

**DRAFT NATIONAL PLAN
FOR POST-SCHOOL
EDUCATION AND
TRAINING**

COMMITTEE DRAFT

Contents

Acronyms	5
Chapter 1: Introducing the National Plan for Post-School Education and Training	8
1.1 Purpose of the Plan	8
1.2 Overall objectives of the National Plan for Post School Education and Training	8
1.3 Focus of the Plan: implementing the vision of the White Paper PSET	9
Chapter 2: Building an expanded, effective, people-centred and integrated post school system.....	14
2.1 Introduction	14
2.2 Shape and size of the post-school education and training system.....	14
2.3 Qualifications, articulation pathways, and quality assurance	21
Understanding articulation	21
The National Qualifications Framework	22
Simplifying and strengthening qualifications	23
The design and development of occupational certificates	25
2.4 Improving the labour market interface	29
Aim of the skills levy-supported institutions: giving expression to an integrated system	31
Future establishment of SETAs	31
Scope of the SETAs	32
Funding allocation	34
Accounting authorities	35
National Skills Fund (NSF).....	37
National Skills Authority (NSA).....	37
Capacity development within the Department	38
Role of partners and stakeholders.....	38
2.5. Infrastructure planning and development for post-school education and training	39
Infrastructure strategies.....	40
ICT infrastructure	41
Chapter 3: Building and strengthening community colleges.....	43
3.1 Introduction	43
3.2 Community colleges in 2017	44
3.3 Community colleges in 2030	45
3.4 Why do we need community colleges?	45
3.4 Objectives of the Plan for community colleges to 2030.....	46
3.5 Establishing and strengthening the sub-system	47

Establishing community colleges	47
Programmes	52
Resourcing	53
Monitoring and evaluation	54
Other areas:	55
Chapter 4: The development of Technical and Vocational Education and Training	56
4.1 Introduction	56
4.2 Objectives of the TVET Plan	56
4.3 Policy imperatives for the TVET system	57
4.4 Objectives for an expanded and strengthened TVET sub-system	58
4.5 The Plan for expanding and strengthening TVET	59
Programmes	60
Other points to note:	65
PQM and enrolment planning	66
Examinations	66
4.6 Building the capacity of the sector	67
Student support services	68
Staffing and staff development	68
Governance and management	69
Modes of delivery and technology	70
Workplace-based learning	70
Infrastructure	71
4.7 Funding and resourcing	72
4.8 Monitoring and evaluation	74
4.9 Policy and legislative change	75
Chapter 5: Strengthening and transforming higher education	76
5.1 Introduction	76
5.2 Strategic objectives	76
5.3 Proposals and strategies for strengthening higher education	78
Building a purposefully differentiated higher education system geared towards transformation and sustainability:	78
The Differentiation Framework:	79
Mandate Differentiation:	79
Institutional Mandates (applies to public and private HEIs):	80
Differentiation through Institutional Missions	80
Outline of process:	82

Strategies for implementing the framework:	83
Developing a more student-centred higher education system: supporting access and success.....	84
Enabling and evaluating student access and success	86
Promoting African languages in and through higher education	87
Strengthening teaching, building curriculum development capacity and harnessing the potential of new technologies for teaching and learning	88
Student housing and other areas of student life.....	90
Financial support for students.....	91
Postgraduate Students:	93
Strategies:	93
The staffing of public higher education institutions	94
Governance, regulation and accountability	96
System governance, regulation and reporting	96
Institutional governance	98
Funding, resourcing and sustainability	99
Higher education in support of society and the post-school education and training system	102
Engaged higher education institutions: Community engagement.....	102
Support for the rest of the PSET system:.....	104
Research and innovation	104
Internationalisation.....	106
Chapter 6: Workplace based learning.....	107
6.1 Introduction	107
6.2 WPBL challenges.....	108
6.3 Strategies to strengthen WPBL.....	109
Programme design.....	110
Capacity, information and support.....	110
Quality assurance.....	110
Incentives	111
Policy and legislative changes and alignment	111
Monitoring and evaluation.....	112
Chapter 7: Resourcing and financing of the PSET system.....	113
7.1 Introduction	113
7.2 PSET system funding context	113
7.3 Expanding and strengthening the PSET system: Funding implications	115

7.4 Key strategies for funding and resourcing the system	117
Chapter 8: Planning, monitoring and evaluation	120
8.1 Introduction	120
8.2 Planning.....	120
8.3 Monitoring and evaluation.....	121
8.4 Data improvements	123

CONFIDENTIAL DRAFT

Acronyms

APP	Annual Performance Plan
ATR	Annual Training Report
CAS	Central Applications Service
CCIBU	Community College Institution-building Unit
CDS	Career Development Services
CET	Community Education and Training
CETAC	Community Education and Training Administrative Centre
CHE	Council on Higher Education
CLCs	Community Learning Centres
COIDA	Compensation for Occupational Diseases and Injuries Act
DHET	Department of Higher Education and Training
DST	Department of Science and Technology
DUT	Durban University of Technology
FET	Further Education and Training
GETCA	General Education and Training Certificate for Adults
GETQSF	General Education and Training Qualifications Sub Framework
HDIs	Historically Disadvantaged Institutions
HEIs	Higher Education Institutions
HELMP	Higher Education Leadership and Management Programme
HEQC	Higher Education Quality Council
HEQSF	Higher Education Qualifications Sub Framework
HRDC	Human Resource Development Council
LRA	Labour Relation Act
LTSM	Learning and Teaching Support Materials
MTEF	Medium-Term Expenditure Framework
MTSF	Medium-Term Strategic Framework
MTT	Ministerial Task Team
NAMB	National Artisan Moderation Body
NASCA	National Senior Certificate for Adults
NCHE	National Commission for Higher Education

NCV	National Certificate Vocational
NDP	National Development Plan
NEDLAC	National Economic Development and Labour Council
NEETs	Not in Education, Employment or Training
NGOs	Non-governmental Organisations
NIHSS	National Institute for the Humanities and Social Sciences
NOCs	National Occupational Certificates
NOLS	National Open Learning Platform
NPHE	National Plan for Higher Education
NPOs	Not for Profit Organisations
NPPSET	National Plan for Post School Education and Training
NQF	National Qualifications Framework
NRF	National Research Foundation
NSA	National Skills Authority
NSC (T)	National Senior Certificate Technical
NSDP	National Skills Development Plan
NSDS	National Skills Development Strategy
NSF	National Skills Fund
NSFAS	National Student Financial Aid Scheme
OFO	Organising Framework for Occupations
OQSF	Occupational Qualifications Sub Framework
PALCs	Public Adult Learning Centres
PQM	Programme Qualification Mix
PSET	Post School Education and Training
QCs	Quality Councils
QCTO	Quality Council for Trades and Occupations
RDG	Research Development Grant
RPL	Recognition of Prior Learning
SAHECEF	South African Higher Education Community Engagement Forum
SAICA	South African Institute of Chartered Accountants
SAIVCET	South African Institute for Vocational and Continuing Education and Training

SAQA	South African Qualifications Authority
SDL	Skills Development Levy
SETA	Sector Education and Training Authorities
SIDPM	Standards for Infrastructure Procurement and Delivery Management
SIPs	Strategic Integrated Projects
SSAUF	Staffing South Africa's Universities Framework
SSS	Student Support Services
TDG	Teaching Development Grant
TIA	Technology Innovation Agency
TVET	Technical and Vocational Education and Training
UCDG	University Capacity Development Grant
UoTs	Universities of Technology
USAf	Universities South Africa
WPBL	Work Based Learning
WSP	Workplace Skills Plan

Chapter 1: Introducing the National Plan for Post-School Education and Training

1.1 Purpose of the Plan

The National Plan for Post-School Education and Training is a **roadmap** for the development and reinvigoration of post-school education and training over the next 12 years, from 2018 - 2030. It provides an **implementation framework** for the policy goals of the 2013 White Paper for Post-School Education and Training (hereafter referred to as the White Paper).

The plan provides a framework to align and integrate the work that is underway to implement the White Paper in the post-school system. The White Paper envisages a post-school system which works *as a coordinated system*, bringing together institutions and traditions with very different histories and investments, and finding ways of making them work together towards common goals. This plan provides a framework to implement that vision, as well as a set of strategies towards it.

The White Paper sets out a vision of a differentiated set of post-school institutions and opportunities that are able to respond to the needs of a wide range of citizens, for whom post-school education and training (PSET) is critical to expand their life options. The post-school system must support people in accessing real opportunities for education and training that are appropriately targeted at their levels of prior educational experience, and offer them solid opportunities for further study and self-advancement, to prepare them for meaningful livelihoods and lives of dignity. The post-school system must serve all South Africans, including those who have been marginalised from real educational opportunities. Core to the policy proposals of the White Paper is the goal that the post-school system must contribute to reducing social and economic inequality.

Much work has already been done towards achieving these goals in different parts of the system. This Plan sets out an implementation framework for the remaining period to 2030. In 2030, the system should be able to meet the vision of the White Paper for a socially just, responsive, and single coordinated system, which provides access to a diversity of quality opportunities and where there are vastly improved links between education and the world of work, and where students have a reasonable opportunity for achieving success.

This Plan therefore has the following objectives:

1.2 Overall objectives of the National Plan for Post School Education and Training

1. To provide a framework for the Department of Higher Education and Training (hereafter referred to as “the Department”) and post-school institutions to implement the policy goals of the White Paper on Post-School Education and Training;
2. To provide the framework through which the Department will develop an integrated post-school system by 2030 that is purposefully differentiated to meet the wide range of education, training, skills development and knowledge demands of the country;

3. To provide the framework for the Department to ensure the delivery of a diverse range of quality post-school qualifications and programmes that are responsive to the needs of students, society and the world of work;
4. To simplify and better integrate the post-school system so that qualification pathways and articulation possibilities are clear and appropriate opportunities can be accessed by students;
5. To provide a roadmap through which the Department will build the capacity of post-school institutions to grow, transform and become more sustainable, with a particular focus on the human capacity necessary for teaching, research, support, engagement, management and governance;
6. To provide a roadmap through which the Department will support the continued implementation of systemic initiatives that will result in improved quality of programmes and curricula, excellent teaching and learning, and significantly improved student success and throughput;
7. To ensure that the PSET system works towards common goals, by aligning the planning, funding and monitoring of the different components of the PSET system, wherever possible; and
8. To increase collaboration and resource-sharing across the system, while ensuring the development of a diverse set of institutions and qualification types.

1.3 Focus of the Plan: implementing the vision of the White Paper PSET

The five overarching goals of the White Paper—social justice; a single coordinated system; access, quality and diversity; improved links between education and work; and responsiveness—are consistent threads throughout the Plan. The Plan builds on the constraints and failures of the current system, which were identified in the White Paper, while also acknowledging areas that are working well. It sets out strategies to achieve a vision for a more successful and integrated system which is genuinely responsive to the needs of people in South Africa, as well as being responsive to the kinds of skills that are needed for inclusive development.

Some key **principles** have guided the development of this Plan:

- In line with the White Paper vision, the Plan builds on and consolidates those aspects of the system that are working well.
- Where change is proposed by the White Paper, the Plan sets out implementation strategies to achieve this change, paying close attention to the need for careful transitions.
- In instances where the White Paper provides a broad vision without specifying a policy implementation trajectory, the Plan converts policy vision into implementation frameworks and strategies.
- The Plan builds on the current capacity of the system, which means being realistic about what can be achieved over what period of time, but making sure that there is substantial movement towards achieving policy goals.
- The Plan acknowledges that post-school education has a complex set of histories, but that it is possible to transcend the inequalities and divisions of the past.

- Difficult decisions may have to be made in an environment of constrained resources, and these should not be avoided or postponed.

Of central importance to the Plan is the recognition that we need **more post-school opportunities outside the higher education sub-system**. This does not mean that universities must not grow, develop, improve and expand—universities are vital to society and our post-school system—but it acknowledges that we simply do not have adequate and diverse opportunities for all those who leave school (on completion of Grade 12 or earlier). In a differentiated post-school system, where the needs of the population are diverse, everyone should benefit from meaningful provision across a wide spectrum of offerings. The Higher Education system will also benefit from more diverse and expanded opportunities, in Technical and Vocational Education and Training (TVET) Colleges and Community Colleges, and offered by other skills development and training institutions. A key implication here is the need to strengthen and expand offerings at level 5 and 6 on the National Qualifications Framework (NQF). In addition, offerings at all levels for adults who have left school without completing need to be strengthened and expanded. For all these reasons, building the new community colleges and reorganising the TVET sub-system are crucial priorities of this Plan.

A key policy shift introduced through the White Paper is the creation of Community Education and Training Colleges, (hereafter Community Colleges) as a new institutional type, based on years of research and proposals for community education in South Africa. The Plan puts in place strategies to build a new sub-system for a potentially diverse group of students.

TVET Colleges also play a central role in the post-school system. FET Colleges were renamed as TVET Colleges in the White Paper, to signify that they have a specific focus on providing mid-level programmes that have direct articulation into the world of work, including formal employment, self-employment and other forms of work. The Plan takes this forward to provide further guidance about the nature of the programmes to be offered in TVET colleges, staffing of colleges, as well as college relationships with formal employers in the public and private sector. In order to implement the goals of the White Paper in this area, the Plan provides a justification for rationalising and re-envisioning the programme landscape of the TVET colleges, to develop a strong and dynamic TVET sub-system, including public and private provision.

The White Paper points out the complexity of the relationships between education and the labour market, and calls for the establishment of a central skills planning mechanism. Substantial progress towards this has been made by the Department, and the Plan builds on this, proposing strategies for provision of information on the demand side to plan enrolments in PSET. The Plan moves away from the current focus on scarce and critical skills and proposes that the focus should be on qualifications and programmes for occupations in high demand, using three dimensions: programmes that are specifically needed for economic growth; programmes that will provide opportunities for employment for large numbers of people; and programmes that support social development priorities.

Key to achieving all of this, and a central vision of the White Paper, is the integration of the institutions currently understood as being part of ‘the skills system’ or ‘the skills landscape’, into the functioning of the post-school education and training system. These have typically included private training providers (including workplaces that also play the role of providers), those that enable workplace-based experience, as well as labour market intermediaries (the

Sector Education and Training Authorities – SETAs) and the National Skills Fund (NSF) and National Skills Authority (NSA). The White Paper is clear that skills development is not something different from education and training: all PSET institutions are in fact developing different kinds of skills, through a wide range of programmes, and at different levels. Thus private skills providers and workplace providers are understood to be an integral part of the emerging post-school system. Workplace experience is seen as a critical cross-cutting imperative that supports all sub-systems. The labour market intermediaries are also envisioned as key institutions to support skills planning and to enable the steering of the system. This Plan provides clear mechanisms to formally enable this significant shift for the first time. The inherited system has different institutions and funding mechanisms in operation, as well as different strategies and planning cycles. The integration of the National Skills Development Strategy III and the new National Skills Development Plan into the National Plan is part of this creation of a common strategy. “Skills planning” is seen as an integrated approach to understanding skills demands of society and the labour market, drawing on information from a wide range of sources, and at the same time planning for enrolments in particular programmes in a more responsive way. By absorbing NSDS III into the NPPSET, and locating NSDP as a distinct section of the Plan, the Department will ensure that there is overall strategic alignment between all PSET institutions, and that planning, funding, reporting and quality assurance mechanisms are meaningfully aligned.

Improving coordination of offerings under the responsibility of the Department and those of the Department of Basic Education and Training is another important emphasis in the Plan, drawing from the White Paper vision of integrating and simplifying technical and vocational education and training pathways. The Plan therefore provides an opportunity to situate the relationships of the PSET institutions within the full continuum of education provision, that includes early childhood development, schooling and extends to knowledge production at the highest level. Post-school education, training, and skills development are a critical pillar of this continuum of education from birth to adulthood, including lifelong learning.

The White Paper policy vision to improve articulation into and across post-school education and training institutions and into the workplace is a critical one, which is taken forward through a number of strategies outlined in the Plan to ensure that institutions in the PSET system have distinct but complementary purposes as part of a differentiated system. The Plan clarifies that programmes offered by different institutions must be defined by purpose and type, but institutions should not be limited to narrowly offering programmes at particular *levels* of the National Qualifications Framework (NQF). In particular, in the future, level 5 and 6 qualifications (Higher Certificates, Advanced certificates and Diplomas) will be offered at a range of different institutions, depending on their areas of specialisation and the occupational and professional area in which they are operating.

The Plan further provides strategies that will improve public understanding of qualification types and pathways, streamline the work of the Quality Councils, and develop meaningful articulation routes and reduce blockages to articulation across post-school education and training.

Another key goal introduced by the White Paper is a simplification of current structures which have created multiple accountabilities, parallel strategies, and a complex reporting environment. The mandate of the National Skills Authority (NSA) shifts in the Plan, as guided by the White Paper and elaborated in the new National Skills Development Plan, to a more

focused role in monitoring and evaluating the SETAs and the NSF. The NSA has traditionally brought together a diverse group of stakeholders working in skills development and will continue to do so in support of its monitoring mandate. The Plan ensures that its strategic role does not overlap with that of the Human Resource Development Council (HRDC) by creating a tighter focus and mandate for both structures. The Human Resource Development Council (HRDC) has a critical role to play in providing a strategic oversight role over the whole education and training system, including early childhood development and basic education, and must not replicate strategy and planning mechanisms. The primary role of the HRDC is to provide high level political support for the broad goals of the entire education system, guided by the core policies and implementation plans of the different sectors. By bringing together individuals and constituencies with strategic positioning and capability, the HRDC can support the PSET system strategy by unblocking obstacles and supporting the strategic decisions needed to implement PSET plans. HRDC strategy will focus on what can be done at national level, across the State, the private sector and a range of constituencies, to strategically support high level implementation priorities. It must not create its own targets, but will focus on facilitating the implementation of cross-system priorities, guided by PSET and education policy. It therefore has a critical role to play in ensuring social and political support for the implementation of this National Plan.

In support of the White Paper goal to create a stronger relationship between education and training and the world of work, the Plan develops a nuanced understanding of and approach to private provision in the PSET system. Public institutions are vital and justifiably prioritised in this Plan, but State-funded institutions are also reliant on relationships with providers outside the public domain. The private sector is not a monolithic group in terms of post-school education and training provision. It includes private education and training institutions and providers, for-profit and not-for profit providers, State-owned and privately-owned workplaces that contribute to education, training and skills development: in short a range of providers playing different complementary roles. These need to be understood in their diversity and their different abilities to contribute to the overall goals of the PSET system, and the right kinds of support and incentives must be provided to enable their integration where necessary and recognition where applicable. The Plan therefore lays the basis for a range of strategies which require a more nuanced approach to private provision, while recognising the Constitutional imperative to ensure quality of provision and to protect the public from unscrupulous provision. The current process of registering a range of skills development providers as private colleges will be revisited to ensure that it is line with the capacity of the Department to register new institutions, and that the process does not override access to a diversity of opportunities, and the flourishing of provision, in the medium term.

The Plan also provides explicit guidance on how collaboration and integration can be achieved to maximise efficiency within the system. Strategies are provided on how institutions in the different sub-systems can work together to ensure that there are clear learning and exit pathways for students from the time they enter a PSET institution to the time they complete.

Another shift underway since the establishment of the Department of Higher Education and Training and the introduction of the White Paper is the establishment of a range of new interventions that will support integration in the post-school system. These include the Central Applications Service (CAS), the Career Development Services (CDS), and the South African Institute for Vocational and Continuing Education and Training (SAIVCET), which will

provide support for curriculum development and staff professional development in the TVET and community college sub-systems. There will also be a systemic drive to develop open learning models to support access, success, lifelong learning and cost-effective provision. The Plan builds on these initiatives to outline a range of strategies (including the establishment of an Infrastructure Development Support Unit) to also prioritise resource-sharing and collaboration in support of the White Paper vision for integration and coordination.

The Plan creates alignment between new proposals and programmes and interventions that are already being implemented in response to White Paper. Policy coherence is also established through alignment of White Paper proposals and provisions of other national policies and development strategies.

The process of developing the Plan has drawn extensively on what is currently known about the post-school system, drawing on research and data available to the system from a wide range of sources. This includes research produced by the HRD Council, the DHET itself, Ministerial Task Teams and research consortia (such as the Education Policy Consortium and the Labour Market Intelligence Project) and a range of other information sources. Although the plan itself will minimise use of in-text references to improve the flow of the document, a list of sources consulted will be included. There are data gaps, and these are highlighted in the Plan, with strategies highlighted to improve the Department's knowledge of the system.

Chapter 2: Building an expanded, effective, people-centred and integrated post school system

2.1 Introduction

This chapter deals directly with ways of integrating the post-school system.

It starts with the vision of the kind of system of provision that is envisaged for post-school education and training. It then offers a set of proposals aimed at simplifying the qualifications framework which frames this system of provision, as well as improving articulation across institutions and programmes. This is followed by a set of proposals for improving the interface with the labour market, through the intermediary skills-levy institutions (specifically the SETAs) and the Department. Finally, it discusses cross-cutting interventions to develop the infrastructure and capacity of our institutions.

2.2 Shape and size of the post-school education and training system

Roles and relationships of post-school institutions

The establishment of the Department of Higher Education and Training (the Department) in 2009 brought together a range of institutions with different histories, strengths and weaknesses, all contributing in some way to skills development, education and training outside of the schooling system. The post-school education system described in the White Paper for Post-School Education and Training is a developing one. The White Paper was produced precisely to fill a gap in forming a systemic approach to what is effectively an emergent system, hence the overarching policy goal of coordination and integration.

The White Paper describes the post school system as comprising “all education and training provision for those who have completed school, those who did not complete their schooling, and those who never attended school.” It then lists the range of institutions that are part of the post-school system. These include the 26 public universities, the 50 public TVET colleges, the 9 new community colleges (incorporating all the former Public Adult Learning Centres); private higher education institutions and colleges; a range of State-owned post-school institutions funded through other government departments responsible for mainly public sector training; the SETAs and the National Skills Fund (NSF); and regulatory bodies responsible for qualifications and quality assurance in the post-school system (SAQA and the QCs).

The Figure below captures the full scope of institutions within the post-school system, with a view to understanding what the system looks like in relation to the implementation of this Plan. Institutions are linked to their major roles and the relationships between them. The diagram aims to show the complexity and scope of the system and is forward-looking. It is not ideal to represent the system in a single diagram, but it is important to try to create a shared understanding of its composition.

Figure 1: The PSET System

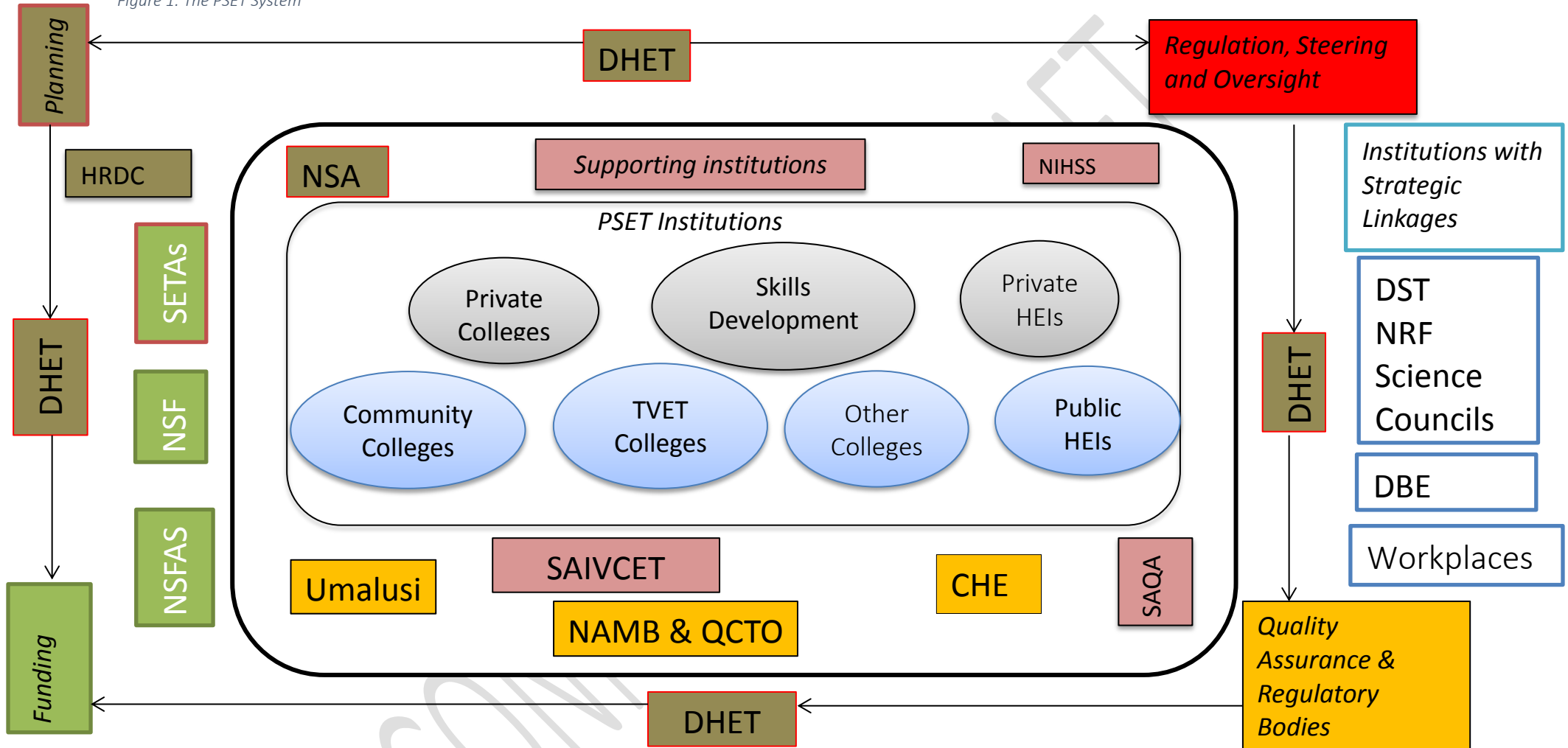


Figure 1 outlines the major roles of and relationships between post-school education and training providers and a range of supporting and collaborating institutions. It also highlights that the PSET provider institutions are the core of the system and are central to the development, growth, and strengthening of the system.

The provider institutions that operate within the post-school system are not new institutions (apart from the community colleges), and there are no changes to the primary mandate of institutions.

The roles and purposes of community colleges, TVET colleges and higher education institutions are described in detail in chapters 3, 4, and 5 of this Plan. The future role and establishment of SETAs, as well as the roles of the National Skills Fund and the National Skills Authority are described in chapter 2, section 3 (the National Skills Development Plan). The roles of the Quality Councils [Umalusi, the Quality Council for Trades and Occupations (QCTO) and the Council on Higher Education (CHE)] and SAQA are outlined in the National qualifications Framework Act (2008), and the role of the Council on Higher Education is further described in the Higher Education Act (1997).

Together, the public and private education and training institutions, along with other skills development providers working across the post-school landscape, will offer a range of diverse qualification and programme types to meet the varied needs of individual students who require education and training opportunities. Other supporting institutions are described in the relevant sections of the Plan, where they play a role in planning, regulation, funding, and quality assurance, or work together in collaboration with parts of the post-school system.

Workplaces in the public and private sectors are in some instances also providers of skills training opportunities, but they also play an important role in supporting workplace-based learning for many students in the system. Chapter 6 focuses on workplace-based learning.

The DHET has oversight of the whole post-school education and training system, conducting system planning (including planning for skills needs and enrolments), steering the system according to policy, providing core funding for a range of public institutions, providing regulation and monitoring mechanisms for oversight, and ensuring that the governance of the system is in line with policy and legislation. Quality assurance bodies also play a key role in supporting the measurement and improvement of quality across the system.

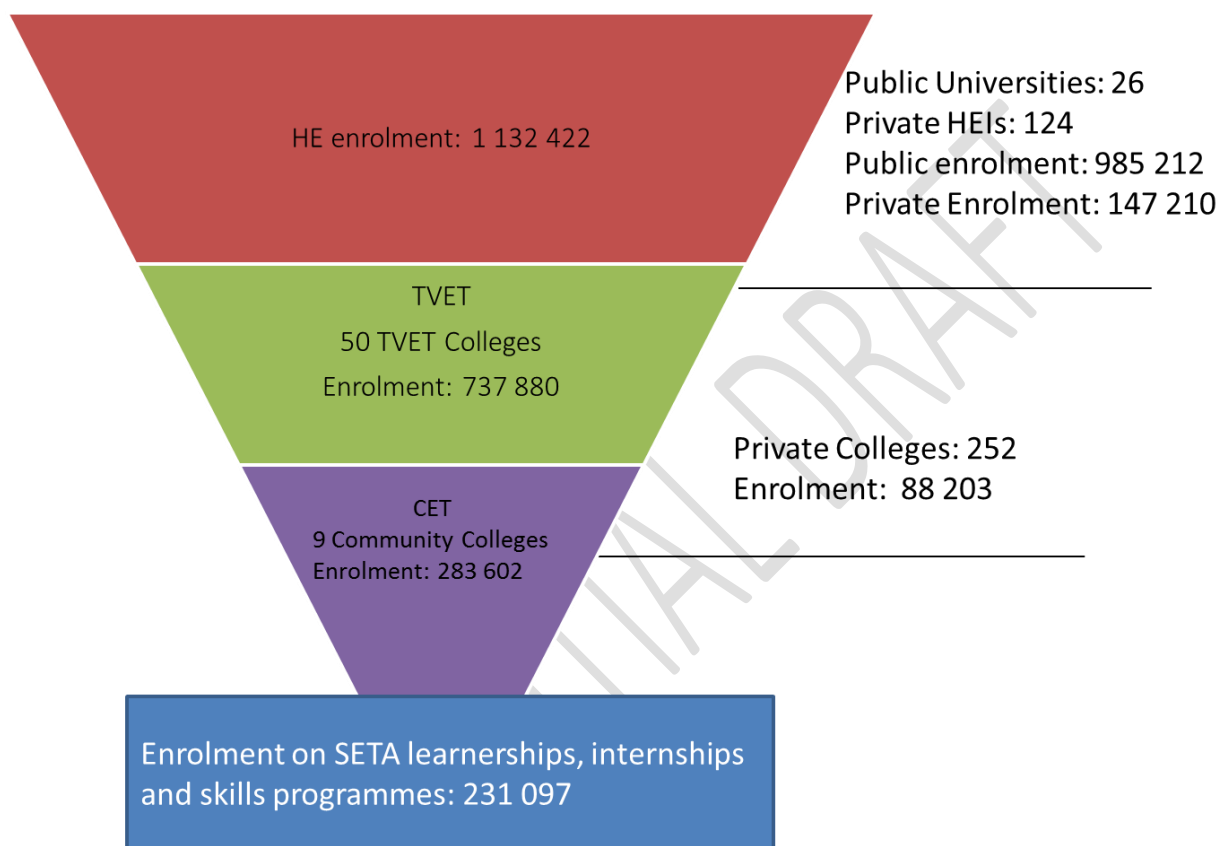
The HRDC is a supporting institution that covers the entire education and training landscape, including schools and early childhood development. In the future it will not develop separate targets and plans, but will play a support role in leveraging political support across all social sectors, including government, to assist in the achievement of the strategic goals of education and training, including in support of this Plan. This is crucial to ensure that policies and practices across government, the private sector, labour, and a range of constituencies, are not in contradiction with each other, and are working together to unblocking obstacles and supporting the strategic decisions needed to ensure human resource development and deployment across society and the economy.

The National Artisan Moderating body (NAMB) currently has a wide scope. In the future, it is envisaged that it merges with the QCTO and primarily becomes the quality assurance body for trade tests.

The size and shape of the provision system

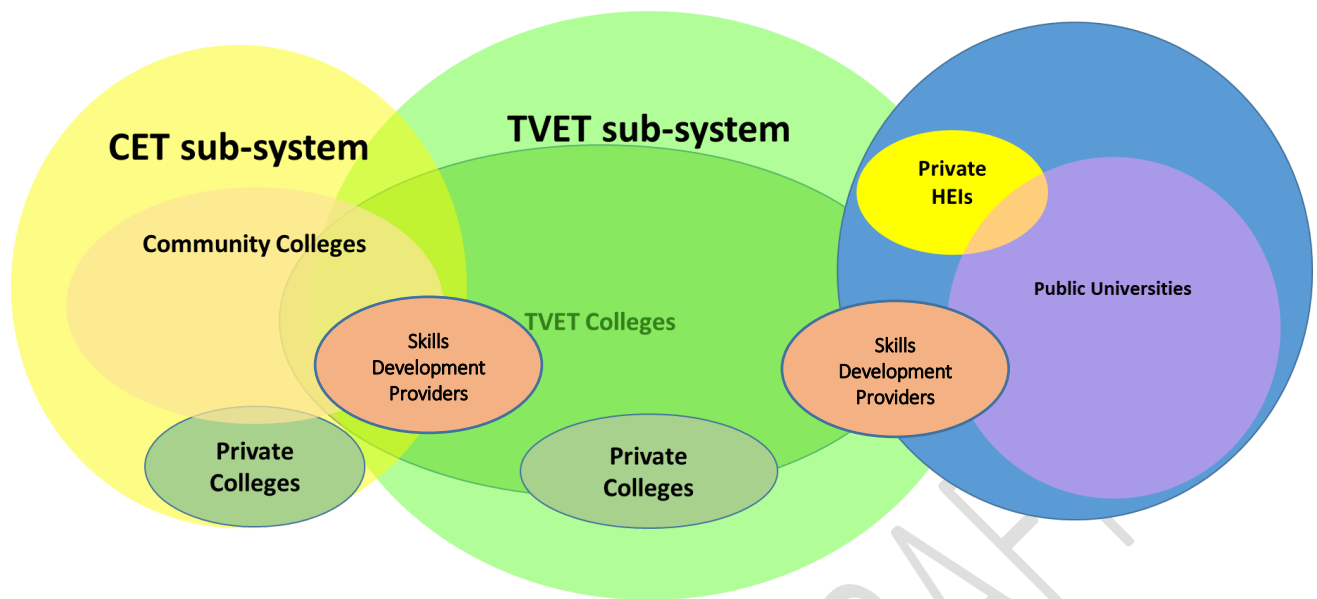
The relative size and function of provision institutions, shown at the heart of the post-school education and training system in Figure 1, needs to change. Figure 2 below shows the current relative size of different providing institutions.

Figure 2: Current shape and size of PSET provider institutions (2015)



The Plan conceptualises the growth and integration of the PSET system that is reflected in Figure 3.

Figure 3: Towards an expanded and integrated PSET system



This reflects a substantial change in the relative sizes of different components of the provision system, to better align with the needs of all South Africans.

The White Paper has highlighted the unquestionable need to provide more opportunities, across the post-school system. The biggest priority here is the community education and training sector, where new community colleges **will have to be built and developed**.

TVET Colleges will also need to grow enrolments over time, though at the same time there will be a significant focus on improving quality and student success, while introducing new sets of qualifications over time, and ensuring that colleges are not destabilised. Growth in enrolments can be enabled by a range of strategies, including more efficient use of college facilities, and improvements in the time students take to complete.

Over the period to 2030, growth in the public higher education sub-system will be more moderate than envisaged in the White Paper and the National Development Plan. University enrolments will need to grow, while continuing to improve on the success of students and institutions within the system, which in turn will open up more spaces over time, as student throughput becomes more efficient. The White Paper and the National Development Plan (NDP) targets for enrolment in PSET institutions are aspirational. This aspiration is critical to pushing for change and transformation and to meet the many demands for post-school education and training in South Africa. However, the targets need to have a realistic chance of success and growth cannot take place without adequate funding to support it. Since the White Paper was released, the country has been in a period of constrained economic growth, with targets falling below those envisaged in the National Development Plan. A costing of the White Paper policy goals and targets was also completed by Treasury in 2016. This costing showed that as the White Paper aims to increase enrolments in the PSET sector substantially, more than doubling them by 2030, while at the same time significantly improving quality, in order to fully achieve White Paper objectives, the expenditure necessary would need to increase three-fold over the period.

The Treasury report recommends that both cost reduction mechanisms (which should include increasing efficiencies and reducing growth targets) as well as increasing funding to

the PSET sector, through increasing government and non-government expenditure and accessing alternative funding sources, should be considered.

It should also be noted that over the current Medium Term Expenditure Framework (MTEF) the budget of the DHET has grown substantially, in response to the significant student funding needs in the public higher education and TVET sub-systems, the zero fee increase of 2016 and the gap funding provided in the 2017 academic year. As critical as these budget increases have been for addressing the affordability of higher education provision, they have not contributed to the funding shortfalls experienced across the post-school system, particularly the need to grow institutional funding to support enrolment growth and improvement.

Moving forward, growth and development have to be carefully planned while pushing for the aspirational targets to be achieved. The work done since the release of the White Paper, as well as the very real constraints of the resources available in an economy that is not growing and a society with many competing needs for social investment, has shown that **the growth targets for the PSET system are not attainable by 2030 without significant new investment.**

Arguably equally important, however, is **the current capacity of the system to grow.** Even with substantial new resources being made available (and this Plan argues that without achieving greater resourcing over time the system cannot grow and develop to meet policy goals) we must be realistic about the human and institutional capacity needed to gear the system up to meet the diverse training needs of more people and to do so more successfully. We need strong, vibrant, and sustainable institutions, well managed and governed and adequately funded to meet expectations, but we also need the lecturers, administrators, researchers and managers that will make these institutions work better, and to improve the chances of success for all students. We must invest in new generations of teachers and scholars to support post-school education and training, and we must support initiatives that will improve teaching, learning, curriculum development, and workplace access.

Taking this into account, the Plan makes arguments for achievable growth. That is, to achieve policy goals over time it will be necessary to grow *within* the limits of the available capacity and resourcing, while setting the system up to accommodate larger enrolments over time. Growth will require both better capacity **and** greater investment.

Enrolment growth will take place in all parts of the PSET system, but growth will be carefully driven through enrolment planning, will be in line with resourcing available, and will be accompanied by adequate growth of appropriately qualified staff in all institutions. Growth will be carefully managed in the first phase of the Plan, given the emphasis on capacity building, improving responsiveness and ensuring student success, but it is envisaged that faster growth will be possible from 2025 onwards, as institutional capacity and resourcing can be better aligned.

Growth of physical infrastructure will be carefully controlled and planned within the constraints of the overall PSET budget, to meet overall policy goals, but with a far greater emphasis on resource sharing where institutions are situated in geographical proximity, and intra-institutional collaboration across sub-sectors will be encouraged and incentivised. Across the system there may be some changes to existing campuses and colleges, which may include repurposing of campuses, linked to a more purposefully differentiated system, and the critical need for resource and infrastructure-sharing initiatives. The category of Higher

Education College, now provided for in the Higher Education Act, also offers opportunities for incorporating other State institutions and in particular single-focus institutions (agriculture, nursing, teaching) into the post-school landscape over time.

Where facilities exist outside of public institutions, focused partnerships will also be supported. One area where infrastructure investment will be critical is in ICT infrastructure, and investments will be needed in this area to ensure that all institutions have access to similar levels of bandwidth. There is also a necessary focus in the Plan on maintaining current infrastructure.

Student housing is a possible area of growth, but will be guided by the framework and principles set out in this Plan. Growth of student housing will increasingly take place through partnerships with private organisations, and where public investment in student housing takes place, this will have to be informed by the criteria to be developed for infrastructure planning in the system.

The DHET is committed to growing the size of enrolments in the public PSET system to meet demand over time, and to improving the quality and success of the system in all areas, which includes offering meaningful and affordable opportunities to young people with reasonable chances of success. It is also committed to understanding the real costs of provision in all areas, to implementing cost saving and resource sharing initiatives and more efficient use of public facilities in PSET institutions over the period of the Plan.

This Plan is therefore under-pinned by three important approaches relating to the size of the system, which together will take forward the policy objectives of the White Paper, recognising the constraints of capacity and funding. These are inter-related and inter-dependent.

- Firstly moderate growth will take place in line with available funding and capacity to increase enrolments, improve successes, and to do so sustainably. This will be guided through existing processes to allocate institutional funding in line with enrolment planning processes. It will also be guided by realistic costing of delivery and improving efficiencies and resource-sharing.
- Secondly, investing in the capacity development of the system is essential to gear the system up as a whole to be able to absorb planned enrolments and to improve successes across the board. This means paying attention to institutional, infrastructural and staffing capacity to deliver meaningful opportunities to students in the system.
- Thirdly, the core funding for the PSET system will have to grow, over the period of the Plan, and according to available funding from government and from other supporting sources. Without this gradual increase, it will not be possible to meet the policy objectives of the post-school education and training system, and to sustain growth and development for the future.

A costing exercise is underway which will outline the proposed targets and growth trajectory for the public institutions in the system. The DHET is committed to sustained change in the enrolments in the TVET and community colleges, which will, over time address the inverted pyramid.

2.3 Qualifications, articulation pathways, and quality assurance

Chapter 9 of the White Paper refers to a range of matters relating to qualifications, articulation and quality assurance in the post-school system.

The following priorities have been identified:

- Simplifying the National Qualifications Framework (NQF): this is primarily about preventing the proliferation of qualifications that cannot be delivered and ensuring that there is less complexity in the design of the NQF.
- Improving articulation: the focus is on avoiding unfair barriers to access and progression within the PSET system; and facilitating student articulation across different qualification types and levels. Problems have been identified in both areas, as outlined in the White Paper.
- Demarcating the work of the Quality Councils in a more rational way without creating unnecessary restrictions on their work.
- Building the capacity of the QCTO to ensure the development and implementation of occupational programmes, and ensure the effective assessment and quality assurance of occupational programmes.
- Building the professional capacity of all institutions involved in qualification development, curriculum development, assessment and certification and quality assurance to move beyond compliance.
- Ensuring that mechanisms are in place for the Recognition of Prior Learning (RPL).

This section addresses some of the necessary strategies to respond to these policy goals, making reference to the role of the NQF and the Quality Councils. While some shifts are proposed, no major structural changes are envisaged.

Understanding articulation

It should be noted that the goals of the NQF exist in support of the PSET system goals, but cannot on their own create articulation, access, redress, reduction of inequality, and improved quality. Changes to the NQF itself will not alone improve articulation across the education system. These goals must be addressed by the system as a whole, with support from all institutions. A lack of articulation is related to complex sets of factors: institutional histories, curricula alignment, institutional collaboration focused on articulation, professional pathways, qualification development processes, and many other factors. Articulation needs therefore to be addressed at a range of levels.

It is also important to note that much of the current evidence available of a lack of articulation is anecdotal. This does not mean that there are no major problems across the system. There are examples in the system of such projects, such as a number of formal partnerships between universities and TVET colleges to deliver Higher Certificates in particular areas. But there is very little reliable data available to properly understand where articulation is working and where it is not and therefore what should be done to improve articulation. It is important, therefore, that adequate data are collected to show articulation pathways in the system, and that systemic articulation problems can be properly understood in context. This understanding of articulation as complex and multi-dimensional is important,

so that purposeful articulation projects can be identified and supported. Chapter 8 addresses data improvements necessary in the system.

When qualifications are developed, articulation routes should be mapped out, as linked to the primary purposes of qualifications. Qualifications should also be designed with planned articulation routes at the outset. There is also a need for a mechanism for students to raise concerns about unfair practices or blockages in accessing qualifications and carrying credit across qualifications and institutions. Over time, and in combination with better quality data about qualifications pathways, it will then be possible to address unfair practices, as well as to develop solutions to systemic articulation problems. SAQA is in a position to support this work by collecting data about individual complaints and by tracking systemic data through the National Learners Record Database (NLRD), and the necessary capacity must be developed to support this role.

It has been suggested that an ombuds or complaints office for the PSET system is necessary, in part to deal with a range of articulation complaints. While it is necessary for students to have access to some form of recourse when they are treated unfairly, an ombuds office for the system would have a broader focus on managing and processing a range of complaints and queries about all aspects of the PSET system, and the legality of such an office taking binding decisions on a range of matters would have to be considered. The Department will investigate the form and function of an office which can handle a range of student complaints, including about articulation, with a view to its possible implementation in 2020.

The National Qualifications Framework

The passing of the South African Qualifications Authority (SAQA) Act in 1995 introduced the idea of a single integrated National Qualifications Framework. The original framework was designed with eight levels divided into 12 learning 'fields'. Structures to design (standards generating bodies) and ratify (national standards bodies) qualifications were created separately from national systems of provision. Many new qualifications and unit standards (part qualifications) were developed, and existing qualifications were redeveloped to meet a required learning outcomes-based format. This led to a data base with hundreds of qualifications all on a single framework.

A review and prolonged policy revision process led to a completely different approach to the NQF being introduced in 2008, whereby the NQF was split into three distinct but linked frameworks—one for higher education, one for general and further education and training, and one for trades and occupational education and training. This emerged from a compromise between the then Departments of Education and Labour, in terms of 'dividing up the pie'. This was done by introducing a distinction between the terms vocational and occupational which has no clear basis and is unworkable in practice.

Sub-frameworks were then designed under the auspices of the quality council with responsibility for each sub-framework: the CHE, through its HEQC for the Higher Education Qualifications Sub-framework; Umalusi for the General Education and Training Qualifications Sub-framework; and the QCTO for the Occupational Qualifications Sub-Framework. The strength of this arrangement was respecting differences between different sectors.

What it did not assist with, however, is articulation. Its weakness is a lack of integration across qualification frameworks.

It has also left the QCTO in a difficult position as it had to develop a completely new set of qualifications in a context where it inherited qualifications which had been developed through the standards generating bodies of SAQA. While some new qualifications have been successfully developed, the main problems identified are as follows:

- The representation of occupational qualifications on the NQF is not user-friendly to the public, because occupational qualifications are distinguishable only by their NQF Levels, and not by terminology that the public can easily recognise. Unlike Higher Education qualifications, which have qualifications that have terms for each NQF level (such as a diploma, undergraduate degree, Master's Degree and Doctoral Degree), occupational qualifications are all called certificates.
- These differences in nomenclature make integration difficult. Occupational qualifications run in parallel to General, Further and Higher Level qualifications, which are predominantly academic in nature. The exception is trade qualifications which are widely accepted.
- There is a strong demand from learners for level 5 vocational/occupational qualifications, particularly outside of the university sector.

Simplifying and strengthening qualifications

The strategies included here are aimed at aligning the nomenclature of occupational qualifications with the rest of the NQF, to make the NQF clear to the public and create a common understanding of qualification types. These strategies focus on occupational qualifications, because the key problems identified are in this area. A review and analysis of these qualifications was conducted, noting research done by the QCTO and changes currently underway at the QCTO towards simplification, and a range of other initiatives including Level 5 (higher certificate) partnerships between TVET colleges and Universities, the NCV Review recently completed by Umalusi, and an engagement with the work of the Department of Basic Education 3-stream model implementation.

Because it is in the area of qualifications aimed at training for mid-level occupations where changes are being made, many of the changes set out here must be read in relation to the programme proposals set out in chapter 4.

Instead of having a separate set of occupational certificates, each called 'certificate', despite being at different levels of the NQF, the occupational certificates should align with terminology used in the rest of the system. This will render the whole system easier to understand. This means:

- Occupational certificates at levels below level four will be called simply 'certificate', although with the designation of the specialization in the relevant area of work.
- Occupational certificates at level four will be called National Occupational Certificates. This is in line with other certificates at this level: National Senior Certificate, National Certificate Vocational, and National Senior Certificate for Adults. Consolidating the use of this term should improve public understanding. This means that there will be four main qualification types at this level: the National Senior Certificate, the National

Certificate Vocational, the National Senior Certificate for Adults, and the National Occupational Certificates, which will have named areas of specialization.

- Occupational certificates at level five will be called Higher Occupational Certificates. They will have specializations included in their titles.
- Occupational certificates at level six will include Advanced Occupational Certificates and Occupational Diplomas. They will both have specializations included in their titles.
- Currently there are a few occupational qualifications at levels 7 and 8, which are mainly offered by universities, and quality assured by the QCTO. These are niche qualifications, targeted primarily at professionals with degrees working in particular fields, and are linked to occupational recognition through a professional body. These are referred to as Specialised Occupational Certificates in the table below, in line with their primary focus.
- The immediate and priority focus is on the development of the intermediate occupational qualifications at level 5 and 6 that can be offered at public TVET colleges. There are currently no level 9 and 10 qualifications registered on the OQSF, but the scope exists for these to be developed in the future.

The implication of this is a simplification of the NQF, but which creates a single set of qualification types, as shown in Table 2 below.

Table 1 Proposed revised NQF with aligned qualification nomenclature

NQF Levels	Academic qualifications	Occupational qualifications
10	Doctorate	
9	Masters	
8	Honours and Postgraduate Diploma	Specialised Occupational Certificate
7	Bachelor's Degree	Specialised Occupational Certificate
6	Advanced Certificate/Diploma	Advanced Occupational Certificate/Occupational Diploma
5	Higher Certificate	Higher Occupational Certificate
	General Education and Training Qualifications	
4	National Senior Certificate/ National Senior Certificate Technical/ National Senior Certificate for Adults/National Certificate Vocational.	National Occupational Certificate
3		Occupational Certificate
2		Occupational Certificate
1	General Education and Training Certificate	

This will lay the basis for a simpler approach to articulation. It will also lay the basis for introducing proposals for qualifications and programmes changes in Universities, TVET and CET, specific plans for growing level 5 and 6 qualifications, roles and relationships of the QCs and SAQA, development and funding of programmes, legislative changes necessary, and processes necessary for moving from the current situation to 2030 (e.g. the need for a joined-up planning process with DBE, DHET, CHE, QCTO and Umalusi regarding the University, TVET and CET programmes).

This will require a change to Notice 1040 of 2012, which determines the sub-frameworks and defines occupational qualifications as being based on workplace learning and a combination of three types of unit standard.

Some of the National Occupational Certificates will be developed by the incorporation and development of the NATED programmes. They will be focused on specific occupations or part-occupations, and will include workplace-based training and/or practical training through simulations and other college-based provision. The proportion of compulsory workplace-based training and practical training will vary depending on the qualification. These qualifications will be increasingly offered in TVET colleges, with clear links to industries and workplaces within each college footprint combined with a degree of programme specialisation. Some alignment has already been achieved through the Apprentice of the 21st Century processes, and this will continue to be built on.

Building on the current processes in the QCTO, the N 4, 5, and 6 will be incorporated into Higher Occupational Certificates at level 5. Aspects of the N diploma may also inform the Advanced Occupational Certificate. The N4-N5-N6 Certificate remains a high enrolment qualification but progression to the N Diploma after 18 months of workplace experience remains challenging due to lack of workplaces and funding for 18 months. This process must be done sensitively, and in line with changes to the programme qualification mix (PQM) funding and planning processes of the DHET for TVET colleges.

TVET colleges and Community Colleges will both also offer foundational learning programmes which are not associated with a level on the NQF but are flexible programmes designed to accommodate the different entry levels and educational background of students in both institutions, and provide these students with the necessary foundational knowledge for a range of college-based programmes.

The design and development of occupational certificates

This section focuses on building the capacity of the QCTO to develop occupational qualifications, and to internalize and streamline the process of qualification development within the QCTO.

A key problem identified in the White Paper is that the current systems for designing qualifications, and the current ways in which relationships between qualifications and occupations are understood, are not working well. This area is therefore discussed in more detail below, in terms of the following aspects:

- the design features of occupational qualifications (what should qualifications look like, what constitutes the kinds of documentation that is required);

- the systems for designing, assessing, quality assuring, and awarding them (who should do each of these things and how?);
- processes to move the system from where it is now to where it must be in 2030.

One key problem is the idea of a one-on-one correspondence between qualifications and occupations. The Organising Framework for Occupations (OFO) is used as the basis for qualification development, but the level of the OFO that is utilised to support this design process is too detailed—so in fact, many ‘occupations’ are really jobs. Qualifications are therefore designed to be too fragmented and too narrow. Qualifications need to be broad enough to accommodate a family of jobs which involves greater aggregation. This applies across the NQF.

Another key problem is a lack of coherence and national direction about priorities for qualification development. The current model is driven by sponsors of qualifications, which means that qualifications favoured by certain interest groups that have access to funding are more likely to be developed. This approach allows for a proliferation of interest groups, and a proliferation of qualifications, and it lacks national coherence.

An additional problem is that the current models are significantly based on a model that contracts work out of the core institutions, rather than on building institutional capacity. Current models are also expensive and unnecessarily complex. Some steps are already being taken by the QCTO to improve these systems, and these changes must be sustained.

The strategies are outlined below.

Understanding demand

The Department is already in the process of creating greater capacity for the analysis of development plans and labour market information. The analysis will result in an evidence-based understanding of skills and occupation requirements to support economic and social development priorities. This will inform a systemic response through SETAs, and engaging with workplaces to determine key trends and establish occupations in high demand: those that are priorities for the economy; those with potential for employment of large numbers of people; and those that are priorities for social development.

This process is outlined in Chapter 2.4, but the key strategies are summarised here:

- The Department will undertake specific interventions to support the development of required capacity to determine occupational demand (occupational priorities). This will be done through the unit being established, and referred to in the White Paper as a “Skills Planning Unit”. It is now being conceptualised as a PSET Planning Unit, which will have improved capacity to make use of labour market data from a wide range of sources, building on the data available through SETAs, and a number of mechanisms developed through the Labour Market Intelligence Programme (LMIP).
- The Department will continue to work in partnership with the higher education and research institutions. It is anticipated that this will contribute to building the capacity of the unit focused on labour market analysis to: analyze credible data that SETAs gather from the workplace (against a single template) to understand the existing skills in the labour market, training taking place and the demand for occupational

qualifications (and part qualifications) nationally and within sectors; AND to consider the skills priorities emanating from government departments' development plans.

- The Department will support and guide SETAs to use the analysis to encourage an employer and labour voice. This will serve to verify occupations—across various groups (managers, professionals, service and clerical workers, artisans, plant and machinery operators and elementary workers), that are in demand.
- The Department will engage with the quality councils to ensure that qualifications and related curricula are in place to meet the occupations in high demand. DHET, primarily through SAIVCET in relation to CET and TVET, will retain the responsibility for developing detailed curricula and materials for different sub-systems and across public and private providers.
- Within the context of the PSET planning framework, the Planning Unit will engage directly with the units of the Department responsible for institutional enrolment planning and support about this demand analysis and the ways in which it must be incorporated into the enrolment planning processes across the system, taking into account national, regional and local demand. This will be combined with resources to support the improvement of the throughput and quality of these programmes as per strategies outlined in each of the sub-system chapters.
- SETAs will participate in such discussions so as to encourage partnerships between institutions and workplaces and where relevant across public and private providers. This in turn will support the planning processes undertaken by the SETAs with workplaces linked to occupational learning programmes and workplace-based learning opportunities.

Planning the development of intermediate occupational qualifications

- The occupational framework will be revised to define the parameters of each of the occupational qualification types e.g. what are the characteristics of an occupational diploma in terms of purpose, credits etc.
- As the occupational certificates will be increasingly offered in public colleges (and continue to be offered in private institutions), the specifications—rules of combination, as well as what is specified and how—needs to relate appropriately to the language of the Department and TVET colleges and the labour market. This will require intensive engagement between QCTO and the DHET in terms of what *should* and *should not* be specified in qualification documentation in order to support the delivery of occupational certificates.
- The PSET Planning Unit in the Department will maintain and improve the list of occupations in high demand on an annual basis, and supplement it by suggesting additional occupational areas which may be important. This list will be the Ministerially-approved list that informs for TVET qualifications development. However, the QCTO and the Department must also be responsive to groups which advocate for the development of new qualifications.
- The next step will be to determine which qualifications are actually 'active'. This requires some focused research in the short term, and ongoing monitoring and

research in the long term. This should be done by the Department, in collaboration with QCTO, and supported by key organizations working in this area.

- This will result in a list of between 150-300 intermediate occupational training courses that will serve the current and future needs of both industry and school-leavers and can be offered at public and private colleges. Wherever possible occupations should be broad rather than narrow.
- The Department and the QCTO will develop a list of TVET qualifications which should be prioritized for development or consolidation immediately, and which should be prioritized in terms of programme offerings in the next 5 to 10 years, after consultation with industry and economic partners.

The development of intermediate qualifications

- The QCTO will develop qualifications and part qualifications for occupations based on the Ministerially approved annual Occupations in High Demand list. Where the QCTO identifies the need for additional qualifications, agreement must be reached with the Department that the identified qualifications should be developed. The QCTO will work with the PSET Planning Unit which will be collecting data about occupations to inform qualification development, and ensure better decisions about type, scope, and contents of occupational qualifications. This will also require engagement with relevant industry associations and growth-strategy driving government departments.
- The QCTO will manage the process of developing and registering qualifications. In order to do this, the QCTO must develop the internal expertise to lead this process across occupational “families” or “clusters”. It will have permanent staff with expertise in occupational families to replace the Development Quality Partner model. As recommended by a recent evaluation of the QCTO processes conducted by the GIZ, this could be started through establishing 4 or 5 units for the huge occupational clusters such as engineering and technology; business administration and services; health and social care and other clusters. Each unit will require at least three field-experts who will be actively involved in the development process. External facilitation expertise should be sought as necessary, rather than be built into the process. QCTO staff should lead the process of scoping qualifications, in consultation with experts. This should be presented to interested parties (employers and educators) in a more explicit role for stakeholders.
- The urgent short-term task for the QCTO is to appoint specialized staff and to develop the necessary institutional capacity for qualification design. Once this has been done, priority qualifications must be identified and developed. This will involve the consolidation of a number of curriculum development initiatives underway: at colleges, through private providers, and through the Department.
- The QCTO must work with the SAIVCET Unit within the Department who will assist at the level of curriculum and assessment specifications, as well as with the NAMB with regard to the curriculum and assessment of artisan qualifications in particular. The NAMB will be merged with the QCTO, as envisaged in the White Paper. This process should be initiated immediately, and completed by 2020.

The broad guidelines for these discussions are:

- Qualification documentation must be detailed and must include: curriculum (not just learning outcomes but actual syllabi, developed by SAIVCET), assessment specifications (for national assessment), and national certification systems. Where there is a national license to practice, detailed curriculum specifications are necessary. Certification will also vary across occupational fields.
- The overall number of occupational qualifications will be aimed at between 150 – 300, to ensure that there are an adequate range of responsive qualifications for which there is demand, and which can be offered in public institutions;
- Qualifications must be organized in occupational families/clusters. A one-size fits all approach may not be necessary for all qualifications.
- Occupational qualifications at the lower levels need to be defined considering pathways to preparation for occupations in a broad sense (and not just for jobs). Pathways between lower and higher level qualifications in the same field must be clear. In this regard the development of part qualifications of full occupational qualifications should be promoted actively.
- The process must take into account qualifications which already exist.

Employer involvement

South Africa (like many other countries) has a very poor track record of involving employers and those active in industry in developing qualifications and curricula.

- The models that are developed for consulting with employers need to be streamlined to ensure that key moments of consultation are identified and employers do not need to be involved in time-consuming and overlapping processes. This also has implications for the reduction of costs.
- The requirements for workplace-based learning in occupational qualifications will differ. Though workplace-based learning is critical for the quality of many occupations, there will be a range of options in different qualifications. Ideally the majority of TVET students should receive real workplace experience, but this cannot be a barrier to enrolment in TVET colleges. A range of issues relating to this are discussed elsewhere in this Plan.
- The SETAs will play an important role as labour market intermediaries in the area of occupational and professional qualifications. This role is discussed further in the next section.

2.4 Improving the labour market interface

This section is based on the National Skills Development Plan (NSDP) which has been developed within the Department, published in the government gazette for public comment, and discussed at NEDLAC. It is the result of a two-year process of formal consultation about the skills landscape within the post-school system following the release of the White Paper. It

should be noted that the NEDLAC process has not yet concluded and some changes may still be affected to this section as a result.

The White Paper addresses a range of problems and opportunities in the skills landscape and sets out a policy vision for skills development within the post-school education and training system. Central to this vision is an integrated system that incorporates a range of institutions in support of post-school skills development opportunities, and a closer relationship between post-school education and the world of work. The creation of the Department of Higher Education and Training (the Department) brought together institutions that were not designed to work together and the White Paper provided an opportunity to establish a shared vision for all the institutions working in support of post-school education, training and skills development.

This section addresses the strategies necessary to implement the White Paper vision for institutions supported through the Skills Development Levy. It addresses the mandate and role of the Sector Education and Training Authorities (SETAs); the skills planning mechanisms of the Department; and the need for better aligned funding, planning and monitoring mechanisms; as well as the role and mandate of the National Skills Fund (NSF) and the National Skills Authority (NSA). The main strategies relate to how the SETAs, NSF and the NSA will support the PSET system as intermediary bodies between the workplace and education and training institutions, and address occupational demand to enable economic growth, employment creation and social development.

A number of challenges relating to the SETAs need to be addressed, including: the lack of achievement of targets; governance challenges; complicated, expensive and wasteful administrative systems; complicated application processes for the public; and uneven capacity across the SETAs. In a context of scarce resources for post-school education and training and skills development, and a need for improved public accountability of the SETAs, it is necessary to re-examine systems and structures to ensure that resources are being used optimally.

This section also builds upon the National Skills Development Strategy III (NSDS III), which has been extended to 2020. The White Paper highlights the need to build on the important policy shifts that were introduced in NSDS III, including:

- providing greater levels of access to education and training in rural areas;
- increasing collaboration between the skills system, government and industry;
- driving skills development primarily through the public education system, and in particular through universities and TVET colleges; and
- focusing less on numerical targets and more on outcomes and impact.

The White Paper specifically emphasizes the need to address challenges that have emerged from NSDS III, including difficulties with work placement for graduates, and limited access to workplace based experience for those whose programmes require this. It also stresses that workplace learning must be an integral part of qualification and programme design and PSET institutions must be strengthened, and changed where appropriate.

The strategies articulated here are consistent with the original purpose of the Skills Development Act (SDA):

to provide an institutional framework to devise and implement national, sector and workplace strategies to develop and improve the skills of the South African workforce.

The skills development levy has a critical role to play in supporting this purpose and those of the White Paper PSET.

It is acknowledged that some of the strategies may require statutory amendments to certain regulations. Any changes will be introduced in a phased approach as systems and capacity are developed.

Aim of the skills levy-supported institutions: giving expression to an integrated system

The SETAs, National Skills Authority (NSA), National Skills Fund (NSF) and the QCTO will support the imperative for skills development for those already in employment, those who are unemployed as well as those who are pre-employed (students). This includes facilitating access to all relevant qualifications (and part qualifications) through post-school institutions, and ensuring that these are consistent with the imperatives of economic growth and development, employment creation and social development.

Funding from government will provide the base-funding for institutions, and funding from the SDL will complement this. It is critical that there is a coherent set of planning and funding systems that are properly aligned to ensure that system funding from different sources works together to contribute to the medium and long-term development and stability of the system, particularly in focusing on quality provision and workplace-based learning.

Future establishment of SETAs

SETAs have a central role to play within the post-schooling landscape as intermediary bodies between demand and supply, and they will be maintained and established permanently as statutory bodies.

The scope of their mandate will, however, be reduced so that their primary focus is on supporting skills planning through engagement with industry, ensuring that funding is allocated to support provision against demand and enabling access to workplace learning.

SETAs will be subject to rigorous performance reviews on an annual basis, and where a review finds evidence of non-performance this could result in the dis-establishment of the SETA.

It is anticipated that some rationalisation of the current SETA landscape will take place as agreed at NEDLAC. A process will be initiated immediately to identify the necessary structural rationalization within the SETA landscape. The process will be informed by both financial viability considerations as well as the logic for sectoral demarcation. The Department will ensure that the criteria and process are adequately consulted upon before final decisions can be proposed and implemented.

SETAs will cut costs by sharing resources and establishing a system of shared services. Areas for shared services include IT, human resources and regional offices to ensure a more

efficient use of resources. It is anticipated that with the introduction of these shared services it will be possible to reduce the administrative costs of the SETAs.

The Department will:

- Develop a business case for shared services. This is an immediate priority.
- Outline the provisions that guide the appointment and remuneration of SETA staff in accordance with government remuneration policies. This work can also commence immediately.
- Commence work on standardized systems for application, grant disbursement, workplace approval and data management. This must be complete by 2020.

Scope of the SETAs

The White Paper notes that a more streamlined mandate for the SETAs will be a key step to strengthening them and enabling SETAs to contribute more effectively to the realization of the objectives of the White Paper. This includes:

- working with the Department and engaging with industry to understand demand and signalling the implications of these trends for supply planning;
- allocating funding to steer the system to meet this demand and to ensure that there is the institutional capacity to deliver these programmes;
- supporting access to workplace learning; and,
- managing the plans, budget and expenditure of the SETAs as well as partnership arrangements.

Throughout these functions SETAs will focus on building their relationship with workplaces. Details of each of these functions include:

- Understanding demand and signalling implications for supply to encourage skills and qualifications for occupations and professions that support economic growth and development, encourage employment creation and enable social development. This means that SETAs will support the process of determining and outlining the demand for occupations in their sector through:
 - Engaging workplaces to enable them to provide increasingly relevant data on the skills of their existing workforce as well as projected skills needs (against occupations). This will be against the revised template currently being developed by the Department to replace the WSP/ATR;
 - Engaging stakeholders (including but not limited to employers, labour and government) to ascertain their perceptions of future trends in their sectors and the implications of these for the demand and supply of skills;
 - Engaging the relevant unit (skills planning unit) within the Department to explore the implications of the findings from the workplace data and stakeholder engagement with respect to sector trends.
- Steering the system:
 - The SETAs will work with the Department to analyse the implications of these trends for supply planning. This will enable SETAs to manage and use the levy-

grant mechanism to ensure that funding concentrates on driving the provision of quality qualifications and/or workplace-based experience.

- These will target the existing workforce, pre-employed (students) and the unemployed and will inform the career guidance processes to encourage individuals to follow learning and occupational pathways within this context.
- Supporting the Department in developing institutional capacity of public and private education and training institutions for the delivery of programmes against qualifications (on all the sub-frameworks) in occupations and professions that support economic growth, encourage employment creation and enable social development for workers, unemployed and pre-employed (students);
- Facilitating workplace-based experience as part of a qualification or for graduates post-qualification again with a specific focus on occupations and professions that support growth, encourage employment creation and enable social development;
- Performing system support functions and managing the budgets and expenditure linked to their mandate. This includes:
 - Administering the skills grants against the agreed upon priorities and timelines;
 - Working with the shared services to ensure a consistent application process for workplaces and potential learners.

The Department will ensure collaboration across the system to consider how best the SETAs can:

- Fund institutions/workplaces to increase enrolment and throughput in occupational qualifications;
- Support workplaces and institutional partnerships for integrated programmes; and
- Design and implement workplace-based learning incentives.

These funding mechanisms will ensure an alignment of funding sources to support occupational priorities and will allow for medium to long-term planning.

The Department, through institutions responsible for materials development, will also take responsibility for ensuring that the materials that are required to deliver learning programmes against the occupational qualifications are in place. This is a critical role for SAIVCET.

The White Paper highlights the complexity with respect to the manner in which quality assurance functions are implemented in this sector and argues that the system needs to be streamlined and simplified:

- SETAs should only undertake quality assurance related issues as they pertain to workplace approval.
- This requires that the functions carried by the SETA ETQAs (Information on Education and Training Quality Assurance) as well as those undertaken by the National Artisan Moderating Body are effectively integrated into the QCTO (Quality Council for Trades and Occupations) as initially anticipated. This process is already underway and will

consolidate the role that the QCTO plays in ensuring the quality of occupationally-related programmes.

- This shift in function will also support the refinement of the role of the SETAs and reduce the quality assurance complexity for providers who will only be required to engage with one quality council.
- It is recognized that during the transition process certain SETAs might have to fulfil a limited delegated quality assurance function, but this should be phased out as the QCTO takes on these responsibilities from 2020.
- There are several costing implications in this regard. The funding allocation of the skills levy will be reviewed to ensure the funding is in line with a reduction of quality assurance functions previously performed by the SETAs. Further, based on the QCTO business case the skills levy allocation as well as the fiscal allocation be reviewed to enable the QCTO to achieve the objectives determined. The skills levy determinations for the QCTO should also be in line with the longer term planning of the system so as to ensure an allocation of the skills levy over a 3 to 5 year planning period.
- The QCTO will engage with the National Skills Authority on a regular basis in relation to its mandate. Mechanisms will be identified to ensure that the priorities of the QCTO are determined by the demand identified through the skills planning system. The extent to which this results in qualifications being taken up and resulting to the intended outcomes will be monitored through the SETAs, NSA and the QCTO.
- It is further recognized that the skills planning system will support programmes against qualifications that are quality assured by other quality councils and that articulation, through improved relations between the quality councils, and institutions, will be encouraged and supported through the allocation of funding.

Funding allocation

Any changes that are made will be consistent with the initial purpose of the skills development levy, and aimed at increasing efficiency and effectiveness of the use of the levy to meet the demand for skills in the economy and to support expansion of the PSET system whilst improving quality.

Allocations will be undertaken in a manner that is consistent with the principles outlined in the regulations and to ensure a strong sense of accountability. Stakeholders will be involved at all levels. The following table highlights the allocation of SDL funding and its purpose.

SDL Allocation	Purpose
20% will continue to be paid to workplaces through the mandatory grant process.	This will still be managed by SETAs and will support national and sector priorities. Reporting templates are under review to promote reporting on all training and not just what is currently in the Workplace Skills Plans (WSP).

SDL Allocation	Purpose
10% will be allocated to support the administrative functions of the SETAs	This will provide for the administrative costs of the SETAs. A percentage of this amount will be used to support the shared services once they are established. The establishment of shared services, and the regulation of administrative costs will ensure greater efficiency and uniformity in operational expenditure.
0,5% of the levy will be allocated by the SETAs to QCTO	To support the QCTO's capacity to perform the relevant quality assurance functions for intermediate level vocational and occupational programmes offered by both public and private providers.
49.5% will go to SETAs	This will be used to support occupational and professional programmes to support economic growth and development, encourage employment creation and enable social development. Planning and budgeting will follow three-year cycles in order to ensure that the allocations in support of qualifications being offered in colleges and universities can be aligned to enrolment plans of PSET institutions. The Department will intervene if programme targets and appropriate grant allocation targets are not met. A mechanism will be put in place to claim back these funds and allocate against priorities if targets are not being met.
20% to the NSF	The NSF will continue to operate as a 'catalytic' fund and will support both unsolicited (proactive and reactive) and solicited proposals. This will enable the state to drive key skills strategies as well as to meet the training needs of the unemployed, non levy-paying cooperatives, NGOs and community structures and vulnerable groups. The NSF will play a critical role in supporting the development of community colleges in particular; in promoting strategic partnerships and innovation in project delivery; and driving change towards partnership-based programmes. NSF funding will also will build on the imperatives outlined in the NSDS III, support the HRDC and the monitoring and evaluation of the SETAs.

Accounting authorities

SETAs will continue to have stakeholder driven governing bodies (accounting authorities). The Department has considered the relationship between stakeholders and SETAs and recognizes the many challenges facing these governing bodies.

Stakeholders from business, labour and government will continue to nominate representatives onto the accounting authority in an equitable manner across the three parties. SETA Boards will continue to be appointed by the Minister of Higher Education and Training.

The Department will stipulate a maximum number of accounting authority members consistent with the principle of creating manageable structures. The decision about numbers on the accounting authority will take into consideration the nature of the sector (for example the number of sub-sectors) and the need to support effective decision-making and good governance. The accounting authority will continue to have governing powers and steer the sector in terms of the scope (mandate and functions) of the SETA as stipulated below.

The Department will define the role and responsibilities of the accounting authority. This will include a clear statement regarding conflict of interest and guidelines regarding the number

of meetings per annum and the rates at which members of the accounting authority are remunerated.

This is to ensure that the various challenges relating to governance of the SETAs will be properly addressed, and that authorities are focused on strategic issues rather than operational matters.

The Department retains the responsibility for appointing an Administrator when required. The Department will issue a more detailed document that defines the processes pertaining to the appointment of an Administrator whether the SETA has a CEO in place or not.

The new governance regulations and relationships pertaining to SETA accounting authorities will be developed immediately and completed by 2020.

Planning, reporting and accountability

The current planning and reporting cycles of the SDL institutions are not consistent with the overall government planning cycles. This does not allow SETAs working with their sectors to effectively plan and implement programmes in demand. It also creates certain budgeting and expenditure challenges.

The planning cycle will in future align with the Medium-Term Strategic Framework (MTSF) 5-year planning cycle and the MTEF 3-year budget cycle. Thus SETAs will establish their 5-year priorities against defined outcomes, a 3-year budget against this plan, and submit annual performance plans (in accordance with the requirements of the Public Finance Management Act, 1999). These plans will be reviewed within the context of the DHET plans for the post-school system.

The annual performance plan (APP) will allow the Department to review the plans of SETAs to ensure that the SETAs have met the agreed milestones. This will form the basis for the monitoring of the SETAs.

The Department will undertake a 3-year review of the contribution that each SETA is making to the intended objectives of the system and on this basis determine adjustments to the next 3-year MTEF budget against its 5 year MTSF plan and priorities (medium term outcomes). This will enable an understanding of the extent of alignment to the performance outcomes and ultimately to the National Development Plan.

There will be standardized timelines across SETAs with clear milestones for:

- Reaching agreement in the sector about the occupations that are required for economic growth, employment creation and social development;
- Issuing requests for 3-year proposals for programmes that result in qualifications for workers, unemployed and the pre-employed in these occupations and/or that support workplace-based experience for those in qualifications and/or graduates;
- Working with the branches within the Department to establish the funding required to support the development of the capacity of providers to deliver the institutional component of these qualifications;
- Awarding grants to workplaces and providers (in line with the agreements with the different branches of the Department) to enable the delivery of these programmes/workplace experiences; and

- Advertising when and where applications can be made by learners for these different programmes. This needs to link to the Central Applications Service once operational.

Increased standardization of processes related to the key functions of the SETAs should allow for the Department to monitor the extent to which the SETAs are attaining the goals in the APPs. Further, it will create certainty for stakeholders, employers, labour, and provider institutions, and potential learners. Finally it will provide the Department with a clear mechanism for sanction should SETAs not meet these milestones.

It is intended that workplace data will be analyzed centrally so as to allow for an economy-wide analysis of the occupations that are needed to support economic growth, encourage employment creation and enable social development. Use of data will be within the rules of the POPI Act where relevant. It will also be possible to address the quality of learner data systems, which at the moment are disparate, unreliable, not easily available, and sometimes non-existent. In order to track learners effectively and determine the education and labour market outcomes of all those who are supported, a solid data and information management system will be essential. This will have to be linked to improvements taking place across the Department.

It is noted that the Department does not yet have the capacity to undertake this analysis of all the WSPs, but must develop this over time. Through research grants, it will continue to rely on partnerships with higher education institutions and public research institutions that have the capacity to conduct relevant research in support of this process.

National Skills Fund (NSF)

The NSF role does not change dramatically, but it must be enabled to play a catalytic role in supporting the overall goals of the NPPSET, in particular regaining its focus over the medium term in supporting the most marginalised groups, including the unemployed, and primarily in the new community education and training system.

20% of the levy will be allocated to the NSF to focus on programmes that will address the needs of the poor (marginalized and disadvantaged groups) in a manner that supports the equity imperatives outlined in this document. The focus will be on skills development offered through the community education and training system.

The NSF will continue to support wider government strategies: youth programmes, developing small businesses and cooperatives, and rural development. It is anticipated that government departments and agencies will partner with the NSF in this area of work.

This money will also be allocated to research for the post-schooling system as well as to institutional development. It could, for example, be used in the form of incentives to support institutions to develop human and infrastructure capacity to grow the enrolment and throughput of programmes that are in high demand. In this regard the NSF will act as a catalytic fund to encourage institutional development and improved provision system wide.

National Skills Authority (NSA)

There have been a number of concerns about the role played by the authority. These will be addressed in the following ways:

- The NSA will be restructured and refocused. The Department will continue to consult stakeholders about ways to ensure the effectiveness and efficiency of the NSA. This could include the possibility of reviewing future representation on the NSA including increasing the level of expertise for its targeted functions.
- Individuals already represented on SETA boards cannot be on the NSA to reduce conflicts of interest.
- The Department will augment its secretariat support to provide the NSA with increased monitoring, evaluation and budget analysis capacity. This will allow the Department to furnish reports to the NSA, which can present an indication of how each SETA is performing. This will allow for deliberation on these achievements within the context of this Plan.
- NSA will also engage with the QCTO in relation to identifying occupations for which qualifications should be prioritised.
- The NSA may commission additional evaluations to understand the impact that SETAs are making to the overarching system objectives as outlined in the M&E framework for the NSDP. Where challenges are identified, the NSA will also make recommendations on required changes to the Minister.

Capacity development within the Department

This plan requires considerable capacity to be developed within the Department. This includes the ability to develop milestones, templates and standardized processes.

Further, the Department will require the capacity to plan across its branches within the context of the overarching PSET plan. This includes the focus on planning, supporting enrolment planning and creating mechanisms to support improved provision.

The Department will put in place the capacity to review the annual performance plans of the SETAs. This will include monitoring capacity as well as budget analysis capacity.

Role of partners and stakeholders

All social partners will need to support the principles and proposals outlined in this plan. The focus of this work will be on the implementation of the Skills Accord. In the Accord parties agreed that:

action and implementation should be a hallmark of the partnership, with constituencies identifying areas where they can make firm commitments as well as identifying actions that other constituencies would need to undertake.

These commitments are in eight key areas. There has been some adaptation of these in line with developments that have taken place since, though the substantive commitment has not been changed. These include the imperatives to:

- Expand the level of training using existing facilities more fully;
- Improve the role and performance of TVET colleges;
- Increase apprenticeships, internships and placement opportunities available within workplaces;

- Improve the level of training in occupations in high demand;
- Improve the funding of training and the use of funds available for training and incentives for companies to offer training;
- Set annual targets for training in state-owned companies;
- Improve SETA governance and financial management and stakeholder involvement;
- Align training to the NDP and ensure that there is effective planning at the national and sectoral level.

The Plan recognizes the important role that other government departments should play both with respect to supporting training of their own employees and in supporting the development of individuals in occupations in high demand. Further, it recognizes that government departments play a key role in these processes to work actively with social partners to achieve these commitments.

The important role of the HRDC in building support for the opportunities to involve these different social partners is recognized. These relationships need to grow to address emerging challenges in the system and to collectively identify solutions.

2.5. Infrastructure planning and development for post-school education and training

Appropriate infrastructure is essential to the achievement of the White Paper policy goals of expanded access, quality improvement, and improved success. Infrastructure must be seen as supporting and facilitating learning and training, supporting research and knowledge production, enabling community engagement, and improving the quality of collaboration across the PSET system. Larger multi-purpose lecture theatres, more student learning spaces, office and work spaces for additional academic and support staff, more libraries, e-learning centres, workshops, work simulation rooms, laboratories, research facilities and equipment, IT workstations and networks, student accommodation and recreational facilities will be required.

Infrastructure priorities vary across the sub- systems. The higher education sub-system has benefitted significantly from the introduction of infrastructure and efficiency funding over the past decade, which has enabled upgrades to infrastructure and the expansion of critical infrastructure. However, teaching and learning equipment at rural campuses is outdated and is in need of improvement. Student accommodation in the system is inadequate, and it is envisaged that minimum standards will be adopted to circumscribe its expansion and improvement.

The addition of new campuses where this is necessitated by increasing enrolments and programmes is envisaged for the community colleges, and will be a priority. The plan for community colleges, in chapter 3, indicates that a combination of strategies will be necessary for ensuring adequate infrastructure to support the growth and development required to establish community colleges.

The White Paper foresees the establishment of additional campuses in the technical and vocational education and training (TVET) sub-systems with attention being given to rural

areas to support the expansion of enrolments. However, this growth will be carefully managed in line with the proposals in this Plan as well as the available resources. Due to fiscal constraints, in the short to medium term, the PSET system will focus on improving efficiencies rather than scaled construction of new infrastructure.

Infrastructure strategies

The following strategies will support this area of work:

- 'New' infrastructure development will be limited in-the-main to existing projects (new TVET campuses (where funding is allocated already), existing infrastructure agreements with universities (including new universities) and addressing infrastructure backlogs at HDIs, as well as projects underway through the Student Housing Task Team.
- For the period of the Plan there will be a comprehensive focus on the maintenance backlogs relating to existing infrastructure across the system.
- An Infrastructure Development Support Unit (IDSU) will be established within the DHET to guide the system-wide acquisition, development and support of infrastructure within the public PSET system and to ensure that system-wide priorities are considered in all infrastructure development projects. The IDSU will also draw on support and expertise available outside the DHET.
- Once established, a critical task of the IDSU will be to conduct a national audit of publically-owned infrastructure in the post-school education and training sector, through which a permanent database, able to be updated annually, will be established. This will provide a critical information resource for supporting any new infrastructure developments, the re-purposing of existing institutions and campuses, and the development of specific infrastructure-sharing projects. Some information is already available in parts of the system, and will feed into this project.
- Construction and deployment of new physical and ICT infrastructure will be guided by a macro-infrastructure framework for the PSET system. A draft framework has already been developed for the public universities and draft guidelines for infrastructure management are being finalised. These guidelines will provide principles and norms and standards for managing university infrastructure, as well as a web-based ICT platform which houses a repository of infrastructure information about each public university. Similar work will need to be done across the PSET system.
- The establishment of community colleges will require some new infrastructure development, as well as the identification of unused and under-utilised government-owned buildings that can be repurposed, including those that fall under the auspices of local government. Infrastructure will be a necessary priority focus in the community college system.
- A specific focus on the development of the necessary e-learning, workshop and work simulation infrastructure and equipment is necessary for TVET Colleges. This must be linked to the enrolment planning and PQM process that will be put in place for the public system.
- New infrastructure will need to be accompanied by plans and budgeting for infrastructure life-cycle maintenance into the future. There will be a focus on institutionalising compliance with a range of regulations and legislation now in place – e.g. Norms and Standards for student housing (which must be revised urgently), Infrastructure Development Management System (IDMS), National Standards for Infrastructure

Development, the Construction Industry Development Board (CIDB) Maintenance Standards such as the National Infrastructure Asset Maintenance Management Standards (NIAMMS), the Standards for Infrastructure Procurement and Delivery Management (SIDPM), and others.

The Department has gained key insights from the oversight and management of recent infrastructure projects in the PSET system, which include the development of the two new universities in the Northern Cape and Mpumalanga, and the building of new TVET campuses in various areas. These have also highlighted the importance of integrated planning for shared infrastructure going forward. The Department must integrate planning across the various subsystems as much as possible.

The establishment of the Imbali Education Precinct (IEP) in Msunduzi, KwaZulu-Natal has shed light on the possibilities for reducing costs through collaboration, integrated planning and shared infrastructure. This multi-stakeholder collaboration aims to improve and integrate various tiers of education, including school and post-school facilities and associated amenities into a sustainable education delivery system. The range of stakeholders include the Department, Durban University of Technology (DUT), uMgungundlovu FET College, KwaZulu-Natal Provincial Education Department, and Msunduzi Municipality. The IEP links together in close physical proximity a range of education institutions including a university, a TVET College, three high schools (1 technical with boarding establishment, one commercial and general), a special needs school, a primary school and a community college, all bordering the University. The Imbali Precinct will be fully operational by 2022. It will provide important lessons for the development of other pilot and fully functioning precincts over the period of the plan. An effective M&E strategy will need to be put in place to ensure that the DHET and its partners can learn from the work that has taken place in the IEP.

- The DHET will also facilitate the implementation of at least three pilots (including Imbali) of the “precinct” idea in at least three different provinces over the period to 2030, in areas where there is existing possibility for the development of precincts. Locations need to be identified and project teams put in place to coordinate and manage the processes. These must be linked to the development of the Community colleges system, so that each precinct must include a Community Learning Centre or a Community College head office (CETAC).
- The Department will develop a national framework for integrated infrastructure development and maintenance in the PSET sector to ensure that standards, methods, strategies etc. comply with a certain set of principles and core process – e.g. any new developments have to take into account possibilities for infrastructure sharing, precincts, re-purposing of buildings, etc. before projects can commence.

ICT infrastructure

Information and communication technology (ICT) infrastructure, recognised for its potential to improve teaching and learning and to expand access, is extremely uneven within the system. In order to improve equitable access to meaningful ICT infrastructure, which is a priority –all PSET institutions should have access to high quality bandwidth and the necessary ICT infrastructure for administration, teaching and learning, and to support research. The completion of the SANREN access project for TVET colleges and rural university campuses will

take place as planned and will bring significant improvements to the TVET College and HE sub-systems by 2020. Community colleges will also be connected to SANREN as they are built and developed.

A national audit to fill the information gaps on ICT infrastructure is needed, which can then form the basis for an ICT infrastructure module as part of a comprehensive system-wide space data system. There is also need to incorporate the use of GIS data. The national audit must commence immediately and should be completed by 2020. A national data system must be developed by 2023 and must have the capability to be updated on an annual basis.

CONFIDENTIAL DRAFT

Chapter 3: Building and strengthening community colleges

3.1 Introduction

Community colleges are introduced in the White Paper as a new institutional type that will cater for the knowledge and skills needs of the large numbers of adults and youth requiring education and training opportunities, unemployed people, and those employed but in low or semi-skilled occupations. StatsSA estimates that more than 18 million people above 20 years have educational levels below the National Senior Certificate, and there are few opportunities for education and work for them. This includes more than three million youth aged 15 – 24 years, and 4.4 million aged 25 – 34 who are not in education, employment or training (NEETs) (StatsSA, 2016), and people in rural areas who constitute the most marginalised.

The purpose of this Plan is to provide guidance on the establishment of community colleges and how to strengthen them to serve the needs of the many people who require adult post-school education and skills development opportunities. The Plan outlines the current state of Community colleges and juxtaposes this with a vision for 2030. The Plan articulates the rationale and vision for the sub-system, and outlines how to establish and strengthen the colleges. This is framed through four key focus areas:

1. **Establishing community colleges** so that there is adequate infrastructure for optimal operation of colleges, with well qualified and adequate staff, student support services to promote student success and governance and management structures that hold college principals and lecturers accountable and assist them with achieving the goals of access with success, and sustainability. As the notion of Community colleges is new in the South African context, a critical dimension to the establishment of colleges is the **piloting of programmes within the new community colleges**, which will provide knowledge about the best way to build and strengthen community colleges. The aim is to create a differentiated sub-system that caters to varied needs of communities, individuals, and society.
2. **Programmes** that are responsive to the needs of communities and that enable individuals to find work, start businesses, and develop sustainable livelihoods and progress into other education institutions, will be offered in colleges.
3. **Resourcing** the sub-system to achieve the objectives set out in the White Paper will require significant fiscal investment and other sources of funding and partnerships for various other contributions like physical space, programme partnerships and other areas.
4. **Monitoring and evaluation** is critical to ensure systematic learning from the pilots and the establishment phase. Adaptive management will focus on addressing challenges timeously to improve implementation of the Plan and to avoid protracted wastage of resources.

3.2 Community colleges in 2017

Prior to the function shift in 2015, adult education and training was provided in more than 3 000 Public Adult Learning Centres (PALCs) under the oversight of provincial education departments. In March 2015, the Minister established nine Community Education and Training College Administrative Centres (CETACs), one in each province. These are now referred to as the community colleges. Each CETAC oversees Community Learning Centres (CLCs), made up of a cluster of PALCs. The CETACs and their CLCs constitute a process in the transition from PALCs to the envisaged community colleges. Challenges include limited programme offerings, as PALCs programmes and qualifications mirrored those of the schooling system, and lack of dedicated infrastructure for the CLCs, as PALCs mostly provided learning spaces through schools and other institutions. Furthermore, ICTs have not yet been established as a tool for teaching and learning in the community colleges. The staff in the sub-system currently are poorly qualified and it has been difficult to retain qualified educators. The majority of educators are part-time school teachers. Access to teaching and learning materials has been limited because budgets are mostly used to cover staff salaries. Currently, the CET sub-system, proposed in the White Paper to expand by more than 300%, receives only 2% of the entire PSET budget.

Another challenge which is as a result of the newly established architecture is that although the nine community colleges have all appointed their councils based on the provisions of the CET Act, this model of Council membership is premised on a 'head office' and expert-driven approach to institutional governance, with very little room provided for community participation and involvement in college governance. While this is understandable in the light of the geography and architecture of the PALCs model that was inherited and incorporated into the new college sector, more should be done to overcome the barriers to community engagement that arise from the governance framework as stipulated in the CET Act.

Despite these challenges, a key strength in the CET sub-system is that additional to the community colleges which are meant to provide public community education, there are multiple community based structures that have historically provided education to communities. These include not for profit organisations (NPOs), multi-purpose centres and non-governmental organisations (NGOs), which provide programmes as wide ranging as health, youth development, community development, early childhood development, driving lessons, computer literacy, arts and culture etc. Some of the programmes are accredited. However, a major challenge for many of the NPOs and NGOs is sustainability as the majority rely on donor funding. The existence of organisations operating in communities is an asset for the establishment of community colleges as there exist multiple opportunities for partnerships and collaboration, building on good programmes already operating.

Another key strength and an opportunity is that there are several national social and economic development programmes and strategies like Expanded Public Works Programme, Community Development Works, Department of Agriculture, Forestry and Fisheries (DAFF) farmer development programmes and implementation of small scale fisheries policy, the Department of Trade and Industry (DTI) cooperative programmes, and others that can provide important links with the new community college system in training for skills

development support to these programmes. Inter-governmental partnerships could provide crucial development opportunities for community colleges going forward.

3.3 Community colleges in 2030

Community colleges will:

... open up diverse life-long learning opportunities for individuals and communities within a community context, so that they can improve their quality of life, progress into other post-school institutions, improve chances of finding work, and start and sustain businesses.

The White Paper stipulates that by 2030, community colleges should be enrolling 1 million students. In the long term there will be 52 community colleges with a main campus in each district municipality, with a learning centre in each of the 226 local municipalities. However, given current fiscal constraints and the need to build strong capacity for staffing the community colleges, identify appropriate infrastructure etc., by 2030, there should be 27 fully operational community colleges, three in each province. The text box below broadly describes the 2030 vision for Community colleges.

People will hear about Community colleges from community liaison officers and various media platforms. On entering any college to inquire about what the college can offer, community members will be told about the range of programmes and qualifications on offer at that college, including academic programmes, and skills and occupational programmes. They will also be advised on what formal or non-formal programme or qualification they can enrol on should they wish, based on their prior learning. They will also be told about the duration of a programme, and what articulation pathways are available after completion, either to another programme within the CET sub-system, to a TVET college or university, or to the world of work. Community members will also be informed about community development programmes to provide communities with knowledge and skills to improve their daily lives, for example, how to care for the environment, and how to take care of children, the aged, and those with critical illness.

Those who decide to enrol for a formal programme or qualification will get career advice and articulation pathways will be mapped out for them based on their choice of programme/qualification. Placement assessment will be taken by the students to determine the student support required to ensure the students' success. Students will be taught by well qualified educators. Student support services available will include both academic and psycho social support. Students will be able to exit the colleges as quickly as possible and move on to a range of other meaningful opportunities within PSET.

3.4 Why do we need community colleges?

The establishment of community colleges is essential for various reasons:

- The importance of lifelong learning is signalled in the NDP and is a critical link to community education and training. The NDP specifies that *all sectors of society need to set up lifelong learning initiatives to ensure that citizens have ample opportunities to*

develop their skills and gain a deeper understanding of the ever-changing environment in which they live (2012: 277).

- Some students will require adult basic education, which the Constitution stipulates as a basic right for all citizens.
- Others will need to complete secondary schooling outside the schooling system or get second chance opportunities to rewrite the National Senior Certificate/NASCA. No other public post school institution is offering these.
- No other post school institutions are offering a diverse range of formal and non-formal programmes and qualifications for youth and adults.
- Community colleges will help to balance out the pressure on the TVET and higher education sub-systems, which are under constant and relentless pressure to expand beyond current capacity and funding. They will provide a necessary expansion of post-school opportunities and an alternative choice for young people and adults who have left school.
- Community colleges have a particularly important role to play in local/community social and economic development, providing support for entrepreneurship and small business development and thereby stimulating local economic development.
- Community colleges will support the achievement of three of the NSDS III goals: to address the low levels of youth and adult language and numeracy skills; to support cooperatives, small enterprises, worker initiated, NGO and Community training initiatives; and to build career and vocational guidance.
- Provide progression opportunities for those who have already left schooling.

For these reasons, South Africa cannot afford **NOT** to invest in Community Colleges as *“the real costs of illiteracy and under-education (in terms of lost productivity, skills shortages, lack of competitiveness and entrepreneurial capabilities) are staggering”* (MTT CET Report, 2013).

3.4 Objectives of the Plan for community colleges to 2030

In order for this vision to be achieved, there needs to be a shift in understanding about the role of the new community college system. Community colleges will be fundamentally different from PALCs in order for them to achieve the desired change.

The following strategic objectives should inform the establishment of Community colleges:

- **To expand access** to greater numbers of students of different ages and with varied prior learning. Access will be enabled through diversity of programme offerings, developing infrastructure that enables people with disabilities to access colleges, free tuition for poor students, and using ICTs to expand access and support teaching and learning. Community colleges should be differentiated and offer programmes that cater for regional and local social, economic and employment need and opportunities.
- **To establish well-functioning and efficient community colleges**, by capitalising on existing resources to establish community colleges, and ensuring that colleges have the required capacity to support students to succeed within the college and move on to other opportunities and to do so within reasonable timeframes.

- **To empower community colleges to serve the needs of their students and communities** by providing financial and strategic support from government, but allowing colleges the autonomy to determine their own programme qualification mix in line with available capacity and resources.
- **To leverage ICTs to improve administration, teaching and learning** by utilising cost effective but dynamic tools, software and applications to manage college administration including student records, and to support innovative teaching and learning. Applications used must allow dynamic analysis of student performance data to enable evidence based improvement of learning outcomes and to determine students at risk early enough to offer intervention for retention, improvement and success. They should also cater for diverse student learning styles and needs. Communities can also gain access to technology at the College. Though forms of blended learning may be used, distance education is not supported at this stage.
- **To improve the success of community colleges** by offering career and programme/qualification guidance at enrolment, providing foundational learning and other required student support services, improving retention and throughput. Success will also be achieved by supporting students who succeed in a college to articulate to other post school institutions or the world of work.
- **To develop visionary community colleges** that adapt to the changing needs of communities and the social and economic environments, and are open to growth. As the demand grows, community colleges may be able to offer programmes at higher levels if they develop the capacity and resources to do so.
- **To provide adequate funding for the CET sub-system** through a careful and systematic injection of financial resources to develop basic institutional infrastructure, ICT infrastructure, learning and teaching support materials, and a capable staff. It is well understood that there are fiscal constraints, and partnerships will play a major role in injecting resources for the development of the sector. However, partnerships will not be sustainable in the long term and fiscal, Seta, and NSF funding should eventually constitute the bulk of Community College funding.

3.5 Establishing and strengthening the sub-system

In order to take the CET sub-system to the desired state by 2030, the following focus areas and proposals should guide the establishment and strengthening of the sub-system:

Establishing community colleges

There are eight components to the establishment of Community colleges: building the capacity for establishing the colleges, selection of programme offerings, infrastructure, staffing, student support services, governance and management, information collection and analysis, and piloting.

Building the capacity for establishing community colleges

To establish community colleges with any reasonable chance of success, given the limited capacity in the Department, the Department will establish a Community College Institution-building Unit (CCIBU) **immediately**, for a period of five years to provide capacity for the

implementation of the pilots and the development of the new system. The Unit will operate as a sub-structure working within the relevant branch of the Department, drawing on specialised short-term capacity where necessary.

This is necessary because an institution-building programme of this nature is not the usual work of the Department, and the college sector will not be built and developed if a business-as-usual approach is adopted. The CET branch will therefore establish a CCIBU, which will draw on the support of senior members of the various units (Programme Management: Community Education and Training; Community Education and Training Colleges Systems Planning, Institutional Development and Support; Financial Planning; and Education and Training and Development Support) as well as additional experts on short-term contracts. This unit will drive the development of the sector in the initial five year period.

The CCIBU will advise and oversee institution building across the 52 district municipalities. By 2025, fully fledged main campus infrastructure will be constructed for 18 district Community colleges, two in each province. Each college will have satellite campuses and community learning centres as appropriate. While resources are being channelled into developing these into fully fledged community colleges, the CLCs in the other districts should not be neglected as these will support the community colleges that will be developed in these districts in the longer term. So, while there may be no infrastructure development in the other 34 districts, they will also benefit from development initiatives like educator training that the 18 districts where campuses are being constructed or established will receive. CETACs will also facilitate any necessary partnerships for the CLCs in the 34 districts and infrastructure maintenance will be budgeted for, for CLCs that own their own buildings.

After the initial institution-building period, the Department, together with CETACs, will support the new colleges, but institution-building and partnership building will continue. At this point some of the institutions will have the capacity to drive this work on their own, with funding and other support, and some will still be driven from the national and regional offices.

Selection of programmes

Community colleges are currently dominated by the historical offering of adult basic education qualifications. Many colleges have focused primarily on enrolment in the GETC. Some have also been offering some form of 'second chance' matric. The new community college must continue to offer general education programmes where there is demand for these. It is also desirable, however, that community colleges start introducing skills programmes. This requires a lot of preparatory work: understanding individual and community needs in this respect; bringing in capacity to offer skills programmes; developing partnerships for delivery; accreditation and certification systems; funding etc. This work will begin to move the previous PALCs into a different set of programme offerings, and it is work that is critical for the development of a new community college system.

Infrastructure

Community colleges will be made up of three structures: the main campus or head office which will also be the administrative hub; learning centres; and satellites. Eventually, beyond 2030, each of the 52 municipalities will have a main campus. Ideally, each of the 226 local municipalities should have its own learning centre, in the long-term. By 2030, 27 Community

Colleges should be operational. Where possible, the Department will build or re-purpose facilities specifically for Community colleges. In other instances, the Community Education and Training Administrative Centres (CETACs)/head offices, with the support of the national DHET and the assistance of municipalities, will seek to identify unused or under-utilised buildings which will be refurbished for the establishment of colleges. This will require an infrastructure audit of both the former PALCs to establish where space is owned by CLCs, as well as of other public infrastructure that can be utilised for college learning and related activities.

The CETACs, with the support of the national Department, will oversee the development of partnerships with purposefully selected providers who have additional infrastructure or spare infrastructure at certain times. This includes public institutions like schools, TVET colleges and universities. There are other non-profit organisations which may be approached by CETACs for partnerships which have their own spaces e.g. churches, community halls, etc.

There must be a physical structure where the college will attend to its main administration and this must belong to it. The location of the main campus must be decided first with issues of accessibility in mind, even if other learning centres are being developed at the same time somewhere else.

Community colleges should be geared up to use technology for teaching, learning and administration and ICT infrastructure should be enabled through appropriate hardware and software purchases and by linking up Community colleges to the National Research and Education Network (SANREN). In the long term, good connectivity will assist with expanding access especially for those in remote areas who cannot get to a physical college but have access to the internet.

Staffing

The Policy on Staffing norms which proposes class size norms for different programmes shall be used for the determination of the number of educators required for each college. The Department will ensure that each college has an adequate number of teachers based on the norms. At a minimum, each college should have a principal, an administrator, a community engagement officer (critical for initial community engagement), two academic planning/coordination staff, teaching staff as well as staff dedicated to student support services. Permanent staff will be employed for core programme offerings while other short term programmes that are difficult to plan for ahead of schedule, for example community programmes, will rely on contract short term staff and partnerships for their delivery. Many students may be part-time and also many programmes may be of short duration. Through the pilot programmes it will be essential to establish a clear understanding of the longer term staffing needs of community colleges, which will include both permanent staff and those on short-term contracts. The nature of staffing for community colleges and how this differs from other institutions in the system will need to be explored and new mechanisms developed to manage this.

The educators in the system will require significant capacity building and the Department's Teaching and Learning Development Capacity Improvement Programme will enable universities to offer qualifications for adult and community educators. SAIVCET will also play a critical role in the professional development of community college educators and lecturers.

Student support services

All community colleges will offer appropriate academic and psychosocial support, as required by the students, and career advice and guidance and employment services to all students. Academic and psychosocial support will improve retention and success, and can be offered through college staff and through partnerships with NGOs and NPOs who are already facilitating some of this support in communities. Career advice and employment services, available through regional offices and through the national career portal, as well as through the Department of Labour, will improve student articulation into the world of work.

A key ingredient to supporting CET students should be to provide support for entry into self-employment initiatives, co-operatives. This can be done through establishing linkages with entrepreneurship hubs and employment creation initiatives. The college is likely to be an important access route for enabling students to interact with such services, where they are available.

Governance and management

The governance systems and structures of community colleges must allow for participation and involvement by the targeted communities in the affairs of the colleges. It is envisaged that during the first five-year phase of development, with the support of the Community College Institution-building Unit (CCIBU), an appropriate governance model (or models) for the Colleges will be developed, which is different from that of TVET colleges and universities and is fit for purpose.

Information collection and analysis

The strength of any system lies in the extent to which information is available about it, to support its development. Community colleges are being established off a base of weak information systems and an absence of credible data. In order to build a credible system, it is important that platforms for the collection of data about the system at institution and system level are designed and developed at the outset. It will also be important to link this data to other public data sets like those within social services, health, schooling, etc. Collecting, analysing and reporting on this information will strengthen the system as it grows.

Pilots

Because Community colleges are being built from a legacy of weak and poor provision in the former PALCs, and this is a new institutional form, the ideas about how Community colleges will operate effectively can only be tested through pilot programmes and partnerships. The four focus areas mentioned previously that inform the establishment and strengthening of Community colleges will be tested in the pilots. Establishment of colleges will include a mix of construction of new campuses, shared spaces, and donated infrastructure. Various technology-enabled teaching methods will be trialled at pilot colleges. The pilots will map programme offerings aligned to national social and economic development programmes like EPWP, CDW, Smallholder farmer development programmes, cooperative development etc., as well as specific locally responsive programmes e.g. programmes addressing drug abuse and programmes targeting fisher communities. Programmes aligned with national development initiatives could be offered at all pilot colleges as applicable, additional to specific locally responsive programmes. Different partnerships will be pursued to offer these programmes. Educators to teach in the pilots will be carefully selected and capacitated, and funding will come from various sources including funds from government (voted funds),

SETAs, the NSF, and other government departments with programmes that can support community college training for mutual benefit.

Strategies	Responsibility	Timeframes
The DHET will as a matter of urgency source funding for range of pilot programmes.	DHET	Immediate and ongoing
The DHET and the community colleges will establish and nurture partnerships for pilots, starting immediately.	DHET and community colleges	Immediate
Implementation of pilots at selected sites	DHET and CCIBU	Immediate to 2022
Monitoring and evaluation of pilots	DHET and CCIBU	2018 - 2022
Improve implementation based on monitoring and evaluation	Community Colleges and DHET	ongoing
Audit of former PALCs/CLCs and existing public and other spaces to establish the scope of utilisable space for establishing colleges	DHET	Immediate and ongoing
Audit of existing staff and qualifications to determine capacity building strategy	DHET and Community colleges	Already underway. Complete by 2019
Capacity building of college staff, management, and councils	DHET, SAIVCET	2018 - 2030
Where possible, build facilities for community colleges	DHET	From 2018 - 2030
Identify and secure spaces that can be used by colleges	DHET, CCIBU, Community colleges, and Municipalities	From 2018 and ongoing
Community colleges must be connected to SANREN from the outset to ensure adequate ICT infrastructure at the start.	DHET, DST, DoC	By 2020 and ongoing in line with building and repurposing of infrastructure.
Audit of community based student support initiatives in all areas with CLCs.	DHET and Community colleges	Immediate. Complete by 2020.
Establish partnerships with community based entities for provision of student support services	DHET and Community colleges	Immediate and ongoing.
Review and alignment of existing policy in line with proposals for the establishment of community colleges	DHET	From 2018 and ongoing

Programmes

Four categories of programmes will be offered in Community colleges:

- **Skills/occupational programmes** will form the mainstay of Community colleges and will focus on skills to enable people to gain entry into the world of work. These programmes will also prepare students for entrepreneurship, business, or self-employment as graduates cannot all be absorbed into the formal labour market. Given the diverse levels of prior learning of students entering community colleges, the programmes will have a high practical component. The programmes will offer strong articulation possibilities to TVET colleges and will also address the skills components of national social and economic development programmes like EPWP, CDW, smallholder development, cooperatives etc.
- **Community education programmes** with a focus on community development will mostly be non-formal. These will include programmes like health and child care, financial management, conservation, democracy and citizenship etc. Not all programmes will be accredited, and not all will constitute formal qualifications, although a balance is necessary.
- **General or academic programmes** will include the General Education and Training Certificate for Adults (GETCA) and National Senior Certificate for Adults (NASCA). The provision of adult basic education programmes is a constitutional imperative and these must be available through all community colleges, as needed. The NASCA can articulate to TVET colleges and university, although some engagement with universities will be necessary to determine the extent to which NASCA prepares learners for university. The GETCA and NASCA will be essential in as much as they provide foundational skills in maths, science and language for uptake of skills programmes. The DBE has increased its offerings of second chance matric programmes that will prepare students for further education. Some engagement is required between DHET and DBE on whether the GETCA and NASCA could be offered as part of the suite of second chance programmes. These discussions are critical as any streamlining that is possible will enable scarce resources in the CET sub-system to be redirected to other programmes on demand.
- **Foundational learning programmes** will also be offered to provide a range of support necessary for students entering community colleges. These modules will be offered flexibly and will not necessarily constitute a formal qualification.

Programmes will be offered based on demand, and demand will be signalled by what communities determine as well as municipal Local Economic Development (LED) plans.

The Department and Umalusi will provide an oversight role on the assessment and certification of GETCA and NASCA, while the Department and the QCTO will manage assessment and certification of skills programmes. Students can be awarded certificates of attendance for community programmes by the responsible service providers.

It must also be noted that community colleges will not be restricted to offering programmes only at particular levels of the National Qualifications Framework (NQF). In the long term this opens up the possibility for colleges to offer Higher Certificates (for example) should the demand, capacity and necessary resourcing be available.

Strategies:

Strategies	Responsibility	Timeframes
Discussions between DBE and DHET to discuss the scope of DBE second chance programmes and the introduction of GETCA and NASCA over time and discussions with HE about adult matric and access to university.	DHET and DBE	Immediate. Complete by 2020.
Funding for and support materials for NASCA and GETCA to be developed	SAIVCET and DHET	Immediate and ongoing.
Engage with municipal LED plans to determine local demand, and with data from the DHET on demand to determine regional and national demand	Community colleges	From 2018 and ongoing
Audit of local skills programmes and community programmes to determine what could be utilised by colleges	Community colleges	By 2018 and ongoing
Establish partnerships for programme offerings	Community colleges	From 2018 and ongoing
Explore immediate opportunities available for delivery of part-qualifications and skills programmes in community colleges, based on qualifications already established and link to pilot opportunities across all 9 existing colleges.	QCTO and DHET	Immediate

Resourcing

To achieve expansion with success, which includes developing infrastructure and offering diverse and responsive programmes, capacitating lecturers, offering student support services, piloting the community colleges and monitoring and evaluation, substantial financial resources are required. The community colleges should be funded from government, SETAs, and the National Skills Fund.

Funding from government in the form of voted funds will need to be increased as soon as possible in line with the envisaged growth of the sub-system. At a minimum, the core minimum staffing necessary for the operations of the current community colleges (and in total the 27 planned by 2030) must be provided from voted funds.

Other sources of funding will need to be secured especially during the initial few years of establishment and to support the pilot programmes. Potential sources of other funding include municipal contributions to the development of colleges and colleges collecting tuition fees for training students on other government funded developmental projects that require training including Expanded Public Works Programme, Community Development Works, Department of Agriculture farmer development programmes, the Department of Trade and Industry Cooperative programmes etc.

Financial sustainability in Community colleges will also be assured through resource based programme planning, as well as diligent monitoring of college financial reporting by the Department. Financial capabilities of council members will need to be improved in order for the council to effectively fulfil its fiduciary responsibilities.

Other resource needs like infrastructure and teaching spaces will have to be negotiated through partnerships with other public entities. Financial resources will also be prudently managed through utilising existing programmes and expertise rather than developing these from scratch. Wherever possible, community colleges will link with available resources at university and TVET college campuses within their vicinity.

Strategies	Responsibility	Timeframes
Developing a framework for joining up funding from government, SETAs, and NSF	DHET	Immediate
Work on increasing the fiscal budget for CET to fund the minimum agreed core costs of the community colleges and CLCs currently established.	DHET and National Treasury	Immediate and Ongoing
Explore immediate funding opportunities across government and the private sector to support pilot programmes.	DHET and community colleges	Immediate
Develop framework and guidelines for partnerships aimed at resourcing and negotiate such partnerships	DHET and Community colleges	Immediate and ongoing
Analysis of enrolment planning to ensure alignment with resources	DHET	Start in 2018 and ongoing
Continuous monitoring of college income and expenditure to ensure continued financial health	DHET	Ongoing

Monitoring and evaluation

In order for key lessons from the pilots to inform the CET sub-system, there should be dedicated monitoring and evaluation of the pilots as well as work taking place across the college system, where pilots may not be in place. Evaluation has to be an integral aspect of the conceptualisation of pilots so that baseline data is collected and a rigorous evaluation design that enables attribution of change to inputs and activities is possible. This means that the necessary resources must be built into the funding models for pilot programmes. The findings and recommendations from the evaluation of the pilots will inform the changes needed to the community college Plan for the remainder of the period to 2030.

Strategies	Responsibility	Timeframes
Monitoring of pilots	DHET and CCIBU	From 2018 - 2022
Monitoring of non-pilot colleges	DHET	From 2018 - 2030
Improvement of implementation of pilots and plan using monitoring data	DHET and Community	From 2018 and ongoing

	colleges	
Evaluation of pilots and establishment of colleges	DHET and DPME	From 2018 – collection of baseline data

Other areas:

While it is not an area of focus in the immediate term, a determination will need to be made at a later stage (following the completion of pilots) about whether separate legislation is necessary for the community college system. Policy and legislation must support the necessary form and function of the sub-system over time.

The necessary capacity of the Department (both at national and regional office level) to support the implementation of this plan, must be urgently determined and put in place over time. This will form part of the overall organisational development process that will need to follow the adoption of the National Plan from 2018.

CONFIDENTIAL DRAFT

Chapter 4: The development of Technical and Vocational Education and Training

4.1 Introduction

The White Paper for Post-School Education and Training describes TVET Colleges as the cornerstone of the post-school system for South Africa and proposes an expansion of the sub-system to absorb the largest enrolment growth in the post-school system. The National Development Plan (NDP) also situates Technical and Vocational Education and Training (TVET) Colleges as a critical pillar of the emerging post-school system and vital for social and economic development.

The growth of stronger TVET colleges will expand provision of mid-level technical and occupational qualifications that will articulate directly into the world of work for the growing numbers of young people leaving the schooling system. A significantly expanded TVET sub-system will also relieve the higher education sub-system which is already under strain from high demand driven by student aspirations for post-school education and a lack of alternative and attractive opportunities elsewhere in the PSET system.

TVET is a high priority for government. The focus on the sub-system since the recapitalisation of the public TVET colleges, and a range of intervention programmes since the creation of the Department, including the Turnaround Strategy, have led to some positive changes in TVET colleges that are starting to show results, but the system has been asked to do too much, too fast, with too little support. The sub-system must build upon its existing strengths, but growth must be realistic. TVET colleges cannot be expected to improve capacity and quality without adequate planning, support, and resourcing. Expansion has to be built on improved capacity and performance, both of which require significant new investment in a chronically underfunded area.

The proposals for the expansion and strengthening of TVET are systemic and inter-dependent to gear the system up to become more successful: better enrolment planning will allow for purposeful decisions about areas of specialisation in colleges and will ensure funding is targeted and purposeful, guiding growth over time into the new qualifications, without immediately dropping opportunities that are currently in place. Wherever possible, the sub-system needs to avoid working according to short-term or ad hoc projects, unless they are explicitly linked to the longer-term development of the sub-system.

This plan is designed to focus primarily on **the growth and development of the public TVET system, and in particular public TVET colleges**, although it has implications for the many institutions involved in delivering and supporting TVET: schools, universities, private colleges and skills providers, workplace training, quality councils and others.

4.2 Objectives of the TVET Plan

The objective of the plan is to explicitly provide an implementation framework to achieve White Paper goals of **an expanded and strengthened TVET sector providing quality technical**

and vocational education and training that prepares students for the world of work. The world of work is understood here as being broadly defined, encompassing formal employment, self-employment, and other forms of work. The primary purpose of TVET is understood in this Plan as providing mid-level skills for the world of work, which means providing skills that will enable students to access the world of work because they have specific and generic technical and vocational skills. It is based on this understanding of the purpose of TVET that the proposals for the TVET sub-system for the NP-PSET are framed.

The Plan sets out a coherent roadmap for the effective development of the TVET system, taking into account the vast scope of changes necessary, and the need for careful transitions. It argues for more cautious and contained growth in enrolment, setting out clear strategies for changes to the public TVET system in particular, to address all the areas of weakness. Ultimately, the strategies attempt to balance working towards a vision of a significantly expanded and improved TVET sector, while taking account of the need to reverse chronic under-performance and grow capacity, within a severely constrained fiscal environment and a complex post-school system. Growth must be built realistically on the gains made in the TVET sector, without crippling it with unrealistic expectations and pressure from a range of interventions that are not aligned to an overarching strategy.

The immediate focus will be on developing and introducing new occupational and higher certificate qualifications and conducting intensive staff development and support materials development, which will stimulate and consolidate the role of SAIVCET. Focus programmes should also include programmes in the business and hospitality areas and not just in the engineering-related qualifications. Further, there is a need to ensure that the programmes selected relate to the broader definition of demand outlined in this plan: this includes a focus beyond critical and scarce skills to those qualifications which enable larger numbers of individuals to access employment as well as those qualifications that are central to social development. While this is taking place a number of critical conversations, particularly with the Department of Basic Education, will need to be resolved as soon as possible.

4.3 Policy imperatives for the TVET system

Countries with strong TVET systems have good relationships between industry and TVET institutions, and TVET plays a particularly important role in directly linking intermediate technical education to the labour market. This means that the system will benefit from a better understanding of skills needs for South African society and industry, and the ability of TVET institutions to respond to social and economic needs, in particular those at the intermediate level in the labour market. There is much work to be done to improve in this area and chapter 2 (National Skills Development Plan) and chapter 6 (workplace-based learning) offer important links in this area.

The TVET sub-system must articulate with schools, with workplace training opportunities (in particular those supported through the skills development levy institutions), and with the higher education system. TVET opportunities must be better informed by skills demands in the wider economy, taking into account both regional and national skills needs, and they should become more responsive to the needs of school-leavers and young people who are not in education, training or employment.

TVET has a significant role to play in provision of skills for the success of many government programmes. However, there are several weaknesses endemic to the TVET sub-system, including qualifications that are not fit for purpose and are outdated; inadequate funding to support the rapid growth in the system since 2010; a lack of systemic planning for public TVET colleges; a shift from FET to TVET colleges, which creates a new kind of mandate for the public colleges; a lack of articulation between school learning and TVET colleges; limited access to workplace-based learning for TVET students in public colleges; and challenges relating to the staffing and governance capacities in the system.

Some labour market analyses shows that job prospects for a TVET College graduate are comparable to (but not better than) those for a matriculant, at 50%, but much higher for qualified artisans where a recent study showed a placement rate of 78%. This means that TVET colleges largely do not always add substantial value to the opportunities for prospective labour market entrants.

The South African TVET system is complex and wide-ranging and has a long history, described elsewhere.

Enrolment growth in TVET colleges has been rapid since the recapitalisation of the TVET (formerly FET) colleges, almost doubling between 2010 and 2015, but slowing down recently in response to funding and capacity constraints. In 2015, the 50 TVET colleges with 260 campuses enrolled 737 880 students, and had 10 592 lecturers, 433 management staff and 7 210 support staff (DHET, 2017).

TVET colleges are fairly accessible because of their geographical spread with multiple campuses, and core programmes (NATED 190/191 and the NCV) funded by government, with SETA funding dedicated to occupational and skills development programmes. Some TVET colleges are very strong with niche programmes that they have become renowned for, and some of the programmes are trusted by industry, especially apprenticeships which have excellent labour market outcomes for students. Dedicated efforts by the Department to improve the TVET college sector, specifically through the turnaround strategy, have led to stabilisation of colleges through improvements in governance, financial management, and teaching and learning, which has contributed to some improvement in the certification rate in NATED and NCV programmes. These improvements in the capacity of colleges will provide a strong base for the implementation of a longer-term plan to develop the colleges. TVET colleges will also need to be set up for greater flexibility in delivery, including more evening and weekend classes.

4.4 Objectives for an expanded and strengthened TVET sub-system

The development of the TVET sub-system to achieve realistic and sustainable expansion with success, that is, improved retention, throughput, and better outcomes into the world of work, is underpinned by five key interdependent objectives.

The overarching objective in the strengthening of TVET colleges is the **development and delivery of mid-level qualifications that are relevant and responsive to the needs of school-leavers and the demands of the world of work**. Fit for purpose and responsive qualifications need to be taught by qualified and capable lecturers, and supplemented by effective student

support services to promote retention and resilience and improve throughput and exit outcomes.

In this regard, **capacity building** of lecturers, as well as administrative, management, and student support staff is critical for strengthening the sub-system to improve its success. Governance capabilities also need to be developed in financial and human resource management so that governance structures provide effective oversight to promote efficiency, effectiveness and sustainability. This Plan puts in place a range of strategies that focus on the overall institutional capacity of the TVET system, with a particular focus on the public TVET colleges.

Workplace based learning is a key pillar in strengthening the links between TVET colleges and the formal world of work, ultimately resulting in the development of relevant curricula and improvements in outcomes in the world of work. As such, strategies to improve employer participation in workplace based learning are critical.

In order to grow, strengthen, improve, and develop, the public TVET system will need **adequate and appropriate resources** to support the implementation of proposals outlined here. There is also a need for more efficient use and management of funds, joined up funding and aligning planning cycles to allow for effective use of both fiscal, levy, and student funding to support TVET programmes. As indicated in chapter 1, the effective development of capacity, adequate resourcing, and improved efficiencies will all work together to get the system to improve. No one intervention will work alone.

Equally critical to the development and delivery of relevant and responsive programmes, developing the capacity of the system, and strengthening workplace based learning is **monitoring and evaluation**. The sub-system can learn and can improve implementation through systemic monitoring and evaluation, and analysis of system data for evidence based decision making. An enabling policy and legislative environment to remove obstacles for effective implementation of the Plan are required, so there may be a need for policy and legislative amendments over time to support the proposed changes.

4.5 The Plan for expanding and strengthening TVET

Vision 2030 for public TVET Colleges

By 2030, TVET colleges will be strong differentiated institutions, offering a range of high quality programmes preparing students for the world of work. Colleges will offer qualifications that are responsive to the needs of students, and regional and national labour demand. An effective enrolment planning system will be in place to determine the necessary programme-qualification mix for the colleges and to guide appropriate resourcing. Employer uptake of students and partnerships with TVET colleges will have greatly improved. Examination and certification will be streamlined and will be more efficient and effective. There will be more and better qualified lecturers and the lecturer: student ratio will improve. Colleges will offer standardised student support services and fiscal funding will be provided for this. Governance and management capacity will be greatly improved and colleges will be functioning more effectively. Retention and throughput, and exit level outcomes as well as articulation to other post school institutions will be greatly improved.

The remainder of this chapter discusses the key areas of work, outlining the main problems and challenges, and presenting the key action areas which will ensure that this vision will be achieved.

Programmes

Currently, the TVET sub-system has several types of qualifications offered in Technical High schools, Schools of Skill, TVET Colleges, and universities, particularly Universities of Technology. Only four of these qualifications—the NCV, NATED, occupational programmes and higher certificate programmes—are offered in TVET colleges, although the occupational programmes have not yet been well integrated, and the higher certificates are a very small part of college offerings. There are overlaps between the NCV and the NSC (with a technical focus) as offered in technical high schools, which must be urgently addressed.

Public colleges predominantly offer the NCV and NATED qualifications. Although colleges have started offering occupational qualifications, these qualifications are not currently supported by voted government funds, and this could explain the consistently low uptake of these qualifications. There are weak links with industry and many students struggle to get places for workplace based learning, and this compromises exit outcomes for the world of work.

The White Paper PSET was informed by a range of research showing that in many cases the current TVET qualifications lack credibility, are out-dated, have weak links with workplaces, do not all offer articulation possibilities for students, and result in poor throughput of students. In addition, the examinations system is expensive and unwieldy.

It must be acknowledged that the overall trends of poor performance are not found everywhere – there are indeed colleges that are doing well and whose qualifications are well respected. However, overall, it is widely agreed that the mid-level TVET qualifications must be reviewed, rationalised, streamlined, simplified and strengthened so that there is a clearer and stronger set of mid-level qualifications aimed at preparation for the world of work, with national credibility, and that are appropriate for offering at public institutions. This has been a major focus of the TVET Task Team for the National Plan and has resulted in the following proposals.

Table 2: Programmes and Qualifications in TVET colleges

Programmes/ Qualifications	NCV	Occupational Certificates and National Occupational Certificates	Higher and Advanced Occupational Certificates	Foundational Programming
Rationale for shift	There is a need for the NCV to continue to be offered at TVET colleges in the immediate and medium term. There are a number of reasons for this: - there are still large numbers of students taking the NCV courses who may not immediately access other opportunities, as they have already left school. - there is considerable support for and expertise in the NCV at public TVET colleges and it may be that growing numbers of students completing the NCV are in fact finding opportunities in the workplace, which suggests that the public perception of NCV graduates is shifting in their favour. - there are aspects of the NCV that are thought to be strong and worth retaining. In fact, at the request of the Minister, Umalusi has undertaken a detailed review of the NCV with proposals for strengthening it (currently out for public comment) and this work should be taken into account in discussions about the future of qualifications of this type at this level.	Occupational qualifications at levels 2, 3 and 4. A number of occupational certificates have been under development by the QCTO and some are already being offered at colleges, through a pilot programme. These will become the primary offerings at TVET colleges in the medium term, and include Occupational Certificates (OCs) at Levels 2 and 3 on the NQF as well as (the majority) National Occupational Certificates (NOCs) at Level 4.	There are currently a number of partnerships between universities and TVET Colleges to offer level 5/Higher certificates at public TVET colleges. According to current legislation, TVET Colleges are not permitted to offer these qualifications without the involvement of a university. There is also a recognised need to provide more opportunities for students at this post-secondary level of the NQF, as many students leave school after matriculating with a certificate that meets the admissions level for Higher Certificates. This group is often unable to access universities because the number of places are increasingly limited, but also because universities offer fewer Higher Certificates and Advanced Certificates, as they move into offering more Diplomas and Bachelors degrees.	The Department of Higher Education is already in the design phase of a foundation programme for TVET colleges that will support TVET students in accessing the range of programmes in colleges. Aspects of the programme will be piloted in the 2018 academic year. It must be noted that this is not proposed as a stand-alone qualification. It will ideally be a programme with a flexible set of modules (not pitched at a particular level on the NQF) allowing students to access different modules depending on their proposed programmes and their prior educational experience and performance.
Priorities	There is an urgent need to rationalise the general vocational qualifications offered at level 4 in the education system as a whole. There is overlap in the qualifications and	These certificates are designed to prepare students for intermediate jobs in the workplace, including artisanal jobs. The exit level of the	If there are to be increased qualifications at this level, new Higher and Advanced Certificates will have to be developed, and increasingly these need to be	Many students entering TVET programmes would also enrol for the foundational learning programme to ensure that they have the desired

Programmes/ Qualifications	NCV	Occupational Certificates and National Occupational Certificates	Higher and Advanced Occupational Certificates	Foundational Programming
	confusion about the purposes, design, curricula, and articulation possibilities of these qualifications. The DBE has announced a three-stream schooling model with an academic, technical occupational, and technical vocational stream. However, there is an urgent need to resolve in consultation between the DBE and the DHET how the three-stream model and the future plans for TVET qualifications can align and articulate.	certificate corresponds with the entry point to a particular occupation, or an initial license to practice in that occupational area. The level and duration of the qualification is determined by what is appropriate for each occupation and for industry. The term occupational is widely understood and used within the labour market and has therefore been explicitly selected over vocational.	offered at TVET colleges. In the medium to long term, as TVET colleges gain the capacity to offer these qualifications, the legal frameworks will need to be adapted to allow for independent delivery within the TVET system. Not all colleges will offer Higher and Advanced Certificates in the medium term as the TVET system, guided by its enrolment planning mechanism, will allow for colleges to differentiate on the basis of areas of expertise. Higher and Advanced Certificates are designed to offer preparation for work, as opposed to being designed for further study, although it is essential that there are articulation possibilities into higher education programmes, which may be offered at universities or higher education colleges, both public and private.	language, science and mathematical skills to succeed in their programmes. The modules are therefore designed NOT as part of a qualification, but as flexible offerings that provide these students with the needed foundational knowledge for a range of college-based programmes, and can be offered at different points in their progress through the college. Foundational learning modules may or may not be accredited. Thus depending on an initial assessment some students may receive foundational knowledge that includes maths, science and english.
Planning considerations	At the moment the National Certificate Vocational (NCV) is offered at TVET colleges and the National Senior Certificate (Technical) is offered at schools, particularly in Technical High Schools. It must also be noted that the National Senior Certificate contains a number of vocational subjects, alongside the traditional academic subjects. Both sets of qualifications are quality assured by Umalusi and both are at Level 4 of the NQF. There is clear overlap in these qualifications. Given the fiscal constraints facing government and the need to simplify	Some of the current NCV programmes, particularly in the engineering fields, may be absorbed into the National Occupational Certificates over time, as they are developed. The NATED programmes, will be absorbed into the National Occupational Certificates over time, as they are developed.	Access to these qualifications could include those with NOCs, NCV/NSC (T) or the NSC. However, entry level requirements will depend on the occupational area. In some occupations, Higher and Advanced Certificates may also provide access to a license to practice in a particular area.	However all students will receive foundational modules that focus on non-cognitive skills development at relevant points in their programme: for example time management and planning when they enter, IT skills and communication during the programme and work-readiness prior to accessing the economy.

Programmes/ Qualifications	NCV	Occupational Certificates and National Occupational Certificates	Higher and Advanced Occupational Certificates	Foundational Programming
	qualification pathways across the education system, this overlap should not continue. The Plan has deliberately avoided commenting on what form this rationalisation will take because it will require detailed engagement with both sets of qualifications, their strengths and weaknesses, and a careful assessment of current and planned capacity to support the offering of these qualifications in schools and TVET Colleges.			
Imperatives	There is an urgent imperative to make system-level decisions about the long-term future of a general vocational school-leaving level qualification—whatever its name. In the long-term it is proposed that the general vocational certificate (which will be termed National based on the proposed terminology) should be offered in schools, with the occupational programmes primarily offered in TVET colleges. At the moment there is confusion about the future of all the mid-level technical, vocational and occupational qualifications because of the varied histories of these, but also because of a lack of aligned planning between the Departments of Basic Education and Higher Education and Training.	These qualifications will be post-school qualifications with entry-level requirements that differ depending on the qualifications.	It should also be noted that this area of provision in TVET colleges will, in the long term, reduce the pressure on universities as more students gain access to intermediate workplace-linked higher and advanced certificates.	Foundational programming will have to be funded as a critical part of the programme offerings of public TVET colleges.
Critical strategies	An immediate and urgent technical process must be established between the two Departments (Basic Education and Higher Education and Training) to start the processes discussed above of reviewing and rationalising the general vocational qualifications at level 4 and make medium	The current specifications of the QCTO for the design of these qualifications require that all contain a theoretical, practical, and workplace component. In an ideal world, all students would be able to gain access to workplace		

Programmes/ Qualifications	NCV	Occupational Certificates and National Occupational Certificates	Higher and Advanced Occupational Certificates	Foundational Programming
	term and long term decisions about the nature of the qualifications, their design, curricula, teaching expertise, and location of offering. It should be noted that the NCV has several different streams, and the discussions need to take this into account. It must also be noted that this means that although the NCV review has taken place and pending public comments, the NCV Review should be seen as an important information source for the joint technical planning process, which should be complete by the end of 2019, in time to be introduced with the first cycle of the new enrolment-planning system for the TVET colleges. Work towards the joint planning process is already underway.	opportunities. However, this is currently not possible for most students on occupational and vocational programmes. While there may be some certificates that have an absolute requirement of a certain amount of workplace experience, it has been decided that from now on they should be developed taking into account the nature and amount of practical learning required. That is, should simulated workplace experience be possible, it should be explored as much as possible. This is to prevent students failing to obtain a qualification because of a lack of workplace opportunities.		

Other points to note:

TVET colleges have also been offering various skills development programmes and short courses. These will continue to be offered based on demand but will not be part of the core qualifications.

Within occupations, criteria for awarding the status of Master Artisan or Master for an occupation will be agreed with relevant professional bodies or associations, based on trade designations as well as appropriate years of work experience, performance and other appropriate requirements, rather than linked to a specific qualification or level.

A number of related strategies are outlined here, which will support the introduction of new sets of programmes, including:

- strategies to improve access to and support for forms of work-based learning;
- an enrolment-planning system for the public TVET colleges;
- a focus on staff development and materials development to support teaching and learning;
- a focus on student support; and
- the alignment of planning and funding cycles to allow for joined-up (fiscal and skills levy) funding to be offered for qualifications that have a workplace component.

SETAs will assist with identification of appropriate workplaces for workplace based learning and linking employers with TVET Colleges.

Strategies	Responsibility	Timeframes
The DBE and DHET will continue with discussions on how the NSC and the NCV can be streamlined and agree on where it will be offered.	DHET and DBE	By 2019
The QCTO will be responsible for qualifications development and as such will need to develop its capacity to develop qualifications and curricula, working collaboratively with DHET for information on occupations on demand for which qualifications should be developed, and with SAIVCET for support with development of curricula.	QCTO and DHET	Immediate and Ongoing
Establishment of SAIVCET	DHET	Operational by 2018
Finalisation of foundational programmes for piloting and introduction (modules to be introduced at relevant points as part of pilot process)	DHET	Immediate and Ongoing

PQM and enrolment planning

Current enrolment patterns highlight that most of the students are enrolling in programmes that may not lead them to meaningful opportunities. Analysis shows that enrolment is largely un-responsiveness to regional economies, for example there are low or no enrolments in tourism and hospitality programmes in regions that have strong tourism sectors. The highest enrolments in the colleges are for Human Resource Management and Business Studies. Given the low enrolment in occupational programmes, the shift to offering more occupational programmes is going to be a significant one and the transition has to be managed carefully to minimise disruption to the system.

In order to offer more meaningful programmes that are responsive to national and regional economies, enrolment planning will be determined in three year cycles, with annual internal reviews to address any necessary changes. Enrolment planning will be informed by PQM that is nationally and provincially/regionally responsive. Determination of PQM according to these criteria will result in a differentiated college system. Criteria for approval of PQM will be developed and will include college physical infrastructure and staff capacity to offer the intended programmes successfully. The Department will review and approve PQM. Colleges will be accountable for their PQM and will also develop tracking systems to monitor where their graduates end up. Academic boards will develop their capacity for oversight of PQM and enrolment planning.

Core programmes to be offered will be funded by government for the agreed number of enrolments and some portion of the funding will be used for responsive programmes that may not attract high volumes of students. Programmes will also be funded through SETA funds and the NSF.

Strategies	Responsibility	Timeframes
Analysis of current PQM	DHET	Immediate
Develop policy and guidelines on enrolment planning and PQM	DHET	2018
Begin review and approval of college PQM	DHET	From 2019
Consolidating funding from government, NSF and SETAs	DHET	From 2019
Develop the capacity of Academic boards for oversight on enrolment planning and PQM	DHET	Immediate
Develop tracking systems to track students after graduation	Colleges	Immediate and ongoing

Examinations

The TVET examination regime is the largest in the country. The number of examinations in an academic year result in 1 800 question papers over 9 examination sittings (trimester and semester). The volume of scripts to be processed coupled with the tight time frames for the processing and releasing of examination results causes backlogs in the certification of students. The reliance on heavy external assessment system also affects the capacity of lecturers to develop question papers for diagnostic and continuous assessment designed to collect data for remediation. Properly constituted internal examinations will develop the

capacity of lecturers to set internal examinations and use assessment for diagnosis and to improve teaching and learning. These examinations have to be as rigorous as possible to prepare students for the external exams.

Changes in qualifications offered will impose new demands on the examination system and the changes provide a good opportunity for the Department to review and improve the examination system, a process already under way. The strategy is to streamline and reduce the number of external examinations that the Department is responsible for so that college lecturers do not only wait for Departmental exams but also get a chance to develop diagnostic and continuous assessment tests that they can use to improve teaching and learning.

Strategies	Responsibility	Timeframes
Develop and implement strategy for streamlining and reducing external examinations and introducing internal examinations.	DHET and QCTO	Immediate and Ongoing
Develop capacity of lecturers to administer internal examinations	DHET	Immediate and Ongoing

4.6 Building the capacity of the sector

The current capacity of TVET colleges is under strain and will make it difficult to achieve sustainable growth and strengthen the sub-system. Student support services to address the challenges faced by students, of poverty and lack of finance, the articulation gap caused by poor schooling, lack of career direction, and other social problems, are highly differentiated across colleges, and are currently limited and uneven.

Where support is available, this includes academic support (learning support, peer mentoring, note taking for students with special needs, provision of assistive devices and study skills), career advice and guidance (information on careers, exit support including CV writing, job hunting and interview skills), and psycho-social support (counselling, awareness campaigns, holistic wellness drives and referrals to external service providers).

Demand for services far outstrips the available staff, whose conditions of service are not favourable – highly qualified professional staff such as psychologists are employed and remunerated at the same level as administrative staff. As a result, qualified staff leave the system when they can find better opportunities, leaving the system with unsuitably qualified staff to support students. There is an under-supply of staff, with colleges having only one qualified counsellor on campus. Funding is also a serious challenge, and the current Student Support Services Plan has not been supported by adequate funding for implementation due to the overall funding challenges facing the sub-system.

Building the capacity of the TVET sub-system is vital to address the challenges identified. Student support services, weak links with industry, underqualified and unqualified lecturers, inadequate infrastructure and facilities, poor data systems, examinations, monitoring and evaluation shall be addressed through building the capacity of TVET in these areas. The White Paper signals that colleges are at very different stages of development and advises that

different levels of intervention and support are required to enable colleges to reach their full potential.

Student support services

Student support focusing on academic support, career guidance (in line with the Department's National Career Development Services) and psycho-social support will constitute the core of student support in all colleges. These areas will be funded, prioritised according to each college's students' needs, and supported by norms for the provision of student support services. Support services offered to students will be evaluated and improved accordingly to improve student success. There is also a need for some support for the appropriate placement of students on entry to TVET colleges.

Strategies	Responsibility	Timeframes
Conduct comprehensive audit of college and external student support services for TVET students	DHET	Immediate. Complete by 2020
Develop norms for student support services including post provisioning norms, funding norms for administrators of financial assistance, and definitions and guidelines for student support services	DHET	Immediate
Coordinate internal student support services with external ones where available in some communities	Colleges	Immediate and Ongoing
Provide catalytic funding for student support services	DHET	Immediate
Monitor and evaluate implementation of the student support services framework	Colleges	As implemented

Staffing and staff development

The majority of the lecturers in TVET colleges are academically qualified, but not professionally qualified or vice versa. Relatively few are completely unqualified, but very few meet all requirements expected of a college lecturer. Currently, college lecturing staff are recruited from the pool of top-performing students, and from TVET college students who proceed to university and come back to the sub-system. Both these routes are misaligned to the policy requirements for lecturer educational training and industry experience. Lecturers are also recruited from those with industry experience who might not have teaching qualifications. Where there is scarcity, retired professionals are also recruited. The introduction of the NCV also led to employment of teachers from the schooling sector who were not trained for lecturing responsibilities at TVET colleges.

Increase in lecturer numbers in the sub-system have not kept pace with increase in learner enrolment and the sub-system is understaffed with lecturer: student (which vary from 1:17 to 1:80 depending on institutions, averaging at 1:65 for the system as a whole), compared to international norms of 1:15. Expansion of the sub-system will require an increase in staff numbers as well as training to improve the knowledge and skills of lecturers.

Lecturer development will focus on the development of new lecturers, based on information on demand, as well as the professional development of lecturers already employed in colleges. The focus of the training will be on theory and technical competence of the subject matter, as well as industry experience. It is also essential for lecturers to acquire skills in technology integration for teaching and learning.

Staff development will also focus on development of college councils, college management, and college administrative staff. A key focus of capacitation of college management and governance structures is in understanding of enrolment planning and PQM.

Strategies	Responsibility	Timeframes
Develop a framework for continuous professional development	DHET	Immediate
Develop a plan for the recruitment, retention and funding for the development of lecturers	DHET	By 2020
Conduct a comprehensive study on demand and supply of lecturers which identifies scarce and critical technical and vocational skills	DHET and SAIVCET	By 2020
Monitor and evaluate implementation of frameworks	DHET and SAIVCET	Ongoing
Establish Regional Support Teams	DHET	By 2018
Provide support for the registration of lecturers on the Lecturer support system	DHET	By 2019, all lecturers should have registered
Draw up training plans for determined lecturer development needs	TVET Colleges	From 2018 and ongoing
Train mentors and coaches annually for the induction of new lecturers	TVET Colleges	Ongoing

Governance and management

The Department's FET College Turnaround Strategy has been attributed with addressing many of the challenges in TVET colleges. Most key vacancies have been filled, and significant attention has been given to ensuring that key management positions in colleges are filled. Significant work has been done on strategic planning in TVET colleges and colleges submit plans annually to the Department. There is little capacity, however, within the Department, to analyse plans and hold colleges accountable for these. The South African Institute of Chartered Accountants (SAICA) has done some work to strengthen financial management within colleges, and many of the colleges are improving in this area.

SRC development work is a focus of the DHET Turnaround Strategy but there are some challenges with student governance in some colleges mainly emanating from the fact that the CET Act is not clear about the eligibility of SRC members.

While improvement is noted, further work is needed to consolidate the gains so far and improve governance in TVET Colleges.

Strategies	Responsibility	Timeframes
Develop capacity development framework for managers and councils in colleges	DHET	Immediate
Review and if necessary change council structures and composition	DHET	By 2019
Develop and implement support programmes for SRCs	DHET	By 2019

Modes of delivery and technology

The delivery modalities of programmes are still predominantly traditionally lecturer-centred, and there is limited use of technology for blended learning approaches. The few colleges making use of distance provision still use the traditional correspondence paper based model, which does very little to support student success and has also been associated with poor success rates in the South African university sector. Availability of ICT infrastructure varies from college to college and is a major constraint in the utilisation of ICTs to improve teaching and learning.

Colleges will at the minimum have the technologies being used in the workplace, which will be acquired with the assistance of SETAs and industry and in some cases acquired collaboratively by colleges that will then share these technologies. The Centres of Specialisation specifically will have modern technology being used in the workplace. It is critical that students get access to technologies being used in the world of work during their training so that they are ready for the world of work.

All colleges will have high quality bandwidth to enable use of technology to enhance teaching and learning, and this will be enabled through SANREN. In the short to medium term, technology will be used in blended learning with a predominantly contact component to enhance teaching and learning and promote student success.

Strategies	Responsibility	Timeframes
Acquisition of technologies being used in the workplace	DHET, Colleges, SETAs, Industry	Immediate and Ongoing
Development of guidelines and incentives for ICT usage	DHET	By 2020
Training lecturers and other staff on effective ICT usage	DHET and SAIVCET	Immediate and Ongoing

Workplace-based learning

Work-based learning is an integral aspect of the PSET system but particularly for TVET, and multiple efforts will be pursued to improve access to workplaces as the ideal for student access to the practical component of their programmes.

Strategies for improving access to and quality of workplace-based learning are addressed in chapter 6.

Infrastructure

College accommodation is extremely limited. The TVET sub-system also has a record of under-funding of physical infrastructure maintenance and a lack of life cycle planning. At the systemic level, the TVET sub-system has not had a planned expansion programme since the Recapitalisation Programme which ended in 2008. Since then, most work of a capital nature at the college level has largely focused on refurbishing buildings or constructing a few extra buildings on existing campuses.

The current funding norms for TVET colleges cover three categories - personnel, operational costs and capital infrastructure replacement. For TVET colleges, the personnel allocation is at 63% of the full programme cost, operational costs 27% and capital infrastructure replacement 10%. Capital infrastructure replacement funding is mainly used for maintenance and replacement of furniture and equipment (DHET, 2016). An analysis of the 2015 annual financial statements of TVET colleges indicates that only 4% has been spent on repairs and maintenance as funds are re-prioritised towards other dire needs due to cash-flow pressure (DHET, 2016).

Recently, a new phase of capital investment in infrastructure commenced with the construction of 16 new projects, of which 13 are new sites, and three refurbishment projects. There is inadequate funding available for new infrastructure development, including the planned capital investment, and including the necessary equipment. An infrastructure plan will be necessary, in line with the overall system proposals in chapter 2.

In the current climate of fiscal constraints, the focus should be to maximise the use of available infrastructure, rather than building new colleges. TVET infrastructure enhancement will be achieved as follows:

Strategies	Responsibility	Timeframes
Link all colleges to SANREN to improve campus connectivity	DHET, DST and DoC	All colleges connected by 2020
Develop a framework and norms for infrastructure utilisation, sharing, use of funding for capital infrastructure replacement, and use of private provider infrastructure	DHET	Immediate
Develop an infrastructure management information system	DHET	By 2020
Centres of specialisation will provide training spaces with high tech equipment that can be accessed for training for specific trades. These centres can be used by other colleges for specific curriculum needs without duplicating what they have in all the colleges.	DHET	Ongoing
Timetabling will ensure that colleges are used from the morning to the evening and during weekends, also to accommodate working students.	Colleges	Immediate and Ongoing

Where possible, private providers will be incentivised where they can make infrastructure available to TVET colleges, e.g. training spaces.	DHET	Ongoing
---	------	---------

4.7 Funding and resourcing

The strengthening of TVET colleges can be expedited if fiscal funding to the sector is increased, and increases in funding can be phased in over a number of years. This will be linked to increases in efficiency and in planned enrolments in line with funding and capacity available.

The Department should make sure that baseline funding as determined during the function shift does not perpetuate underfunding of colleges in some provinces. Additional funding is needed for more equitable funding across provinces. Increases in funding will also be aimed at eradicating provincial disparities inherited by the Department during the function shift.

Budgeting and funding norms for colleges should consider the key components for strengthening the sector - staffing, student support services, programme development, LTSM, examinations, information systems, evaluation and research, capital equipment and infrastructure.

Enrolment planning will be linked to available funding in the Medium Term Expenditure Framework (MTEF) and the Department will review the financial sustainability of enrolment plans. Any enrolment beyond the funded budget provided by Department should be motivated by the Colleges and supported through financial resources.

Data systems for funding for students will be aligned to ensure proper accountability and efficiency utilisation of financial resources. The Department will collect standard reporting information through the effective application of TVETMIS applied at all colleges.

The funding formula needs to be revised so that it is based on inputs and outputs in agreement with colleges, in relation to non-personnel budgets.

Programme costs should include costs of examinations and also consider variables such as FTE enrolment, differential programme costs, performance based funding for student success, weighting for rural and disadvantaged areas, weighting for disability, infrastructure development and maintenance, staff development and student support.

Strategies	Responsibility	Timeframes
Increase sub-system funding: the current underfunding and shortfalls are not conducive to strengthening the sub-system and improving throughput. Some urgency has to be applied in substantially improving TVET funding in line with the envisaged goals of the sector.	DHET and National Treasury	Immediate and over time to 2030
Increases in funding can be phased in over		

Strategies	Responsibility	Timeframes
several years. TVET is a priority sector for the country's skills needs and funding has to be found from government and skills levy funding to properly support this sector.		
Revision of funding formula: The current system of input funding has led to massification without the necessary student support, resulting in poor throughput. The DHET should change the funding formula and base it on inputs and outputs based input-output mix agreed with colleges in combination with a core institutional grant. The DHET should update the current funding formula's weighting of the NCV and occupational programmes, and programme costs should include cost of examinations. The DHET should determine the details of future funding formulae to include variables such as FTE enrolment, differential programme costs, performance based funding for student success, weighting for rural and disadvantaged areas, weighting for disability, infrastructure development and maintenance, staff development and student support.	DHET	Immediate and complete by 2020.
TVET College budgets should include all components that are key for developing the capacity of the sector - staffing, student support services, programme development, LTSM, examinations, information systems, evaluation and research, capital equipment and infrastructure.	DHET	Immediate and ongoing
Student support services should be adequately funded and the foundation programming must be fully funded through voted funds.	DHET	By 2020
The enrolment plans for TVET Colleges which include their PQM should be linked to available funding in the MTEF. Enrolment growth will be controlled through the enrolment planning process which results in an agreed PQM for each college. The DHET's monitoring should ensure that enrolment plans are financially sustainable.	DHET and SETAs	By 2020

Strategies	Responsibility	Timeframes
Seta programmes should form part of the three year enrolment planning cycles, with guaranteed funding. Enrolment planning and budgeting should take account of students who stay in the colleges for longer than the minimum programme period.		
Seta planning cycles and TVET college planning cycles should be harmonised so that Seta employer grants are approved before college enrolment planning begins so that colleges are aware of the number of learners who will have workplaces for specific programmes.	DHET and SETAs	By 2020
Data systems need to be merged so that disbursements to learners are managed efficiently. The DHET should join up FETMIS+SETAMIS+HETMIS to ensure tracking of student funding through the various funding sources. In the immediate period TVETMIS must be quality assured to ensure that the system is fully operational and data is correctly received and uploaded.	DHET	Immediate and ongoing.

4.8 Monitoring and evaluation

The TVET sub-system does not have strong data management systems for data sets to assist with sub-system planning. There is no consolidated information on infrastructure, and no regular audits to understand any infrastructure limitations and strengths. Enrolment planning has not been based on any data inputs on demand. Data on exit at different parts of the sub-system as well as exit level pathways is not available. There is no integrated information available on how many TVET students are enrolled at school level, through the SETA system, at TVET colleges, and at universities. The sub-system does not have strong data management systems that can account for the enrolment and exit at different parts of the sub-system. Work is being done here, however, and a unit record data system will soon be introduced which will allow for proper cohort studies to be conducted. There is no integrated information available on how many TVET students are enrolled at school level, through the SETA system, at TVET colleges, and at universities.

Implementation of the plan will require systematic monitoring and evaluation to ensure that implementation is improved continuously based on evidence from monitoring and evaluation. There will be need to establish the effectiveness of interventions, so several dedicated evaluations will be conducted for the key interventions proposed in this Plan. Evaluations should be planned from the outset to provide opportunities for the collection of baseline data. The existing TVET M&E framework will be revised and updated to align with the system M&E Framework and the Plan.

Strategies	Responsibility	Timeframes
Update TVET M&E framework in line with PSET M&E framework and the Plan	DHET	Immediate
Monitoring of implementation of the Plan	DHET	Ongoing
Design evaluations for key interventions	DHET	From 2018
Plan for data improvements	DHET	Immediate

4.9 Policy and legislative change

Although the sub-system has enabling policies and legislation, there may be policy and legislation that presents obstacles in a range of areas: introducing new qualifications, funding policies and norms; and workplace-based learning, for example. The policy and legislative framework will need to be reviewed over time and amended to remove any hindrances to the implementation of proposals in the Plan.

Strategies	Responsibility	Timeframes
Review and amendment of policy and legislation to enable Plan implementation	DHET	Ongoing

Chapter 5: Strengthening and transforming higher education

5.1 Introduction

The overall goal of this chapter of the Plan focusing on higher education is to give effect to the policies set out in White Paper 3 and the White Paper for Post-School Education and Training. This Plan locates higher education as one component of an emerging post-school system. Taken together the policies impacting on higher education express a vision of a strong, purposefully-differentiated, and people-centred higher education system that develops capabilities, skills, and knowledge for a democratic, inclusive and just society. This chapter primarily talks to the growth, development, and sustainability of the public higher education system.

Planning for a post-1994 higher education system commenced with the work of the National Commission for Higher Education (NCHE) completed in 1996, and continued with the release of the White Paper 3: A Programme for the Transformation of Higher Education (WP3), the adoption of the Higher Education Act (HE Act) in 1997, and then the introduction of the National Plan for Higher Education (NPHE) in 2001. The Higher Education Act has been subject to several changes over the years with the most recent amendments being adopted in 2016, following an extensive and inclusive review process. This Plan derives its mandate of the White Paper for PSET, but draws also on many of the policy goals of the WP3, which remain relevant in the current period. **This National Plan for Post-School Education replaces the 2001 National Plan for Higher Education.**

5.2 Strategic objectives

The following strategic objectives for the higher education system are addressed in the chapter:

1. Building a purposefully differentiated higher education system geared towards transformation and sustainability:

The White Paper PSET emphasises the importance of a differentiated higher education system, and provides a framework for policy development in this area. This plan further elaborates the policy basis for differentiation, and sets out an implementation strategy to develop the differentiation framework. A purposefully differentiated public higher education system is essential for the sustainable development of public universities, for appropriately targeted resource allocation to help develop the capacity of public universities and the quality of higher education, but also to ensure a diversity of appropriate opportunities for young people leaving school.

2. Developing a more student-centred higher education system - supporting access and success:

Students are the backbone of the higher education system, and are the primary reason why higher education institutions exist. Despite improved access to higher education,

many students do not complete their studies or take too long to do so. The White Paper notes that the system has relatively low and inequitable participation rates and throughput of students. Improving equitable access and student throughput is therefore a major priority for the plan. Significant and continued focus on student access and success initiatives will be critical to shift the system to become more student-centred. There is also a focus on the kind of curricula and programmes needed to prepare students for a 21st century world. The strategies under this goal are structured in the following areas: planning, monitoring and evaluation of student access and success; teaching and learning, curriculum development and new technologies; student housing and other areas of student life; and financial support for students. There is also a specific focus on African languages and postgraduate students. The overall approach is linked to the University Capacity Development Programme, which has a core focus on developing equity, quality and success and is a people-focused programme gearing the public university system to become more successful. Its focus on student access and success is supported by other strategic goals, in particular the importance of academic staffing.

3. Growing the staffing capacity of public higher education institutions:

The White Paper identifies the rejuvenation of the academic profession through the development of new generations of academics and paying attention to the demographic equity of university staffing at all levels, as critical for the development and sustainability of the higher education sector. The ability of institutions to attract and retain staff is fundamental to their long term development. The provision of quality development opportunities for academic staff, management and leadership staff and other professional staff that directly support and enable the academic function is a key pillar of the University Capacity Development Programme through the Staffing South Africa's Universities' Framework.

4. Improving governance, regulation, and accountability:

The focus on developing institutional capacity is carried through into this strategic goal with a focus on strengthening and improving the mechanisms that exist at system and institutional level to ensure accountability for policy goals and the use of public funds. Strong governance and accountability mechanisms can ensure that the system is focusing on the multi-dimensional transformation goals for higher education. Strong regulation and monitoring is necessary in combination with accountable and ethical governance at system and institution level. It is also necessary to find ways of effectively aligning regulatory mechanisms so that reporting is as effective as it can be.

5. Addressing Funding, Resourcing and Sustainability for the future of higher education:

This plan includes a significant focus on the affordability of public higher education, the real costs of providing quality, responsive higher education, and the sustainability of the sub-system for future generations. It addresses the approaches to the funding of the system for the next period.

6. Developing higher education in support of society and the post-school education and training system:

The White Paper places the higher education sub-system as part of a broader post-school system. Strengthening and growing higher education is an important part of building the post-school system, but on its own the public higher education institutions will not meet the policy goals of the White Paper. More diverse opportunities are needed for young people in other post-school institutions, and higher education must play a role in supporting the development of other parts of the system. Ultimately this will result in a more stable and focused higher education system. This area includes improving the relationships and articulation between universities and the other sub-systems of the post-school system, sharing of resources, leading collaboration and supporting lecturers for PSET. This section also addresses community engagement.

7. Strengthening Research and Innovation:

The White Paper recognises the critical role played by universities in producing knowledge in support of social and economic development. It is this area of work that distinguishes universities from other kinds of post-school institutions. The Plan therefore focuses on strategies that will enable research capability in the public institutions to be developed and strengthened towards excellence.

5.3 Proposals and strategies for strengthening higher education

The following strategies give expression to the policy goals of the White Paper PSET, as well as those expressed in the National Development Plan, and the many White Paper 3 goals which remain relevant 20 years on. This provides an implementation framework for the entire higher education system for the period until 2030.

Building a purposefully differentiated higher education system geared towards transformation and sustainability:

A framework for the purposeful differentiation of the public higher education sub-system:

There is widespread agreement that institutional diversity is necessary if the higher education sub-system is to effectively and efficiently meet the social, economic and cultural needs of the country. A diverse range of institutions is required to enhance inclusive access to a variety of higher education opportunities, respond to a range of educational and research imperatives, and promote responsive programmes in a broad range of areas required for the labour market, the public service and overall development imperatives.

The need for a systemic focus on institutional diversity is acknowledged in policy (Education White Paper 3 (1997) and the White Paper for Post-School Education and Training), which also recognizes that diversity is promoted through processes of purposeful differentiation.

Despite the recognition of the importance of institutional diversity by the government, institutional leadership and other key stakeholders, there has been a tendency (not unlike that seen elsewhere in the world) towards institutional isomorphism, which happens when all institutions aspire to a common 'gold standard', as exemplified by leading research universities. This is done irrespective of current capabilities, capacities or access to appropriate resources. This tendency towards homogenization, depending on the particular context, is driven, unintentionally or intentionally, by many factors such as state funding, policy incentives, institutional and public perceptions of prestige, peer comparisons, global rankings and many others. It is recognised that there could be a range of contributors to this trend in South Africa.

This Plan sets out a broad framework to strengthen the purposeful differentiation of higher education institutions in the period to 2030, with the view to promoting a diverse set of institutions, which together will be able to meet the multiple goals of an effective, efficient and transformed higher education sub-system, within the broader post-school system.

While this is the first time that a clear framework is being committed to for the system, it makes use of existing steering and reporting mechanisms and relationships already operating.

The Differentiation Framework:

This framework conceptualizes differentiation at two levels, the first being through **mandate differentiation** informed by institutional type and the second by way of **distinct institutional missions**.

Over the past two decades there has been much suspicion of any attempt to formally differentiate the system as it is feared that this would invariably entrench historical patterns of advantage and disadvantage, or establish new hierarchies of privilege. While all policies and implementation processes carry the risk of unintended consequences, the Department is committed to ensuring that this differentiation framework is implemented in ways that allow institutions to transcend their histories.

Mandate Differentiation:

The White Paper for Post-School Education and Training and the amended Higher Education Act (2016) sets out the first level of institutional differentiation, i.e. the designation of two institutional types – Universities (traditional universities, comprehensive universities, universities of technology (UoTs)) and higher education colleges. Each higher education institution has a formal designation or **mandate**. The distinction between these institutional types will (continue to) be based on programme differentiation and will be regulated through the Programme Qualification Mix (PQM) of institutions. Higher education programmes are disaggregated into three broad tracks – general formative, professional and career-focused programmes.

- General formative qualifications primarily include degrees in core founding disciplines, such as those central to the curricula of general degrees (BA, BSc, B.Com, BSocSci etc).
- Professional qualifications primarily include degrees that demand some mastery of the fundamental concepts and theories of the cognate disciplines upon which their knowledge field draws, while directing theoretical understanding to its application in practical contexts. These qualifications often lead to professional registration but only

after a mandatory workplace based component most often utilising an internship model. Examples include the MBCHB, LLB, BEd etc.

- Career-focused qualifications include higher certificates, diplomas and degrees that have a distinctive focus on the vocational or occupational learning field. Examples include B.Tourism, B. Engineering Technology etc.

Institutional Mandates (applies to public and private HEIs)¹:

Traditional universities operate primarily in general formative and professional education (two tracks).

UoTs operate primarily in career–focussed education and secondarily, in professional education in some areas (one core and one secondary track).

Comprehensives operate in general formative, professional and career-focussed education (all three tracks).

Higher Education Colleges operate in career focused education (single track).

Mandate differentiation will be steered and monitored through the PQM planning process already in place, with a focus on avoiding mandate drift. However, some flexibility will be required to allow institutions to offer programmes outside the scope of their mandate if it is warranted, for example, in areas of specialization; where there is limited capacity; or in response to local or regional priority areas. Such exceptions will be managed through the process of engagement between the Department and individual institutions, described below, and will depend on the necessary capacity being available to support such exceptions.

Differentiation through Institutional Missions

The White Paper for Post-School Education and Training’s vision of a diverse higher education sub-system is a “continuum of institutions ranging from “largely undergraduate universities to specialized, research-intensive universities which offer teaching programmes from undergraduate to doctoral level”.

Higher Education Colleges are not mentioned in the White Paper, but as discussions about public colleges in agriculture, nursing, police and other areas are developing, the institutional type has come into focus. As these institutions are brought more directly into the public higher education system over time, the institutional type provides an opportunity to extend the range and scope of higher education opportunities in a differentiated system. The framework will need to be adapted to incorporate higher education colleges over time.

A key proposition is that each institution will have a distinct mission, which would define its position within the overall system.

¹ University Colleges can also be established, but these do not represent a specific institutional type. University colleges are a new category in the amended HE Act (2016).

Private HEIs must be considered in the analysis of the HEI landscape, as **new programme proposals with high implementation costs must analyse both public and private provision.**

This framework for the designation of institutional mandates does not address the scope of programme offerings in relation to either disciplinary fields or vertical levels of programme offerings.

The White Paper also sets out a number of principles to inform the differentiation of universities, including the following:

- All universities are equally important to the system as a whole;
- All universities must offer high quality undergraduate education;
- All universities should engage in some level or type of research;
- All universities will be responsible for addressing the imperatives of equity and social justice;
- Policy and funding should ensure that where quality of teaching and/or research is high, this should be sustained and improved, and where the quality of teaching is not as good as it could be, it should be improved;
- Differentiation will be responsive to the contextual realities of institutions;
- Differentiation policy and strategy should be aligned to national development policies, such as the National Development Plan and HRD strategy; and
- Better intergovernmental coordination and policy alignment (especially between the Department and DST) will support the differentiation strategy.

These principles, along with an assessment of the performance and capacity of each institution in key areas and the availability of resources, will be used as the basis on which the Department will arrive at formal agreements with each institution, setting out its distinct mission and scope of activities. Such binding agreements will, in the first instance, be for a five year period (linked to the current enrolment-planning and strategic planning cycles of the Department), after which they will be reviewed, to take account of changes in capacity and identified local and national needs. The agreements will be published in the government gazette by the Department. The Department will also determine the sanctions to be applied against institutions that do not adhere to the agreements. Based on the aggregate of the institutional agreements, the Department will publish a 5 yearly public report on the overall institutional landscape of higher education and its contribution to human capacity development, knowledge production and engagement with the broader development imperatives of the country.

It must be emphasized that the envisaged process is not a new, stand-alone initiative but rather an extension of the current enrolment planning process, supported by the performance monitoring process, which will result in a binding agreement between the Department and individual institutions. It integrates the related planning, funding, and monitoring processes, guided by an overall framework.

The underpinning basis for these institutional engagements will be elaborated by the Department but will include, in addition to the White Paper principles (listed above) the following considerations:

- Overall size and shape of the higher education system, as informed by affordability and, in particular, the availability of government resources;
- National and regional development priorities (including research & innovation priorities) and interventions to address the needs of disabled students and staff;

- An assessment of the performance and capabilities of individual institutions as reflected in annual performance plans, the four institutional types and the system as a whole in terms of an agreed set of performance indicators;
- Areas identified for purposeful growth and development, including critical skills areas and specific initiatives to address historic institutional inequalities; and
- Possibilities for national and regional collaboration.

The agreement between the Department and each institution will address the following areas, amongst others:

- location and distinct niche of each institution within the broader higher education system;
- location and positioning of an institution within a particular local and regional context;
- scope of an institution's involvement in postgraduate studies and research. This will include the identification of national and international areas of excellence;
- scope of an institution's undergraduate involvement;
- scope of the institution's involvement in open and distance education;
- development of new infrastructure (buildings, research and ICT);
- development of new areas of teaching and learning; and
- areas (academic programmes, teaching, research and support activities) to be strengthened or developed through inter-institutional and/or regional collaboration; this includes partnerships across the PSET sector as a whole.

Outline of process:

- These principles, along with an assessment of the performance and capacity of each institution in key areas and the availability of resources will be used as the basis on which the Department will arrive at formal agreements with each institution, setting out its distinct mission and scope of activities. Such binding agreements will, in the first instance, be for a five year period (linked to the current enrolment-planning and strategic planning cycles of the Department), after which they will be reviewed, to take account of changes in capacity and identified local and national needs.
- The agreements will be published in the government gazette by the Department.
- The Department will also determine (through policy) the sanctions to be applied against institutions that do not adhere to the agreements.
- Based on the aggregate of the institutional agreements, the Department will publish a 5 yearly public report on the overall institutional landscape of higher education and its contribution to human capacity development, knowledge production and engagement with the broader development imperatives of the country.

The intention of this framework is to implement a mechanism that will allow higher education institutions to re-imagine their futures in ways that draw on their strengths and geographical location, rather than to create additional administrative burdens on institutions.

This process will lead to a diverse institutional landscape comprised of strong, focused and sustainable institutions, each with its own particular identity. While all institutions will be required to offer high quality undergraduate education; to engage in some form of research

or scholarship; and to be socially engaged and responsive, each will have a discernible identity: some as undergraduate universities with excellence in teaching and learning and scholarship; some as research-led universities with nationally and globally acknowledged areas of expertise; some as universities of technology with strong technology transfer and applied science capacity; and some as universities focused on meeting local or regional needs etc. All institutions are expected to strive for high quality in their chosen niche, and will be differentially monitored and measured according to the agreed mandate and mission, and their own developmental capabilities, rather than in competition with all other institutions in the system.

The framework is intended to stimulate all institutions to chart their own developmental trajectories within the bounds of available resources and capacities and within the framework of dynamic regional, local and national developmental imperatives. No institutional niches should, in principle, be cast in stone or frozen in time. At the same time, great care must be taken to avoid arbitrary or random evolution of mandates and missions that cannot be sustained by the system as a whole. Clear rules of engagement regarding evolutionary transitions across the broad institutional types will be put in place, including a framework for consultation and approval by the Department.

The achievement of these goals will require judicious steering and monitoring on the part of the Department, especially in a resource constrained environment. Limited resources from the budgets of both the Department and DST, for example, will need to be used to retain and enhance South Africa's globally competitive research capacity, as well as its role as part of the southern African and African higher education systems. Equally, the Department recognizes that dedicated resources, backed by appropriate plans, policies and performance indicators, will be required to give effect to specific institutional goals that are integral to their distinct missions. In this respect, a set of performance indicators, differentiated in type or weighting, will be developed for each institution. Quality Assurance mechanisms will also play an important role in supporting the development of a more purposefully differentiated system.

The overall approach to differentiation will need to be embedded in the three primary steering mechanisms available in the public higher education system in South Africa: planning, funding and quality assurance. The Department and the CHE will collaborate to ensure that the mechanisms available in the system are adequate and appropriate for this.

This framework is based on a range of long-term sectoral discussions and a broad consensus about the need for a purposefully differentiated university sector.

Strategies for implementing the framework:

- Although high level analysis of the academic activity of public universities shows that the majority comply with designated mandates, there are two identified exceptions. The DHET will enter into a process to clarify the mandate of both the universities of Venda and Zululand. Once the process is complete, the DHET will issue a list of institutions and their formal mandates. This will be a document published in the government gazette which will provide the broad framework for the scope of programme/qualification mix of each institution going forward.

- The next round of enrolment planning discussions between the DHET and public institutions will lead to a formal agreement linked to this differentiation framework. As a basis for the next round of discussions, the DHET will issue a template for engagement, based on this framework and on the process that already exists. This template will indicate what information is necessary for the discussions. Once the discussions are concluded an agreement will be signed between the DHET and each public institution for the 5-year period of the next enrolment plan. This will provide the framework for the scope of activity of each institution going forward.
- DHET, in consultation with DST will explore funding and other incentives to support the differentiation framework, in areas of joint funding mandate.
- The funding framework will be adjusted where necessary to ensure that the necessary support mechanisms are in place to support the implementation of the differentiation framework.
- Reporting will continue as per the existing regulation processes, although changes will be made in line with the differentiation framework. An explicit set of indicators will be developed that can be adapted across institutions, and grouped appropriately to allow for a more differentiated performance monitoring process.
- Specific strategies will be developed to promote and support greater levels of system and in particular regional collaboration.
- As discussed in chapter 2, the DHET will further analyse the entire post-school system to clarify the institutional landscape with a view to re-purposing some institutions and campuses and to identify opportunities for more formal collaboration across the PSET system.
- Ongoing analysis of private institutions will be necessary to ensure that up to date information is available on the PQMs and enrolment growth of private institutions.

Developing a more student-centred higher education system: supporting access and success

As indicated in section 2.2 of the plan, significant enrolment growth is planned for the higher education sector, albeit at a slower rate than envisaged in the White Paper. Despite enormous growth in the participation rates of students in higher education and evidence of improved success of students, there are still significant systemic weaknesses in student throughput. A key focus of the plan outlined in section 2.2 is to grow according to available funding while pushing for increases in the overall core budget for higher education, which will enable real capacity development over time. At the same time it will be critical to improve the levels of throughput in the system, making sure that students are able to persist in university courses and complete in reasonable time. This in itself will enable the system to cater for more students in a specific time period as a result of improved efficiencies.

The persistent social and economic inequalities in society, in the basic education system and in the higher education system still impact on who accesses higher education, and how well they are able to succeed in their studies.

The current South African higher education sector, which has been built on a history of exclusion and inequality has made huge strides in expanding access. Enrolment has grown significantly from 495 356 in 1994 (DHET, 2015), to 1 132 422 in 2015. Enrolment in public universities in 2015 was 985 212. The demographic profile of students in South African universities has also changed, with a marked increase in the number of students in all race groups, and a larger increase for Africans than for other groups. Enrolment for African students rose from 59.8% in 2001 to 70.7% in 2015, and that for coloured students rose from 5.3% to 6.3% in the same period. Gender proportions have also changed - in 2015, female students constituted 58.3% of all students in universities. However, there are still significant inequities in participation rates on the basis of race.

The significant growth in access to higher education has changed the student profile of public universities, which are no longer reserved for the elite few, but have opened up to a diversity of students from different socio-economic and schooling backgrounds. However, the articulation gap between schooling and the epistemological demands of higher learning continues to affect throughput of students in the higher education system, in combination with a range of other factors that impact on student success. As a result, the successes achieved in expanding access have not been matched by equivalent success in retention and throughput rates. Cohort studies have shown that there is a high dropout rate, especially after the first year of study, and this is a major concern for the system (DHET, 2016b). However, there is also evidence of improvements in drop-out rates over time.

Another measure of success of the sub-system, student throughput rates, highlights some inefficiencies in the system. Cohort studies of students in three or four-year programmes show that 44.2% of the 2000 cohort had graduated after five years. For the 2009 cohort, 53.5% of the students in the cohort had graduated after five years, an improvement on the 44.2% of the 2000 cohort (DHET, 2016b). Although there are signs of improvement, throughput is still far too low. These figures only refer to students studying in contact mode. When the cohort of students in distance education mode are included the throughput rates and completion times are worse.

The poor throughput rates at undergraduate level affect the success of the university system at postgraduate level, as poor throughput with many students achieving inadequate standards of achievement means a limited pool of students are able to enter postgraduate study. Despite increases in postgraduate enrolments in the last fifteen years, enrolments in both Masters and Doctoral programmes are still low in relation to comparative middle income countries, and to meet the targets of the National Development Plan.

There is little doubt that despite the progress in student throughput and success, a range of innovative practices, and pockets of excellence, this must be a core area of focus for the system over the next 12 years. Overall dropout must be reduced, throughput must improve with greater numbers of students succeeding and meeting appropriate quality standards in shorter periods of time, and inequities between groups of students must reduce.

The multiple and complex academic and non-academic factors contributing to poor student success in South African universities have been well documented over a long period of time.

At undergraduate level, poor success can be attributed among many factors collectively grouped into life and logistic factors, teaching and learning factors and psycho-social factors. These include factors such as the articulation gap between school and university, inadequate access to funding for tuition and living expenses, and poor living conditions for some students. Large classes, poor early warning systems, limited access to student support services (both academic and psycho-social), curriculum design and pedagogical challenges, language issues, inadequate or inappropriate teaching and learning facilities, alienating institutional cultures, the use of ICT infrastructure, and many other factors impact overall on the ability of institutions to facilitate improvements in student success.

While we now know a great deal about the broad range of factors impacting on student success, it is widely agreed that **no single intervention** can solve the challenges of improving success for all students.

The Plan recognises that there is a great deal of work taking place in the system to improve the student-centred nature of the system. However, improvements must continue and accelerate in order to make sure that more students are succeeding and accessing a quality higher education, and that the overall efficiency of the system improves.

Systemic, focused and multi-dimensional interventions are required at all levels to impact on student success, and the sector must improve on its ability to learn from what works. Importantly, mechanisms must be put in place to ensure that the multiple interventions are aligned and work coherently together towards improving student success.

Enabling and evaluating student access and success

A number of enabling programmes and strategies at national level can contribute to a more successful higher education system. This section outlines a range of strategies for supporting students towards improved success and for monitoring and evaluating improvements in student success.

Strategies:

A systemic focus on student success is necessary for all institutions. This means paying attention to a range of factors that will enhance student's chances of success. Good undergraduate teaching must be a focus of all institutions and strategies to improve teaching and learning must be explicitly part of all university strategies and missions and well reported on.

The Career Development Services are already in operation to provide support to students in making appropriate career and study choices. The Central Applications Service (CAS) will become fully operational in 2025, and will provide an enabling mechanism for students to apply for different areas of study and at a range of institutions. These mechanisms must be sustainably funded for the long term.

Institutions require improved systems for appropriate placement of students that are inclusive, that have the ability to recognise potential and the possibility of success with appropriate support and that do not simply replicate the prevailing inequities.

Placement in extended curriculum programmes has contributed to improved student success in undergraduate programmes through improving student retention and throughput. An enhanced, strengthened extended programme policy will be introduced with the next enrolment planning cycle. It will enable more flexible options, such as including support over multiple years of study, and will strive to cater for a national average of 30% of first-time entering students.

Student analytics, early warning systems, strong student advising systems, and appropriate support interventions are essential pillars that can help to identify the right kind of support that should be provided to individuals and groups of students at the right time. Universities need to be able to provide a range of student support and development services that are wide enough to be able to be responsive to the needs of individual students. Student support systems must grow and improve to support student success. Student success interventions, specifically those that focus on retention after first year, tutoring and mentoring, improving throughput, improving graduation in regulation time, improving success in gateway courses, and enabling psycho-social support services should continue and be strengthened. This constitutes the student development and support framework for improving student success that the University Capacity Development Programme will support universities to develop and implement.

Three focus areas will inform the key interventions that will be supported by the UCDP enable a *structured and integrated approach to improving student success*: (1) student development initiatives to improve success, (2) staff development (which is also a key enabler of student success) and (3) programme/curriculum development (also a key contributor to student success). In this way the UCDP cuts across three major areas of developmental focus for this Plan.

It will also be necessary for universities to allocate some of the resources under their direct control to these important areas, and joint Department and university efforts to draw the support of other partners to collaborate with the Department and universities in strengthening these areas must also be strongly pursued.

System level performance targets for student success improvements will be set in the form of dropout rates, throughput rates overall, throughput rates across different programme types and in particular in areas of weakness, the numbers of students graduating in regulation time; and improvements in equity of students in all these areas. These indicators will be monitored annually through the cohort studies conducted through HEMIS, and in line with enrolment planning monitoring. In addition, trends in high attrition areas will be monitored by the Department.

Promoting African languages in and through higher education

It is acknowledged that the development and promotion of African languages is a broader issue that impacts on student success, but also relates to a range of other areas of work, including research and innovation.

The White Paper on PSET identified African languages as being a priority knowledge area under risk in the higher education system partly as a result of the dominance of English, the systemic, systematic and intentional neglect of African languages in the previous

dispensation, the decline of African language departments and capacity, and a (purposeful) lack of specificity in prevailing higher education policy. Besides being a vehicle for communication, language is a carrier of culture and identity. The neglect and decline of the African languages presents a significant social justice imperative that must be addressed.

Strategies:

The Higher Education Language Policy is being re-developed to address the current language concerns in the system. The policy will be finalised as an immediate priority.

An implementation plan (which will also address resourcing) will follow the adoption of the revised language policy to ensure that work is done in three areas:

- the purposeful strengthening of African language departments at universities in all indigenous languages for a range of purposes, including the development of the languages themselves and the need for growth in scholarship in this area; as well as the importance of African languages for particular fields of study (particularly for foundation phase teaching, health sciences, social work and other professional qualifications). The approach will be to ensure that a collaborative system is put in place to ensure at least one centre of excellence in each language.
- the proper development of strong language policies of institutions, which will include the promotion of multi-lingualism in institutions (for communication and administration purposes); and
- the development of a range of mechanisms to support teaching, learning and research in African languages, including the establishment of Centres for African Languages Teaching and the establishment of research and development chairs.

Both the latter areas of work are linked to but not dependent on the purposeful strengthening of African language departments, as not all institutions will include an academic centre of specialisation in an African language. Focused resources will be necessary for a five-year period to support these processes and assist in building capacity across the system. This will be a shared responsibility of the Department, DST, the Department of Arts and Culture (DAC) and the Pan South Africa Language Board (PANSALB). Some support will also be built into existing earmarked grants, such as the UCD grant.

Strengthening teaching, building curriculum development capacity and harnessing the potential of new technologies for teaching and learning

Improved success in the higher education system will be achieved not only through direct student support initiatives but also through focused attention on strengthening university teaching, building curriculum development capacity across the system, and optimising the use of new technologies in support of university teaching and learning.

Effective student learning cannot happen in the absence of quality teaching, and student success ultimately and primarily depends on quality teaching. The ability of university teachers to teach in ways that are responsive to the needs of their students is an important factor contributing to student success. In the context of high levels of student dropout and

low throughput, good pedagogical practice is a necessity not a choice. Efforts to develop and strengthen university teachers and university teaching need to become mainstreamed at universities. The image, status and recognition of teachers and teaching must be enhanced.

It is widely acknowledged that the curricula of higher education institutions need to constantly develop and transform to respond to the constantly evolving needs of students and society. The development of relevant, responsive, and accessible that is appropriately scaffolded is at the core of the work of higher education institutions. Debates are currently raging within the sector about the need for the decolonisation of curricula. Institutions also have to respond to a range of pressures on the formal curriculum: the imperatives for social relevance, sustainable development concerns, ongoing field developments, and the impact of the fourth industrial revolution on learning, responsiveness to the world of work, including the need for entrepreneurship education amongst many others. Debates about these areas should be encouraged and supported, to enable an appropriate balance amongst the many competing demands on higher education curricula and teaching to be achieved.

If institutions are able to continuously adapt their curricula, curriculum development skills and systems are required.

Many institutions have, and continue to engage in curriculum review processes. These must be supported and intensified and systemic collaboration through communities of practice and national networks of support is necessary to make them effective and of high quality.

Advances in digital technologies and open learning provide new opportunities for enhancing teaching and learning, for engaging a wider range of students in new ways, and ultimately for curriculum delivery, including assessment. This includes the integration of ICTs in teaching and learning, including in contact teaching and learning, and the use of digital technologies to enable online and/or blended course delivery modalities, even in contact programmes.

Distance education programmes are well placed to make effective use of the affordances offered by digital technologies but currently do not do so on a significant scale. Some institutions have advanced much more than others in this area.

There is also concern about the efficiency of formal distance education programmes, the low throughput rates of students studying in distance mode and the high cost of inefficient throughput, both personal and systemic. A substantial focus is needed on how technology can enhance student success when studying in formal distance mode and what kind of teaching and learning in combination with technology is necessary to reverse negative trends.

Strategies:

The UCDP as a strategic resource, supported by the UCDG as a monetary resource will be a key mechanism through which strategies for strengthening teaching, building curriculum development capacity, and harnessing digital technologies to support teaching and learning will be driven.

A national framework for strengthening university teaching will be put in place to enable improved coordination and collaboration across institutions in this area, and to ensure that there is greater consistency in the teaching development opportunities across the system, and better equity of provision. The national framework will set out national, inclusive

benchmarks for quality teaching; enable professional development for university teaching; promote a scholarship of teaching and learning; ensure that teaching excellence is recognized and rewarded; and establish and maintain teaching development support structures and resources. The national framework will have the purpose of guiding the allocation of state, institutional and partner initiatives and resources for strengthening university teaching.

The Department will continue to provide infrastructure grants which support a range of infrastructure developments to support teaching and learning and research, with a focus also on maintenance backlogs. This will be guided by the Macro-Infrastructure Planning Framework being put in place.

Professional development opportunities for academics and other support professionals implemented by universities will include opportunities for developing expertise in curriculum development.

Universities will be supported to review and renew existing curricula to respond appropriately and responsibly to current debates; to create new curricula in areas that are institutional priorities (linked to their agreed mandate in a differentiated higher education landscape), and to create new curriculum offerings that are national priorities (e.g. in emerging new development areas).

Regional or national collaborations to develop programmes and curricula in regional and national priority areas will be supported.

The Department is in the process of implementing the second phase of the Rural Campus Connectivity Project, which will improve student and staff access to broadband connectivity and resources that can be accessed online.

In order to replicate what is working well in some institutions and to initiate new possibilities, the Department will encourage and support collaborative technology enhanced teaching and learning projects through the collaborative projects component of the University Capacity Development Programme.

The growth of formal distance education provision must be carefully planned, as there is concern about the poor throughput of students in traditional distance programmes, and low levels of support for students who would perform better in a contact environment. The potential for expansion of the public higher education sector has partly been addressed by the *Policy on Distance Education*, which allows for the provision of distance education by all public universities. In pursuance of a differentiated higher education sector, distance delivery should be in line with institutional approved missions through the enrolment planning process, and in line with approved programme qualification mixes. The accreditation process of the HEQC is also critical for assessing the capacity of institutions to support good delivery of distance education programmes.

Institutions will continually consider mixed mode/blended programme delivery based on the needs of students and their contexts, as well as curriculum requirements. However, flexible provision should not lead to delayed exit outcomes and end up disadvantaging students. Attention will need to be given to quality assurance considerations in relation to new and different modes of teaching and learning and curriculum delivery.

Student housing and other areas of student life

Currently only about 20% of students in public universities are in university owned and managed residences. It is recognised that university residences can provide structured support environments to enhance student success. The long term goal is to increase the proportion of students that are able to access university-owned accommodation and university-accredited private accommodation and ensuring that students have access to quality living and learning spaces. This is particularly important for first year students.

Growth in access to student housing must be linked to available funding, both public and private. The incremental realisation of the goal to support growth in access to quality student housing will continue to be supported through DHET infrastructure funds, which have prioritised student housing needs across the system. In addition, there will be support for public-private partnership models, where they are able to meet the goals of good quality and affordable student housing.

Improvements in the living conditions of students, both on and off campus, need to be rigorously monitored. Adherence to norms for student housing provision and facilities can ultimately contribute to improved student performance.

It is also recognised that many universities do provide additional support (such as access to subsidised meals on campus, late night library services and transport for off campus students, recreation services etc). These services are recognised as critical for the well-being of all students, and must be supported as funding allows.

Affordable internet access should be explored for all students through both institutional and national mechanisms. Wherever possible, free data should be negotiated to support academic work and access to academic materials.

Financial support for students

NB- this chapter was drafted before the Heher Commission report was released. It will need to take account of the recommendations as well as the responses to it.

Financial support for students is recognised as being integral to success. Students who are not able to access adequate support for their full cost of study (which includes tuition fees, living expenses and other costs) face genuine barriers to success.

The following outlines the Plan for improving student financial support for higher education studies. The vision for student financial support is to ensure that all poor students are adequately funded to allow them to complete university, and that university education is affordable for all other students. Over the period of this Plan, the Department, in partnership with NSFAS, institutions and private sector funders, will work towards ensuring that no student who cannot afford the costs of higher education is prevented from entering and succeeding at university. A range of support mechanisms are necessary and these will be put in place over time towards a viable and sustainable model for student financial support in the higher education sector.

Strategies:

- Sufficient funds to meet the full cost of study will be made available to all students who qualify, through a range of mechanisms and provided that students complete within adequate time. This will be subject to available funds and could include both bursary and income-contingent loan funding. This should be available to all students regardless of household income, but will be prioritised for poor students.
- Through public and private partnerships, support for “missing middle” students (currently defined as up to R600K family income) and support for living expenses will be offered from 2018. This will be linked to income-contingent loans and will be universal by 2030. Over the period of this plan the benchmarks will be linked to tax collection benchmarks, so that a single, rational data set can be used to determine thresholds.
- A cost-sharing funding model for higher education will continue. This includes charging student fees in combination with greater levels of access to financial support mechanisms for all students, but with priority to the poor and working class. Those who can afford tuition fees and can access non-State funding for higher education must continue to do so.
- A framework to regulate the fees of public higher education institutions will be introduced, as advised by the Council on Higher Education (CHE) and the Heher Commission.
- The possibility of loan funding for all students regardless of family income may become a reality should public-private partnerships be successful. Students in private institutions should also be able to access support from this fund over time, and linked to certain criteria (such as equivalent courses in high demand not available in the public sector).
- Greater amounts of funding for higher education will be obtained from the private sector. This is built into the model for the new financing initiative, which builds on the funding stream from the BBBEE codes.
- Mechanisms will be put in place to allow for loan funds to be returned to the State and private sector through the South African Revenue Service (SARS), so that sustainable funding is available for future generations of students.
- Student funding models need to consider financial support for postgraduate students also, with priority given to honours students.
- The administration of NSFAS must improve through immediate review and new systems in place. NSFAS will continue to be a truly important vehicle for facilitating access to higher education for poor students.

Postgraduate Students:

Higher education policy recognizes the centrality of research in the production and dissemination of knowledge and the importance of a vibrant research and innovation system to support national development goals and global competitiveness.

The White Paper goals are that postgraduate output must increase, particularly at doctoral level, and for the development of future academic cohorts. There must also be a strong focus on improving equity in relation to gender, race and disability at postgraduate level. It must be acknowledged that the Department and the DST share responsibility for the funding of postgraduate students. Currently, 16.6% of the total students in public higher education institutions are studying at postgraduate level (2015).

Since 2005 (stimulated by the introduction of the then new funding framework, in particular the research funding), there has been good annual growth in the production of research masters and doctoral graduates at 8.8% and 8.2% respectively, even though this comes off a low base. Despite this growth, there has been no significant increase in the size of the country's human capacity for Science and Technology over the past decade. The headcount of researchers at universities, science councils, government departments and national research facilities has remained at around 43 000 over the past decade². The number of PhD graduates per million of the population was 41.8 in 2014, well below that of most global knowledge economies, though there is improvement.

The system must prioritize the full funding of high-performing students from financially disadvantaged backgrounds to enable them to proceed directly from undergraduate to honours, masters and doctoral studies. By creating such a qualification pipeline, this approach should contribute to increasing the numbers of full-time postgraduate students and thereby reducing the time to completion of doctoral studies.

Notwithstanding the reported progress, the policies of the Department, DST and National Development Plan all call for the expansion of human capacity for the research system.

Strategies:

- Through the enrolment planning process institutional targets will be set for undergraduate/postgraduate mix; masters and PhD enrolments. Targets and improvements in graduation rates and time to graduation will be monitored through the reporting process.
- Support for new models of doctoral study should be explored across all institutions. There may be different models appropriate to particular disciplines and new models that are more appropriate for particular types of doctoral study, and which may enable better quality and more effective learning, and more efficient throughput.

² DST-NRF Centre of Excellence in Scientometrics and Science, Technology and Innovation Policy: The Changing Face of South African Science, 2016

- Supervision is a critical component of successful PhD studies. New methods of incentivising, rewarding, and professionalising supervision will be required. This is linked to academic staff capacity development, but requires specific strategies. In particular there is a need to investigate the current incentivisation of PhD graduate output through the earmarked grants of the Department. PhD outputs will be addressed in a separate strategy from research outputs.
- Joined up strategy between DST and the Department is important for improving postgraduate funding and success. Currently only about 16% of postgraduate students are supported through NRF scholarships. A specific joint strategy and mechanism is addressed in the later section on research and innovation. Postgraduate growth and improvement is a core part of this joint planning and implementation.
- Funding for postgraduate students must improve, in particular the low proportion of postgraduate students receiving state funding and the sufficiency of grants to adequately support postgraduate studies. Honours students will continue to be prioritised for growth, but targets must also be increased for masters and doctoral students.

The staffing of public higher education institutions

The staffing of the university sub-system is a vital focus area for this Plan, as the transformation and long-term sustainability of public higher education institutions depends on their ability to attract and retain staff. The rejuvenation of the academic profession and a focus on demographic transformation in academic staffing and in areas of professional leadership and management are key policy goals. A holistic view of staffing underpins this plan, inclusive of academic staff, professional staff that directly support the academic function and leadership and management staff.

Rapid expansion of student numbers has not been matched with growth in the number of lecturers in the system. In 1994 the lecturer: student ratio was 1:38.5 and by 2013 this had increased to 1: 55.7 (DHET, 2015). Further analysis is needed about ratios across different fields of study. In addition to an unfavourable lecturer: student ratio, the demographic profile of academic staff in universities still reflects the unequal patterns of the past.

Women, particularly black women, are not well represented in senior academic, professional and leadership positions in public universities. It is also a matter of concern that large numbers of academic staff are reaching retirement, and progress in recruiting new generations of academics has been slow. There is also concern about the increasing reliance on temporary staff.

A more coordinated effort to pay attention to the transformation challenges in the area of academic staffing is required and over time and the system must focus on making academic careers more attractive, developing pathways for new generations of scholars, and providing adequate capacity development across the system at different levels. This will require clear institutional strategies (which go beyond compliance with the employment equity act because they are intensified, broader and more sustained), combined with steering and support mechanisms at national level. One of these strategies is the SSAUF which combines a

number of these approaches and is supported through the University Capacity Development Plan and Grant.

The SSAUF, however, is only one catalytic intervention in a large system. The overall rejuvenation of the academic profession, the need to ensure the long-term sustainable development of new generations of academics, and addressing the institutional cultures that many academics find alienating, will not happen without addressing the issues relating to the future sustainability and funding of the higher education system.

Strategies:

- The Staffing South Africa's Universities Framework (SSAUF) is a national and sector response to the staff capacity challenges in universities and will continue to be the main national vehicle through which staff development imperatives at universities are addressed. Initiatives include structured support for developing emerging scholars from honours level; a specific programme for developing new generations of academics, recruiting young academics to address equity targets in high need areas, with initial funding from the Department; support for capacity development of existing staff, including where necessary support for PhD completion, and other forms of professional development; supporting universities to employ specialised staff on a contract basis where gaps exist; and building knowledge across a range of areas to rejuvenate the academic profession in a range of ways. The full expression of the SSAUF through the scaled implementation of all of the programmes contained within it, will require additional resources to be availed. The Department will seek to garner the required level of resources, including through the collaborations and partnerships that it is able to establish with national and international stakeholders and partners.
- The New Generation of Academics Programme (nGAP) is a nationally driven programme that is part of the SSAUF that will continue to be implemented, recruiting a minimum of 100 new academics per year. Efforts will be made to increase this number as funding becomes available.
- The Higher Education Leadership and Management Programme (HELMP) is another core programme that has been incorporated as part of the SSAUF. It is focused on developing staff in leadership and management positions at universities. HELMP will be implemented through a partnership with Universities South Africa (USAf).
- A Ministerial Task Team has been appointed to investigate barriers to the recruitment, retention and progression of black academics in the system. The dearth of a black professoriate will be a major focus of the task team. The task team will complete its work by 2019, and will provide advice to the system on work that can be done in this area across all institutions.
- Long-term institution-specific strategies for developing and supporting new generations of academic staff must be in place at all institutions. Institutional strategies must focus on ensuring fairness in promotion criteria and implementation of these; developing generations of young scholars; supporting early career academics in developing research and teaching skills, completing PhDs, and

developing career strategies; structured mentoring for young academics; ensuring a range of career development and support initiatives for academic staff, and developing the black professoriate, amongst others. Some level of support for these initiatives will be provided to universities through the UCDG, but universities must also intensify their own efforts to raise the required resources to make a meaningful contribution to addressing the staffing challenge.

- Equity and transformation plans of public institutions must put in place visible strategies to improve the equity of academic, professional leadership and management staffing cohorts, transforming the profile of staff at all levels, and paying particular attention to inequities at senior levels.
- The Department will closely monitor annual staffing equity developments across the sector to assess progress.
- Efforts must be made to reduce the ratios of permanent to temporary staff. This is linked to the overall funding of the system improving, but also requires specific institutional strategies to make available permanent academic posts to absorb new generations of scholars.
- Improved staff capacity to support teaching and curriculum development will be supported at institution level and stimulated at system level through the UCD Grant. Professionalising teaching in higher education, by building the capacity of lecturing staff (including a focus on curriculum development skills and capacity) is critical for student success improvements. Collaboration will also be promoted through the sharing of good practice at tri-annual staff and student success symposia. The focus will be on improving staffing capacity to support student success and improved throughput.
- The overall percentage of academic staff with PhDs will continue to improve through targeted programmes. Targets will be negotiated with individual institutions, linked to the plans of each institution and appropriate for institutional mandates and missions.

Governance, regulation and accountability

System governance, regulation and reporting

The calls for the greater public accountability of public higher education institutions have intensified in recent years, in the face of a range of challenges, but including the concerns that some institutions have made slow progress in transforming their staff and student demographics and institutional cultures, impacting on the experiences of black students and staff, poor and working class students, women, and people with disabilities.

There is, on the one hand, a concern that the Ministry and Department have been too quick to intervene in individual institutions, but on the other hand, a concern that some universities ignore national policy imperatives and do not do enough to transform themselves, making intervention necessary. This is a difficult balance to maintain, but it is clear that there are vast

differences across the system in how well institutions are run, how effective institutions are at implementing policy goals, and how well their finances are managed.

Over time the system has developed a range of mechanisms to monitor and assess governance and success of institutions and the data available for regulatory purposes has grown in complexity and richness. The growing information base includes the information available from annual reporting and through the audit processes of the CHE.

Constituency-based structures have grown across the system, and although there are concerns about “stakeholderisation” in the system, it is important for system governance to be able to engage national structures that can represent the “voice” of particular groups – university Council members, vice-chancellors, and academics. The absence of a national grouping representing academic staff makes it difficult to consult academic staff at a national level.

The current governance modes of the higher education system, which includes institutional governance have developed over a 20-year period since the introduction of the Higher Education Act in 1997. Some shifts are reflected in the re-drafted HE Act (2016) which clarifies the role of the Minister in setting transformation goals of the HE system, intervening in institutions in situations of maladministration, and a range of other matters, including the need for university Councils to seek the advice of Institutional Forums on particular matters and provide reasons where advice is not taken.

Going forward, the system will need to adapt to the need for continued regulation and oversight from the Department and the CHE, in particular the need for more sophisticated and in depth/institution-specific data and making use of new mechanisms for interpreting governance and financial health of institutions, amongst other areas. At a systemic level institutional governance structures, the regulation and oversight of the Department, the quality assurance and advisory role of the CHE should work together to deepen the self-regulation of institutions, the necessary balance between accountability and autonomy, and the high level agreements between public HEIs and the State.

Strategies:

- A reporting system between universities and the DHET already exists. Reporting between institutions and the DHET will be reviewed to ensure that:
 - all necessary information is being collected (aspects of this Plan will require new information- e.g. Differentiation framework, community engagement, code of good governance);
 - reporting can be streamlined- the reporting burdens on institutions are already quite high, and a review should look to streamline reporting;
 - the DHET has the necessary capacity in place to effectively monitor and provide oversight, based on the reports provided by institutions.

Ultimately there is a need to balance the need for nuanced information with the need to rationalise a range of reporting processes, where possible.

- The monitoring and oversight system will need to be further developed to respond to the requirements of implementing the Differentiation framework.

- A review of the role of the Council on Higher Education should be undertaken to inform its future role in the regulation and quality assurance of the system. Its advisory role also requires strengthening, and the review may inform this.
- Audits undertaken by the CHE can play a crucial role in triangulating information about the performance of the system. In addition, national reviews play an important role in improving the quality of particular professional fields across the system. The plan supports the reintroduction of audits by the CHE. A framework for the first round of audits should be published by 2019. The Department will also engage with the CHE to identify the areas for national reviews in the next period.
- The work of the Transformation Oversight Committee (TOC) will be aligned to the existing work of the Department so that it plays an advisory role on matters of institutional transformation, with a particular focus on systemic frameworks for understanding and monitoring transformation indicators. This has to be linked to existing reporting and monitoring.

Institutional governance

Pressures on decision-makers in higher education are significant, with the growing complexity and multi-dimensionality of decision-making in a university environment, growing sustainability concerns, growing public interest in how universities are managed, and global pressures that impact on knowledge institutions.

From the point of view of the conceptualisation of both transformation and accountability, the 'lifting' of transformation from the core functions of the institutions seems an artificial operation which runs the risk of reinforcing the view of transformation as something different from the educational, social and administrative processes that sustain the life of universities. (CHE, 2016)

Institutions need to develop leadership and management capacity at all levels, and develop the capacity to produce and make sense more complex data sets to steer institutions successfully.

Student governance is also facing a crisis of legitimacy in some institutions, with persistent low voter turnouts at SRC elections, while at the same time new student organisations are rapidly growing. In short, institutional governance methods and structures need to be constantly adapting to change and ensuring responsiveness to new challenges. SRCs are part of the formal governance structures of public institutions and must continue to be supported and recognised as such.

The Department will also need to work with institutions to support greater institutional capacity for data generation, management and planning and institutional research.

Strategies:

- The Department and institutions must ensure that there is efficiency in the appointment of Council members, appointing replacements timeously, so that there is stability and continuity in the governance of institutions.
- Clear criteria must be developed to guide the appointment of Council members in public higher education institutions. This will ensure that the roles and responsibilities of Council members are explicit and well known.
- The Code of Good practice for institutional governance will be operationalised. Guidelines for the appointment of Council members must include very clear guidance on conflicts of interest and how they will be managed.
- Targeted support and induction must be available for Council members across all institutions. However, this training and support must be fit for purpose and be able to be offered flexibly. Support for Council chairs, ordinary Council members, and new members of Council will be different. A new training and support system will be developed by the Department in partnership with the UCCF. Support will be targeted and specific and will include the provision of online materials.
- Continued support for student governance is necessary at both institutional and national level.

Funding, resourcing and sustainability

This section addresses matters of institutional funding for public universities. Student funding has been addressed under priority area two in this chapter. The goal is to achieve a funding regime that will support the long term goals for growth and improvement in the higher education system, and ensure that public institutions can be sustainable and stable over the long term.

The funding of the public higher education sector has become a national talking point following the #feesmustfall protests of 2015 and 2016. This has drawn attention to an issue that has been under discussion for several years: the fact that the growth of the overall budget for higher education has not kept pace with the growth in student enrolments, despite consistent increases in the State budget for higher education, including for student funding for poor students. It should also be noted that much of the recent increase in the higher education budget has gone to the National Student Financial Aid Scheme (NSFAS), which supports poor students. This is a recognised priority.

However, the decline of the government subsidy in relation to enrolment growth has led to a growing reliance on student fees by public higher education institutions (leading to above-inflation fee increases), and concerns about affordability for all students, as families are increasingly unable to pay tuition fees and allocations from the NSFAS struggle to keep up with the costs of study and the demand from students. It is well known that adequate funding for both tuition and living expenses is a critical element of support for students in

higher education, as financial stress and inability to fund studies is a major cause of drop-out and inability to complete.

A series of processes have been put in place since 2015 to look at the overall funding of higher education, culminating in the appointment of the Heher Judicial Commission in December 2015, which has advised on the feasibility of providing fee-free higher education and Technical and Vocational Education in public institutions. The advice of the Heher Commission has been considered in the development of the draft Plan, as it provides an important source of advice for government on the long-term decisions about the funding of higher education necessary.

There is uncertainty about the fee regime that will operate in the future and in turn, the implications of this for the funding of higher education more broadly. This is a cause of concern for all higher education stakeholders and the DHET recognises the importance of re-establishing, as a matter of priority, certainty and stability to the higher education funding framework.

In the period since the appointment of the Heher Commission, there have been several developments. The first was a freeze on tuition fee increases at public universities for the 2016 academic year, which resulted in a shortfall on the national budget for higher education, some of which was covered by institutions themselves, but the bulk of which was funded by government. This has also resulted in an increase in the baseline allocation for public universities for the MTEF.

The second was an agreement that public universities could increase their fees for the 2017 academic year, but not beyond a maximum of 8% on the 2015 fee level. At the same time it was announced that government will fund the 8% gap between the 2015 and 2017 fee up to a maximum family income of R600 000 per annum. This has required a new set of administrative processes to be established to process applications for the gap funding. Ultimately, however, this will also result in more available information about the socio-economic status of students in the higher education system.

At the time of the announcement of the 0% fee increase, additional amounts were also injected into NSFAS to cover historic debts of NSFAS students and to increase allocations to NSFAS for poor students.

As a result of these developments since 2015, the budget for the Department, which includes transfers to public universities, has become the second fastest growing budget in government. This is a positive development. However, it raises several concerns:

- This allocation has to be re-prioritised from other government budgets, including e.g. the National Skills Fund, which makes less money available for other PSET projects.
- The allocation does not meet the full need for student financial support in the system.
- The allocations do not directly address the need for increased institutional funding to support enrolment growth, quality improvements and long term sustainability, and the need for a substantial increase in the subsidy and overall budget of higher education to meet national goals.
- While the higher education sector faces funding challenges, the other parts of the PSET system are also chronically under-funded in relation to current enrolments and in line with the policy goals of the White Paper to increase the numbers of students in both

TVET Colleges and Community Colleges. The recent increases in the PSET budget have not addressed these sectors at all.

It will also be necessary to take into account the effects of the 2015-2017 period on the financial sustainability of universities, as there has been increasing pressure on university budgets and a growth in deficit budgets. There have also been related developments as a result of student protest, such as the decision of several public universities to commence processes of “insourcing” workers previously employed by private companies, in support areas such as security; catering; cleaning and maintenance. It is assumed that institutions are therefore under increasing financial strain, as budgets have not been able to keep pace with HE inflation, and as a result of recent developments. There are serious concerns about the long-term sustainability of the higher education system. The Department, in collaboration with public universities, is conducting more detailed analysis of the financial reports of institutions, to understand the financial position of institutions and the system.

There are no easy solutions. A combination of strategies is going to be necessary into the future.

The proposals below are based on the continuation of the current approach to the funding of the system, which is a cost-sharing model, based on a combination of State funding, student fees, and other sources of income for public universities.

Strategies:

- The erosion of the block grant to public universities in relation to the earmarked portion of the subsidy must be reversed over time. Although the earmarked grants are important for achieving particular policy goals, it must be recognised that the block grant is a critical pillar for achieving sustainability in the sector.
- At the minimum, the State subsidy for higher education must keep pace with higher education inflation. Without this growth in the overall allocation, it will not be possible to achieve the goals set out in the Plan. It is difficult to see a way through the long-term erosion of per capita funding and the need for affordability and sustainability of public higher education institutions, without an increase in the State budget for higher education. The Department will work with National Treasury to establish a long term plan in this regard.
- In support of this, much better quality information is needed about the real costs of providing higher education, and this will require greater institutional accountability about the actual costs required for a properly funded system. The current funding is distributed on the basis of an available funding envelope, and according to a complex funding framework. If higher education costs are routinely higher than average inflation, this needs to be appropriately measured and incorporated in the necessary funding planning. The Department will work with Universities South Africa to improve the data available to inform this planning.
- Following the developments since #feesmustfall in 2015, the Minister has been advised that it will be necessary to adapt the methodologies for determining fees across the public higher education system. There is a need for a more negotiated,

transparent and inclusive process. A national approach to fee-setting will need to be developed, as the laissez-faire approach has caused instability over time, and placed unrealistic pressure on families to pay above-inflation fees. This has also been a key cause of the student protests.

- Over time, a new process will be developed to focus on narrowing the range of differences in fees across institutions, backed by effective support from government to support institutions. An independent expert panel to assist with the fee determination process has been proposed by the CHE. Other aspects of the CHE's advice to the Minister on fee regulation will be considered by the Department in consultation with Treasury, and public higher education institutions. It is recognised that student fees are a key component of the funding of public institutions.
- It is important to note that public universities rely not only on student fees and State subsidy, but also on alternative or third stream income. Although institutions have different levels of access to additional income sources, and this is dependent on a range of factors, innovation which supports the growth of third stream income must be supported and encouraged.
- There is, however, a need to understand more about how institutions are innovating to bring in alternative streams of funding and what kinds of "entrepreneurial" strategies are being implemented. It is also necessary to understand better what kinds of private entities are linked to and supporting public institutions. The Department will, in partnership with USAF, conduct research in this area, with a view to understanding practices and making decisions about what regulation is necessary going forward.

Higher education in support of society and the post-school education and training system

"South African universities should work together to build a system of higher education that advances the public good and ensures that the intellectual resources within the sector are harnessed to enable the country to generate solutions to the problems facing the country and to transform the social and political context. Collaboration between universities can enhance the impact of scholarship on policy development and implementation" (CHE, 2016: 271).

Engaged higher education institutions: Community engagement

According to the Higher Education Act (1997) the three purposes of higher education institutions are teaching, research, and community engagement. Despite this third purpose being clearly stated in legislation, there is little common understanding about what community engagement is, and there is little detail in policy documents about expectations of higher education institutions in this area. It is strongly implied in the many policy goals for higher education, which have a strong focus on the important role of higher education in development, but no policy framework yet exists, nor does community engagement feature specifically in reporting requirements or funding mechanisms, and it is not explicitly recognised or rewarded in any research metrics. It should be noted that a lack of conceptual clarity about community engagement is not unusual internationally.

Despite this policy silence about community engagement, ideas about community engagement are widely discussed in the sector, and a field of practice has developed within the sector. A chapter in the CHE 20-year review of higher education describes how the conceptualisation of community engagement has developed over time in South Africa, having started out as primarily being about community service through service learning for students, developing over time into a much broader and complex set of ideas incorporating service learning, engaged scholarship, partnerships between HEIs and communities, government, business, NGOs and a range of work with external social partners. In fact the term is used quite broadly to reflect a range of activities and increasingly is seen as integrated into the teaching and research work of institutions, rather than as a stand-alone activity.

According to the CHE 20-year review chapter, common elements of community engagement activities are as follows:

- “Community engagement involves universities and multiple social partners, but excludes interaction with other academic constituencies;
- The interactions between universities and social partners should be characterised by reciprocity and mutual benefit;
- Community engagement is a key mechanism for building civic consciousness among students and plays a role in building their commitment and capacity for critical citizenship;
- Engagement can take multiple forms, including research-oriented forms (such as participatory action research and community-based research); teaching oriented forms (including service learning, clinical service, continuing education courses, and the collaborative production of popular educational materials); and can operate at multiple levels (local, regional, national, sectoral etc.); and
- The activities should have an intentional public purposes or benefit and form part of the broader notion of the social responsiveness of universities.” (CHE, 2016: 265)

As this a complex area covering many types of activities, and public higher education institutions in South Africa have developed the field of community engagement in very different ways, depending on their areas of expertise and available resources, a one-size-fits-all approach to framing community engagement is not recommended, and any national policy framework would have to recognise this.

However there is a need for broader recognition of this area of practice through policy and national strategy, as it must be recognised that community engagement is a critical part of the work of HEIs and can enrich teaching, learning and research across the sector, while at the same time growing the contribution of HEIs to society.

It should be noted that engagement with and support to other PSET institutions (such as TVET and Community Colleges) is understood to form part of the community engagement role of higher education institutions.

Strategies:

- Public institutions should be required to report on engaged scholarship and community engagement activities. The CHE study showed that there are big differences in institutional strategy and capacity to report. However requiring

institutions to report in this area, linked to strategic plans (and institutional mission) will give it greater prominence, stimulate new institutional strategies, and provide an opportunity for data to be collected at a national level.

- The CHE will be requested to advise on policy guidelines and reporting requirements for community engagement, and develop mechanisms for monitoring and measuring community engagement. The CHE should draw on the expertise available in the sector across a variety of institutions including SAHECEF (the South African Higher Education Community Engagement Forum). Advice should also include ways of stimulating the sharing of criteria, guidelines, and good practices in institutions and on how this work can be stimulated at a national level, including through a possible national awards system, and through specific forms of funding.

Support for the rest of the PSET system:

Public universities play a key role in supporting the production of teachers and lecturers for the schooling system, and the rest of the post-school system. A great deal of work is underway to ensure that there is adequate support for initial teacher and lecturer education, understanding of the demand-side requirements for teachers and lecturers, improved quality of teacher and lecturer education, as well as professional development initiatives for schools and TVET and community colleges. These issues are addressed in specific chapters, but the important role of universities is highlighted here.

Support for the TVET colleges is being provided through a range of Higher Certificate programmes being offered in collaboration between public TVET colleges and public universities. These programmes will continue to the extent that they assist to build the offering of Higher Certificates in particular occupational fields that allow students to articulate both directly into workplaces, and into higher education. A Plan is in place to support this work. Over time, specific incentives and support will need to be developed for targeted articulation projects between TVET colleges and universities.

Education precincts and other collaborative initiatives to ensure better resource and infrastructure sharing across the PSET system are planned. These are addressed in chapter 2 of this plan. It is anticipated that public universities will play a critical role in leading and supporting these kinds of projects.

Research and innovation

The White Paper for Post-School Education and Training proposes that the:

“focus of policy must be on growing research and innovation, improving the quality of research, ensuring coherence of the policy frameworks guiding these areas across the higher education and research communities, and strengthening particular areas identified as important for national development. In short, collaboration must improve, both between universities and across the research community, which includes universities, research councils and other institutions in the private and public sectors. Quality must improve, with a focus on niche areas of national importance.”

It must be recognised that public universities play a critical role in knowledge development through research, and research is a core function of all public universities. In addition, the

vast majority of research and development in the innovation system, funded through the Department of Science and Technology, takes place in the public university system.

Strategies are set out here towards achieving these policy objectives, with a particular focus on the role of the DHET in advancing research and innovation, both directly and in partnership with other key constituencies, in particular the Department of Science and Technology (DST) and the National Research Foundation (NRF) and other science councils.

The DHET and DST have complementary functions with respect to research and innovation. In essence, the responsibility of the DHET is to garner the resources and capacity required by universities to sustain and grow the core infrastructure for research and postgraduate studies. The DST, via the NRF, is responsible for the provision of directed research funding through, amongst others, research grants, the establishment of national research facilities and centres of excellence, research chairs, the provision of specialized research equipment, and funding for postgraduate students and postdoctoral studies. DST support for technology transfer is directed through the Technology Innovation Agency (TIA).

There has been a sustained increase in performance-based DHET funding (generated by measurement of publication and research masters and doctoral outputs) flowing to the universities over the past years from just under R 1 billion in 2004/05 to just over R3 billion in 2015/16. Relative progress has also been made with respect to the race and gender transformation of the research and innovation workforce, but inequalities persist.

Strategies:

- Stronger formal collaboration between the DST and DHET is essential for the achievement of all research targets and the long-term improvement and growth of the research and innovation system, including researcher development. The alignment of policies, plans and targets must be consistent to allow for effective delivery, monitoring, development of new fields and many other areas of work. A formal mechanism will be established to ensure that this alignment can be effectively facilitated across the areas of joint mandate between DHET and DST. The exact mechanism will be determined following negotiation between the two Departments, but must be in place in time for the next enrolment planning cycle.
- Real annual increases in the core DHET subsidy will enable universities to adequately grow and renew research infrastructure, including improvement to staff student ratios and supervisory capacity.
- The attainment of the policy objectives for a strengthened and better quality research and innovation system will also depend on the more efficient, effective and targeted use of the available capacities and resources in the system. This will be driven by the institutional differentiation framework adopted in this Plan, which will require each university to enter into a binding 5-yearly agreement with the DHET to delineate the scope of an institution's involvement in postgraduate studies and research. The differentiation framework will also guide the DST/NRF in making decisions in relation to the identification of national and international areas/centres of excellence, and through the collaboration mechanism established.
- The full implementation of a system of National licenses for key journal data-bases is an urgent priority. This project has been in planning for some time and must be operationalised by 2020. It will be a key enabler of equitable access to research

materials for all institutions and science councils, as well as cost savings in an area that is a significant driver of higher education inflation costs. Many other possibilities exist for digitisation, sharing of library resources, the development of open learning materials, and the modernisation of library operations. These will also be investigated.

- The process of regular monitoring of the list of approved journals by the DHET will continue. Currently a process is underway to ensure the appropriate quality of recognised journals. Regular review and monitoring is essential, as predatory publishing is becoming an increasing problem. The DHET also will ensure that institutions are not chasing publication targets by creating and publishing in journals that have poor credibility.

Internationalisation

Internationalisation is an important area of work for the South African higher education system as South Africa is a popular destination for international students (particularly those from across Africa, and particularly at postgraduate level) and South African students increasingly benefit from exchange with other higher education systems. Internationalisation is inevitable in a competitive global higher education context, but can also be beneficial to advance collaboration in research and teaching, grow capacity in a range of areas, and fill skills gaps not being met internally. Higher education exchange and collaboration is often an important part of bilateral and multi-lateral agreements.

Strategies:

- The DHET has developed an Internationalisation Policy Framework for higher education which will be implemented as part of this plan.
- The DHET will continue to effectively manage outbound scholarship programmes for South African students in line with a range of agreements, and grow the opportunities available, particularly at post-graduate level and also in areas that support the development of academic staffing. Academic exchange programmes will be encouraged and supported where possible.
- The DHET will continue to encourage the inclusion of foreign postgraduate students in public universities. The proportions of students from outside South Africa will be monitored through the enrolment planning process, and through the individual contracts with institutions. It is important that each institution ensures an appropriate balance of local and foreign students at postgraduate level.

Chapter 6: Workplace based learning

6.1 Introduction

Improving the relationship between education and training and work is a key policy goal of the White Paper. It therefore recognises the importance of workplace-based learning to achieving the policy objectives for the PSET system. Chapter 2 has addressed a range of issues relating to skills planning, and the role of SETAs in supporting and stimulating workplace linkages with education and training institutions. This chapter builds on these proposals as well as those set out in chapters 3, 4 and 5 for improving the capacity and sustainability of community colleges, TVET colleges and higher education institutions. In particular the alignment of planning and funding cycles of SETAs will allow for much greater coherence between workplaces and education and training institutions in offering workplace learning opportunities to students in PSET, and industry experience for lecturing staff, particularly in public institutions.

A range of strategies are identified here and are linked to the other chapters of the Plan to:

- Improve the relationship between PSET and the world of work;
- Increase access to workplace-based learning for students across the PSET system;
- Allow for a diversity of workplace-based learning opportunities;
- Eliminate barriers to critical partnerships between education and training institutions and workplaces;
- Improve the responsiveness of programmes and curricula to the world of work; and
- Improve the quality of workplace-based learning.

Workplace-based learning (WPBL) is an approach to vocational learning that utilises the workplace for a student to gain access to knowledge, skills, competencies and dispositions necessary for the world of work and specific employment. This is done through real work, paid or unpaid, that leads to the production of real goods and services.

In South Africa, there are various approaches to workplace based learning, including apprenticeships, learnerships, different types of internships, and work-based exposure. Workplace based learning is an integral and critical aspect of the entire PSET system, particularly for TVET colleges, Universities of Technology, and for a range of professional qualifications at universities such as engineering, applied sciences, health sciences, teaching etc. Community college skills and occupational programmes and qualifications may also require WPBL.

The Plan recognises that the current challenges with access to workplace learning for students requires consideration of a range of opportunities for students to do work through job shadowing and simulations, as well as through real work experience, depending on what is necessary for particular occupations. Different forms of workplace learning can be incorporated into qualifications in different ways. The DHET is committed to ensuring that there is real growth in access to quality workplace-based learning opportunities for students across the system. In addition, graduates who did not have the opportunity to undertake sufficient levels of workplace based experience during their qualification should be supported to access this experience upon graduating, where this is necessary. This will require a range of strategies including better planning and alignment at all levels.

WPBL has increasingly become a feature of education systems worldwide, operating at secondary schooling, TVET and HE levels. In the aftermath of the global economic crisis and increasing levels of youth unemployment, there is increased emphasis on the need to find sustainable approaches to successful youth labour market transitions. Strengthening WPBL within the TVET system is viewed internationally as a critical element of achieving this. This is also important because relationships between work and education are complex and there is no straightforward or universal approach to vocational education or workplace-based learning.

The White Paper PSET is unequivocal that the main purpose of TVET is to prepare students for the world of work, a position that is in line with international practice. The OECD's review of TVET systems in 20 countries concluded that a key feature common to effective TVET systems everywhere is a focus on training for employment. Workplace-based learning is important for the employment outcomes of students in the system.

Since 2012, the QCTO has been developing new occupational qualifications which will become an important part of the offerings in TVET colleges. All the new occupational qualifications require some work experience for certification. Although some flexibility in the design of different qualifications is proposed in this Plan, there is no doubt that the system requires better and more systemic arrangements for workplace-based learning in order for the programmes to inspire confidence among employers and to improve employment outcomes for students.

6.2 WPBL challenges

Workplace Based Learning is explicitly supported and promoted in policies and strategies including the Skills Development Act (SDA), the National Skills Development Strategy III (NSDS III), the National Development Plan (NDP), the New Growth Path (NGP), the Sector Education and Training Authorities (SETA) Workplace-based Learning Programme Agreements Regulations, the National Skills Accord (NSA), the Youth Employment Accord (YEA), the Strategic Infrastructure Projects (SIPs), the National Youth Policy 2014-2019, the Turning the Public Sector into Training Space Strategy, and the Public Service Human Resource Development Strategic Framework: Vision 2015, and a draft DHET Workplace-based Learning Policy.

Despite this substantial recognition in policy and strategy, South Africa continues to experience multiple challenges in the provision of WPBL in support of education and training. Until the White Paper no coordinated vision existed in this area.

Additional problems with specific reference to public TVET colleges are identified as follows:

- WPBL is not currently a requirement for the two main qualification types being offered in public colleges: the NCV and NATED. The NCV recommends but does not require workplace experience for graduation. Some of the NCV programmes require simulated practice but not authentic WPBL, resulting in most students spending three years being trained for workplaces that they never set foot in during their training. NATED courses require neither authentic nor simulated practice.
- Most TVET colleges rely on champions and do not have dedicated units or staff for supporting work placement. In some colleges WPBL is a function within another focus area e.g. student support services, with no dedicated staff, while in colleges where there are dedicated units, there is a shortage of staff.
- Funding is also a major impediment to the success of WPBL. The Department does not provide WPBL funding and any funding is accessed through SETAs and the NSF. However, as addressed in chapter 2, SETA grants can be difficult to access, and there are concerns about a range of legal and financial issues amongst employers in offering formal WPBL opportunities. This makes it difficult to build formal relationships with employers.
- The links between industry and TVET colleges is weak, and attempts to strengthen them through the establishment of SETA offices at TVET colleges are still in the infant stage. There is some concern that this may also not be the appropriate vehicle to improve relationships between employers and TVET colleges.
- The status of WPBL in distance education requires some consideration and active intervention. Many university-level programmes do not provide adequate workplace access in professional areas.
- Policy incoherence discourages employers from taking students on for WPBL. The Labour Relations Act (LRA), for example, allocates apprentices and students on short periods of workplace based learning the same rights as permanent employees, placing considerable risk on employers in taking on trainees. At the same time, the Compensation for Occupational Diseases and Injuries Act (COIDA) makes no provision in the national compensation-insurance scheme for short-term learners in the workplace, making employers liable for the full cost of injuries to students and any claims arising from this.
- Regulations governing WPBL provided for in the Skills Development Act and the Broad-based Black Economic Empowerment Act have not yet been put in place, and some employers are concerned that WPBL is being implemented without a clear legal framework.

6.3 Strategies to strengthen WPBL

Given the strong evidence of the improvement in learning and employment outcomes as a result of WPBL, several strategies must be employed at system and institutional level to address the highlighted challenges and strengthen WPBL provision within public institutions.

Programme design

WPBL for students will be carefully planned so that it is meaningful both for the employer and the student. This means that the duration of WPBL should be meaningful enough for students (whether current students or graduates) and employers for authentic learning to take place. Both the employers and student interests can be addressed at programme design level, through constructive engagement between social partners, the involvement of employers in decision-making about these processes and the provision of support to companies to ensure that WPBL can be optimally managed and delivered.

- The Department, supported by the QCTO and the HEQC will develop a comprehensive strategy to support improved and increased WPBL opportunities for students across the system. This will be used for sustained advocacy to build more partnerships for WPBL across the system. This strategy will ensure sustained growth of the quality and number of opportunities over the period of the Plan. The South African Institute for Vocational and Continuing Education and Training (SAIVCET) will play a critical role in supporting programme design (with the QCTO).

Programme design for occupational qualifications is addressed substantially in chapter 2 of this Plan.

Capacity, information and support

Institutions must have adequate and qualified staff to support WPBL. This includes both dedicated staff for WPBL facilitation, and the integration of WPBL continuing professional development into the performance requirements of all lecturers teaching technical, vocational, and professional qualifications. Dedicated WPBL staff will pursue partnerships with employers, both private and public, with the assistance of SETAs. The South African Institute for Vocational and Continuing Education and Training (SAIVCET) will play a critical role in designing appropriate professional development opportunities for lecturers in TVET and community colleges.

Implementation of work-based learning programmes by employers must be better supported through the DHET recognising that training is not the primary responsibility of workplaces. Technical expertise offering high quality training for workplace supervisors and mentors is essential to ensure the best possible workplace learning experiences for students. This requires urgent intervention, building on good practice already taking place and learning from international examples.

Quality assurance

Quality assurance arrangements should be clarified so that there is an understanding of what form of quality assurance requirements are needed for the various types of WPBL. This needs to take into account the imperatives for the WPBL to be cost-effective; easy to administer and implement and supportive of the learning objectives of the WPBL. Thus there may be a strong focus on assessment of Workplace based learning where it is linked to a qualification,

but for internships for graduates there may be a stronger focus on work readiness interventions that may not be accredited but that maximise the learning for the new entrant.

Incentives

The funding formula for public TVET colleges will be restructured to allow for joined-up funding between the skills levy support for WPBL and the core funding for programmes in the colleges. Chapter 2 sets out the contribution of the skills levy to support occupational programmes and puts in place the necessary mechanisms to allow for joined-up funding. However, for this process to work well significant work will need to be done, and includes the introduction of a comprehensive enrolment planning system for the public TVET colleges. These changes will need to take place over time to ensure that systems and planning cycles can be properly aligned.

The Department is already working with DTI to ensure that there is recognition for workplace based learning within the BBBEE codes. This has already been agreed upon and the definitions utilised in the DHET policy should be included so that there is clarity as to what is defined as WPBL, and the nature of the point allocation system. It is necessary to ensure that there is recognition both for workplace experience that is part of a qualification as well as workplace experience that is offered to graduates/new entrants.

The Employment Tax Incentive is already available as an incentive to enable workplaces to absorb new entrants for workplace experience and it will be important that this incentive is sustained until the economy strengthens and the absorption capacity of the economy expands.

In addition, the tax allowance that is in place for learnerships and apprenticeships will be extended to include new occupational qualifications.

Policy and legislative changes and alignment

As mentioned earlier, a lack of policy and legislative coherence has led to some of the obstacles to employer involvement in workplace-based learning. The following strategies are set out to promote more employer involvement in provision of places for WPBL:

The DHET will work with the Department of Labour to reconcile contradictory provisions in different pieces of legislation, such as the status accorded to students in the workplace by the Labour Relations Act (LRA) and Compensation for Occupational Diseases and Injuries Act (COIDA). This will be done by an inter-ministerial committee, ideally with inputs from the National Economic Development and Labour Council (NEDLAC), the apex forum for discussions between government, business and labour on economic issues. Work on this must commence immediately and be completed by 2020.

Long-awaited regulations for workplace-based learning must be finalised, so that employers and training-service providers alike know and understand their roles and responsibilities and operate within a clear legal framework. This must be done as an immediate priority but

actual implementation must be aligned to the new SETA Landscape, the NSDP and the shared service system across the SETAs.

The criteria and the administrative process for approval to offer workplace-based training should be simplified and standardised. NAMB has already developed new criteria for approving workplaces as sites of artisanal training. The SETAs, as outlined elsewhere in this plan, will have as one of their primary responsibilities, the task of ensuring that these criteria are supported and that they are implemented in a manner that is simple and focused and that is not onerous for employers.

Processes for registering, administering and reporting on work-based learning should be streamlined. This is linked to the development of shared services across all SETAs, but work in this area must commence immediately. This is also linked to improving the management information systems for reporting across the SETAs, as outlined in chapter 2 and 8.

Monitoring and evaluation

The M&E Framework for this Plan will include baseline data and indicators for WPBL to test assumptions about WPBL and its effects on employment outcomes. Data should be kept systematically to ensure that long-term and good quality data about access to WPBL and exit outcomes is available. This will link to other improvements in the tracking and tracing of students and graduates of all PSET institutions and across all qualifications.

Chapter 7: Resourcing and financing of the PSET system

7.1 Introduction

Funding is often presented as the single most critical imperative for an improved and transformed post-school system. Each part of the post-school system faces its own funding challenges, relating to the funding required to meet NDP and White Paper targets, but also relating to the appropriateness of the funding arrangements and mechanisms for current requirements. Funding is such an integral issue for the system because as highlighted in the section on shape and size, different PSET institutions and functions were not supported from one Department until 2009, and all parts of the system have developed in different ways over the years. Bringing institutions together under the banner of the DHET has also meant that any historical funding inadequacies of these institutions have followed their function shift and created a highly differentiated funding landscape for the PSET sub-systems. Currently, universities receive 69% of the State budget, TVET colleges receive 11%, and community colleges get 2%.

Funding has been addressed in each chapter of the Plan and this chapter draws together the strategies proposed throughout the plan for different sub-systems and for the system as a whole. It also provides an overview of the approach in the Plan to the overall funding and resourcing of the PSET system, and links to the proposed shape and size of the system, which is substantially informed by availability of funding.

7.2 PSET system funding context

PSET provider funding sources and frameworks are differentiated by institutional type as appropriate for such a diverse system. Funding provisions for universities, TVET and community colleges, and workplace training vary.

Universities and colleges are funded from State subsidies (voted funds), student fees, and third stream sources of income. State funding is in the form of subsidies to universities and colleges, and funding to the NSFAS for student loans and bursaries. Funding sources for universities are mainly government subsidies, student fees, the NSFAS and third stream income from donors and entrepreneurial activities whose extent and scope needs to be researched and understood better. Government voted funds currently constitute the largest share of public university revenue. TVET colleges receive the bulk of their funding through direct transfers from the Department, and from NSFAS student bursaries as well as funding from the NSF and SETAs. Some colleges receive limited funding from course fees and donations. Community colleges are funded through appropriations, which are varied based on historic provincial allocations for adult education and training.

The Skills Development Levy primarily funds skills development including workplace training for the employed and workplace based training for students. Skills levy funding reaches institutions via the SETAs and the NSF. The Plan sets out the future allocation of the skills levy funding in chapter 2.

The TVET and CET sectors are chronically under-funded in relation to current growth targets, and this has made it very difficult to meet policy goals. Strong arguments are presented here for increasing funding in these areas, linked to the substantive action plans presented. New institutions cannot be developed without additional resources being made available, and better integration of and understanding of the diverse sources of funding will require new systems and technologies. Going forward the system will need to understand real costs better, account for more efficient usage of funds, and put in place new funding frameworks (e.g. some performance-based funding in TVET).

The funding of the public higher education sub-system has been under the spotlight following the #feesmustfall protests of 2015 and 2016. This has highlighted the reality that growth of the overall budget for higher education institutions has not kept pace with the growth in student enrolments, despite consistent increases in the state budget for higher education, including the provision of student funding for poor students. As a result of these developments since 2015, the budget for the DHET, which includes transfers to public universities, has become the second fastest growing budget in government, with new allocations totalling R32bn over the medium term. This is a positive development. However, it raises several concerns:

- This allocation has to be re-prioritised from other government budgets, including e.g. the National Skills Fund, which makes less money available for other PSET projects.
- The allocation does not meet the full need for student financial support in the system, the quantum of which is not fully understood.
- The allocations do not directly address the under-funding of the higher education system, and the need for a substantial increase in the core subsidy and overall budget of higher education to meet national goals.
- While the higher education sub-system may be under-funded, the other parts of the PSET system are more chronically under-funded, and given the policy goals of the White Paper to increase the numbers of students in both TVET Colleges and Community Colleges, the recent growth in the PSET budget has not addressed these sectors at all.
- The recent increase in the higher education budget has gone to the National Student Financial Aid Scheme (NSFAS) to support individual students, and not towards developing system inputs, and this poses a threat to the sustainability of the sub-system.

The decline in real terms of the core subsidy has led to a growing reliance on student fees by public higher education institutions (leading to above-inflation fee increases), and concerns about affordability for all students, as families are increasingly unable to pay tuition fees and allocations from the NSFAS struggle to keep up with the costs of study and the demand from students. Student debt is also a concern at many institutions.

It is well known that adequate funding for both tuition and living expenses is a critical element of support for students in higher education, as financial stress and inability to fund studies is a major cause of drop-out and inability to complete.

A series of processes have been put in place since 2015 to look at the overall funding of higher education, culminating in the appointment of the Heher Judicial Commission in December 2015, to advise on the feasibility of providing fee-free education in public HEIs and

TVET Colleges. **The advice of the Heher Commission and the DHET's response to it may require updates in a later draft of the Plan.**

Consideration of fee-free or tuition free higher education must be considered in the context of overall funding of PSET system and overall constraints of funding within government. There are many competing demands, and student funding should be separated from institutional funding for improvements in teaching and learning infrastructure and resources.

There is uncertainty about the fee regime that will operate in the future and in turn, the implications of this for the funding of higher education more broadly. This is a cause of concern for all higher education stakeholders and the DHET recognises the importance of re-establishing, as a matter of priority, certainty and stability to the higher education funding framework.

In the period since the appointment of the Heher Commission, there have been several developments. The first was a freeze on tuition fee increases at public universities for the 2016 academic year, which resulted in a shortfall on the national budget for higher education, some of which was covered by institutions themselves, but the bulk of which was funded by government. This has also resulted in an increase in the baseline allocation for public universities for the MTEF.

The second was an agreement that public universities could increase their fees for the 2017 academic year, but not beyond a maximum of 8% on the 2015 fee level. At the same time it was announced that government will fund the 8% gap between the 2015 and 2017 fee up to a maximum family income of R600 000 per annum. This has required a new set of administrative processes to be established to process applications for the gap funding. Ultimately, however, this will also result in more available information about the socio-economic status of students in the higher education system.

At the time of the announcement of the 0% fee increase, additional amounts were also injected into NSFAS to cover historic debts of NSFAS students and to increase allocations to NSFAS for poor students.

It will also be necessary to take into account the effects of the 2015-2017 period on the financial sustainability of universities, as there has been increasing pressure on university budgets and a growth in deficit budgets. There have also been related developments as a result of student protest, such as the decision of several public universities to commence processes of "insourcing" workers previously employed by private companies, in support areas such as security; catering; cleaning and maintenance. Institutions are therefore under increasing financial strain, as budgets have not been able to keep pace with HE inflation, and as a result of recent developments. There are serious concerns about the long-term sustainability of the higher education system.

7.3 Expanding and strengthening the PSET system: Funding implications

Chapter 2 argued that it will not be possible to achieve NDP targets by 2030, and that the system has to grow realistically and in relation to the current capacity. Efforts at growing the system will include building capacity and improving efficiencies. The work that was done by

National Treasury to cost the White Paper is largely supportive of the Plan's pragmatic approach to growth. This costing work was done using three scenarios:

- **the status quo scenario** estimates the cost of expanding access to achieve the White Paper targets while keeping inputs that may affect the quality of education and training the same.
- **the full policy scenario** calculates the cost of expanding access to meet the targets while improving the quality of education and training as envisaged by the White Paper.
- **the mixed scenario** examines the cost of increasing enrolments gradually (but not meeting the targets by 2030), placing emphasis on changing the mix and levels of inputs in order to enhance quality.

The cost of funding the system under the status quo scenario is R352.4 billion, and the resultant shortfall in 2030 based on projections in funding and financing would be R91.2 billion. Total costs for the full policy scenario almost double to R655 billion relative to the status quo scenario, with a shortfall of R370 billion. Total costs for funding the system for the mixed scenario are similar to those for the status quo scenario (R376 billion) but the shortfall is significantly higher (R131 billion) than the status quo scenario (R91.2 billion) even with all the quality improvements because lower enrolment figures result in far lower levels of fee income within the university sector and in the TVET sector.

It seems pragmatic then that the growth of the system be based on the mixed scenario option to achieve significant growth in community and TVET colleges and moderate growth in universities while improving quality in the entire system.

This recommendation is informed by these four related and inter-dependent guiding approaches, the first three which have been articulated in Chapter 2.2:

- Firstly more moderate enrolment growth will take place in line with available funding and capacity to increase enrolments, improve successes, and to do so sustainably. This will be guided through existing processes to allocate institutional funding in line with enrolment planning processes. It will also be guided by realistic costing of delivery and improving efficiencies and resource-sharing.
- Secondly, investing in the capacity development of the system is essential to gear the system up as a whole to be able to absorb planned enrolments and to improve successes across the board. This means paying attention to institutional, infrastructural and staffing capacity to deliver meaningful opportunities to students in the system.
- Thirdly, the overall funding for the PSET system institutions will have to grow, over the period of the Plan, and according to available funding from government and from other supporting sources. Without this gradual increase, it will not be possible to meet the policy objectives of the post-school education and training system, and to sustain growth and development for the future.

- Fourthly, funding from government voted funds and the skills development levy has to be aligned wherever possible, so that it is used efficiently to support the development of the system.

7.4 Key strategies for funding and resourcing the system

There are no easy solutions to the funding and resourcing of the system. A combination of strategies is going to be necessary into the future. The strategies below are based on the continuation of the current approach to the funding of provider institutions, which is a cost-sharing model, based on a combination of fiscal funding, student fees, and other sources of income for institutions. The strategies also focus on the capacity and efficiencies of institutions, for an improvement in funding without efficient utilisation of available resources will not achieve system sustainability. These strategies draw on funding strategies that are proposed in the other chapters of the Plan.

Financial support for students is integral to access and success. Students who are not able to access adequate support for their full cost of study (which includes tuition fees, living expenses and other costs) are rarely able to succeed well. Community colleges will be largely fee free for poor students although employers will pay to access programmes for employees. Financial support for university and TVET college students will continue through NSFAS, and public-private partnership models utilised to support university and TVET students who do not qualify for NSFAS. Student funding planning should also consider postgraduate students.

There is a significant demand for new funding to support various aspects of the expansion and strengthening of the whole PSET system, and decision making about priorities is necessary. While infrastructure development is needed in all sub-systems, growth of physical infrastructure will be carefully controlled. In the CET sub-system new infrastructure will be necessary for the effective establishment of community colleges. More emphasis will be placed on **resource sharing** including the development of precincts, and repurposing of existing infrastructure.

The Department will improve funding mechanisms and rules for different types of institutions. Funding mechanisms need to be appropriate to the enrolments of the institution, and its purpose and institutional capacity; they cannot be undifferentiated across universities, TVET colleges, and community colleges. All institutions require institutional funding that supports the core activities of those institutions, targeted infrastructure development, and performance-related funding linked to student enrolments and student completion, but the balance will be different across the different types of institutions.

More efficient use of available infrastructure will include flexible provision through blended learning, which will require initial large investments in ICT infrastructure, as well as **optimal timetabling** to offer evening and weekend classes. Infrastructure use can be optimised if there is data on the available infrastructure. In this regard a national data system with GIS capabilities should be invested in. Expensive equipment, such as machinery being used in industry can be shared through the centres of specialisation and through partnerships, which can be supported from public funding. In the TVET colleges, where the need for student support services is vast, priority interventions will be identified within each college.

Provider and supporting institutions need to be adequately funded from government funds. A proposal has been made that the QCTO's quality assurance will be supported through 0.5% of the 10% of the SDL for SETA administration. While this is a useful measure for now, in the long term, the QCTO should be supported through increased SDL funding or appropriate levels of government funding. The long term funding arrangements of other supporting institutions like the HRDC and the CHE need to be considered to enable them to have the financial resources to effectively fulfil their mandates. Phasing in adequate government funds is a long process, and in the interim, catalytic funding for example, funding for community college pilots will be sourced from elsewhere as there is no fiscal funding available at this time. Earmarked grants such as the University Capacity Development Grant will be used to support student success initiatives in universities to improve throughput, and NSF funding will be used to support the establishment of community colleges and other PSET priority programmes. Partnerships will be key for the resourcing of the system. However, the long term sustainability of the programmes supported by catalytic funding should be planned for through voted funds.

Prudent management of available financial resources will ensure greater reach of these resources. In the entire system this will involve joining up funding from government, SETAs, and the NSF to support students and system development. **Enrolment planning** for TVET colleges and universities will be linked to financial resources in the MTEF and capacity to ensure quality offerings. In community colleges this will include the utilisation of already existing quality programmes from NGOs and CBOs and other institutions to avoid developing all programmes from scratch. The NSFAS is a critical organisation supporting student funding, and its sustainability can only be assured if study loans are paid back by recipients who are working. Tax collection data will assist with collections so that this fund can continue to fund future generations of students.

Improving efficiencies is key to the **sustainability** of the system. Integrated planning in many areas like provision, infrastructure, funding cycles, and monitoring will achieve integration and efficiencies. Provision of level 4 vocational and occupational qualifications, and level 5 occupational qualifications will be streamlined and qualifications will be developed with clear articulation pathways to improve progression and exit level outcomes. When **planning for provision**, institutions should consider the landscape and what is being offered in other institutions to avoid developing programmes that already exist elsewhere. Serious consideration will be given to funding poor and deserving students to enrol for niche programmes in private institutions.

Skills development is integrated as an integral aspect of PSET provision and this will align SETA and Department planning cycles and align levy and voted funding so that they are used efficiently. SETAs will improve efficiencies through shared services, and some technical advice will be sought on designing the shared services architecture.

Data systems need to be merged so that disbursements to learners are managed efficiently. The Department should join up FETMIS+SETAMIS+HETMIS to ensure tracking of student funding through the various funding sources. Infrastructure planning should be integrated in line with available resources. Budgeting should make provision for infrastructure maintenance as the costs of new infrastructure are high. **Financial monitoring** will enable the Department to identify problems early on and provide the necessary intervention. Departmental monitoring will ensure that **enrolment plans are financially sustainable**.

A critical dimension for the sustainability of the PSET system is the **capacity and funding of the Department** itself. With adequate funding to employ capable staff and build the capacity of existing staff, the Department's oversight will most likely improve to ensure the efficiency and effectiveness of the system. Immediate funding for the establishment and staffing of key institutions that are imperative for the enrolment planning process and the development of curriculum and staff for TVET and community colleges is required. Effective enrolment planning depends on the existence and capacity of a PSET Planning Unit and support and coordination of college curriculum and staff development depends on the establishment of a well-staffed and capacitated SAIVCET.

CONFIDENTIAL DRAFT

Chapter 8: Planning, monitoring and evaluation

8.1 Introduction

The prescripts for planning, monitoring and evaluation (M&E) including what performance and financial reports to produce and when are clearly set out in government policy, legislation and guides developed by the DPME, National Treasury and Office of the Public Service Commission (OPSC). The NPPSET is a critical instrument in policy implementation, and any planning and M&E work that will be done for this Plan will align with government guidelines and expectations, and will be aimed at meeting PSET policy goals.

8.2 Planning

A key principle for effective planning promoted by the plan is integrated planning that aims at aligning different planning processes and cycles to streamline planning and reporting for efficiency and effectiveness. The following is a consolidated outline of key actions that are proposed in the plan to achieve integrated planning.

- The Department and skills planning institutions should integrate skills planning into the PSET system, based on the understanding that skills development is not a separate aspect of the PSET system, and that it is integral at all levels of planning and implementation, particularly for effective programme development and enrolment planning, and for joining up funding from skills development institutions with government funding, to ensure efficient use of funding to support the development of the PSET system.
- All PSET institutions and entities should use data effectively for planning – this includes using information about skills in high demand as well as tracer data for informed enrolment planning and programme design. The Departmental Skills Planning mechanism will communicate demand analysis data to PSET institutions and also work with the QCs for developing relevant qualifications based on information on occupations in high demand. The Skills Planning mechanism will maintain and improve the list of qualifications on high demand (scarce skills, qualifications where there are large employment opportunities and those that support social development priorities). Data needs for effective planning in the implementation of the NP-PSET include audits of SSS for TVET; staff qualifications for CCs; community economic and education data, information on NGOs and viable programmes etc.
- The Department will adopt an economy wide approach to analysis of data for occupations in demand rather than a sectoral analysis as has been the case.
- The PSET system will plan for sustainability based on available resources – enrolment planning and infrastructure planning will be in line with available financial and human resources.
- Infrastructure planning will be integrated to enable maximisation of available resources, for example, roll out of ICT infrastructure should be based on system planning rather than sub-system planning to enable bandwidth and equipment to be

rolled out equitably across all sub-systems. Integrated infrastructure planning will also lead to shared infrastructure which maximises efficiency.

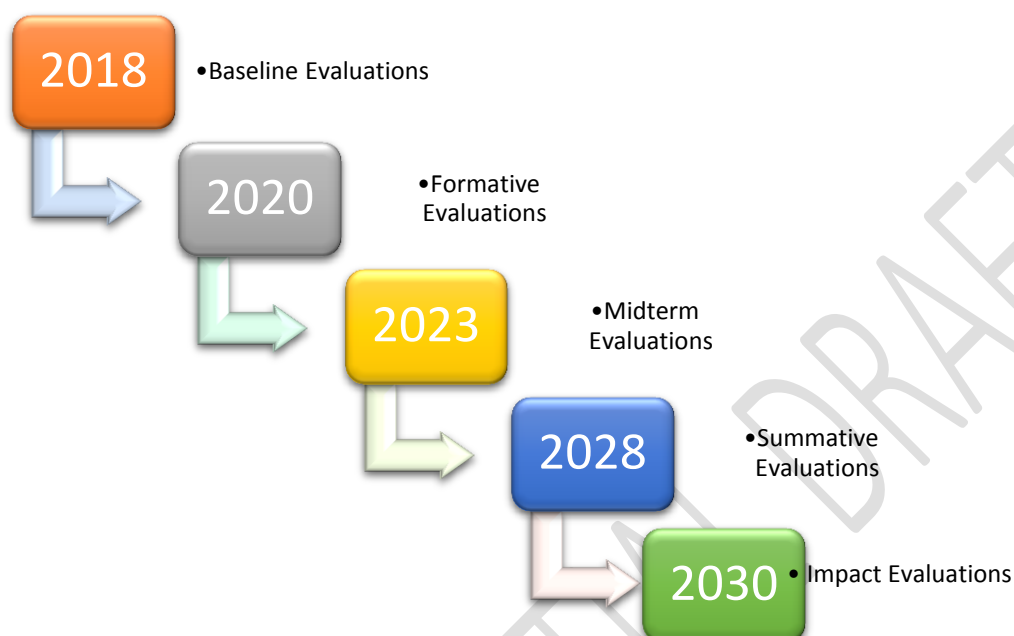
- DBE and the Department will collaborate and streamline provision of the NCV and NSC Technical, QCTO and Umalusi will also collaborate in the development of TVET and CET programmes, and QCTO and CHE will collaborate in the development of Higher Certificates. Such collaboration will enable articulation as learning pathways will be considered in the development of qualifications.
- SETAs, whose role will be more focused on supporting skills planning through engagement with industry, will have to follow 5 year MTSF programme planning and 3 year MTEF budget cycles of the DHET. SETAs will provide information they source from industry on demand to DHET who will in turn share this information with QCs and PSET institutions.
- M&E is an integral part of the planning process, and all branches and institutions should consider M&E implications in their implementation planning for the Plan.
- All institutions will consider the landscape in their planning, particularly in enrolment planning. This includes considering what private institutions are offering and whether it would be better to channel public sector students to private institutions rather than developing new programmes.

8.3 Monitoring and evaluation

Monitoring and evaluation (M&E) are essential management tools that are used for holding managers accountable for the use of public funds. M&E should be used to identify implementation successes as well as challenges that impede service delivery so that mitigating strategies are employed to address these challenges. Monitoring and evaluation take place at different levels of the PSET system, sometimes in discrete ways that defeat the purpose of creating an integrated and efficient system. To increase the effectiveness of M&E, all Department branches will develop an M&E framework in line with the plan and the system M&E Framework that is being developed by the Research, Monitoring and Coordination Directorate. The Branches will then use their sub-system M&E framework to inform institutions about reporting requirements. Institutions must not all have their own M&E frameworks, they will be guided by the Department on what to report on based on the sub-system M&E framework. Important in the development of the sub-system M&E Frameworks is that they should have qualitative indicators. Quantitative targets can be met, but they do not always give a clear indication of aspects such as quality, efficiency, effectiveness and the experiences of students and staff in the system. In order for the system to continuously improve its outputs and outcomes, qualitative indicators should be used to give a more nuanced impression of quality, efficiency and effectiveness.

If M&E data is to be used consciously for evidence based policy making, the Department will need to improve its M&E capacity so that it can support the M&E function in institutions adequately. Other PSET institutions with an M&E function, SETAs, HRDC, and NSA will also need to improve their M&E capabilities to support their constituency's M&E functions adequately and also to ensure that resources are being used effectively and efficiently to achieve the desired outcomes and impacts.

Evaluations will constitute a critical measure of implementation of the Plan. Different types of evaluations should be conducted as appropriate, depending on the timeframes in the implementation trajectory for the Plan. The Plan is a 12 year plan, and the following evaluation timeline is proposed.



It is important to note that although impact evaluations are indicated for 2030, the design for impact evaluations should in fact be in 2018 so that baseline data and monitoring data for the impact evaluations are collected at appropriate times during implementation of the Plan as specified in the impact evaluation design. This will allow for prospective evaluations with a rigorous design rather than retrospective designs which often have to reconstruct data and have reduced credibility because of reliance on memory after the event or process.

Because of the scope of the Plan, which covers the entire PSET system, it would be very complicated to conduct one impact evaluation. So, the DHET will plan for multiple evaluations, in a systematic manner to avoid duplication and wastage from continuous ad hoc and unplanned evaluations. The Department will update the Research Agenda 2014 – 2017 to reflect the research priorities for the system from 2018 – 2030. The Department will also develop a repository to house all PSET research so that those in the research community can first check before embarking on any research whether their research has not already been conducted.

In addition to supporting a limited number of multiple small scale studies that cannot be generalizable at system level, the Department should promote and fund large scale research projects so as to develop the data analytic capabilities for large data sets in the system, and to conduct analysis and produce findings with relevance at system level, using large samples. This will minimise the use of anecdotal data from very small samples for policy decision making. Also, it minimises the proliferation of too many studies whose purpose is not clear.

The 12 year implementation time span for the plan provides a good timeframe for cohort analysis. The higher education sub-system has developed capabilities for cohort analysis and the same capabilities should be developed for the TVET and CET sub-systems as well as for workplace learning.

The Department should also set up a facility for documenting recommendations from research and evaluation. Some very good research and evaluations have been conducted that made useful recommendations that were never carried through. The Department should promote the utilisation of research, and this includes translating recommendations into actions to improve the system.

Critically, the Department should ensure that monitoring and evaluation are costed as part of implementation of the Plan so that there are adequate budgets for conducting credible monitoring, research and evaluation.

8.4 Data improvements

Data is a critical aspect of policy and decision making and credible data leads to correct interpretations, reliable establishment of causality, and the design of appropriate mitigating strategies, while unreliable data results in the opposite and contributes to wastage in the system. To use data effectively for policy and decision making, the PSET system needs data improvements in the following areas:

- All institutions should collect baseline data prior to the implementation of an intervention so that this is used as a measure against outcomes and impact.
- The QCTO should develop its own learner record management system as it currently does not have one.
- Data verification is needed to avoid differences in official statistics produced by CHE, the Department, DBE and the NLRD.
- There is need to conduct tracer studies as these are one good measure to signal the effectiveness of the system. Unit record data with ID numbers will enable effective tracing of students within and outside the PSET system and they should be collected as part of the PSET learner records data.
- TVET sub-system data should be collected from all institutions providing TVET. This will enable a complete picture of the extent of TVET. Currently data is collected from public institutions and some willing private colleges so there is partial data being used to plan for this sub-system.
- Data submission and collection from private institutions must be improved. The system is being planned on partial data as only a few of the private institutions are submitting data. If necessary, incentives should be provided to encourage private providers to submit data to the DHET.
- Data integration is required to enable more efficient and effective disbursement of funding from voted funds and the SDL – CETMIS, TVETMIS, HEMIS and SETA learner data should be linked.
- The data that is collected should be purposeful so that it is credible and useable. Reporting from employers has to be streamlined so that credible data on demand and

supply is reported. Currently, templates for reporting are regarded as too cumbersome and are often incomplete.

- SETAs need to improve their record keeping of student data as their records are mostly incomplete. IT shared services will help to improve the data management capability of SETAs.

CONFIDENTIAL DRAFT