

Achieving universal health coverage for adolescents in South Africa:

health sector progress and imperatives

Authors

Kim Jonas^{i,ii}
Trisha Ramrajⁱ
Ameena Goga^{i,iii,iv}
Arvin Bhana^{i,v}
Catherine Mathews^{i,ii}

Investment in adolescent health and wellbeing today will bring multiple benefits, leading to better long-term health for this generation and generations to come.

Investing in adolescent health and wellbeing is critical as 35% of the global burden of disease has its roots in adolescence. However, despite the increasing global focus on adolescent health and wellbeing, there has been little progress in attaining universal health coverage for adolescents.

South Africa is known for its robust policies and initiatives, stemming from the human right's perspective reflected in the country's Constitution. This includes initiatives to

promote access to high-quality health care for adolescents, who comprise 18.5% of the population. This chapter reviews progress towards achieving UHC for adolescents within the South African public health sector. It goes on to summarise the health risks faced by adolescents, and to review policies and initiatives to deliver adolescent-responsive, quality health services and create demand for health care among adolescents in the country.

i Health Systems Research Unit, South African Medical Research Council
ii Adolescent Health Research Unit, Department of Psychiatry and Mental Health, University of Cape Town
iii Department of Paediatrics and Child Health, University of Pretoria
iv HIV Prevention Research Unit, South African Medical Research Council
v Centre for Rural Health, School of Nursing and Public Health, University of KwaZulu-Natal

Introduction

Adolescents represent the largest and fastest-growing population group worldwide.^{1,3} Globally, adolescents aged 10 - 19 years comprise 16% of the total population (1.2 billion people).¹ In sub-Saharan Africa, adolescents aged 10 - 19 years constitute the largest proportion (23%) of the total population.¹ In South Africa, the population curve demonstrates an adolescent and youth bulge (Figure 1), with adolescents comprising 18.5% of the total population. Investment in adolescent health and wellbeing today will bring multiple benefits, leading to better long-term health for this generation and generations to come.⁴

It is estimated that the adolescent population will continue to increase through to 2050, highlighting the need to strengthen efforts to make this population group a healthy one.⁶ It is therefore not surprising that adolescents are central to the Sustainable Development Goals (SDG) 2030 agenda as 12 indicators relate specifically to them.⁷ The SDGs aim to transform the world through improving health and wellbeing for all individuals, including adolescents. Specifically, target 3.8 of the SDGs seeks to “achieve universal health coverage (UHC), including financial risk protection, access to quality essential health-care services and access to safe, effective, quality and affordable essential medicines and vaccines for all”.⁷ UHC is defined as “access to good quality promotive, preventive, curative, rehabilitative, and palliative health services for all people, without financial hardship”.⁸ Like the Millennium Development Goals (MDG)⁹ agenda, SDGs present an opportunity for global and national commitment towards

achieving UHC for all, especially adolescents as they have the potential to bring global sustainable transformation if they have better health and wellbeing.

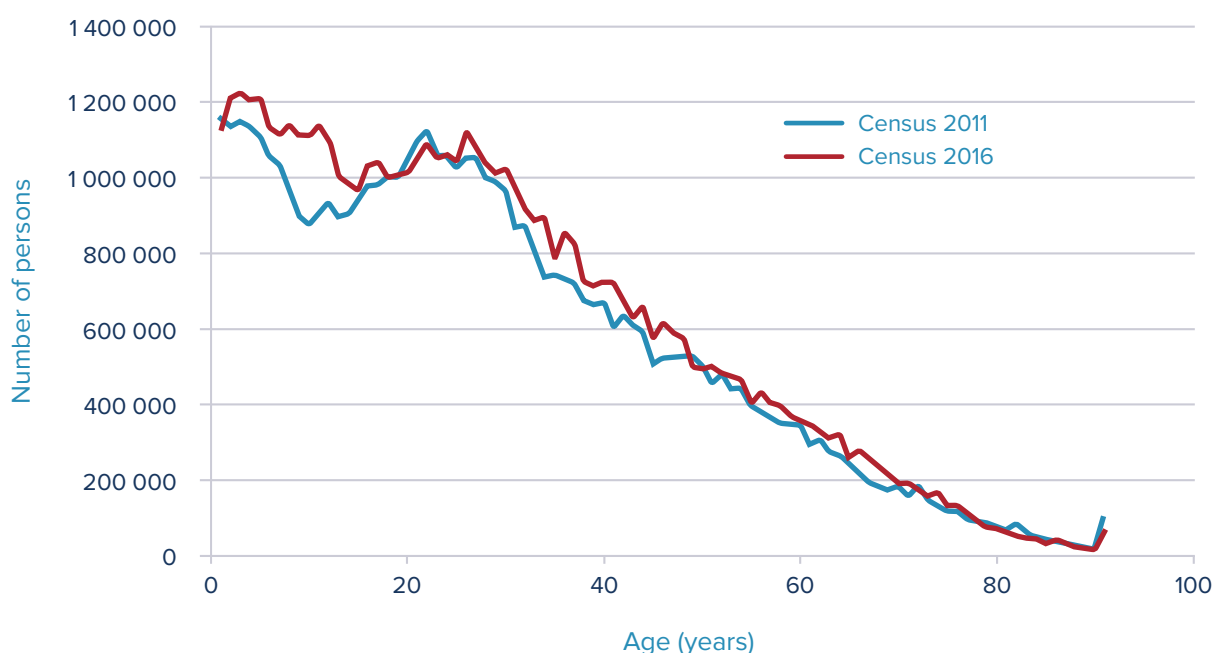
Achieving UHC entails three basic policy principles: ensuring that service delivery, laws and policies are improved; ensuring that efficient and equitable financing is implemented; and strengthening governance through meaningful participation.^{6,8} These principles are applicable to achieving UHC for adolescents, but special attention must be paid to the specific needs of this group.

This chapter reviews progress towards achieving UHC for adolescents within the South African public health sector. It goes on to summarise the health risks faced by adolescents, and to review policies and initiatives to deliver adolescent-responsive, quality health services and create demand for health care among adolescents in the country.

Determinants of health for adolescents

Adolescents go through key developmental changes and experiences as they transition from childhood to adulthood.^{2,10} For this reason, adolescents exhibit unique characteristics that distinguish them from other population groups, hence their health needs are unique and require special attention. The specific and interrelated individual, interpersonal, community and organisational/structural factors affecting adolescent health and access to health services and interventions are described below (Figure 2).

Figure 1: South African population between 2011 and 2016, showing adolescent and youth bulge



Source: Statistics SA, 2016.⁵

Individual factors

Neurological development, such as development of the limbic system of the brain (inter alia responsible for pleasure seeking) precedes development of the pre-frontal cortex responsible for decision-making processes and impulse control.¹⁰ During adolescence, neurological development affects exploration and experimentation, often leading to healthy and unhealthy behaviours.¹⁰ This predisposes adolescents to risk taking.^{10,12} For example, tobacco and alcohol use and use of other substances often begin during adolescence, and can have a detrimental effect on adolescent and adult health.² Alcohol use is associated with unintentional and intentional non-adherence to the antiretroviral therapy (ART) regimen.¹³⁻¹⁵ Alcohol and substance use impact people's decision-making and increase the likelihood of unprotected sex, and the likelihood of sexually transmitted infections (STIs) and HIV incidence.¹³

Interpersonal factors

Psychosocial immaturity affects the physical capacities of adolescents, their sensation seeking, and their capacity for self-control compared with adults.¹² On the one hand, adolescents seek independence, while on the other they depend on their families for transportation, company, and sometimes permission to access healthcare services.¹⁰⁻¹² This often results in adolescents being unable to obtain the necessary health information and services they need for their health. Limited access to sexual and reproductive health (SRH) information and services among adolescents is a major contributing factor to early unintended and unwanted pregnancies.

Community-level factors

Community norms and values reflect adult views, which may not support adolescent sexuality. Consequently, many

adolescent-related health behaviours such as contraception-seeking, are stigmatised within communities, deterring adolescents from seeking the services.¹⁰⁻¹² Access to contraceptives among adolescent girls is a growing public health concern as teenage pregnancy rates are declining at a slower rate among adolescents in South Africa than among their peers in developed countries, despite the availability of contraceptives at no cost from the public health services.^{3,16,17} According to the United Nations Population Fund (UNFPA), teenage pregnancy changes a girl's life significantly as her health and that of the baby are compromised, as well as her educational and future employment prospects.¹⁸ Furthermore, teenage pregnancy is a risk for maternal and child morbidity and mortality.

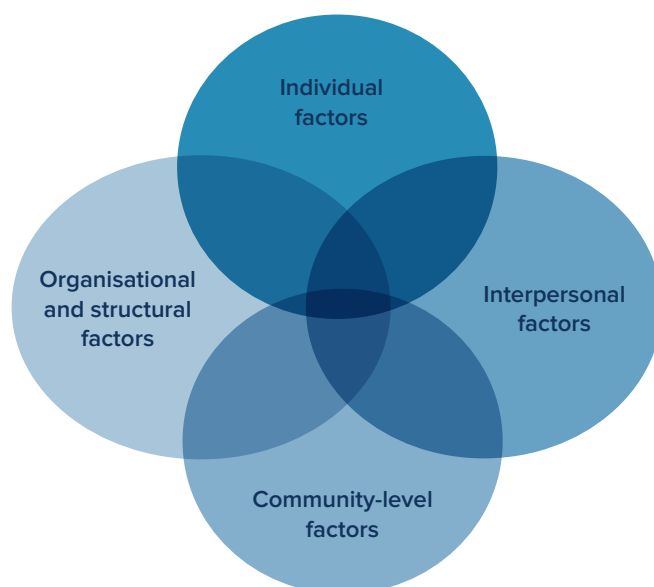
Organisational and structural factors

Health services need to respond to the unique and evolving health needs of adolescents by providing respectful, patient-centred, high-quality, well-coordinated, appropriate care with accurate provision of information, as stipulated in the World Health Organization (WHO) adolescent-friendly standards.¹⁹ However, given that adolescence is a transitional period between childhood and adulthood, the place of adolescents in the health system is often not well-defined, posing a challenge to the provision of adolescent-friendly services.

Education, poverty and violence

South Africa has one of the highest observed proportions of adolescents not in employment, education or training (NEET).^{17,20} In the case of adolescent girls in particular, higher levels of educational attainment are associated with lower risks of HIV and other STIs.²¹ In addition to level of education, frequency of school attendance/absenteeism is also associated with HIV and other STIs.²¹ School dropout is associated with pregnancy among adolescent girls as

Figure 2: Ecological model of factors that make adolescents unique



Source: Adapted from Baltag V, Sawyer SM; 2016.¹¹

both a cause and consequence of dropout.²² Economic interventions have the potential to reduce the risk of HIV and intimate partner violence (IPV) among adolescents.^{23,24} There is a large body of evidence showing that IPV and sexual violence increase the susceptibility of adolescent girls to HIV and undermine HIV treatment.^{25,26}

The above factors and determinants of health need to be considered when designing and delivering services that respond to the needs of adolescents in order to increase service coverage and uptake. Currently, health service delivery in South Africa does not specify the adolescent space, except for a few primary health care (PHC) facilities that have youth clinics on certain days and/or times during weekdays.

Burden of disease among adolescents

Until recently, adolescents and young people have not been prioritised in global health and social policy,⁴ hence they have experienced fewer benefits than adults from the epidemiological transition whereby reduced mortality and fertility have shifted population structures and patterns of disease.^{2,4,17} Globally, an estimated 1.3 million deaths occurred among 10 - 19-year-olds in 2012,^{27,28} with the top five leading causes of death among adolescents and young people being injuries, AIDS-related causes, suicide, lower respiratory tract infections, and interpersonal violence.^{2,4,29} Of critical concern is the estimated number of global HIV-related deaths among adolescents aged 10 - 19, which has nearly tripled from 21 000 in 2000 to 60 000 in 2014, while a decrease has been observed in all other age groups.²⁸⁻³⁰ In 2015, adolescent HIV-related mortality increased, which is alarmingly inconsistent with the decreasing trend measured in older populations,²⁷⁻³⁰ and in 2016, the leading causes of death among adolescent girls aged 10 - 14 and 15 - 19 years were HIV/AIDS and maternal conditions, respectively.^{2,30}

Furthermore, more than half of all adolescents grow up in multi-burden disease countries characterised by high levels of poverty and multiple colliding epidemics, including high prevalence of diseases of poverty such as HIV and AIDS, tuberculosis (TB), high maternal mortality ratio and infant mortality rates, and high incidence of non-communicable diseases (NCDs).⁴ These colliding health problems, set against a backdrop of poverty and lack of adolescent-responsive health services, have implications for adolescent health and wellbeing and continue to exert significant impact as young people grow into adulthood.⁴

Although adolescence is often considered a healthy stage, 35% of the global burden of disease originates during adolescence. For example, tobacco and alcohol use often begin during adolescence and they are major risk factors for NCDs during adulthood.² Mental health conditions account

for 16% of the global burden of disease and injury among 10 - 19-year-old adolescents, and an estimated 10 - 20% of adolescents experience mental health conditions, which are largely underdiagnosed and undertreated.²⁷ Alcohol use is now linked to various NCDs, including eight different types of cancer, hypertension, fetal alcohol syndrome when consumed during pregnancy, and various forms of liver and other organ diseases such as pancreatitis in adulthood.⁴

Burden of disease among South African adolescents

In 2015, the top risk factors for morbidity and mortality among South African adolescents were HIV, teenage pregnancy, substance use, and violence and injury; these, together with TB were among the top 10 causes of mortality in this population.^{29,30} Although there has been a modest decline in mortality rates among adolescents aged 10 - 19 years in South Africa, decreasing from 131 in 2001 to 111 in 2011, deaths among adolescents accounted for an estimated 2.5% of the total number of household deaths reported in 2016.^{29,30}

HIV prevalence among adolescents remains a challenge in South Africa, particularly among adolescent girls, as recent estimates show a 5.8% prevalence rate compared with 4.7% for adolescent boys.³¹ With regard to viral load suppression, less than 50% of HIV-positive adolescents and young people aged 15 - 24 years are virally suppressed, presenting a serious challenge to improving health and wellbeing of adolescents living with HIV.³¹ Despite numerous efforts to help alleviate the burden of HIV among adolescent girls and young women they continue to be disproportionately affected by HIV.

Little information exists about the prevalence of mental health disorders among adolescents in South Africa, but an expert consensus systematic review determined an overall prevalence rate of 17% among children and adolescents in the Western Cape.³² Early trauma and violence in childhood have been shown to affect the mental health of adolescents.³³

Initiatives towards UHC for adolescents in South Africa

In addition to being central in the SDGs, adolescents are also prioritised in the Global Strategy for Women's, Children's, and Adolescent's Health (GS 2016 - 2030).³⁴ Among other things, this Strategy aims to end all preventable maternal and new-born deaths, and to ensure that every child not only survives but thrives and transforms over the life course through enabling environments that support their health and wellbeing.³⁴ To achieve these objectives and those of the SDGs, countries have had to develop strategies and initiatives promoting health equity and coverage.

South Africa is well known for its progressive human-rights-based policies guided by the Constitution and is committed to global efforts towards achieving UHC through its National Health Insurance (NHI) Policy, which has been proposed as the overarching policy for achieving UHC. The NHI Policy is a health-financing system designed to pool funds to provide access to quality affordable personal health services for all South Africans, including adolescents, based on health needs and without financial hardship to any family or family member.³⁵

As part of NHI reform, and the revitalisation of PHC policies geared towards achieving UHC in South Africa, PHC has been re-engineered into three streams, one of which involves strengthening school health services for adolescents through the 2012 Integrated School Health Programme (ISHP).^{36,37} The ISHP aims to provide a comprehensive package of health services for children and adolescents that address barriers to learning and conditions contributing to morbidity and mortality.³⁶ It focuses strongly on involvement of key stakeholders such as educators and health service providers, and offers a range of health services such as SRH services, screening for health (vision, oral screening, and TB), and vaccination.³⁶

The UNAIDS 90-90-90 targets aim to achieve the following: 90% of all HIV-positive persons know their status; 90% of those diagnosed access ART; and 90% of those on treatment achieve viral suppression.^{28,38} Ending HIV and AIDS is prioritised in SDG goal 3.3, which aims to end AIDS, TB and other communicable diseases by 2030.^{7,38} The South African National Strategic Plan for HIV, TB and STIs 2017 - 2022 (NSP 2017 - 2022)³⁹ is South Africa's initiative towards ending AIDS by 2030 and its targets are aligned with the 90-90-90 global targets and the All-In Strategic Framework.⁴⁰ Preventing HIV infection among adolescent girls and young women is a key focus in the NSP³⁹ as preventing horizontal as well as vertical transmission of HIV are important in ending the epidemic.

The All-In Strategic Framework, a global initiative for ending HIV and AIDS among adolescents by 2030, has three targets for the year 2020: at least 75% reduction in new HIV infections among adolescents; at least 65% reduction in AIDS-related deaths among adolescents; and an end to HIV and AIDS stigma and discrimination.⁴⁰ In line with UHC objectives, the Framework seeks to drive a fast-track effort through partnerships that combine forces to improve leadership, commitment, investments and programmes, and that strengthen data, implementation and systems for adolescent engagement across a wide range of areas.^{39,40}

The WHO standards on adolescent-friendly health services are global standards to ensure adolescent-responsive healthcare services.¹⁹ In South Africa, an early initiative to promote adolescent-friendly health services was the National Adolescent Friendly Clinic Initiative (NAFCI), implemented between 1999 and 2006 by LoveLife, a national youth HIV-prevention initiative in partnership with the National Department of Health (NDoH).^{41,42} The current

South African Adolescent and Youth Friendly Services (AYFS) initiative is a government initiative comprising an accreditation model to drive adolescent- and youth-responsive health care and quality improvements in clinics.⁴³ The AYFS is aligned with the Adolescent and Youth Health Policy and is a standard-driven approach to improve adolescent and youth access to high-quality health care for adolescents and youth. It is well-aligned with WHO global standards for quality healthcare services for adolescents.⁴³

Another initiative to expand high-quality healthcare services to adolescents is the Adolescent Sexual and Reproductive Health and Rights (ASRHR) Framework.⁴⁴ ASRHR focuses on increasing coordination, collaboration, information and knowledge-sharing among key stakeholders responsible for developing innovative approaches to comprehensive SRHR information, education and counselling for adolescents, and on strengthening ASRHR service delivery.⁴⁴ The ASRHR Framework is a step towards achieving universal SRH service delivery for adolescents, but on its own it is insufficient to achieve UHC for adolescents as it has implementation challenges at facility level.

The Child and Adolescent Mental Health (CAMH) policy⁴⁵ is a guiding framework for establishing mental health services for children and adolescents in South Africa using an intersectoral approach that is collaborative and integrative within the health sector, and that includes families of the children and adolescents.⁴⁵ The CAMH is a stand-alone policy as there is no specific provision for children and adolescents in the national mental health policy guidelines.⁴⁶

Thus far the chapter has focused predominantly on policies and initiatives that aim to ensure a supply of high-quality healthcare service delivery for adolescents. In addition to service delivery, there is a need for interventions to increase adolescent demand for health care. The latter is influenced by the quality of available services, and also by adolescents' motivation to use the services, their knowledge of where and when to go, their ability to get to the services, community support for the services, and support for adolescents' use of the service. MomConnect,⁴⁷ a mobile technology intervention, is an example of a digital intervention to increase the demand for maternal and child health services.⁴⁷ Implemented at large scale, with broad intervention reach, mobile technology can potentially improve access and use of health services, thereby improving service coverage. B-Wise⁴⁸ and She Conquers⁴⁹ are similar demand-creation interventions specifically targeted at adolescents and youth, with great potential to expand service coverage.

UHC for adolescents in South Africa: progress and challenges

Despite an enabling policy environment for adolescents in South Africa as described above, there have been

numerous foundational challenges across the health system ‘building blocks’,⁵⁰ including challenges with governance, medicines and technologies, human resources, service delivery, lack of adolescent-specific indicators in the data information system, and system financing. These elements are key in achieving UHC, and without strengthening them and ensuring that interventions to improve adolescent health are prioritised across the health system, achieving UHC for adolescents will remain a challenge in South Africa.

To ensure targeted action and progress in achieving adolescent health, the Lancet Commission has proposed 12 headline indicators encompassing health needs, health risks and the social determinants of health (Table 1, columns 1 and 2).¹⁷ In columns 3 and 4 of Table 1, potential data sources are described for South African adolescents, and the most recent estimates for the headline indicator are included, where available. These estimates can be regarded as indicators of past progress towards achieving UHC for adolescents, as well as indicators of the unfinished agenda. For example, South Africa has a high proportion of adolescents not in employment, education or training (NEET), which is a social determinant of adolescent health. South Africa’s efforts to achieve UHC for adolescents will be dependent upon progress in reducing the prevalence of adolescents who are NEET (Table 1).

Across the public sector, health system weaknesses have undermined clinical competence, and quality of care and safety for citizens, including adolescents.^{51,52} The public health workforce is under strain, with insufficient stewardship of human resources for health planning across the system, and staff shortages especially in rural and underserved areas.⁵² There are stockouts of essential medicines such as ARVs, TB medication and contraceptives.⁵³ Underlying these weaknesses are leadership, management and governance failures. Governance is a key foundational health system building block and refers to the oversight and guidance that enables the entire system to function effectively.⁵² Without strengthening health systems and public health policy by addressing these factors, UHC may be unattainable, more so for adolescents and other vulnerable groups in this country.

Implementation of the ISHP has focused primarily on primary schools, where health assessments and appropriate vaccines are administered. The programme now includes the human papillomavirus (HPV) vaccination, which is one of the key successes of the ISHP.³⁷ However, the ISHP as originally conceptualised has not been fully implemented. For example, SRH services have not been made widely available in high schools, and most schools only offer limited SRH education. Provision of the full package of services is dependent on school governing body approval.³⁷ The high unmet demand for contraception among adolescents has been ascribed to a failure of the ISHP, among other factors.³⁷

Despite NSP 2017 - 2022, South Africa has made inadequate progress towards achieving 90-90-90 targets among adolescents. It is well established that adolescents

diagnosed with HIV have poorer adherence to ART than the older population groups,^{54,55} and are the only age group with increasing HIV mortality.²⁷⁻²⁹ Compared with adult mothers, adolescent mothers living with HIV are more likely to have unplanned pregnancies and less likely to access interventions to prevent mother-to-child transmission.^{54,55}

To date there is no evidence that clinics implementing Adolescent and Youth-Friendly Services (AYFS) provide more adolescent-responsive, high-quality care than those not yet implementing it.^{41,42} Given their dissatisfaction, adolescents and young people say that they would not recommend the clinics they attended to their peers.⁴¹ An evaluation of AYFS health facilities conducted in 2015 in 14 health facilities in a sub-district in Gauteng and 16 health facilities in a sub-district in North West, found that none of the service providers met the minimum standards of AYFS.⁴²

Despite the AYFS initiative and the Adolescent Sexual and Reproductive Health and Rights (ASRHR) policy, adolescents have a high unmet need for contraception and a high prevalence of unintended pregnancy.^{37,56} Little is known about adolescents’ access to abortion in the country. Maximising efforts to improve access to SRH services for adolescents holds the potential to reduce unintended pregnancy and unsafe abortions, while concurrently improving reproductive health and safer conception options for those living with HIV.

The technical and attitudinal competency of health workers is central to the implementation of AYFS standards, as stipulated in the WHO Core Competencies in Adolescent Health and Development for Primary Care Providers.⁵⁷ Building an adolescent-competent health workforce will require in-service training for health workers, an improved pre-service curriculum, and continuing professional education. An adolescent-competent, supportive healthcare provider needs knowledge, skills (including communication skills), and an attitude that is understanding and responsive to adolescents’ developmental and health needs according to their age and stage of development.^{11,19} Such healthcare providers also need to be competent in applying laws and policies that promote, protect and fulfil adolescents’ healthcare rights, including assessment of adolescents’ capacity for autonomous decision-making.^{11,58} Healthcare providers are often unprepared to respond to adolescent health needs, including SRH, because of insufficient training and unsupportive community norms.^{2,58,59}

Although relatively old, the CAMH policy has not yielded results as very few resources and funding have been dedicated to it at both provincial and national level.^{46,60} Mental health services for adolescents have not been prioritised despite the inclusion of mental health services in the ISHP policy. Early identification of adolescents with mental health problems is likely to be most efficient at school level, with systems to ensure referral by schools to mid-level counselling psychologists at district level, and an upward referral system for more severe cases. At community

Table 1: South African estimates for 12 headline indicators of adolescent health

Headline indicator short title	Headline indicator definition	Source and definition of South African indicators	Most recent estimate for South African adolescents
Health outcome			
Group DALYs	DALYs per 100 000 adolescents due to communicable, maternal and nutritional diseases in individuals aged 10 - 24 years	No available reliable source at present	Not available
Injury DALYs	DALYs per 100 000 adolescents due to injury and violence in individuals aged 10 - 24 years	No available reliable source at present	Not available
NCD DALYs	DALYs per 100 000 adolescents due to NCDs in individuals aged 10 - 24 years	No available reliable source at present	Not available
Health risks			
Daily tobacco	Daily smoking of any tobacco product in individuals aged 10 - 24 years	Source: SADHS ³ Definition: Daily and occasional smoking of any type of tobacco by people aged 15 - 24 years	2016 findings: Females: 15 - 24 years, daily or occasional smoker: 4.9% Males: 15 - 24 years, daily or occasional smoker: 28.9%
Binge drinking	Binge drinking in past 12 months in individuals aged 10 - 24 years (>48 g of alcohol for females, >60 g for males)	Source: SADHS ³ Definition: Drinking five or more standard measures of alcohol on a single occasion in the 30 days prior to the survey	2016 findings: Females: 15 - 24 years, binge drinking past 30 days: 5.1% Males: 15 - 24 years, binge drinking past 30 days: 20.7%
Overweight and obesity	Individuals aged 10 - 24 years who exceed WHO guidelines for overweight (IOTF thresholds, age-specific and sex-specific thresholds equivalent to a BMI ≥ 25 kg/m ² at age 18 years)	Source: SADHS ³ Definition: BMI ≥ 25.0 kg/m ²	2016 findings: Females: 15 - 24 years, 39.8% ≥ 25.0 kg/m ² Males: 15 - 24 years, 11.2% ≥ 25.0 kg/m ²
Anaemia	Prevalence of iron-deficiency anaemia in individuals aged 10 - 24 years (for those aged 10 - 14 years haemoglobin <115 g/l; for those aged 15 - 24 years, <130 g/l for males, <120 g/l for non-pregnant females, and <110 g/l for pregnant females)	Source: SADHS ³ Definition: Any anaemia for non-pregnant women <12.0 g/dl, for pregnant women <11.0 g/dl, and for men <13.0g/dl	2016 findings: Females: 15 - 24 years of age, 33% had any anaemia Males: 15 - 24 years of age, 13.3% had any anaemia
Social determinants of health			
Secondary education	Completing ≥ 12 years of education among individuals 20 - 24 years	Source: SADHS ³ Definition: Among 20 - 24-year-olds, completion of secondary school	2016 findings: Females: 39.7% Males: 34.0%
NEET	Individuals aged 20 - 24 years not NEET	Source: South African Child Gauge ³³ Definition: Among 15 - 24-year-olds, proportion not attending any educational institution and who are not employed or self-employed	2017 findings: 34.3 %

Table 1 (cont.)

Adolescent livebirths	Birth rate (livebirths per 1 000 population per year) in females aged 10 - 19 years	Source: SADHS ³ Definition: Adolescent birth rates per 1 000 women	2016 findings: Females: 10 - 14 years: 1 per 1 000 Females: 15 - 19 years: 71 per 1 000
Child marriage	Proportion of females aged 20 - 24 years in marriage or union before age 18	Source: SADHS ³ Definition: Among males and females aged 20 - 24 years, proportion who had been married or living together with a partner as if married before age 15 and 18 years	2016 findings: Females currently aged 20 - 24: 0.9% were in a union by age 15, 3.6% by age 18 Males currently aged 20 - 24, 0.4% were in a union by age 15, 0.6% by age 18
Demand for modern contraception satisfied	Proportion of females aged 15 - 24 years whose demand for contraception is satisfied with a modern method	Source: SADHS ³ Definition: Unmet need for contraception. Proportion of women who: (1) are not pregnant and not postpartum amenorrhoeic and are considered fecund and want to postpone their next birth for two or more years or stop childbearing altogether but are not using a contraceptive method; or (2) have a mis-timed or unwanted current pregnancy; or (3) are postpartum amenorrhoeic and their most recent birth in the last two years was mis-timed or unwanted.	2016 findings: Unmet need among sexually active women 15 - 19 years: 31%; among sexually active women 20 - 24: 28%

Source: Azzopardi et al. 2019.¹⁷

DALY = disability adjusted life year; IOTF = International Obesity Task Force; NCDs = non-communicable diseases; NEET = not in employment, education or training; SADHS = South Africa Demographic and Health Survey.

level, there is a need to reconsider the scope of practice of ward-based outreach teams related to identifying children and adolescents with mental health problems for appropriate assessment and referral.

availability of friendly, supportive staff and convenient opening and closing hours of facilities – this is a specific requirement to improve coverage and uptake of adolescent-friendly health services; developing adolescent-specific indicators in the data management system; and financing mechanisms that specifically ring fence funding to improve adolescent health.

Conclusion

Despite the availability of progressive adolescent-related policies and initiatives in South Africa, implementation challenges exist and are impeding progress towards the achievement of UHC. As demonstrated, the source of these challenges lies in weaknesses in the public health system across the six system building blocks. Achieving UHC and optimal health for adolescents will require multi-sectoral collaboration to increase NEET among adolescents, and to implement specific health-related interventions. The latter include both general and adolescent-specific interventions that focus on improving: governance and leadership within the health system – this is a general requirement across the health system that would improve overall governance; the availability of medicines and technologies needed by all users, including adolescents; the

Recommendations

In order to achieve the ‘triple dividend’ envisaged by the Lancet Commission on Adolescent Health and Wellbeing, the South African public health system needs to be strengthened to meet the unique needs of adolescent clients. In addition to overall health system strengthening, implementation of South Africa’s adolescent-specific policies and programmes needs to be monitored using adolescent-specific indicators or age-disaggregated indicators, and systems should be strengthened routinely based on these data. This entails capacity development of healthcare personnel to use data and provide people-centred, adolescent-friendly services. There is a need to define

and monitor indicators for effective UHC coverage among adolescents, and to monitor the quality of adolescent health services routinely. Such indicators and reviews should be aligned with global initiatives and integrated within routine health system functioning to ensure sustainability. Efforts to increase human resources for health and training of healthcare providers to be adolescent-competent are urgently required to achieve UHC for adolescents.

At PHC level, measures for screening and early identification of risk factors among adolescents are necessary to avert long-term health consequences in adulthood; this would be a step towards preventing and promoting healthy behaviours early on. With screening and assessment in place comes the urgent need to strengthen referral systems for linkage to care and other services for adolescents. There is an urgent need to scale up interventions to prevent early unintended pregnancy, as promoting contraceptive access and use among adolescents is likely to reduce morbidity and mortality among adolescents and young people in South Africa. Additionally, once pregnancy has occurred there is an urgent need to keep pregnant learners in school before and after delivery. An intersectoral approach between health, education and social development is fundamental to improving adolescent service coverage and uptake to achieve UHC for adolescents.

References

1. United Nations Children's Fund. Adolescent demographics – UNICEF DATA. New York: UNICEF; 2016. URL: <https://data.unicef.org/topic/adolescents/demographics/>
2. World Health Organization. Global accelerated action for the health of adolescents (AA-HA!): guidance to support country implementation. Geneva: WHO; 2017. URL: <https://apps.who.int/iris/bitstream/handle/10665/255415/9789241512343-eng.pdf?sequence=1>
3. South African National Department of Health, Statistics South Africa, South African Medical Research Council, and International Children's Fund. South African Demographic and Health Survey 2016. Pretoria, South Africa, and Rockville, Maryland, USA: NDoH, Stats SA, SAMRC, and ICF; 2019. URL: <http://www.mrc.ac.za/reports/SADHS2016>
4. Patton GC, Sawyer SM, Santelli JS, et al. Our future: a Lancet commission on adolescent health and wellbeing. *Lancet*. 2016;387(10036):2423-78.
5. Statistics South Africa. Community Survey 2016, Statistical release P0301. Pretoria: StatsSA; 2016. URL: http://cs2016.statssa.gov.za/wp-content/uploads/2016/07/NT-30-06-2016-RELEASE-for-CS-2016-_Statistical-releas_1-July-2016.pdf
6. Plan International UK. Adolescent Health: The Missing Population in Universal Health Coverage. London: Plan International; 2019. URL: <https://plan-uk.org/file/plan-adolescent-health-reportpdf/download?token=VVsY-cTp>
7. United Nations. Transforming our world: the 2030 Agenda for Sustainable Development; 2015. URL: <https://sustainabledevelopment.un.org/post2015/transformingourworld>
8. World Health Organization. Universal Health Coverage. Geneva: WHO; 2019. URL: https://www.who.int/health_financing/universal_coverage_definition/en/
9. World Health Organization. United Nations Millennium Development Goals 2015. URL: https://www.who.int/topics/millennium_development_goals/about/en/
10. World Health Organization. Adolescence: Neurodevelopmental changes. Geneva: WHO; 2014. URL: <http://apps.who.int/adolescent/second-decade/section2/page4/adolescence-neurodevelopmental-changes.html>
11. Baltag V, Sawyer SM. Quality health care for adolescents. In: Chery AL, Baltag V, Dillon ME, editors. *International Handbook on Adolescent Health and Development*. Berlin: Springer; 2016: pp 309-24. URL: https://link.springer.com/chapter/10.1007%2F978-3-319-40743-2_15
12. Romer D. Adolescent risk taking, impulsivity, and brain development: implications for prevention. *Dev Psychobiol*. 2012;52:263-75.
13. Schneider M, Chersich M, Temmerman M, Degomme O, Parry CD. The impact of alcohol on HIV prevention and treatment for South Africans in primary healthcare. *Curationis*. 2014;37(1):1-8.
14. Amanuel H, Morojele N, London L. The health and social impacts of easy access to alcohol and exposure to alcohol advertisements among women of childbearing age in urban and rural South Africa. *J Stud Alcohol Drugs*. 2017;79(2):302-8.
15. Parry C, Burnhams NH, London L. A total ban on alcohol advertising: Presenting the public health case. *S Afr Med J*. 2012;102(7):602-4.
16. Jonas K, Crutzen R, Krumeich A, Roman N, van den Borne B, Reddy P. Healthcare workers' beliefs, motivations and behaviours affecting adequate provision of sexual and reproductive healthcare services to adolescents in Cape Town, South Africa: a qualitative study. *BMC Health Serv Res*. 2018;18(1):109.
17. Azzopardi PS, Hearn SJ, Francis KL, et al. Progress in adolescent health and wellbeing: tracking 12 headline indicators for 195 countries and territories, 1990-2016. *Lancet*. 2019;393:1101-18.
18. United Nations Population Fund. Adolescent pregnancy. New York: UNFPA; 2017. URL: <https://www.unfpa.org/adolescent-pregnancy>

19. World Health Organization. Making health services adolescent friendly: Developing national quality standards for adolescent friendly health services. Geneva: WHO; 2012. URL: https://apps.who.int/iris/bitstream/handle/10665/75217/9789241503594_eng.pdf?sequence=1
20. Wils A, Sheehan P, Shi H. Better secondary schooling outcomes for adolescents in low- and middle-income countries: Projections of cost-effective approaches. *J Adolesc Health*. 2019;65(1), supplement:S25-S33.
21. Stoner MC, Pettifor A, Edwards JK, et al. The effect of school attendance and school dropout on incident HIV and HSV-2 among young women in rural South Africa enrolled in HPTN 068. *AIDS*. 2017;31(15):2127-34.
22. Stoner MC, Rucinski KB, Edwards JK, et al. The relationship between school dropout and pregnancy among adolescent girls and young women in South Africa: A HPTN 068 Analysis. *Health Educ Behav*. 2019;46(4):559-68.
23. Kim JC, Watts CH. Gaining a foothold: tackling poverty, gender inequality, and HIV in Africa. *BMJ*. 2005;331(7519):769-72.
24. Gibbs A, Jacobson J, Kerr Wilson A. A global comprehensive review of economic interventions to prevent intimate partner violence and HIV risk behaviours. *Glob Health Action*. 2017;10(supplement 2):1290427.
25. Jewkes R, Dunkle K, Nduna M, et al. Factors associated with HIV sero-status in young rural South African women: connections between intimate partner violence and HIV. *Int J Epidemiol*. 2006;35(6):1461-8.
26. Hatcher AM, Smout EM, Turan JM, Christofides N, Stoeckl H. Intimate partner violence and engagement in HIV care and treatment among women: a systematic review and meta-analysis. *Aids*. 2015;29(16):2183-94.
27. United Nations Children's Fund. Adolescent mortality – UNICEF DATA. New York: UNICEF; 2016. URL: <https://data.unicef.org/topic/adolescents/mortality/>
28. United Nations Children's Fund. The gap report. New York: UNICEF; 2014. URL: https://www.unaids.org/sites/default/files/media_asset/UNAIDS_Gap_report_en.pdf
29. Dorrington RE, Bradshaw D, Laubscher R, et al. Rapid mortality surveillance report 2017. Cape Town: South African Medical Research Council; 2019. URL: <http://www.samrc.ac.za/sites/default/files/files/2019-02-06/RapidMortalitySurveillanceReport2017.pdf>
30. Statistics South Africa. Demographic profile of adolescents in South Africa. Pretoria: StatsSA; 2018. URL: <http://www.statssa.gov.za/publications/Report%2003-00-10/Report%2003-00-102016.pdf>
31. Simbayi L, Zuma K, Moyo S, et al. South African National HIV Prevalence, Incidence, Behaviour and Communication Survey, 2017. Cape Town: HSRC Press; 2019. URL: <http://www.hsrc.ac.za/uploads/pageContent/10779/SABSSM%20V.pdf>
32. Kleintjes S, Flisher AJ, Fick M, et al. The prevalence of mental disorders among children, adolescents and adults in the Western Cape, South Africa. *Afr J Psychiatry*. 2006;9(3):157-60.
33. Hall K, Richter L, Mokomane Z, Lake L, editors. *South African Child Gauge*. Cape Town: Children's Institute, University of Cape Town; 2018. URL: <http://www.childrencount.uct.ac.za/indicator.php?domain=6&indicator=58>
34. World Health Organization. Global strategy for women's, children's and adolescents' health (2016-2030). Geneva: WHO; 2016. URL: <https://www.who.int/life-course/partners/global-strategy/en/>
35. South African National Department of Health. National Health Insurance. Pretoria: NDoH; 2015. URL: <https://www.gov.za/about-government/government-programmes/national-health-insurance-0>
36. South African National Department of Health and National Department of Basic Education. Integrated School Health Policy. Pretoria: NDoH; 2012. URL: <https://serve.mg.co.za/content/documents/2017/06/14/integratedschoolhealthpolicydbeanddoh.pdf>
37. Shung-King M, Orgill M, Slemming W. School health in South Africa: Reflections on the past and prospects for the future. In: English R, Padarath A, editors. *South African Health Review 2014*. Durban: Health Systems Trust; 2014: 59-71. URL: <https://www.hst.org.za/publications/South%20African%20Health%20Reviews/6%20School%20Health%20in%20South%20Africa%20-%20Reflections%20on%20the%20past%20and%20prospects%20for%20the%20future%20-%20SAHR2014.pdf>
38. Joint United Nations Programme on HIV/AIDS. Fast-track: ending the AIDS epidemic by 2030. Geneva: UNAIDS; 2014. URL: https://www.unaids.org/sites/default/files/media_asset/JC2686_WAD2014report_en.pdf
39. South African National AIDS Council. South Africa's national strategic plan for HIV, TB and STIs 2017-2022. URL: https://www.gov.za/sites/default/files/gcis_document/201705/nsp-hiv-tb-stia.pdf
40. United Nations Children's Fund, Joint United Nations Programme on HIV and AIDS. A progress on All In to end the adolescent AIDS epidemic. URL: https://www.unicef.org/videoaudio/PDFs/ALL_IN_2016_Progress_Report_6-16-17.pdf
41. Geary RS, Webb EL, Clarke L, et al. Evaluating youth-friendly health services: young people's perspectives from a simulated client study in urban South Africa. *Glob Health Action*. 2015;8(1):26080.
42. James S, Pisa PT, Imrie J, et al. Assessment of adolescent and youth friendly services in primary healthcare facilities in two provinces in South Africa. *BMC Health Serv Res*. 2018;18(1):809.

43. South African National Department of Health. National adolescent and youth friendly health services strategy. Pretoria: NDoH; 2012. URL: <http://www.ppdafrica.org/docs/southafricaadolescent.pdf>
44. South African National Department of Health. National Adolescent Sexual and Reproductive Health Rights Framework 2014-2019. Pretoria: NDoH; 2015. URL: <http://srjc.org.za/wp-content/uploads/2019/10/02-National-Adolescent-Sexual-and-Reproductive-Health-and-Rights-Framework-Strategy-pdf-003.pdf>
45. Flisher AJ, Lund C, Funk M, et al. Mental health policy development and implementation in four African countries. *J Health Psychology*. 2007;12(3):505-16.
46. Mokitimi S, Schneider M, de Vries PJ. Child and adolescent mental health policy in South Africa: history, current policy development and implementation, and policy analysis. *Int J Ment Health Syst*. 2018;12(1):36.
47. Mehl GL, Tamrat T, Bhardwaj S, et al. Digital health vision: could MomConnect provide a pragmatic starting point for achieving universal health coverage in South Africa and elsewhere?. *BMJ Glob Health*. 2018;3(supplement 2):e000626.
48. South African National Department of Health. B-Wise Mobi-site. Pretoria: NDoH; 2016. URL: <https://bwisehealth.com/>
49. South African National Department of Health. She Conquers Campaign for empowering adolescent girls and young women. Pretoria: NDoH; 2016. URL: <http://www.health.gov.za/index.php/ndoh-campaigns-list/440-she-conquers-campaign>
50. World Health Organization. Everybody's business: strengthening health systems to improve health outcomes: WHO's framework for action. Geneva: WHO; 2007. URL: https://www.who.int/healthsystems/strategy/everybodys_business.pdf
51. Surender R, Van Niekerk R, Alfiers L. Is South Africa advancing towards National Health Insurance? The perspectives of general practitioners in one pilot site. *S Afr Med J*. 2016;106(11):1092-5.
52. Rispel L. Analysing the progress and fault lines of health sector transformation in South Africa. In: Padarath A, King J, Mackie E-L, Casciola J, editors. *South African Health Review 2016*. Durban: Health Systems Trust; 2016: 17-23. URL: <https://www.hst.org.za/publications/South%20African%20Health%20Reviews/SAHR%202016.pdf>
53. Hwang B, Shroufi A, Gils T, et al. Stock-outs of antiretroviral and tuberculosis medicines in South Africa: A national cross-sectional survey. *PLoS One*. 2019;14(3):e0212405.
54. Adejumo OA, Malee KM, Ryscavage P, Hunter SJ, Taiwo BO. Contemporary issues on the epidemiology and antiretroviral adherence of HIV-infected adolescents in sub-Saharan Africa: a narrative review. *J Int AIDS Soc*. 2015;18:20049.
55. Enane LA, Vreeman RC, Foster C. Retention and adherence: global challenges for the long-term care of adolescents and young adults living with HIV. *Curr Opin HIV AIDS*. 2018;13(3):212-9.
56. Chersich MF, Wabiri N, Risher K, et al. Contraception coverage and methods used among women in South Africa: A national household survey. *S Afr Med J*. 2017;107(4):307-14.
57. World Health Organization. Core competencies in adolescent health and development for primary care providers: including a tool to assess the adolescent health and development component in pre-service education of health-care providers. Geneva: WHO; 2015. URL: https://apps.who.int/iris/bitstream/handle/10665/148354/9789241508315_eng
58. World Health Organization. Building an adolescent-competent workforce. WHO Policy brief. Geneva: WHO; 2015. URL: https://apps.who.int/iris/bitstream/handle/10665/183151/WHO_FWC_MCA_15.05_eng.pdf?sequence=1
59. Jonas K, Roman N, Reddy P, Krumeich A, van den Borne B, Crutzen R. Nurses' perceptions of adolescents accessing and utilizing sexual and reproductive healthcare services in Cape Town, South Africa: A qualitative study. *Int J Nurs Stud*. 2019;97:84-93.
60. Docrat S, Lund C, Chisholm D. Sustainable financing options for mental health care in South Africa: findings from a situation analysis and key informant interviews. *Int J Ment Health Syst*. 2019;13(1):4.

