agricultural staff in mind. Overall there are no specific programmes or courses offered for the further training and development of experienced agricultural staff in the area of administration and management other than as reflected in the courses on community development and co-operative management. The management of direct production in agriculture is not available as a subject in any of the above institutions.

#### Zambia

"The ten local educational and training institutions which contribute to management development and training (of which only two have this as their main function) are quite unable to meet the needs of industry now or in the foreseeable future. Because of the serious shortage of management training staff and facilities in Zambia, these institutions cannot be expected to begin to meet even a portion of the need in the future unless there is a major expansion of their facilities or unless additional educational and training resources are established."

Such was the conclusion of a recent survey into the Zambian managerial manpower need.

The situation in the agricultural sector is even more critical, for though the School of Agricultural Science in the University of Zambia, the Natural Resources Development College and the Zambia Colleges of Agriculture at Monze and Mpika cover the needs of degree, diploma and certificate levels, there is no institute other than the Pan African Institute for Development, with

its course in Integrated Rural Development, which meets the training and development needs of experienced agricultural staff.

#### Zimbabwe

The present facilities of the Agriculture Faculty of the University at degree level and the two diploma colleges of Chibero and Gwebe are inadequate to meet the needs for basic agricultural training let alone the further training and development of experienced agriculturalists in administration and management skills.

MAMC course attendance on its 'Planning and Control in Agricultural Management' course  
(PC courses) April 1973 - July 1981

	1973	1974	1975	1976	1977	1978	1979	1980	1981
Botswana					1	1	4	4	2
Lesotho	1			3	6	4	1		2
Malawi		10	15	14	12	8	7	5	
Swaziland	4	3	6	7	6	3	2	3	
Tanzania	5	13	1	6	7	12	10	8	5
Zambia	3	8	14	17	14	11	10	6	5
Zimbabwe									2
<b>Total</b>	<b>13</b>	<b>34</b>	<b>36</b>	<b>47</b>	<b>46</b>	<b>39</b>	<b>34</b>	<b>26</b>	<b>16</b>
Caribbean	1	4	2	5	3	1	3	1	1
SE Asia/Pacific		3	1	2	4	4	4	6	5
East/North Africa	1	9	10	11	12	10	12	23	16
West Africa	8	13	15	17	19	28	25	25	23
UK	1			3		2			
<b>Total</b>	<b>10</b>	<b>29</b>	<b>28</b>	<b>35</b>	<b>38</b>	<b>45</b>	<b>44</b>	<b>54</b>	<b>45</b>

MAMC course attendance on its senior (SM) and credit (CD) courses, 1978 - 1981

	<u>SM Courses</u>				<u>CD Course</u>
	1978	1979	1980	1981	1981
Botswana				1	3
Lesotho		1			3
Malawi	1			1	2
Swaziland	2	2		2	3
Tanzania	4	7	6	3	4
Zambia	2	3			
Zimbabwe					
<b>Total</b>	<b>9</b>	<b>13</b>	<b>6</b>	<b>7</b>	<b>15</b>
Caribbean	4	3	1	2	
SE Asia/Pacific	3	2	2	4	1
East/North Africa	5	4	7	5	3
West Africa	11	6	7	9	9
UK	3	3	4		
<b>Total</b>	<b>26</b>	<b>18</b>	<b>21</b>	<b>20</b>	<b>13</b>

Outline of a 5 week course, in May/June 1981, for senior managers at Mananga Agricultural Management Centre entitled "Senior Management in Agricultural Development".

The following pages are extracted from the Course Programme handed to students on arrival for a course May - June 1981. Notes on the use of the library and a daily timetable of lectures, seminars, discussions, visits etc. have been excluded.

COURSE OBJECTIVES

This course is designed for senior managers with broad responsibilities in major agricultural projects. In addition to an examination of management practices called for in the normal running of an organisation, there will be opportunities to consider the special difficulties faced by managers responsible for starting up new projects or in expanding those already in operation.

The main purpose of the course is to help project managers and senior agricultural staff to be more aware of, and to understand more fully the complexities and problems in the development and running of projects through. -

1. Understanding the need to build an organisation structure and an administrative system hand-in hand with the technological development of the project.
2. Understanding more clearly their role in relation to the project's environment and objectives and to be ready at all times to modify work programmes to meet unfolding situations.
3. Becoming more aware of the need for human development in the growth of agricultural projects.
4. Increasing their awareness of relevant financial information and of the financial effects of their decisions.
5. Evaluating their own experience and comparing it with that of people doing similar work.
6. Improving their ability to assess what is important in unfamiliar situations and in deciding what action to take.

COURSE PROGRAMMEGENERAL PROGRAMME

During the first two weeks of the course a series of plenary sessions will be held. The purpose of these sessions is to present ideas and concepts for exploration and discussion. The focus will be upon the following subject areas -

Corporate Strategy      3 sessions

Corporate strategy is concerned with the study of issues and problems encountered by management whose prime responsibility is the long term development of a project or organisation. We will examine not only the process of policy formation (corporate objectives) but also the planning process and the implementation stage.

These early sessions will be fully developed through the major group project 'Managerial Work'.

F.N. Youdale

Organisational Behaviour      6 sessions

Through experiential exercises, films, selected readings and group discussions four important concepts usually identified under the title organisational behaviour will be explored.

The four areas will be:

Work Performance and Motivation  
 Communication and Perception  
 Leadership  
 Working in groups

D.C. Marshall

### Financial and Economic Analysis

In these introductory sessions, course participants will consider the relevance and usefulness of financial and economic information to sound decision-making. Using a major case study, course members will be given the opportunity of developing their ability to analyse the strengths and weaknesses of an organisation, as revealed by its annual accounts. They will explore the rationale of investment appraisal and the potential contribution of financial and economic analysis to long-term investment planning.

D.V. Coy/  
T.J. Harding

### Roles and Cultures

#### a) The Manager's Roles

The concept of role is a useful way for an individual to increase his understanding of how he fits into the organisation of which he is a part. This session will introduce participants to the elements of role theory. Those who wish to explore the area more deeply will have a chance to do so in Option D.2

#### b) The Cultures and Structures of Organisations

Organisations are very varied: they vary not only in such obvious characteristics as size or output but also in more intangible aspects such as ways of organising work, norms of behaviour, traditions, procedures and levels of motivation. These 'intangibles' can be summed up as the culture of the organisation. During these two sessions participants will examine their own organisations to identify the prevalent culture and will then look for the reasons why it has developed in that way and what the implications are for the efficient working of the organisation.

J.L. Marjoribanks

DEVPRO

Devpro is an interactive business game based on a tropical agricultural production and marketing model. The game has been designed to consolidate understanding in the area of finance, accounting, production economics, and organisational behaviour. In particular, Devpro helps to develop appreciation of the interaction of decision making - a decision relating, say, to production rarely affects production alone, but will have important consequences for other areas, such as marketing and finance.

Participants will become involved in a lively and, at times, exciting activity - working in groups, the interaction invariably provokes further reflection on group behaviour.

Managerial Work Seminar

Many contemporary writers continue to define managerial work as the process of Planning, Organising, Command, Co-ordination and Control, and so forget or do not even know that Professor Carlson in 1951 so sensibly wrote that

"... concepts like planning, co-ordination and control are of very limited use when we want to describe in an observational study the daily work and actual patterns of behaviour of managing ... most of the concepts do not fulfill the qualification of operational concepts that they should be synonymous with a clearly defined set of operations ... if we ask a manager when he is co-ordinating, or how much co-ordination he has been doing during the day he would not know, and even the most highly skilled observer would not know either. The same holds true of the concepts of planning, command, organisation and control ..."

This group project is designed to help you take a fresh look at the fascinating concept of managerial work and to offer ideas and approaches that enable you to reappraise how effectively you work, and how effectively you run your project.

F.N. Youdale

Cost Control Seminar

Managers in tropical agriculture are often criticised for their lack of cost consciousness. 'Achieve the objective regardless of cost' seems to be the motto of many. Drawing on the combined knowledge and experience of several senior managers in the Swaziland lowveld, this seminar will focus attention on the problems of improving costs control in tropical agriculture.

## MANAGEMENT STUDY GROUPS AND TUTORIALS

Two structures have been provided to assist learning during the course and to monitor progress.

MAMC Staff

### Tutorial Structure

Course members will be allocated to a tutor on arrival. The task of the tutorial group will be to assist all group members to obtain the best they can out of the course. There are many resources available at MAMC and in the locality. The tutorial group is the mechanism whereby the learning needs of each course member are matched to the learning resources that are available. During the last week of the course the tutorial group meets to carry out a self evaluation of the period spent at MAMC.

### Managerial Study Group

A group of course members, with common interests, meet with a member of staff to explore any aspect of management which has been mutually agreed. The direction and depth of the discussion or exploration will be left entirely in the hands of the group.

ECONOMIC AND AGRICULTURAL DEVELOPMENT STRATEGIES

It is very hard for managers in any part of the agricultural economy to find the time to sit back and think about the broad issues that affect the way the country and in particular the agricultural sector is developing. A combination of lectures, discussions, field trips, visits and debates over most of the fifth week will give all course members the chance critically to examine the following important issues:

- What factors affect a nation's rate of economic growth?
- What sociological and demographic trends accompany economic growth?
- Why is agricultural development so important in the developing countries?
- What strategies of agricultural development are available to government?
- How should governments choose the most effective strategies for agricultural development?

To most of these questions there is no single answer, but a deeper understanding of the factors involved will give you an enhanced level of insight into your own role in the agricultural sector of the developing economy of your own country.

All Staff

## OPTIONS

This section of the course gives course members an opportunity to examine topics of specialised interest. Two or three options will run simultaneously and an attempt has been made to provide a range of subjects to meet the needs of many specialising in agriculture.

### Block A

#### Project Identification

Many of the problems encountered in attempting to implement agricultural development programmes can be traced to poor project preparation and an inadequate consideration of those technical and operational factors likely to contribute to unsatisfactory project performance. This option will cover an appreciation of the basic process and procedures involved in the identification, design and development of agricultural projects.

Sir Roger Swynnerton  
T.J. Harding

#### The Organisation of Extension

Extension is one of the services offered to smallholder farmers in the attempt to stimulate change in their farming activities. This option will look at the service from the viewpoint of the manager, examining in particular the organisation of an extension service, planning extension programme, evaluation of extension work, co-ordination with other farmer services and back-up of field personnel.

Visiting Lecturer

#### Estate Management Labour and Work Planning

To examine with exercises the fundamentals of labour planning, the decisions that have to be made in the areas of permanent 'V' casual labour 'V' mechanisation.

N.P.S. Hetherington

Block BProject Appraisal

Project Appraisal is the detailed evaluation of alternative ways of achieving policy objectives. Appraisal should not be regarded as the final stage in project development, to be undertaken after its design and principal features have been fully determined. Project appraisal should be applied at all stages of project selection and analysis, from preliminary identification to the preparation of detailed design.

By means of a major case study, this option will explore the basic concepts of economic project appraisal, introducing the following analytical techniques:-

- pay-back period
- cost-benefit ratio
- net present value
- internal rate of return
- sensitivity analysis.

Sir Roger Swynnerton

Role Analysis

The concept of Role is a useful way for an individual to increase his understanding of how he fits into the organisation of which he is a part. This option will allow participants to examine their own jobs in terms of Role Theory in order to bring to light any conflicts, ambiguities, stresses or strains that may be inherent in their job. This elucidation should assist participants either to come to terms with their situation or to see more clearly how it might be changed.

J.L. Marjoribanks

Critical Path Analysis

Critical path analysis is the organised application of reasoning for planning, scheduling and controlling practical situations where many separate jobs, which make up the whole task, can happen simultaneously or in sequence such that it is difficult intuitively to establish the relationship between separate jobs. This study will cover one of the basic techniques in network analysis. Examples will be taken from typical agricultural development projects.

N.P.S. Hetherington

## Block C

### Budgeting and Estimating for Estate Work

To learn or re-learn the components of budgeting. The implications of unit cost computation and the use of these:

Cost implications of variances in production against budget assumptions.  
Phasing of budget and cash flow analysis.

N.P.S. Hetherington

### Interactive Workshop I

The aim of the workshop is to explore by means of experiential exercises, reading and discussion aspects of organisational behaviour. The concepts of control supervision, appraisal and rewards will be the main focus of our attention.

The depth of the study will be in the hands of the participants bearing in mind the constraints of time and resources.

D.C. Marshall

### Development Agencies

Many countries have seen in recent years a proliferation of agencies involved in Rural Development. From Ministries of Agriculture, through Crop Development Authorities and Produce Marketing Boards to Integrated Area Development Projects, there have been a wide variety of organisational structures created in an attempt to achieve rural development goals. This option will examine why this should be so and attempt to identify some of the structures which have been associated with success or, alternatively, failure.

Visiting Lecturer

Block DIrrigation Management

Irrigated agricultural projects are a growing feature in the technology of agriculture. These sessions will cover the important components and problems which must be considered in the preparation and implementation of such projects.

Sir Roger Swynnerton

Economics of Smallholder Production

Why do peasant farmers sometimes appear to respond in an "economically irrational" manner to increased income opportunities? What motivates the traditional smallholder and what are the major constraints to his economic progress?

Using a range of economic techniques, this option explores the hypothesis that peasant farmers are indeed rational in the allocation and organisation of their limited resources and that, to improve present farming practices, personnel involved in the provision of services to peasant farmers should first identify their resource constraints and understand the economic, social and institutional environment within which they are required to operate.

T.J. Harding

Accounting for Inflation

High rates of inflation cause conventional historic cost accounts to give a misleading view of the financial position of the organisation. During the seventies, accountants have devoted much time to accounting for inflation but they have so far failed to find an acceptable solution. In this option the various alternatives in this current accounting dilemma will be explored.

D.V. Coy

Planning Agricultural Surveys

Planning of agricultural development programmes aimed at the traditional sector cannot be properly done unless a sound data base is available to the planners. This option looks at some of the factors involved in the design and implementation of agricultural surveys aimed at providing the necessary information.

J.L. Marjoribanks

Block EProblem Solving

We often like to think that the decisions we take as managers are totally rational ones based on a sound consideration of the facts relevant to the problem. Reality may, however, be very far from this ideal. This option will examine some of the reasons why practice so often diverges from the ideal and will look particularly at: emotional involvement; the need for both creativity and analytical thought; stages in problem-solving; group problem-solving.

J.L. Marjoribanks

Workshop in Creativity and Problem Solving

This option is designed to help people to learn to use their potential more effectively in working through the continual stream of problems that face us in our normal life at work. The programme is highly participative and self directive.

F.N. Youdale

Interactive Workshops II

This workshop will be run along the same lines as C2 but the focus of attention will be upon change, development and training.

D.C. Marshall

Outline of a 3 month course for middle/senior managers at Mananga Agricultural Management Centre entitled "Planning and Control in Agricultural Management".

The following pages are extracted from the Course Programme handed to students on arrival for a course July - September 1981. Notes on the use of the library and a daily timetable of lectures, seminars, discussions, visits etc. have been excluded.

COURSE OBJECTIVES

1. Educational Development aims to broaden your knowledge of management theory, techniques and practice through the use of the facilities, resources and individuals which make up the centre.

This course is not concerned with providing training in the technical problems of agriculture. We shall not discuss relative merits of varieties of sugar cane, or what herbicide to use to control weeds in rice. We shall devote the time to considering how to make economic decisions to ensure profitable production; how to combine men, machinery and materials so that objectives can be reached efficiently; and how records can be designed to help in planning and control. In seeking how to organise other people better, you will find that you will be able to examine yourself in your role as a manager.

2. Individual Development To provide you not only with a structural management programme, but also with the opportunity of following in depth your necessary for your future careers.

Our object in the three months that you are at MAMC is to create a situation in which you will develop and improve your ability as a manager in agriculture. We have in mind a picture of your work and responsibilities and the whole programme is related to this. We do not try to include everything in management, but only those methods and practices that you can probably use back home. Throughout the course we shall discuss principles, and then seek to see how these are applied. A real effort will be needed from you to perceive how you could apply the principles under your own conditions. The staff will also help in discussion, but will not attempt to tell you exactly what you should do. Exercises or case studies in which work is done in small groups are designed to help you see how to apply new knowledge in practical situations.

3. Confidence Development To provide you with the challenge of working, either individually or in small groups, on a variety of educational activities. To enable you to have formal and informal discussions in a relaxed atmosphere which encourages the development of non-aggressive self-confidence.
4. Social Development To provide a small community where you will live and work, learning with and from other experienced managers from a broad range of countries, organisations and specialisations.
5. Environment We hope to create a learning environment away from the everyday place of work where, free from interruption, you can:-
  - think about your work
  - develop new ideas
  - learn from your own resources
  - learn from the resources of MAMC and its staff
  - and above all learn from living and working closely with participants from different countries and organizations.

6. Our learning philosophy. You may find our approach to teaching different from what you expect. We do not attempt to tell you how to do your job, but help you to learn for yourself how to do it. This calls for a sustained effort from you to see how to use what you will learn about. We are not looking for the one correct answer, because it does not exist; by exercises, discussion and argument we seek to give you understanding.

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COURSE PROGRAMME

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## COURSE PROGRAMME

### 1. GENERAL PROGRAMME

The first four weeks of the course will consist of a series of plenary sessions in which all course members will together examine a single topic which has been suggested by a members of staff.

In addition time will be allocated for course members to begin to examine aspects of managerial work as they affect him at work and to discuss these with his fellow course members.

#### 1.1 PLENARY SESSIONS

The purpose of these sessions is to present ideas and concepts for exploration and discussion. The focus will be upon the following subject areas:

##### 1.1.1. Economics and Finance

Using the case study of a local agricultural enterprise course members will explore many of the fundamental principles of economics and finance. Cash flow statements, balance sheets, profit and loss account gross margins and farm planning will be considered.

##### 1.1.2. The Study of Organisations

We all work within an organisation of some kind or another. An understanding of the structure of that organisation can help us to work more effectively. These sessions will examine some of the concepts underlying the theory of organisations and will encourage participants to take a reflective look at their own organisation and their role within it.

##### 1.1.3. Human Interaction

It is accepted that a major part of a managers work life involves a series of interactions with other people who come from both inside and outside the organisation. This introduction to what is in effect a large subject will examine some aspects of this human interaction which should be applicable to many situations that managers face.

#### 1.1.4. Information and Control Systems

The need for a manager to 'manage' all aspects of his work area is the paramount requisite of his job.

It has been stated that "He who controls the information will in effect control the job". Given the need for the manager to be the person in control, these plenary sessions will allow us to explore this area and evaluate the control needs of any scale of organisation.

#### 1.1.5. Team Building (Group Dynamics)

Individual persons within an organisations become part of many groups. Some are formed informally, others are formally appointed. The groups are formed for many objectives and reasons. In the two days set aside to examine the nature of work groups, with the aid of the video tape recorder, an exploration of the process and interaction which takes place within groups is carried out.

#### 1.1.6. Organisational Behaviour Workshops

These workshops will build upon the framework laid in Human Interaction, Team Building and the Study of Organisations. They will look at the practical implications of some of the basic concepts applied to the management of staff within an organisation. Particularly Leadership and Motivation will be examined.

#### 1.1.7. Cost Control Seminar

Middle managers in tropical agriculture are often criticised for their lack of cost consciousness. 'Achieve the objective regardless of cost' seems to be the motto of many. Drawing on the combined knowledge and experience of several senior managers in the Swaziland lowveld, this seminar will focus attention on the problems of improving cost control in tropical agriculture.

#### 1.1.8. Visits

A list of possible visits is presented to course members and trips are organised, according to the response, during afternoons throughout the course for visits to projects in the locality, and on Tuesday 10th August for those situated further afield.

## 1.2 EXAMINATION OF MANAGERIAL WORK

These sessions will afford the course member the opportunity to think about his organisation, his job and himself. They will be carried out as follows:-

### 1.2.1. Group Project - Managerial Work

Many contemporary writers continue to define managerial work as the process of Planning, Organising, Command, Co-ordination and Control and so forget or do not even know that Professor Carlson in 1951 so sensibly wrote that

"...concepts like planning, co-ordination and control are of very limited use when we want to describe in an observational study the daily work and actual patterns of behaviour of managing .... most of the concepts do not fulfill the qualification of operational concepts that they should be synonymous with a clearly defined set of operations ... if we ask a manager when he is co-ordinating, or how much co-ordination he has been doing during the day he would not know, and even the most highly skilled observer would not know either. The same holds true of the concepts of planning, command, organisation and control ...."

This group project is designed to help you take a fresh look look at the fascinating concept of managerial work and to offer ideas and approaches that enable you to reappraise how effectively you work, and how effectively you run your department, section or project.

F.N. Youdale

### 1.2.2. Management Case Studies

Many management courses explore managerial work with the aid of case studies. We have developed at Mananga a process whereby we can examine some of your own cases rather than present a fictitious and often irrelevant case for members to explore.

This method also assists the individual course member to reflect upon his organisation and his job.

Each course member will be asked to submit a description of three particular incidents at work. It could be something which is causing the course member a problem at this very moment in time or a problem he has solved in a particular way, or a long standing, seemingly insoluble case.

The case studies are then categorized and a representative of each category is presented to the whole course for exploration and discussion.

### 1.2.3. Management Study Groups/Tutorials

A small group of course members arrange to work with one tutor during the period of the course. The purpose of the group is twofold.

Firstly the course member will have the opportunity to individually discuss the course work with a member of staff. By reviewing understanding and relevance, the course member can be helped to monitor his learning and enhance the benefit from the course. The member of staff will be available as a resource, guide and helper to any member of his study group.

Secondly the course members comprising the study group are free to explore and examine any aspect of managerial work which is mutually agreed. This vehicle will allow course members to examine in depth, with the aid of one or two colleagues and his tutor, some aspect(s) of management which interests or challenges him.

## 2. OPTIONS

The plenary sessions during the first four weeks of the course (and the subsequent workshops and seminars) have been planned by the staff to examine topics which they feel may be relevant and useful to the course members.

From week 5 to week 9 the decision as to which topic to study is now made by the course member.

This decision is taken in two ways:-

- a) The timetable is so arranged that at any one time three separate groups will be meeting to examine three different areas of study.
- b) Although the staff have outlined the broad areas for exploration and discussion in these three separate groups. It can be seen, on closer examination, that they are so broad that they will need to be renegotiated before work can be carried out. This negotiation as to exactly what topics will be examined during the option will be the responsibility of the individual course members comprising the option and the member of staff who will act as a resource to the group.

A1 Inducing Change in Smallholders

At the centre of many governments' strategies of rural development is a commitment to the stimulation of smallholder development. Why do farmers appear to resist change? Conversely, why should they change? Members of this option are encouraged to explore any factors which they feel have an influence on the change process.

A2 Managing People

It is assumed that the course members will wish to examine such problems as motivation, communications, performance appraisal etc. during these sessions. It is also assumed that people working in large organisations will be attending these sessions.

A3 Finance : Planning

Course members will have the opportunity to study aspects of agricultural planning that involve a financial input. The actual areas to be studied will be negotiated by the group.

**B1 Administration of Service Agencies**

A large part of the rural development effort of any government consists of the provision of services (extension, input supply, marketing, health, education etc) to the rural population. The administration of these services is not easy, which only serves to emphasise the need for the close examination of this area which it is expected that members of this option will wish to make. A later option (D1) will look at the particular problems of credit administration.

**B2 Staff Development and Training in Organisations**

Large organisations usually set up training departments which develop policies. This option is to enable course participants to explore the problems involved with the development of staff and the various training systems which are in operation.

**B3 Finance:Control**

Effective control systems are an essential part of efficient agricultural production. In this option, course members will be able to explore the aspects of financial control systems they identify as being particularly relevant to themselves.

C1 Decision Making Process

"All my decisions are based on rational thought". Are they?  
 "I never allow emotion to influence my decisions". Don't you?  
 "A good manager decides for himself". . . But group decisions ensure commitment.

How do you really take decisions? This option invites you to examine the decision making process and perhaps to reflect on your personal style - do you think you could improve it?

C2 Economics of Large Scale Production

Economic principles have long been applied to large-scale agriculture. Many specific 'roots' have been developed to improve the predictive quality of information available to the manager who wishes to plan his farming activities for the optimisation of returns to available resources. Members of this option are invited to study some of these economic tools.

C3 Planning of Project Implementation

The roots of successful project implementation lie in the care and attention given to planning. In this option course members will be able to explore problem areas of planning and study techniques that may help in the planning process.

**D1 Credit for Smallholder Development**

Course members who have an interest in the stimulation of smallholder development, particularly those with a direct interest in credit provision, may wish to take the chance provided by this option to explore any area of credit policy or administration.

**D2 Finance : Interpretation**

For many managers an important quality is the ability to read and interpret financial information. In this option course members will be able to explore and study aspects of the interpretation of financial information, which they identify as being particularly relevant to themselves.

**D3 Workshop in Creative Thinking**

From early childhood onwards we learn to conform to certain socially-acceptable behaviour patterns. This is very necessary for us to become normal members of society. It does have an unfortunate side-effect. We also acquire a tremendous number of inhibitions along the way and these inhibitions can be a real barrier to original, innovative and creative thinking. This option invites you to take part in a programme designed to help you to break through some of the barriers.

E1 Managing people in Service Agencies

It is assumed that managers who work in public service agencies will face slightly different problems in the managing of their staff. Those course members in the public services agencies who wish to explore the problems they face in working with people are invited to attend this option.

E2 Administration of Estate Agriculture

The problems of controlling a large estate labour force, of controlling stores and a machinery fleet and of running the ancillary services necessary are largely centred round the design and implementation of sound control systems. Members of this option are invited to study aspects of estate administration which they feel are particularly relevant to their needs.

E3 Project Identification and Appraisal

Before any financing agency, whether it be the domestic government, a bilateral or a multilateral agency, will consider investing any money in agricultural development, specific projects have to be identified and appraised to determine whether or not investment is likely to prove worthwhile. The need for this is urgent in many cases, as aid agencies are often very keen to disburse funds and are only held up by the lack of proper project identification and appraisal. Members of this option are invited to examine any of the specific techniques which have been developed for this purpose.

### 3. CONCLUDING SESSIONS

The whole course come together during the last two weeks of the course to work on two large exercises; one involving visits to various agricultural developments in Swaziland and the other involving a farm business game.

#### 3.1 Strategies for Agricultural Development

It is often very hard for managers in any part of the agricultural economy to find the time to sit back and think about the broad issues that affect the way the country and in particular the agricultural sector is developing. A combination of lectures, discussions, field trips, visits and debates over most of the tenth week will give all course members the chance critically to examine the following important issues:

- What factors affect a nation's rate of economic growth?
- What sociological and demographic trends accompany economic growth?
- Why is agricultural development so important in the developing countries?
- What strategies of agricultural development are available to government?
- How should governments choose the most effective strategies for agricultural development?

To most of these questions there is no single answer, but a deeper understanding of the factors involved will give you an enhanced level of insight into your own role in the agricultural sector of the developing economy of your own country.

#### 3.2 Devpro

Devpro is an interactive business game based on a tropical agricultural production and marketing model. The game has been designed to consolidate understanding in the areas of finance, accounting, production economics, and organisational behaviour. In particular, Devpro helps to develop appreciation of the interaction of decision-making - a decision relating, say, to production rarely affects production alone, but will have important consequences for other areas, such as marketing and finance.

Participants will become involved in a lively and, at times, exciting activity - working in groups, the interaction invariably provokes further reflection on group behaviour.

### 3.3 Managerial Work Seminar

This seminar is the culmination of the group project in Managerial Work. Papers produced by groups of course members will be discussed and appraised in plenary session.

F.N. Youdale

## AIDS TO LEARNING AT MAMC

1. It may be useful to state the underlying philosophy of learning which has governed the design of the course.

1.1. Learning is a personal activity. When considering adult learning it is prerequisite for the establishment of an effective learning environment that each individual takes responsibility for his own learning process. The structure of a course and the personnel involved in organising it can only be looked upon as resources to be used at the discretion of the individual learner. It is therefore beholden upon each course member critically to examine his own process of learning and fully to utilise those resources which will be of value to him. This course attempts to free the course member from the obligation to learn a specified area of cognitive knowledge, there is no 'body of knowledge' which has to be 'got over' and which is evaluated by means of an examination. It is incumbent upon the staff to attempt to make their input and the structure of their learning activities as challenging as possible with the express aim of giving the course participants an opportunity to widen their views on certain managerial topics.

1.2 The staff at Mananga see the following as useful learning resources available to course participants.:

Time - For a period of eleven weeks you are away from the normal pressures of every day work life. An opportunity is there for you to use this 'breathing space' to reflect upon yourself, your career, your job and your organisation.

Colleagues - By virtue of the fact that the course is comprised of course members from a variety of nations, organisations, disciplines, cultures etc, an opportunity is presented for you to compare and contrast many aspects of your managerial activities.

Private study and reading - For those of you who have often looked forward to an opportunity to catch up on some reading around the managerial profession perhaps that time is now.

Staff - The Mananga staff have gained a certain expertise in structuring situations which encourage course members to question, discuss and debate various issues. Their role is seen as one which helps to create learning environments. They also can be viewed as guides to the many resources available in MAMC itself and in Swaziland generally (especially in the lowveld). The staff in addition to the skills associated with management learning also have a great deal of experience in various aspects of the agricultural industry.

### 1.3 Learning in a small group

This is one of the most important learning structures and a more detailed discussion of this approach is deemed to be necessary.

It is common knowledge that being in a group can frequently be a very frustrating experience. Major issues can be side-stopped, rational arguments can apparently be swayed by irrational points, lengthy speeches will be made on trivial issues and some members will say nothing at all. On the other hand, being a member of a dynamic and effective group can provide a very stimulating and developmental situation, leading to significant work achievements. In studying a subject at Mananga, the group becomes a prime source of information, for we believe that individual members can learn to be more effective in managing a group, or contributing to one.

#### 1.3.1. Method of Working

Group learning is essentially something which can be experienced instead of being studied academically. Consequently, the major source of information comes from the interaction and behaviour of the group itself. No matter what subjects are being studied, the process whereby members in the group relate, interact, like or dislike each other, help or hinder each other, is continuous. It is this continuous process which reveals the working of a group and provides the richest source of learning for members, including (and especially) about their own behaviour. There are certain themes which frequently occur in groups, such as Power, Authority, Leadership, Affection and Dislike. These are rarely discussed or brought out into the open, but they have an immense effect on the group's effectiveness. You have to listen very hard to hear this 'music' because the words being spoken will apparently have no connection with these themes. But gradually you begin to realise that the topic on the agenda or the subject under discussion is being used as a cloak under which these driving forces of human emotions and needs are being played out.

#### 1.3.2. Some Factors at Work in the Group

Whilst any group is unique, there is enough evidence to suggest that there are likely to be certain common factors at work.

#### 1.3.3. Authority and Leadership:

Who is in charge? Who is the leader? How can I get my point of view accepted? They're ganging up on me. The theme of authority and leadership is heard initially to affect the group's working and until it is brought into the open it will dominate and frustrate the group. It may never be fully resolved but its recognition as a powerful force is a landmark in the group's development.

#### 1.3.4. Affection and Dislike:

I can't stand suede shoes. Look at his hair! What an accent. Typical civil servant, production manager/marketing man. He seems a decent sort of chap. I think we have similar problems. He's an excellent chairman. What a report! The need to like and be liked must always be a strong factor in a group, together with the opposite of disliking and being disliked. The 'cosy' group is rarely if ever the group where there is mutual liking and trust. It is usually a device to prevent existing strong feelings from emerging and frequently shows itself by having an unwritten rule that no one shall say anything personal. One of the lessons to be learnt is how to recognise strong feelings and deal with their expression, to the ultimate benefit of individuals and the group. The recognition and exposure of feelings in a group is a recognition of reality. Only then can relationships be formed as the prerequisite of co-operative working on a task. There may even be the added bonus of liking the persons concerned.

#### 1.3.5. Membership and Acceptance:

At work a person is rarely able to choose the group in which he works and it is the same at MAMC. Nevertheless, once a person is in the group it is essential that that person feels accepted as a full member. In order to achieve this, all group members need great sensitivity to ensure that everyone is accepted, for a person who feels rejected is unlikely to make much contribution to the group; he is much more likely to be a focus for costly and non-productive behaviour which may well be rationalised in terms of lengthy and irrelevant contributions or rational but continuous opposition.

#### 1.3.6. The Climate of the Group:

It becomes apparent that in order for the group to develop and learn about itself, there must be a climate in which this is more likely to happen.

#### 1.3.7. Frankness:

The group must be able to give and receive facts and opinions at a personal level. For this to happen, the group must encourage frankness and openness.

#### 1.3.8. Risk-taking:

For learning to take place, people must be able to experiment with different methods of behaviour and working. Mistakes must be seen as part of the learning process rather than as occasions for judgment and guilt. To build such a climate is a hard and sometimes painful process and this is why learning can take such an effort. But the results in terms of group effectiveness and personal development can be deeply satisfying and the learning becomes permanently integrated into one's total body of knowledge.

### 1.3.9. Conclusion

In studying a subject, the group becomes a microcosm of the work situation. The hopes and fears, aspirations and expectations you have as a manager in your job are also present with you as you study a subject in a group. It provides an opportunity for you to discover how people work in groups and more especially how you work in a group. The underlying feelings and emotions which affect all of us cannot be ignored. It is by the recognition of them that we learn and hence improve our ability to deal with people and work with them more effectively.

### 1.4 Locality

Three large commercial CDC projects serve as a background to the MAMC training programme. These include the growing of fruit tree crops and sugar cane under irrigation, a large cattle ranching activity and a smallholder settlement scheme involving sugar cane, maize, cotton and vegetables.

### 1.5 Swaziland

Swaziland has some interesting agricultural schemes covering rural development, settlements, mechanisation of both small and large estates, irrigation schemes and large scale food/fibre production.

### 1.6 Opportunities

The period spent at Mananga is one of opportunities and choices. (A reflection of the world of managerial work). The use made of the opportunities will depend greatly upon the commitment and motivation you bring to bear upon your choice process. May I wish you a productive and useful period of time spent with us.



D.C. Marshall  
Director of Studies

Outline of a 6 week course in April/May 1981 for middle senior managers at Mananga Agricultural Management Centre entitled "Credit for Development".

The following pages are extracted from the Course Programme handed to students on arrival for a course April - May 1981. Notes on the use of the library and a daily timetable of lectures, seminars, discussions, visits etc. have been excluded.

COURSE OBJECTIVES

Staff engaged in the provision and management of credit for development have a particularly onerous task. They need well developed skills in the use of the written and spoken word; a facility with accounts; wide knowledge of the rural, commercial and banking environment; an ability to handle staff and customers effectively and a keen and well developed sense of judgment. Allied to this is a responsibility for bank funds which invariably amount to substantial portfolios spread amongst many hundreds of clients all to be carefully appraised, monitored and controlled if the agency is to operate effectively.

The overall course objective is to help participants become more effective members of their organisations by:

- developing awareness of the role of credit in the development process;
- improving knowledge, skills and judgment in credit appraisal;
- broadening appreciation of the essential policy issues in the provision of agricultural credit;
- emphasising the need for care in human relationships and developing abilities in dealing with clients and staff.

## COURSE PROGRAMME

### The Role of Rural Credit in Economic Development

In these sessions there will be a review of the main social and economic factors, which affect economic development. Following a survey of the contrasting strategies for development, participants will consider such questions as:-

- is there a conflict between government objectives and rural development?
- is a lack of credit a constraint on rural progress?
- are credit agencies contributing effectively to rural development?

All Staff

### Assessing Credit Needs

During this part of the course, we will identify and explore the assistance which credit staff can render to prospective borrowers in assessing the potential costs and benefits of credit use. The viewpoint considered will be that of the borrower rather than the lender, giving emphasis to an exploration of the role of credit in developing rural enterprise. The following topics will be covered:-

- the farmer as resource manager.
- farming systems and farm level planning.
- the farmer's choice of a farming system.
- the farm business environment and credit requirements.
- farm business analysis.
- records and accounts for farm planning.
- partial and whole farm budgeting.
- investment planning.
- balance sheets, profit and loss statements, preparation for loan application.
- introduction to investment appraisal.

T.J. Harding, F.A. Wilson, D.V. Co.

### Practical Loan Appraisal

Credit will be viewed from the lender's angle. These sessions will review the factors making for sound loan appraisal and a number of case studies illustrating different types of loan will be considered. The following will be examined:-

- importance of sound evaluation and the cost of lending.
- information collection and the appraisal of farmer efficiency.
- interpretation of balance sheets and profit statements.
- case studies of seasonal medium and long term loans.

D.V. Coy, F.A. Wilson, T.J. Harding

### Credit Delivery, Administration and Control

The fundamentals of sound credit administration and control will be considered. The different methods of lending, maintenance of adequate supervision and the handling of arrears and defaults will be explored.

- Cost effective loan administration.
- Repayment methods and procedures.
- Constraints on effective delivery.
- Group lending.
- Assessing loan delinquency.

F.A. Wilson, T.J. Harding, D.V. Coy

### Working with People

Someone once defined management as 'getting things done through other people'. While this may not necessarily be true at all times, there is no doubt that the ability to work successfully with other people is a major factor in the effectiveness of a manager. A series of one day workshops spread throughout the course will examine various aspects of working with people. They will allow participants to examine certain behavioural concepts which may be used to interpret and understand the relationships and behaviour patterns that exist within an organisation.

The areas covered will include perception, communication, roles, leadership and motivation.

In an optional exercise using audio-visual equipment, course participants will be given the opportunity to develop their interviewing abilities.

J.L. Marjoribanks, N.P.S. Hetherington

### Managerial Work

Many contemporary writers continue to define managerial work as the process of Planning, Organising, Command, Co-ordination and Control, and so forget or do not even know that Professor Carlson in 1951 so sensibly wrote that

"... concepts like planning, co-ordination and control are of very limited use when we want to describe in an observational study the daily work and actual patterns of behaviour of managing ... most of the concepts do not fulfill the qualification of operational concepts that they should be synonymous with a clearly defined set of operations ... if we ask a manager when he is co-ordinating, or how much co-ordination he has been doing during the day he would not know, and even the most highly skilled observer would not know either. The same holds true of the concepts of planning, command, organisation and control ....."

This group project is designed to help you take a fresh look at the fascinating concept of managerial work and to offer ideas and approaches that enable you to reappraise how effectively you work.

F.N. Youdale

### The Implications of Credit Policy

#### ADBANK

ADBANK is an experiential management game designed to develop an awareness of the full implications of various aspects of credit policy. Participants are required to develop an operational statement for a newly constituted Agricultural Development Bank in a developing country. Policy aspects requiring decision and justification include interest subsidies, eligibility and security, repayment scheduling and the handling of loan default, delivery systems and channels of credit distribution.

T.J. Harding and Staff

### Management Study Groups

A small group of course members work with one tutor throughout the course. The purpose of the group is:

- (i) to provide opportunity for the group, either individually or collectively to review course work so that learning might be enhanced; and
- (ii) to enable the group to explore further aspects of credit and management which are mutually agreed. The individual course member can pursue an area of study of direct interest to him or herself.

### Visits and Visiting Speaker

The visit and visiting speaker will focus the attention of the course on the role credit plays in the rural and economic development of Swaziland. The visit will be to the Swaziland Development and Savings Bank (Swazibank) and course members will be able to discuss with senior officials in the Head Office and also visit a rural branch.

Mr. Fion de Vletter, Senior Lecturer in Economics at the University of Botswana and Swaziland has agreed to be our visiting speaker. Mr de Vletter has undertaken research on the economic development of Swazila and will provide us with an insight of the progress made and the role credit has played in rural development.

## Mananga Agricultural Management Centre

### Teaching Staff

F.N. Youdale, B.Sc. (London), D.M.S., M.B.I.M. Principal

Development Chemist and Plant Manager, Albright and Wilson Ltd. UK 1958-64; Manager, Process Investigation Section, Agricultural Division, Imperial Chemical Industries UK 1964-66; Part-time tutor in Management studies, Constantative Technical College UK 1965-66; Assistant Works Manager, Berks Ltd. UK 1967-68; Senior Lecturer in Management Studies, University of Malawi 1968-71; appointed to MAMC in 1972, Deputy Principal 1976 - August 1980 when he was appointed Principal

D.C. Marshall, M.Sc. (Manchester), C.D.A., Cert. Educ. (Birmingham), M.I.T.D., Director of Studies and Senior Lecturer.

Farm Manager, Chipembi Training Farm, Zambia 1960-64; Principal, Chipembi Farm College, Zambia 1964-68; Rural Studies Teacher UK 1968-69; Chief Training Officer, Ministry of Rural Development, Zambia 1969-75; appointed to MAMC in 1975, Lecturer until August 1980 when he was appointed Senior Lecturer and Director of Studies.

D.V. Coy, B.A. (Nottingham), A.C.M.A., A.C.I.S., Cert. Educ. Senior Lecturer

Voluntary Service Overseas, Sierra Leone 1963-64; Further Education Lecturer UK 1964-70; Lecturer in Economics, Evelyn Home College, Zambia 1970-73; Accountant, Zambia Sugar Co. Ltd. 1973-75; appointed to MAMC in 1976, Lecturer until August 1980 when he was appointed Senior Lecturer.

J.L. Marjoribanks, B.A. (Cantab), Lecturer

Development Officer, Scottish Agricultural Industries Ltd. UK 1965-73; Extension Training Officer, Ministry of Rural Development, Zambia 1973-78; appointed to MAMC in 1979.

T.J. Harding, B.A. (Nottingham), Lecturer

Project Economist, (Nigeria), Agricultural Planning Associates 1974-75; Agricultural Economist (Nigeria, S. America, Sudan), W.S. Atkins and Partners, Consulting Engineers 1975-77; Project Economist (Iran, Kenya, Belize, W. Indies, Sudan) U.L.G. Consultants Ltd. 1977-79; appointed to MAMC in 1979.

N.D.S. Hetherington, N.B.A, C.D.A., C. & G., Lecturer

Manager, Animal Nutrition Experimental Farm UK 1961-62; Assistant Agricultural Officer and Planning Officer, Department of Agriculture, Uganda 1962-67; Manager, Coffee Pulping and Coffee Estate, Uganda 1967-69; Field Crops Adviser and Assistant Development Manager, Birds Eye Foods (Unilever) UK 1969-77; Development Manager and Estate Manager, Oil Palm, Unilever, Ghana and Cameroon 1977-80; appointed to MAMC in 1980.

Estimates of CostA9.1 Direct costs of three courses for 1982 programme

Details of costs (taken from the MAMC revised estimated for 1981 dated 1 June 1981) are given below of the three residential courses currently operated at MAMC. Apportionment of costs has been based on a basic student week cost at MAMC for 1982 of E528.9 per week.

Item of Cost	Senior 5 weeks	Middle/Senior 11 weeks	Special/ Credit 6 weeks
Tuition - 5 lecturers, support staff; supervision and planning by Principal; includes preparation, teaching material, teaching and tutorials	47,582	104,681	57,099
Stationery, text-books (individual issue), educational material	4,060	8,932	4,872
Accommodation in single study bedrooms, social facilities, domestic services - laundry, food preparation, cleaning	13,790	30,338	16,548
Food and domestic supplies	8,365	18,403	10,038
Local transport; to and from airport, training and amenity visits	7,840	17,240	9,403
Campus services; electricity, fuel and water	7,787	17,132	9,345
Administration - international and local travel, recruitment and enrolment, evaluation of training and issue of reports, general administration - postage, telex, telephone	14,857	32,686	17,629
Miscellaneous; insurances, medical care	3,465	7,623	4,158
Visiting lecturers - fees and travel	11,500	-	14,950
<b>Total</b>	<b>119,246</b>	<b>237, 043</b>	<b>144,247</b>

### A9.2 Students' Travel

Estimates of cost under this head are made on the basis that:

- i) travel in every case is from the capital city to Manzini;
- ii) travel is by air with no intermediate overnight stops.

Cost of travel from Manzini Airport in Swaziland to MAMC by road is covered in paragraph A9.1 above.

	E
From Tanzania	700
Zambia	385
Malawi	330
Zimbabwe	325
Botswana	225
Lesotho	200
Swaziland	-
Angola	730
Mozambique	80
Average cost	330
1982 cost	34,200

### A9.3 Other Costs

Student's allowance. Presently set (EDF, British Council and CFTC) at E17 per student per week.

1982 cost would be E15,480

Staff travel in region for consultation - see paragraphs

1982 cost would be E12,550

#### A9.4 Total Costs of 1982

Cost per person attending above courses at a total course occupancy of 35.

Senior 5 week (SM)	Middle/Senior 11 week (PC)	Special 6 week (CD)
E3,400	F6,770	E4,121

With an allocation of 18 places per course to SADCC countries (see paragraphs ) and a MAMC annual programme of 1 senior, 3 middle senior and 1 special/credit.

Total annual costs for 1982 would be :

Senior SM	61,200
3 x middle/senior PC	365,580
Special CD	74,180
staff travel in region for consultation	12,550
Student travel	34,200
Student allowance	15,480
	<u>563,190</u>

A9.5 Total Project Costs over the period 1982 - 86

	1982	1983	1984	1985	1986	Total
Senior (SM) 5 week	61,200	79,380	80,937	93,077	107,039	412,633
Middle/Senior (PC) 3 x 11 week	365,580	420,417	483,479	556,001	639,401	2467,878
Special (CD) 6 week	74,180	85,307	98,103	112,818	129,741	500,149
Staff travel in region for Consultation	12,550	14,432	16,597	19,987	21,950	84,616
Students Travel	34,200	39,330	45,229	52,014	59,816	230,589
Students Allowance	15,480	17,602	20,472	23,543	29,074	104,372
<b>Total</b>	<b>563,190</b>	<b>647,668</b>	<b>744,817</b>	<b>856,540</b>	<b>985,021</b>	<b>3,797,227</b>

Zambia Air Services Training Institute (ZASTI)

1. General

The Institute operates under the Department of Technical Education and Vocational Training, Government of the Republic of Zambia (GRZ). ZASTI was established in 1965 and has grown steadily over the 15 years until at the present time the total value of its facilities is about K3,000,000 (US\$4,500,000). Teaching staff totals 35, and there are 100 support staff - technicians, administrators etc. Teaching workshops and classrooms have been purpose-built on a spacious site adjacent to Lusaka International Airport. It has a maximum capacity to accommodate 140 students in double rooms. Usually there are fewer students in residence, and many rooms are used as single rooms. Additional students could thus be accommodated at once, but in the longer run extra accommodation for about 50 students would need to be provided. GRZ has always made available 5% of the places for students from outside Zambia. In view of the potential of ZASTI for training students from all SADC countries, GRZ should be requested to revise this figure upwards. To enable an increased intake in the next year or so, as an interim measure a moderate capital expenditure is required, and is discussed below. Additional running costs could be met by students fees, and these should be set after consideration by ZASTI and the Department of Technical Education and Vocational Training. In the short term the intake of students from outside Zambia could probably number about 60 per annum on a range of courses. In the near future one or more consultants should be appointed to assess accurately the number of students in various categories who require air services training over the next 10 years in the nine SADC countries. Based on this information the facilities at ZASTI should be built up to serve the training needs of the region.

2. Flying School

The course for Commercial Pilots Licence, Twin and Instrument Rating currently runs for 18-24 months according to the ability of the trainee. With an increase of two single engine aircraft (in addition to the existing four) and of one twin engine aircraft (in addition to the existing one) the training capacity of this course could be doubled, to 24. Additional instructors are available, and are already budgeted for in 1981. The existing maintenance facilities could cope with the additional aircraft.

### 3. Air Traffic Control (ATC)

On three courses held each year, an additional 6 places can be made available in 1981 at no extra capital cost. Demand for these courses within Zambia is now falling, since the peak demand is now passed, and additional places in 1982 and subsequently can be made available. The three courses are:

ATC Assistant/Induction course	1½ months
ATC Basic/Aerodrome course	9 months
ATC Approach/Area Control course	2 months

### 4. Meteorology School

Currently one 6 month course for Meteorological Assistants is given each year for 12 students. This throughput could be doubled, to make an additional 12 places available each year. In addition, 3 month refresher courses can be given. No extra equipment would be required.

### 5. Aeronautical Telecommunications Operators

Three courses are provided of 6, 3 and 2 months duration, currently normally attended by 8 students each. This attendance could be increased by 50%, thus providing an additional 12 places spread over three courses each year. These extra numbers could be catered for with additional equipment (teleprinters, and associated typewriters) which has been already requested but not yet supplied. Two extra two extra teaching staff would be required.

### 6. Engineering School

(a) It should be noted that after qualifying from the course on Aircraft Maintenance Engineering, a "type-rating" licence would be required in addition to the basic licence acquired at ZASTI. (This takes a further 6-12 months according to type.) The course at ZASTI takes 3 years, and two courses each with 16 students run concurrently. A third course could be started, thus making another 16 places available (i.e. equivalent to an annual intake of 5). For the most part, equipment now available would suffice, but some additional items would be required, and some strengthening of teaching staff would be desirable.

(b) In Aeronautical Electronics Engineering, one course is run, with 16 participants, and lasts for 3 years. Starting in 1981, a second course of 16 could be mounted. ZASTI has recently started three new courses on Instrument Landing Systems, VHF/OMNI Range, and Distance Measuring Equipment each of two months duration. It is likely that up to 2 places could be made available on each for SADCC nominees. Arrangements are currently being completed for a 3 month course on Airborne Radio, and up to 2 places could be made available. These extra places would not call for additional equipment or instructors.

7. Rescue Fire Services School

The basic course is for 4 months, and 12 students are enrolled. Three subsequent courses of 4, 3 and 2 months duration take 8 students each, and are required for promotion in the fire services. With a very moderate amount of extra equipment and two more instructors the throughput could be doubled i.e. an extra 36 students annually.

8. Additional Courses

The facilities exist for training flying instructors, and could be brought into use at short notice if required. As a long term project, facilities are being prepared for training for Airline Transport Pilot Licence, and is expected to be operative in 1981. Flying Operations (i.e. the general management of Air Traffic) is an important part of training in air services. This is not currently available at ZASTI and consideration should be given to providing it as a matter of urgency. (Currently GRZ sends its nationals to Beirut for this training.)

9. Additional Capital Expenditure

Preliminary consideration suggests that the following capital expenditure would be required if the increased number suggested above are to be trained.

(a) Student accommodation	K 70,000	
(b) 2 single engine aircraft ) 1 twin engine aircraft ) plus spares	K200,000	
(c) Engineering workshop equipment	K100,000	
(d) Telecommunication equipment	K 20,000	
(e) Fire Services equipment	K 50,000	
(f) Staff housing and furniture (NB: rent would be charged for this accommodation)	K225,000	
(g) Office accommodation and miscellaneous	K 50,000	
	<u>K715,000</u>	= US\$1,072,000
	<u><u>K715,000</u></u>	