Analysis of Vocational Education and Training

Kenya

Lyanne Woltjer

March 2006

Kenya

General

In the Republic of Kenya live about 33.850.000 people. 45 % of these people are Protestant, 33 % is Roman Catholic, 10 % of the people have indigenous beliefs and the remaining 12 % is Muslim or other.

Table: Age categories population Kenya

under 15 years	42,5 %
between 15 and 65 years	55,2 %
Over 65 years	2,3 %

Source: CIA, 2006

Kenya has a young population with almost half of the people are below 20 years. The growth rate of 2,56 % is very high and can (partly) be explained by the young population and low information on family planning.

Economy

US$ 450 (2003)
Of the labour force of 11,85 million, 40 % is unemployed (4.740.000 people) (CIA, 2006)

	GDP	Workforce	
Agriculture	16,3 %	75 %	Tea, coffee, corn, wheat, sugarcane, fruit, vegetables; dairy products, beef, pork, poultry, eggs
Industry	18,8 %		small-scale consumer goods (plastic, furniture, batteries, textiles, soap, cigarettes, flour), agricultural products; oil refining, aluminium, steel, lead, cement; commercial ship repair, tourism
Trade and service	65,1 %		

CIA, 2006

In Kenya, the labour force was estimated to be 11.5 million in 1996. Between 1986 and 1996, the average growth rate in the labour force was 4.1% per year. The growth in employment required to absorb this growing labour force is about 492,000 new jobs annually. Yet employment increased only between 2 and 2.5% annually from 1986 to 1995. As a result, more than two million Kenyans were unemployed, and even among those counted as employed, a significant proportion was underemployed particularly in small-scale agriculture and the informal sector in both rural and urban areas. Unemployment in Kenya has therefore become a serious problem. Average unemployment is currently 23%, and is even higher for youth that drop out of school and for women, averaging 25% in both cases. The small-scale agricultural sector is the single largest source of employment in Kenya, absorbing 51% of the labour force. The urban informal sector is the next largest source of employment, comprising over 10% of the labour force, followed by the urban formal sector, at 7% in 1994.
The recent African Growth and Opportunities Act (AGOA) enacted by the government of the United States has led to increases in employment especially in the textile industry. It is estimated that between October 2000 to December 2001 two hundred thousands jobs will have been created (200,000). However, the government of Kenya is struggling to

meet the conditions of AGOA especially in labour standards and good governance. Moreover, AGOA does not promote quality employment and the conditions in AGOA industries resemble those in the export-processing zones (EPZs). The National Rainbow alliance government NARC promised to create 500,000 jobs annually starting 2003. In the first quarter of 2003, 7,000 jobs have been created under the AGOA (COTUK, 2003).

Education

85, 1 % of the total population is literate (male: 90.6%, female: 79.7%) (CIA, 2006)
Over the past three decades, Kenya has experienced a relatively steady growth in the provision of education. This has largely been due to the absence of political instability, continued financial support from the international community, governments' efforts and parents' determination (Kerre, 1997).

	Number	Enrolment
Nursery school	NA	1 million
Primary school	15.000	6 million
Secondary school	2.700	650.000
University	6	40.000

(Kerre, 1997)

Kenyan education is based on an 8-4-4 system: eight years in primary school, four years in secondary and four in tertiary education. The majority of poor Kenyans do not get beyond primary school. The National Curriculum has been in place for some time and is heavily influenced by the British system. The first national exam is the KCPE (Kenya Certificate of Primary Education), which is taken at the end of Standard 8, the last year of primary school. This is an extremely important exam, since the marks gained determine the type of school which a pupil can go on to (http://www.hsk.org.uk/issues.htm). .

Secondary education is extremely expensive and only the better off can afford to move into Form 1. As in primary education the standard of schools varies enormously, from the well-funded and equipped national and provincial schools to the desperately under-equipped and under-staffed harambee (self help spirit) schools (http://www.hsk.org.uk/issues.htm).

Kenyan textbooks are very good - in many cases better than their English equivalents since they are designed for use by less educated teachers. But they are comparatively expensive, and consequently nearly all harambee schools have either none at all or a very small number. The vast majority of children cannot afford to buy their own textbooks (http://www.hsk.org.uk/issues.htm).

There are 6 public universities that have been granted a royal charter by the Commission for Higher Education (CHE) (some of them with constituent colleges), 5 private institutions with a charter (fully accredited), 3 private universities with a letter of Interim Authority, and 6 private institutions without a charter. Universities are autonomous. All administrative functions are independently managed through university councils. Though autonomous, universities receive funding from the Ministry of Education. Alongside these universities, there are 9 private institutions, without a charter, offering degree courses in Kenya. All of them, except the United States International University, are theologically oriented. These universities are advised by the

CHE to diversify their curricula to meet the needs of Kenyan society. They raise funds from their own sources and do not receive any grants from the State. Apart from the universities, there are a number of post-secondary institutions offering training at diploma and certificate levels. In the field of teacher training, these include six diploma colleges for the training of non-graduate secondary school teachers, and 20 teacher training colleges for primary school teachers. For technical education they include 4 national polytechnics, 17 institutes of technology and 20 technical training institutes. In addition to these, a number of government ministries also offer 3 years' professional training at diploma level for their middle-level manpower requirements (http://www.kie.go.ke/education in kenya.html#secondary).

The current graduates from the primary level of education have averaged more than 600,000 every year in recent times. Out of these only 55 percent or 350,000 primary school leavers proceed to secondary schools. The rest (about 300,000) either join the youth polytechnics or the informal sector, with the majority left without opportunities for further education advancement. At the end of the secondary education cycle, about 20,000 join universities while the rest estimated at 200,000 are catered for by the middle level colleges. The existing capacity and capability in the middle level colleges (both private and public) and youth polytechnics are inadequate to absorb the remaining KCPE and KCSE graduates estimated at 300,000 and 200,000 respectively.
This is a target group whose skills development will have to be enhanced through a well harmonised, flexible and demand driven TIVET system in order to ensure that they contribute meaningfully to economic development. The implementation of FPE has resulted in a larger number of KCPE graduates moving to the TIVET system therefore exerting pressure on the existing facilities and structures.
In spite of the enormous gains made in the development of TIVET over the last 40 years, the growth of this sub-sector has been rather haphazard and uncoordinated due to lack of a unified policy and legal provisions. This has resulted in ineffective co-ordination of training policies, disparities in training standards, and the disproportionate production of skilled personnel in the economy, which has also been aggravated by inadequate funding of the sub sector (Ministry of Education Science and Technology, 2005).

Vocational Education and training

How is VET defined?	" a comprehensive term referring to those aspects of educational process involving, in addition to general education, the study of technologies and related sciences, and the acquisition of practical skills, attitudes, understanding and knowledge relating to occupation in various sectors of economic and social life. It applies to all forms of technical and vocational education provided in educational institutions or through cooperative programs organized jointly by educational institutions at one hand, and industrial, agricultural, commercial and any other undertaking related to the world of work, on the other."
Formal, informal and non formal? Does it include training on the job?	See below
% youngsters in vocational education and training, regional differences	At the end of the secondary education cycle, about 20,000 join universities while the rest estimated at 200,000 are catered for by the middle level colleges.

	The existing capacity and capability in the middle level colleges (both private and public) and youth polytechnics are inadequate to absorb the remaining KCPE and KCSE graduates estimated at 300,000 and 200,000 respectively.
Share of flow from regular education to vocational education and training	Idem
Gender ratio in VET on national level, regional differences	Despite the fact that women are numerically balanced in the general population and enrolment in TVET, they are still largely found in stereotyped courses such as dressmaking, home economics, hair dressing etc (Kerre, 1997).
Which institutions pay attention to VET?	Primary and secondary schools, national and youth polytechnics, technical training institutions, NGOs churches, individual proprietors, enterprises.
In which regions are they active, share urban / rural?	

The government and the public at large have recognised the important role that technical and vocational education and training can play in development. In Kenya, youth polytechnics (YP) are the major institutions currently targeting the primary school leavers who average 250.000 each year, about 70 % of primary school leavers who do not pursue secondary education (Kerre, 1997).

The total enrolment in TIVET institutions has increased, and stood at 79000 in 2003. Female enrolment constitutes 44 %, but there exist serious gender disparities in terms of the overall enrolments and registration in science and technical areas. The bulk of female students (54,2 %) are enrolled in business studies compared to less than 5 percent registered in engineering courses. The Kenya polytechnic recorded the highest enrolment of women students at 4562 (Ministry of Education, Science and Technology, 2003).

In Kenya TVET is delivered through 3 major systems: formal, non-formal and informal systems.

Formal TVET

In the formal system two major delivery patterns are evident: one is the introduction of TVE in the school curriculum at both primary and secondary level. At primary level, tvet subjects are: agriculture, art and design, drawing and design, business education, building construction, electricity / electronics, metalwork power mechanics and woodwork. In this case, TVE is the responsibility of the Ministry of Education.
The second major pattern is delivered in post school institutions. These include:

- 650 youth polytechnics, catering over 40.000 students most of whom are primary school leavers.
- 17 technical training institutions and 21 institutes of technology with a population of about 10000 students mainly secondary school graduates and offering craft and technician programmes
- three national polytechnics with slightly over 10000 students mostly secondary and higher level students and offering diploma certificate in various technical disciplines

- several vocational training institutions attached to government ministries and parastatal organisations offering a wide range of programmes from artisan to diploma levels.

Non formal TVET

Besides the formal TVET system, Kenya has a non formal network of TVET institutions run by NGOs, churches and individual proprietors. They offer various courses such as tailoring, bakery, metal fabrication etc. to specific target groups such as women groups, girls, street children and handicapped.

Informal TVET

Recently, much interest has been expressed by individuals and community groups who week to participate in income generating activities in the informal sector. A major activity in this area has been the apprenticeships taken by youth with experienced artisans in various trades. Community groups and individuals have also been targets for support of NGOs in acquiring specific skills to operate small enterprises.

At the moment [1997], Kenya has no programme through long distance learning (Kerre, 1997).

Kenya faces major challenges in the development and implementation of TVET. These include: economic decline, declining enrolments, lack of trained teachers and trainers, low status syndrome and more recently, the changing needs of society and the work place. A major fear has been expressed by experts that TVET is still traditional in content and at most irrelevant to modern societal needs (Kerre, 1997).

Due to the limited places available in TIVET institutions, only a small proportion of eligible school leavers are absorbed. Every year, 55 percent of those graduating from the primary school level join technical institution, while the balance join the labour market directly, there is need to target this group for skills development through TIVET institutions as these have the potential to create the critical human resource needed for technological transformation of the country.

For many trainees TIVET programmes is terminal. It is imperative therefore that the existing education structure is reviewed in order to establish opportunities that link TIVET programmes with programmes at higher levels of education and training. This will have the potential of enhancing training and the attractiveness of the TIVET programme to learners and parents who consider TIVET as sub standard (Ministry of Education, Science and Technology, 2003).

The lower status still ascribed to TVET and the high cost associated with TVET programmes have pushed enrolments towards service oriented theoretical programmes. It is cheaper to mount training courses in accounts and secretarial studies than putting up workshops and equipping them for technical subjects.

To address the problems of TVET, the Government has initiated TIVET reforms.
The reform started with rapid appraisal of TIVET system, which was followed by a validation workshop of key stakeholders who adopted the findings and 214 recommendations of the rapid appraisal team.
A national symposium was held in November 2003 involving all stakeholders. The objective of the symposium was to review TIVET status in Kenya and build a consensus

amongst stakeholders on the strategies for the reform process. The symposium came up with the following recommendations;

- Establishment of a National Training Authority to oversee the development and co-ordination of TIVET.
- Development of National Skills Training Strategy.
- Establishment of a programme to enhance access and equity for people with special needs at all levels of TIVET.
- Provision of incentives to encourage industry's participation in financing of skills training.
- Identification and development of TIVET's centres of excellence for nurturing creativity and innovation.
- Harmonization of the schemes of service for all cadres of trainers in TIVET institutions.
- Establishment of a national technology diffusion and training fund to facilitate generation and dissemination of appropriate technologies and skills.

(Ministry of Education, 2005)

The heterogeneity of the informal sector is a major constraint as well, as the concept gives rise to different interpretations and hence the difficulty in estimating its potential for training and employment opportunities (Kerre, 1997)

Policy and organisation of VET

Overall, the management of Technical Industrial, Vocational and Entrepreneurship Training (TIVET) is spread over 10 ministries, which makes coordination of their activities and maintenance of the training standards difficult. The supervision of most of these institutions is left to individual ministries and privaet sector that often lack the capacity to assure quality and high standards of training (Ministry of Education, science and technology, 2003).

The Ministry of Research, Technical Training and Technology was established in 1988 to coordinate vocational training as well as the development of the Jua Kali (Informal) sector (Kerre, 1997).
The overall government policy on TIVET as articulated in NARC's manifesto and more recently the draft Sessional Paper No.1 of 2005 is to enhance skills development and critical stock of human resource. The aim of public investment in this sub-sector is therefore to enhance skills development for increased productivity in order to stimulate economic growth and employment creation (Ministry of Education, 2005).

The main goals on VET in national policy

1. To provide increased training opportunities for school leavers that will enable them to be self-supporting.
2. To develop practical skills and attitudes, which will lead to income earning activities in the urban and rural areas.
3. To provide technical knowledge and vocational skills necessary for manpower development.
4. To produce skilled Artisans, Craftsmen, Technicians and Technologies for both formal and informal sectors.

In order to address the above challenges, the Government will:

1. Involve relevant stakeholders in the development of a comprehensive national skills training strategy;
2. Devise mechanisms and apply appropriate incentives to promote private sector investment in the development of TIVET through research, training and joint projects.
3. Provide scholarships and other merit awards for staff and students in order to promote excellence in creativity and innovation in the field of science and technology;
4. Provide loans and bursaries to enhance access to TIVET taking special account of marginalized groups, such as female students and, physically handicapped;
5. Absorb into MOES&T and rationalize youth polytechnics in order to make them appropriately staffed and equipped to provide credible TIVET programmes; and
6. Rehabilitate facilities in public TIVET institutions to ensure quality training.
7. Provide an alternative path for accessing higher education and training upto degree level;
8. Create opportunities for national polytechnics to offer degree level qualifications while retaining their present mandates;
9. Establish a national TIVET authority to oversee the national skills training system;
10. Collaborate with stakeholders to create necessary linkages and credit transfers between tertiary institutions and with universities;
11. Review the current training delivery mechanisms to include mandatory on-job training to enhance quality and relevance of training as part of the academic programme;
12. Continuously take stock of the existing and anticipated demands for skilled labour in the short term and long term so as to ensure the provision relevant training;
13. Utilize secondary schools with facilities for industrial arts to offer secondary technical education curriculum in order to prepare the form four graduates for careers in TIVET;
14. Provide mechanisms for linkages and credit transfers to facilitate horizontal and vertical mobility;
15. Undertake regular labour market skills survey and training needs assessment in collaboration with the industry in order to develop manpower development plans and provide appropriate feedback into curricula design and development;

Ministry of Education, 2005

The government has created several programmes to improve the quality and quantity of TVET. They are mentioned in the Kenya Education Sector Support Programme 2005 – 2010:

- Development National Skills Training Strategy
- Enhancing Transition from Primary to Technical, Industrial, Vocational and Entrepreneurship Training
- Establishing Centres of Excellence for Technical, Industrial, Vocational and Entrepreneurship Training
- Skills Enhancement for Automation and Computer Integration in Industry
- Technical, Industrial, Vocational and Entrepreneurship Training Bursary

Ministry of Education, 2005

Relation government and trade and industry (private) companies in VET

The recognition of the important role that TVE plays in the nation's development has been echoed in several Government sessional papers in Kenya. The only existing legal frameworks within which industry participates in technical and vocational education and training are the Industrial Training act (1971) and the Education Act (1980). Since there is no legal provision to guide TVE institutions and enterprises in their cooperation, a common practice is where individual TVE institutions approach individual enterprises, and mutually agree on some formula of cooperation where students are placed on what is commonly known as industrial attachment. The duration of attachment varies from short periods of three months to six months and up to one year (Kerre, 1999).
There are some constraints in bringing together TVET institutions and industry for the production of qualified manpower. There is, at first, a reluctance of enterprises in cooperating. Only medium and large scale enterprises have some interest in training, but this interest is decreasing. Training is expensive and most enterprises are avoiding as many costs as possible. Enterprises do not seem to be aware of the benefits of the trainees, even not aware of the donations and input in terms of scholarships, equipment and latest technology demonstrations. There is a lack of effective industrial attachment management, no coordination and programmes (Kerre, 1999).

One of the plans for Kenya is the creation of industrial incubators, because Kenya is trying to get the industrialised country status in 2010. This programme has the following objective:
"To create industrial incubators in order to inspire and enable TIVET graduates set up small innovative growth oriented business enterprises for self-employment and enhance transfer of technology for industrial development." (Ministry of Education, 2005)

Higher education training in industry
A number of government Ministries offer three years' professional training at diploma level for their middle-level manpower requirements.
(http://www.kie.go.ke/education%20in%20kenya.html#teacher).

Relation between governmental and private initiatives on VET

NA

International donors / INGOs involved in VET

Generally, vocational training and various informal sector activities targeted at increasing opportunities for youth employment have had considerable support from the government, both local and foreign donor agencies and particularly the World Bank, ILO and UNDP (Kerre, 1997).

Donor support to the Kenyan education system is currently informed by the policy provisions and priorities contained in the Education Sector Strategic Plan (ESSP). The principal development partners, their areas of assistance and levels of assistance are summed up in the following table:

Table 2.2 Current Major Donor Support to Education

Donor	Area of Intervention	Funding
DFID	Grant for FPE	KES 1.6 billion
World Bank	Grant for FPE	USD 50 million
SIDA	Grant for FPE	KES 400 million
UNICEF	Grant for FPE	USD 2.5 million
JICA	Secondary Teacher Training	USD 30 million
UNICEF	Youth and HIV/AIDS	USD 10.9 million
OPEC Fund	School Improvement Prim/Sec	USD 15 million
World Bank	Prim/Sec Schooling	USD 40 million

Networks around VET

NA

Are there examples known of successful and unsuccessful networks?

NA

(New) initiatives / intentions from the trade and industry (private) sector around VET

National policy frameworks have been introduced to promote TVET and the development of the informal sector. Of particular interest have been the introduction of entrepreneurship education in all TVET programmes and the availability of credit facilities to potential entrepreneurs to start up or improve on their business. Today, more youth are looking forward to and getting into self employment rather than looking around for salaried employment.
Another notable innovation has been the introduction of production units in most vocational training institutions (VTIS). With declining government financial support, several institutions are offering products and services needed in the immediate environment. Such production units as furniture production, metal fabrication, bakery, water pump production, farming and horticulture, are a common find.
Collaboration between technological institutions and the Jua Kali (informal) sector has been encouraged. Several hundreds of artisans in this sector have benefited from short courses and workshops conducted at the Jomo Keyatta University of Agriculture and Technology, Egerton University and Eldoret Polytechnic amongst others (Kerre, 1997).

Education of teachers

Training of secondary school teachers
Training of secondary school teachers is carried out at two levels. In universities, graduate teachers are trained in four years for the Bachelor of Education Degree (BEd). Graduates holding a BA, BSc or BCom take a one-year post-graduate diploma course in education. Teachers are also trained at two diploma colleges. The three-year course leads to a Diploma in education. Kenyatta University is a major teacher training institution. It has begun an in-service post-graduate diploma programme.

Training of higher education teachers

There is no formal training for higher education teachers who wish to teach in universities. Candidates must hold a first class or upper second class Honours Degree, followed by a Master's Degree (http://www.kie.go.ke/education%20in%20kenya.html#teacher).

VET specialisations

At primary level (Formal TVET), tvet subjects are: agriculture, art and design, drawing and design, business education, building construction, electricity / electronics, metalwork power mechanics and woodwork.
Besides the formal TVET system, Kenya has a non formal network of TVET institutions run by NGOs, churches and individual proprietors. They offer various courses such as tailoring, bakery, metal fabrication etc. to specific target groups such as women groups, girls, street children and handicapped.
In the informal sector, a major activity has been the apprenticeships taken by youth with experienced artisans in various trades (Kerre, 1997).

Strengths and weaknesses

Strengths	***weaknesses***
There is a strong call from society for a qualitatively strong TVET system. There is a call by students, parents and employers.	There is a meagre policy framework for the cooperation between industry and TVE institutions.
It is widely recognised by government, employers and students that TVET institutions and industry have to cooperate.	Inflexible and outdated TIVET curriculum.
TVE has developed rapidly in response to the demand of skilled manpower in the work force and the need to prepare youth for the world of work.	Mismatch between the skills learned and the skills demanded by industries
	Inadequate mechanism for quality assurance.
	Inadequate physical facilities for training coupled with lack of sufficient modern equipment.
	Expensive training materials and textbooks
	Low participation of private sector in the curriculum design and development

The technical training institutes currently offering courses in industrial training fields are staffed by qualified trainers, but are seriously lacking in modern equipment and learning materials. However, improvements in the economy are likely to lead to a revitalisation of the informal sector, and the youth polytechnics will be well-placed to contribute to the generation of a wide range of required skills. In order to play such a role, significant and well-targeted assistance will need to be provided to the polytechnics. To face up to the evident quality and relevance problems affecting TVET programmes, a proposal has been prepared by the TVET department in the MOEST for development of a *National Training Strategy.* The proposal calls for an 18- month development process involving all TVET stakeholders in a participatory effort to reform TVET and improve its quality, relevance and efficiency. The contribution of the proposed project will be central to the implementation of this national exercise (ADF, 2003).

Information sources available

- CIA, worldfactbook, 2006
- Ministerie Buitenlandse Zaken, country information, 2006
- Kerre, B. (1997) TVE for rural development: the case of Kenya, UNESCO Unevoc
- Kerre, B. (1999) African experiences, Kenya: Cooperation in Technical and Vocational Education
- Ministry of Education Science and Technology (2005) Kenya Education Sector Support Programme 2005 – 2010
- ADF (2003) Republic of Kenya, education III project – strengthening and expanding access to appropriate secondary education and skills acquisition
- COTUK, 2003, Highlights of Current Labor Market Conditions in Kenya, Global Policy Network

oMinistry of Education, Science and Technology (2003) Development of education in Kenya

Appendix 1 Logframe TVET Ministry of Education, 2005

TIVET LOGFRAME

Narrative Summary	Performance Indicators	Means of Verification	Critical assumptions
Goal: Improve access, quality and relevance of TIVET.	• Improved student learning achievement • Improved labour market performance of graduates	• Labour market data • Tracking survey	• Legal framework governing TIVET put in place • Education Act revised • Availability of adequate funding by GOVERNMENT and development partners
Development Objective: To develop a flexible and demand driven TIVET system that provides skill development opportunities to KCPE/KCSE graduates.	• Employability and labour market performance of TIVET graduates improved • Increased enrolment to 180,000	• Enrolment Data from training institutions • Labour market survey	• Industry and private sector participation
Outputs Output 1: Harmonized and enhanced TIVET SYSTEM	• Legal framework developed • TIVET authority established • Qualification framework and credit transfer system established	• TIVET Act • National Training strategies documented	• Timely cabinet approval and parliamentary enactment
Output 2: Transition from primary to TIVET enhanced.	Training opportunities for KCPE graduates increased to TIVET	• Enrolment Data • Survey reports	• Harmonized coordination of youth polytechnic programmes
Output 3: Access to and quality of TIVET enhanced.	• Enrolment increased in NPs, TTIs and ITS to over 60,000 students • 90 programmes revised/ modularized • 10 Degree programmes established in National Polytechnics	• Evaluation reports • Staff returns • Progress reports • Syllabi documents • Accreditation documents for degree	• Acceptance by BOG • Enabling environment created

Narrative Summary	Performance Indicators	Means of Verification	Critical assumptions
Output 4: Skills for computer automation and interaction enhanced.	• Ratio of 15 students per computer attained in TIVET institution • Distance learning programmes established • Management information system established in TIVET institution covered • 200 trainers trained in automation technologies	• Survey reports • Progress reports • Contract documents • Utility bills	• Availability of power and telephone services in TIVET institutions
Output 5: Bursary awards programme started.	• 2800 students receiving bursaries per year	• List of recipients • Survey reports • Progress reports	• Positive response by targeted communities • Availability of favourable environment for learners with special needs.
Output 6: Industrial incubators created.	• 5 industrial incubators established and equipped • 100 youth benefiting from from loan programme in the first year • 20 technology managers trained in the first year • At least one technology congress held every year • 100 merit awards and scholarships allocated to top students in the first year.	• Evaluation reports • Trade licenses • Awards and prizes • Loan records • Merit list	• Support from private sector • Support of BOG
Activities: 1.1 Development of National Training Strategy.	• Legal framework developed • TIVET Authority established. • Qualification framework and credit transfer system established.	• TIVET Act • NTS document	Timely Cabinet approval and parliamentary enactment
2.1 Baseline study on youth polytechnic.	A baseline report	The Baseline report.	Timely release of GOVERNMENT and donor support.

Narrative Summary	Performance Indicators	Means of Verification	Critical assumptions
2.2 Infrastructure improvement for youth polytechnics.	Infrastructure developed in 600 youth polytechnics	Survey Reports	
2.3 Upgrading of equipment in the TIVET institutions.	600 youth polytechnic equipped.	• Progress report	
2.4 Development of Teaching and learning resources.	Youth learning and teaching resources developed.	Enrolment data	
2.5 In-servicing of youth polytechnic staff.	600 youth polytechnic teachers trained each year.	• Evaluation reports	
3.1 Curriculum development for youth polytechnics.	Existing syllabi updated New syllabi developed	Curriculum documents Inspection reports	Funds will be available, Personnel for inspection will be adequate.
3.2 Curriculum development for craft level programmes.	Existing syllabi updated New syllabi developed	Curriculum documents Inspection reports	Funds will be available. Personnel for inspection will be adequate.
3.3 Curriculum Development for implementing all unique programmes.	"	"	"
3.4 Upgrading equipment for centers of excellence	Equipment upgraded	Inspection reports	Funds will be available There will be skilled personnel to perform the tasks.
3.5 Staff in-service training and skills upgrading.	In-serviced staff	Certificates	There will be skilled personnel. There will be interest in the updated training programmes.

Narrative Summary	Performance Indicators	Means of Verification	Critical assumptions
4.1 Carry out study to establish the status of training in automation and computer integration in TIVET.	Study completed and report produced.	Study report	
4.2 Purchase training equipment	8 Centres of Excellence provided with equipment every year.	• Inspection Reports • Procurement reports	
4.3 Staff in-service training and skills upgrading.	4 Staff trained/inserviced for every centre established.	• Training reports	
5.1 Support youths from poor households.	2000 needy students receive bursary per year.	Expenditure Returns Disbursement list	• Availability of favorable environment for learners with special needs • Resources will be availed from Treasury
5.2 Bursary to achieve the MDG on gender parity.	700 female students receive bursary per year.	Gender parity Enrolment data	
5.3 Bursary for youth with special needs.	200 youth with special needs receive bursary per year.	Enrolment data on special Youth institutions.	
6.1 Purchase of pool equipment for incubation.	Equipment purchased for one incubator per year.	Invoices and delivery documents for equipment.	
6.2 Purchase of pool equipment for incubation.	Equipment purchased for one incubator per year.	Invoices and delivery documents for equipment.	

Narrative Summary	Performance Indicators	Means of Verification	Critical assumptions
6.3 Infrastructure Development for incubators	Infrastructure developed for one incubator per year.	Building contracts and handing over reports.	
6.4 Skills upgrading for business creation and technology management	80 trainers trained every year for skills upgrading.	Study leave Enrolment documents	
6.5 Technology innovation research fund.	At least 100 research projects undertaken every year from the second year.	Research proposals and reports Loan disbursement and repayment records	
6.6 Tool kit loan fund.	At least 100 tool kit loans disbursed per year	Loan disbursement and repayment records	
6.7 Technology congress and Awards	At least one congress held every year.	Congress reports	