

2017

Global School-based Student Health Survey

Lebanon



Global School-based Health Surveillance System
A contribution to the WHO STEPwise approach to Surveillance



Global School-based Student Health Survey Report

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2017

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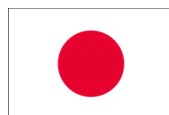


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Preface of the Ministry of Education and Higher Education

The Ministry of Education and Higher Education works jointly with the Ministry of Public Health and the World Health Organization, within the framework of the School Health Program to improve school health in its different components: school environment, student medical exam, and health education and awareness.

To develop evidence-based interventions and initiatives, MEHE relies on representative school-based assessments and surveys that reflect the situation of school health in Lebanon.

In this regard, the Global School-based Student Health Survey (GSHS) has served across the years as a reliable reference to MEHE in its continuous efforts to enhance the physical, psychological and mental health of students in a healthy school environment. We, at MEHE, are pleased to have partnered with WHO and MOPH in the implementation of the 2016 GSHS and are looking forward to make use of the new information provided by the report in our school health activities and initiatives.

Fadi Yarak

Director General of Education
Ministry of Education and Higher Education

Preface of the Ministry of Public Health

The Ministry of Public Health has paid close attention to plan and implement preventive and curative health programs targeting youth through interventions related to school health. The School Health Program which is implemented within the framework of the tripartite agreement signed in 2007 by the Ministry of Public Health, the Ministry of Education and Higher Education, and the World Health Organization, remains one of the most effective channels to improve youth education and health at the same time.

In the coming years, the MOPH will pursue its commitment to school health, through its extensive collaboration with MEHE and WHO, while relying on the results of the 2016 Global School-based Student Health Survey report, which presents evidence-based recommendations and up-to-date information about the health of youth in schools across Lebanon.

Dr. Walid Ammar MD, Ph.D

Director General
Ministry of Public Health

The National School Health Program

The national School Health program was revised in 2007 with a tripartite agreement between the Ministry of Public Health, the Ministry of Education and Higher Education, and the World Health Organization, to implement activities related to three main areas: medical screening, health awareness and education, and school health environment. Initiatives and interventions are in line with the National school health strategy that was revised in 2010 and approved by the National School health committee. The committee includes the main stakeholders involved in supporting youth health interventions such as line ministries, national NGOs, academic institutions and UN agencies. While all interventions are joint and under the umbrella of the National School Health Program, the role of the MOPH was more on the normative side, whereas the role of the MEHE was more on the implementation and coordination side. Below is a summary of the main activities supported by the line ministries.

School health activities implemented by MEHE

The MEHE Department of Counseling and Guidance, through the Health and Environment Unit, has developed several initiatives aiming at raising students' awareness and enabling them to make the right decisions regarding health issues, improving the medical screening process, as well as promoting a healthy physical and psychosocial environment. The main initiatives include:

- **Medical Services:**
 - The medical screening and oral exam, coordinated by the health educators in the public schools conducted every school year to ensure early detection of health problems and appropriate medical referral.
 - The student medical screening file is automated and integrated in the student Information system at the MEHE
 - Fluoride rinse for cycle 1 students
 - The national yearly vaccination campaign with the collaboration of the MOPH.
 - Providing the basic first aid for eventual injuries in the school premises.
 - Monitoring absenteeism, related to a number of communicable diseases and aiming to an early detection of epidemics and response.
 - A weekly check-up for lice and scabies among students.
- **School environment:**
 - Periodical inspecting the cleaning of school premises especially the sanitary facilities.
 - Periodical monitoring the water quality at public schools.
 - Periodical inspecting of the quality of products at the school shops/canteens.
- **Health promotion and education:**
 - Awareness campaign for parents in order to follow-up their children health issues that has been detected during the medical screening.
 - Awareness sessions on youth health risks behaviors based on GSHS 2011 survey results.
 - Awareness on Environmental issues (solid waste management, energy and water conservation)
 - Building the capacities of health educators through regular training workshops.
 - Integration of Reproductive Health in the health and environment curriculum
 - A child protection policy was developed with UNICEF and a child protection team in MEHE was established to respond to cases of violence.
 - A child protection hotline is planned to be launched with UNICEF.

- MEHE with the collaboration of UNICEF is currently updating the health manual which includes the TOR of health and environment unit team and the health educator in each school, in addition to all topics related to health and environment issues.

School health activities implemented by MOPH

The MOPH is committed to supporting Youth Health in Lebanon through the National School Health Program. Through collaborative efforts with the MEHE and the WHO, the MOPH implemented numerous school health initiatives in the three main areas; medical screening, health awareness and education, and healthy school environment.

o Medical Screening:

- Yearly training on standardized medical screening is organized by the Lebanese Order of Physicians and Order of Dentists in collaboration with MEHE
- A list of MOPH primary healthcare centers within the national network was made available to all the public schools for potential referral of students.
- 3000 copies of the revised version of the physical exam screening guidebook were printed and distributed to the concerned stakeholders. The guidebook introduced the young athletes' medical screening for the first time in schools.
- The MEHE student information system integrated the student medical file. In parallel, a software compatible with the MEHE student file was developed by the MOPH to allow private schools as well to report on the medical screening and youth health. The data obtained from the medical screening that is implemented each year in schools will be entered into the system and will allow the Ministries to tailor interventions based on the main detected health issues.
- The MOPH supported a 5 years' program for provision of fluoride for 30,000 students for fluoride gargle, as part of prevention of dental caries.

o School Environment:

- Based on the school health environment survey conducted in 2009, supported by WHO and in Collaboration with MEHE the MOPH developed a national Physical School Environment Parameters guidebook. A series of training for public and private schools were organized to disseminate and introduce the guidebook.

o Health awareness and education:

- The e- health education modules developed by WHO were contextualized to the Lebanese context and the e modules on reproductive health, physical activity, tobacco, road traffic injuries were introduced in collaboration with the MEHE to around 300 public schools to be integrated as extracurricular health education activities.
- A tobacco free school initiative was supported in the area of Saida with local NGOs.
- A project for Health Promoting Schools is currently being developed.

List of abbreviations and acronyms

AFRO: World Health Organization Regional Office for Africa

AMRO: World Health Organization American Regional Office

BMI: Body Mass Index

CDC: Centers for Disease Control and Prevention

EMRO: World Health Organization Eastern Mediterranean Regional Office

ETS: Environmental Tobacco Smoke

EURO: World Health Organization Regional Office for Europe

GSHS: Global School-based Student Health Survey

GYTS: Global Youth Tobacco Survey

HIV: Human Immunodeficiency Virus

MEHE: Ministry of Education and Higher Education

MOPH: Ministry of Public Health

RACE: Reaching All Children with Education

SEARO: World Health Organization Regional Office for South-East Asia

STI: Sexually Transmitted Infection

UAE: United Arab Emirates

UNAIDS: Joint United Nations Program on HIV/AIDS

UNESCO: United Nations Educational, Scientific and Cultural Organization

UNICEF: United Nations Children's Fund

UNRWA: United Nations Relief and Works Agency for Palestine Refugees in the Near East

WHO: World Health Organization

WPRO: World Health Organization Western Pacific Region

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WHO Country Office

Executive Summary

The Global School-based Student Health Survey (GSHS) was developed by the World Health Organization (WHO) in collaboration with the United Nations Children's Fund (UNICEF), the United Nations Educational, Scientific and Cultural Organization (UNESCO), and the Joint United Nations Program on HIV/AIDS (UNAIDS) and with technical assistance from the Centers for Disease Control and Prevention (CDC). The goal of the GSHS is to gather epidemiological data from students to support school health and youth health programs as well as youth-relevant policies nationally and globally. The survey is done systematically across multiple different countries to generate comparable estimates.

Lebanon implemented its third wave of GSHS in 2017. The purpose of the survey is to: 1) gather epidemiological data to set priorities, and establish evidence-informed programs, as well as advocate for resources necessary to ensure school health or youth health programs and policies; 2) monitor trends in the prevalence of health behaviors their associated factors by comparing current survey data to previous data from the two previous waves (2005 and 2011); and, 3) identify areas that need to be addressed via national policies or school-based programs. The survey employed a two-stage sampling design. A total of 5,708 students (Grades 7-12) were surveyed, recruited from 56 schools, including public and private schools from all over Lebanon. The students completed an anonymous, self-administered 88-item questionnaire which included 10 core modules addressing leading causes of morbidity and mortality among children and adolescents worldwide. The core modules cover questions related to alcohol use, dietary behaviors, drug use, hygiene, mental health, physical activity, protective factors, sexual behaviors, tobacco use, as well as violence and unintentional injury. A module on cigarettes and other tobacco use (previously administered as part of the GYTS) was integrated into the 2017 Lebanon GSHS and included 10 questions on cigarettes, waterpipe and medwakh use. Additional questions not included in previous Lebanon GSHS surveys assessed students' nationality, types of bullying behaviors and teasing/name calling, disclosure about a mental health problem, opportunity to use illegal drugs (even among abstainers), nonmedical use of psychoactive medications, peers' intimate physical relationships including students' age at first intimate physical relationship, sources of information about Human Immunodeficiency Virus (HIV) infection and school education on how to avoid pregnancy or sexually transmitted infections (STIs). All results are weighed to adjust for non-response and varying probabilities of selection.

Findings reveal that about 1 in 3 students were overweight or obese. Unhealthy eating habits were more common among male students, although the latter were more physically active than females. The prevalence of good personal and oral hygienic behavior was high; yet, the percentage of students who had gone for a check-up or an exam as the main reason, among those who visited the dentist in the past 12 months was low. Violence and serious injuries were prevalent, including being physically attacked, physically bullied by being hit/kicked and shoved and hit on purpose by a teacher (more common in males). In addition, students reported smoking, drinking alcohol, trying drugs and having intimate physical relationships at an earlier age (prior to 14 years of age). A third used tobacco products other than cigarettes, and 5% use new form of tobacco known as Medwakh. Almost 20% of students reported that they had used a drug without a doctor's prescription, or differently than how the doctor told them to use it in the past year (mostly prescription opioids). In addition, almost 12% of students felt lonely most of the time or always, 13.5 % seriously considered attempting suicide and 9.7 % actually attempted suicide one or more times. Few students felt comfortable talking about their problems to their parents. With regards to health education in schools, less than 50% were educated in schools about health eating, a third said they covered topics such as problems associated with alcohol/drug use, and less than a third were taught about how to prevent HIV/AIDS or avoid pregnancy or STIs.

This report adds to the existing literature on health risk behaviors and protective factors among youth, and highlights the need for multilevel prevention strategies involving students,

teachers, parents and other stakeholders. School-based interventions are needed to better promote students' wellbeing. Schools should ensure students are being exposed to age-appropriate information about various health behaviors; parents, teachers and students should be involved when possible as primary stakeholders.

It is very important to note and understand that these issues do not happen in silos, and often the same adolescent is being bullied, feeling anxious, eating unhealthy and having trouble discussing his/her issues with a close friend or parent. Therefore, a holistic and comprehensive approach to adolescent health must be adopted, contextualized to the Lebanese context, and involving youth as active agents of change in their own wellbeing.

Evidence-based recommendations for future GSHS or other surveillance research are provided. This report should serve as a platform for national researchers to investigate underlying factors associated with adolescents risk behaviors. It is also important take a more positive approach and understand why the majority of youth do not engage in risky behaviors, and perhaps learn both qualitatively and quantitatively how existing protective and risk factors can interplay to impact youth health.

Results from the current GSHS call for a national action plan for adolescent health in Lebanon to ensure overall adolescent physical, social and mental health wellbeing. Since GSHS is being repeated approximately every 5 years, the results of the current 2017 GSHS report should be disseminated to all governmental agencies, and schools, and other stakeholders, and a 5-year national strategy for adolescent health in Lebanon can be launched, monitored and evaluated. This strategy should build on all the great work that the MEHE (through the national school health program) and other ministries as well as academic institutions are all involved in to ensure overall adolescent physical, social and mental health wellbeing and not just the absence of disease.

Part I: Introduction

I. Background

One in six people worldwide are between 10-19 years of age (WHO, 2017a). Adolescents, aged 10-19, are often considered to be healthy; yet yearly, about 1.2 million adolescents die prematurely mainly due to road traffic accidents, violence, suicide, pregnancy complications and other illnesses that are preventable or treatable; many more suffer from lifetime chronic illnesses and disabilities. In addition, most of the illnesses and deaths that occur in adulthood are largely due to behaviors initiated during adolescence such as tobacco use, unsafe sexual practices, poor eating habits, and physical inactivity, among others (WHO, 2017a, 2017b). Indisputably, promoting adolescent health is essential to save the lives of many young people and ensure successful transition to adulthood.

The Global School-based Student Health Survey (GSHS) is a surveillance project initiated in 2001 by WHO, in collaboration with UNICEF, UNESCO, and UNAIDS with technical assistance from CDC. The purpose of the GSHS is to collect accurate data on health behaviors and protective factors among students, mainly aged 13-17 years, in order to 1) help countries develop priorities, establish programs, and advocate for resources for school health and youth health programs and policies; 2) allow international agencies, countries, and others to make comparisons across countries regarding the prevalence of health behaviors and protective factors; and 3) monitor trends in the prevalence of health behaviors and protective factors by country for use in evaluating school health and youth health promotion programs (CDC, 2016).

It uses a standardized multistage cluster sampling technique. The questionnaire is self-administered and covers 10 main core modules: alcohol use, dietary behaviors, drug use, hygiene, mental health, physical activity, protective factors, sexual behaviors that contribute to human immunodeficiency virus (HIV) infection, other sexually transmitted infections (STIs), and unintended pregnancy, tobacco use, and violence and unintentional injury. Besides the core modules, the survey allows for core-expanded questions, as well as country-specific questions.

Since 2003, Ministries of Health and Education around the world have been using the GSHS to periodically monitor the prevalence of important health risk behaviours and protective factors among students. To date, the GSHS has been conducted in 104 countries in the African (AFRO), Americas (AMRO), Eastern Mediterranean (EMRO), European (EURO), South-East Asia (SEARO), and Western Pacific (WPRO) regions. Particularly, in the EMRO region, 21 countries completed the GSHS including: Afghanistan, Bahrain, Djibouti, Egypt, Iraq, Jordan, Kuwait, Lebanon, Libya, Morocco, Occupied Palestine Territory, Palestine, Oman, Pakistan, Qatar, Sudan, Syria, Tunisia, United Nations Relief and Works Agency for Palestine Refugees in the Near East (UNRWA), United Arab Emirates (UAE), and Yemen.

The following report summarizes the findings from the 2017 GSHS conducted in Lebanon by MEHE in collaboration with MOPH and WHO Lebanon Office. The report aims to 1) describe the prevalence of adolescent behaviours and related protective factors among middle and high school students; 2) highlight main differences by sex, school type and grade level; and 3) explore time trends between GSHS 2011 and GSHS 2017. Evidence-informed recommendations are also presented at the level of research or policy/practice.

II. About GSHS Lebanon

Following approval from MEHE and MOPH, Lebanon implemented its first and second waves of the GSHS in 2005 and 2011, respectively among public and private students in grades 7-9. The present and third wave was conducted in 2017 among students in grades 7-9 and for the first time among high school students in grades 10-12 in an effort to monitor the prevalence of important health risk behaviors and protective factors, establish time trends, and direct decisions related to the school health program for a larger segment of youth.

Existing evidence from 2011 GSHS conducted in Lebanon had highlighted several health risk behaviors among students. Overall, 1 in 4 students were overweight (based on self-reported weight and height); half of the girls were trying to lose weight despite only 15% being overweight. Only one in two students reported eating breakfast most or all of the time in the preceding month, and only about a quarter ate the required 5 fruits and vegetables per day; additionally, 60% drank at least one soft drink per day replacing healthier fluid intake. Physical activity was low and almost half of the students engaged in three or more hours per day doing sitting activities. Alcohol consumption was also high. More than a third of students who drank, consumed two or more drinks on the days they drank and one fifth reported that they had been drunk at least once in their life. Half of the students had been in a physical fight during which 40% were injured at least once. Male students were more likely than females to experience all forms of violence and injury. One fourth of the students were bullied, and were ever hit, slap, had something thrown at them, or been physically hurt on purpose by their teacher. Mental health indicators were also alarming. About a third of the students had felt so sad or hopeless almost every day for two weeks or more in a row that they stopped doing their usual activities and 15% had seriously considered suicide, 12% had made a plan, and 14% had attempted at least once. Almost all indicators of mental health were more prevalent in girls than boys.

Based on another nationally representative school-based survey, the GYTS, conducted in Lebanon in 2011 among students aged 13 to 15 years, findings had found that almost 36% of students currently use any smoked tobacco products including cigarettes and waterpipe, and about 7 in 10 students lived in homes where others smoked cigarettes (with 6 in 10 students having at least one parent who smokes cigarettes (WHO, 2012).

Findings from both the previous GSHS and GYTS contributed to the existing regional and global literature on youth risky practices and protective factors and helped in planning and implementing curricular and extra-curricular programs and activities that promote school health and enhance students' wellbeing; this includes the introduction of an E-learning module on HIV prevention, training health educators on reproductive health and violence issues and on nutritional concepts and educational tools, promoting research on drug use, waterpipe smoking and protective factors among youth, among others.

The current 2017 GSHS included the same modules that were previously part of the 2011 GSHS, but further integrated additional questions on students' nationality, perceived opportunity to use illegal drugs, nonmedical use of psychoactive medications, waterpipe and medwakh use, among others that were not previously addressed in the GSHS 2011. The question on nationality was included given the fact that about 1 in 5 people in Lebanon, a country of around 4.5 million citizens, is now a refugee (Khawaja, 2016). With the large influx of Syrian refugees to Lebanon, mainly school-aged children, the Lebanese MEHE has taken several measures to include Syrian children in formal education. Following the adoption of the Reaching All Children with Education (RACE) policy in 2014, the number of Syrian children enrolled in public schools in Lebanon had reached 158,321 by the end of the 2015-2016 [5]. Hence, assessing student's nationality would enable to examine the prevalence of risky behaviors and protective factors among Lebanese and non-Lebanese students in order to ensure that all health programs/initiatives reach all those in need. In addition, evidence has shown that increasing opportunity to try an illegal drug is positively

associated with drug use initiation among adolescents (Allen et al., 2017; Cox Jr, Croff, Washburn, & Liu, 2017). Therefore, a question exploring opportunities for drug use was examined in the current GSHS. Psychoactive prescription drug abuse among youth is gaining more attention worldwide. In Lebanon, A cross-sectional study of 986 high school students attending public and private high schools in Beirut in 2011 found that 10% had used any psychoactive prescription medication nonmedically defined as the use of prescription drugs for reasons other than prescribed, for a time period longer than prescribed, or simply, without a doctor's prescription; the lifetime nonmedical prescription use of opioid pain relievers, tranquilizers and stimulants were 8.2%, 5.6% and 3.5%, respectively (Zahlan, Ghandour, Yassin, Afifi, & Martins, 2014). The same study showed that nonmedical use of prescription tranquilizers, opioid pain relievers were associated with 3-4-fold increase in the odds of smoking waterpipe, controlling for sex, age, school type, and other substance use. Nonetheless, research on the topic in Lebanon is still scarce. Thus, questions on the use of psychoactive medications were also added. The tobacco module was not part of the 2011 Lebanon GSHS but was reintegrated in the 2017 Lebanon GSHS. In view of the increasing prevalence of alternative tobacco products such as waterpipe and Medwakh/dokha among youth in the Middle East and the hazard it poses to their health (Aden, Karrar, Shafey, & Al Hosni, 2013; Bahelah et al., 2017; Bteddini et al., 2017; Vupputuri et al., 2016), questions on waterpipe smoking and Medwakh use were added to this module as well.

Part II: Methods

I. Sampling procedures

For the 2017 Lebanon GSHS, CDC employed a two-stage cluster sample design to generate a representative sample of students in grades 7-12. The first level of the GSHS sample selection process was schools. All schools containing grades 7-12 were included in the sampling frame, which was generated by MEHE. Schools were selected systematically with probability proportional to school enrollment size in grades 7-12 using a random start. A total of 64 schools were sampled. The second level of the GSHS sample selection process was class rooms: all classes with the majority of students in grades 7-12 were included in the sampling frame. CDC provided Systematic equal probability sampling with a random start was used to select classes from each school that participated in the survey. All students in the sampled classrooms were eligible to participate in the GSHS.

II. GSHS questionnaire

The GSHS is self-administered, and for each theme/topic, a set of core questions, core-expanded questions and country specific questions may be included. The 10 core questionnaire modules address leading causes of morbidity and mortality among children and adults worldwide. Countries implementing the GSHS must include at least six of the ten core modules with no changes in their wording to enable comparison across different countries; same applies for the three demographic questions. Additional core-expanded questions and country specific questions can be added as relevant to each country's needs. These questions share the same format characteristics as the core questions, and can be used to collect more detailed and contextually relevant data.

The GSHS 2017 conducted in Lebanon used an 88 item-questionnaire: 54 core questions and 34 core-expanded or Lebanon-specific questions. In addition to the demographic questions, it consists 10 core modules including: 1) alcohol use; 2) dietary behaviors; 3) drug use; 4) Hygiene; 5) Mental health; 6) Physical activity; 7) Protective factors; 8) Sexual behaviors; 9) Tobacco use; and 10) Violence and unintentional injury. The module on cigarettes and other tobacco use was previously administered as part of the GYTS survey, but was reintegrated to the 2017 Lebanon GSHS and included 10 questions on cigarettes, waterpipe and medwakh use. Additional questions not included in previous Lebanon GSHS surveys also assessed students' nationality, types of bullying behaviors, teasing and name calling, disclosure about a mental health problem, opportunity to use illegal drugs, nonmedical use of psychoactive medications, sources of information about Human Immunodeficiency Virus (HIV) infection, peers' intimate physical relationships, students' age at first intimate physical relationship, and school education on how to avoid pregnancy or sexually transmitted infections (STIs).

The questionnaire was developed both in English (see Appendix A) and in Arabic (see Appendix B). All questions shared a common format to streamline the flow of the survey and enhance comprehension by the student. No skip patterns were allowed. The survey was answered on special answer sheets and pencils were distributed to students from WHO in order to answer their survey. Pencils were kept with the students after completion of the survey as a gift.

III. Preparatory meetings

In Lebanon, various preparatory meetings took place with a technical committee composed of experts in the various topics/themes addressed in the GSHS, as well as the National Coordinator of the school health programs team from the MEHE. During these meetings, the members reviewed the survey items and added 'country-specific' items, keeping in mind the length of the survey. The final list of questions included a total of 88 items.

Subsequently, in order to engage private schools, a meeting was held in December 2016 with the directors of 32 private schools with the aim of introducing GSHS, the sampling procedures, and the methodology of the data collection. This was an opportunity to allow the directors to ask any questions that they might have on the survey. These meetings also increased participation rates and greatly facilitated the process of field implementation.

IV. Weighing

A weighting factor was applied to each student record to adjust for non-response and for the varying probabilities of selection.

The weight used for estimation is given by:

$$W = W1 * W2 * f1 * f2 * f3$$

W1 = the inverse of the probability of selecting the school;

W2 = the inverse of the probability of selecting the classroom within the school;

f1 = a school-level non response adjustment factor calculated by school size category (small, medium, large). The factor was calculated in terms of school enrollment instead of number of schools;

f2 = a student-level non response adjustment factor calculated by class;

f3 = a post stratification adjustment factor calculated by grade.

The weighted results can be used to make important inferences about the priority health-risk behaviors and protective factors of all students in grades 7-12.

V. Data Collection

A training session was held in November 2016 in the presence of WHO and Ministry of Education and Higher Education (MEHE) representatives. Field workers attended the training and received a briefing and specific instructions on how to communicate with the target schools and how to gather the needed data. The data collection tools (e.g. the questionnaire) were presented to all surveyors alongside the instructions on how to properly fill them.

The self-administered GSHS questionnaire was administered and filled during one regular class period. Students were also informed about the survey and its content, their rights, and the voluntary nature of participation. Students recorded their answers on a computer scannable answer sheet. Survey procedures were designed to protect the student's privacy and allow for

anonymous and voluntary participation. Survey administrators and coordinators collated the answer sheets and sent them to CDC for scanning and processing. After the answer sheets were scanned, data were processed using the same data edits for each country to ensure comparability across countries. Important to note that core-expanded and country added questions are not edited against core module questions by CDC even if they could be considered logically related. This is to ensure that core module questions remain comparable across countries.

After survey implementation was complete, the field coordinator met with the school administrators of the private schools to gather their insight into the survey implementation process. These insights will be invaluable for the implementation of the subsequent GSHS in Lebanon.

VI. Response Rate

Out of 64 sampled schools, 56 participated resulting in a school response rate of 88%. 5,717 of the 6,152 sampled students completed the survey. Hence, the student response rate was 93%. 5,708 questionnaires were usable after data editing. The overall response rate was $88\% * 93\% = 82\%$.

VII. Main Themes and Measures

Regardless of whether the questions were core, core-expanded or country-specific, together the 2017 GSHS Lebanon surveyed the following main themes: demographics, eating habits, personal and oral hygiene, violence, injuries, bullying, mental health, substance use (tobacco, alcohol, illegal drugs, and psychoactive medications), sexual and reproductive health, physical activity, and protective factors.

Demographics: The surveyed demographic and other personal characteristics were: age (years), sex (male/female), grade (7-12), and nationality (Lebanese/Syrian/Palestinian/Other).

BMI, perception of weight status, and losing weight: Height (cm) and weight (kg) were measured and recorded by survey staff prior to survey administration. Height and weight, along with sex and age, were used to calculate body mass index (BMI) and subsequently indicators for underweight, overweight, and obesity. WHO Growth Reference Data were used to determine underweight, overweight, and obesity. Height, weight, and BMI were reviewed to ensure that results are plausible before the indicators were calculated. Students were categorized as underweight if their BMI is $<-2SD$ from the median for age and sex; overweight if their BMI is $>+1SD$ from the median for age and sex; and obese if their BMI is $>+2SD$ from the median for age and sex. Students' weight perception as compared to other boys or girls their age (very underweight/ slightly underweight/ about the right weight/ slightly overweight/ very overweight) was also assessed. In addition, students were asked whether they have taken any diet pills, powders or liquids without medical advice to lose weight or to keep from gaining weight (yes/no).

Eating habits: Questions assessing daily intake of fruits, vegetables, and carbonated soft drinks (0 intake to 5 or more times per day) in the preceding month were included, as well as number of days consumed food from a fast food restaurant during the preceding week (0 to 7 days). One question asked students if they were taught in any of their classes in the past year about the benefits of healthy eating (yes/no/I don't know).

Food Security: Only one question asked students how often they went hungry because there was not enough food at home during the past 30 days (never/rarely/sometimes/most of the time/always).

Personal/oral hygiene: Questions on personal hygiene assessed number of times students had cleaned or brushed their teeth per day (0 times to 4 or more times) in the preceding month; past month frequency of handwashing (never/rarely/sometimes/most of the time/always) before eating and after using the toilet or latrine, as well as frequency of using soap when washing their hands, were also assessed. Students were also asked whether they were taught in any of their classes during the past 12 months about the importance of hand washing with soap and water (yes/no/ I don't know). Questions on oral health asked about the main reason for visiting the dentist during the preceding year (I have not been to the dentist during the past 12 months/something was wrong with my teeth or gums/for follow-up treatment from an earlier visit/as part of a dental check-up or exam at school/ as part of a dental check-up or exam outside of school/some other reason/ I do not know).

Violence, including physical attacks: questions on violence, including physical attacks were preceded with an explanation clarifying to students that the latter occur when one or more people hit or strike someone, or when one or more people hurt another person with a weapon (such as a stick, knife, or gun). Students were also asked about the number of times during the past year during which they were physically attacked (0 times- 12 or more times), the number of times they engaged in a physical fight (defined for them as two students of about the same strength or power who choose to fight each other) (0 times-12 or more times) and whether their teacher had ever hit, slapped, or physically hurt them on purpose during the past 12 months (yes/no).

Injuries: Three questions addressed serious injuries defined for the students as any injury that makes a student miss at least one full day of usual activities such as school, sports, or a job or requires treatment by a doctor or nurse. Questions assessed the number of times a student was seriously injured during the past 12 months; the type of the most serious injury they had during the past 12 months (if any); and the major cause of the most serious injury that happened to them during the past year (if any). The frequency of seat belt use when riding a car or other motor vehicle driven by someone else during the past 30 days was also assessed.

Bullying: Students were asked on how many days during the past 30 days they were bullied, how they were most often bullied (physically, verbally, sexually.... if bullied in past 30 days), in addition to how they themselves bullied others most often whether alone or as part of a group (all within the past month period).

Mental health: Questions inquiring about symptoms of mental wellbeing were also included in the survey. Students were asked how often (never/ rarely/sometimes/most of the time/always) they felt lonely during the past year, they have been so worried about something that they could not sleep at night, as well as number of hours of sleep they were getting on an average school night). Students were also asked whether during the past 12 months they had ever seriously considered attempting suicide, if they made a plan about how they would attempt suicide, and the number of times they actually attempted suicide. Additional questions assessed social support by inquiring about the number of close friends the students had and, who they had talked to most often about their mental health problem (if any) during the past 12 months.

Substance use: Several questions assessed students' use of various substances including tobacco, alcohol, illegal drugs and for the first time, nonmedical use of psychoactive medications that should be only used with a doctor's prescription.

The module on cigarette and other tobacco use included 10 questions assessing: age when students first tried cigarettes; the number of days they smoked cigarettes during the past month; quit attempts during the past year; frequency of use of tobacco products other than cigarettes such as waterpipe during the past month; age at first use of waterpipe; and number of days smoked Medwakh or pipe during the past 30 days, as well as exposure to second hand smoking during the past week, including Parental or guardian use of any form of tobacco . Questions on perception of risk were also included, specifically whether students perceived each of cigarette smoking or waterpipe use as harmful to their health.

A total of 8 questions assessed alcohol drinking among students (including beer, arak, whiskey, wine, vodka, and juices that contain alcohol such as Smirnoff ice, Barcardi breeze, XLL, or Buzz), and they include: age of first alcohol drink other than a few sips; number of days during which a student had at least one alcoholic drink during the past 30 days; number of drinks they usually drank per day on the days they drank during the past 30 days; frequency of lifetime drunkenness; number of times they had ever gotten into trouble with their family or friends, missed school, or got into fights as a result of drinking alcohol; source of obtaining alcohol during the past 30 days; and whether they would drink alcohol if any of their best friends offered them a drink. Finally, students were also asked if they were taught in any of their classes during the past year about the problems associated with alcohol drinking.

Use of illegal drugs was also assessed, including the use of marijuana, amphetamines, cocaine, and inhalants. Measures included the age of first drug use; frequency of lifetime and past month marijuana use; frequency of lifetime and past month amphetamines or methamphetamines use; and opportunity to try an illegal drug during the past 12 months.

Questions assessing non-prescribed use of psychoactive medications were also included and assessed: the type of drug most often used by students during the past 12 months without a doctor's prescription or differently than how a doctor told them to use it; the usual source of psychoactive drugs used non-medically during the past year; and whether they had received any school education on the problems associated with drug use during the past 12 months. Brand names of each drug type were included to enhance recall and reduce information bias such as "Xanax©, Rivotril©, Rivo, Lexotanil©, Lexo, Valium©, Dormicum©, Stilnox©, or Inductal©" for sedatives, tranquilizers, or sleeping pills; "Vicodin©, Tramal©, Dolosal©, Solpadeine©, or morphine" for pain relievers, "Ritalin© or Concerta©" for stimulants; and "Prozac©, Zoloft©, Seroxat©, Cipralext©, or Effexor©" for anti-depressants.

Reproductive health: A total of 9 questions measured reproductive health related issues including puberty, pregnancy, sexually transmitted infections, and HIV infection or AIDS. Students' perceptions on when reproductive health education should start was assessed, in addition to whether they support being taught about reproductive health in school, and if yes, whether they felt that education about reproductive health should be taught in "boys only" or "girls only" classes or in mixed classes with boys and girls. Students' knowledge around HIV infection or AIDS was examined by asking whether they had ever heard of HIV infection or AIDS, about their main source of information around HIV infection or AIDS (if they had heard); and whether they had ever talked about HIV infection or AIDS with their parents or guardians. Questions specific to sexual experiences included the age when students had their first intimate physical relationships; and if they had ever said no to someone who wanted to have an intimate physical relationship with them. Students were also asked about their perception of peer sexual practices measured by asking the students about the number of peers who they believe have had an intimate physical relationship. School education on reproductive health issues in the preceding year was assessed via two questions inquiring whether the students had been taught in any of their classes how to avoid HIV infection or AIDS, or how to avoid pregnancy or sexually transmitted infections.

Physical activity and sedentary lifestyle: Several questions measured students' physical activity including the number of days they were physically active for a total of at least 60 minutes per day in the preceding week; whether they walked or rode a bicycle to or from school; and, attended a physical education (PE) class weekly during this school year. Questions also assessed sedentary behaviors by asking students about the time they spend sitting and watching television during a typical or usual day, or playing computer games, or doing other sitting activities, such as playing with a PC or video games, playing on an iPad or other tablet, or chatting with friends on the phone.

Protective factors: GSHS included questions on a number of established protective factors including school attendance (days missed classes or school without permission in preceding

month), perceived social support at school (how often were most of the students in school kind and helpful in preceding month), in addition to six questions assessing perceived levels of parental monitoring (checked homework, understood problems and worries, really knew how free time was spent, went through students' personal belongings without approval, frequency of embarrassing student in public or in front of friends, and frequency parents/guardians gave attention and listened to student).

VIII. Data management

The data set was centrally cleaned and edited for inconsistencies at CDC. In the case of out of range responses, or students mistakenly selecting more than one response (when only one is possible), the question was set to missing. Missing data were not statistically imputed. If less than 60% of students had a valid response for a question, then that question was set to missing for all students. Record checks were also conducted to ensure that each student has at least 20 valid responses once all other edits had been completed, and to ensure that there are no cases of too many of the same response in a row (e.g., if a record has answers with "B", "C", "D", "E", "F", "G," or "H" 15 or more times in a row, then the entire record for that student is deleted).

During logical consistency checks, in the case a student had selected responses from two related questions that conflicted logically, then both questions were set to missing unless one of the questions is the question about the age of that student. If a student selected a response to a question that conflicted with the age reported by the student then, the question was set to missing but age was left unchanged. This preserves the responses to the age question. Standard logical consistency edits were applied only to questions from the GSHS core questionnaire modules. Additional logical consistency edits were made to core-expanded or country specific questions as advised by data processing staffs. Core-expanded and country added questions were not edited against core module questions even if they could be considered logically related. This is to ensure that core module questions remain comparable across countries. Consequently, minor inconsistencies between logically related questions in the core- and core-expanded and country-specific questions may therefore still exist.

IX. Data analyses

Analyses using Epi Info and Stata software took into consideration the complex sample design rendering GSHS findings representative of all students attending grades 7-12. Each core module question, core-expanded, and country specific question [except demographic questions and height and weight] have a corresponding dichotomized variable. Dichotomized variable values divide students into two groups: those who report a particular behavior or knowledge and those who do not. Dichotomized variables are created by combining responses from the original question into the response of interest (ROI) which is the way that variables are most typically reported. Dichotomous variables are created during data processing at CDC and are the same for all GSHS data files. Their presence makes it easier to conduct comparable analyses across countries. The original questions are always available, however, for additional country-level analyses that require different combinations of response options or more detail.

X. Interpretation of tabulated results

At the request of CDC, 95% confidence intervals were compared to test for statistically significant differences between two proportion estimates. When the 95% CI overlapped, differences were deemed not statistically significant; when they did not overlap, the differences were considered statistically significant at a critical alpha level of 0.05. While this is common practice, it can be misleading because the practice fails to detect statistically significant differences that standard hypothesis testing detects. In other words, while two estimates with non-overlapping 95%CI are truly different; but if their 95%CI overlapped, it is not necessarily true that they are not significantly different (Schenker & Gentleman, 2001).

Since this method is adopted in this report, readers are cautioned not to dismiss differences that may be clinically meaningful (so a wide difference in percentages) but with overlapping confidence intervals (especially slightly overlapping). When comparing differences between rates, readers encouraged to reflect on the public health importance of this difference. Sometimes, differences may be statistically significant though the difference in estimates may be small, and may lack importance for decisions related to population-based public health programs.

Readers should keep in mind that: 1) if there is no overlap between the 95%CI of two proportions, it means that they are statistically significantly different at $\alpha=0.05$; 2) if there is lots of overlap, then not statistically significant at $\alpha=0.05$; but if 3) there is some overlap, cannot tell for sure, and hypothesis testing must be conducted to ascertain whether the differences are statistically significant or not. For this reason, in the present report, only statistically significant differences are highlighted. To avoid making false conclusions about overlapping confidence intervals, no statements are made about two estimates whose 95%CI do overlap.

Part III: Results

I. Sample Characteristics

Table 1 presents the weighted demographic characteristics of the participating students, as a total sample, and separately by public and private schools. The GSHS was completed in 2017 by 5,708 students (53.2% females and 46.8% males) recruited from a total of 56 schools [32 public schools (57.1% of the total sample of schools), and 24 private schools (42.9%)] across Lebanon. About two-thirds (64%) of the students were in public schools and 36% were in private schools. Students in private schools were almost equally distributed by sex with almost 50% females and 50% males; in public schools, females were slightly higher in percentage (59% versus 41% males). The majority (92%) of the students in the total sample were Lebanese; 4.4% of the sample were of Syrian origin, more so in public schools (9.3%) than private schools (1.6%). The majority (81%) of the students were aged between 13-17 years old. Students were distributed by grades as follow: middle school students: 23.5% in grade 7, 20% in grade 8, and 17.1% in grade 9; and high school students: 15% in grade 10, 12.9% in grade 11, and 11.5% in grade 12. The grade distribution was somewhat similar in private and public schools.

Table 1. Demographic characteristics of 7th-12th graders in the total sample, and in private and public schools separately

Demographics		Total sample	Public Schools	Private Schools
		N (%)	N (%)	N (%)
Sex†	Male	2330 (46.8)	1271 (40.8)	1059 (50.2)
	Female	3370 (53.2)	2372 (59.2)	998 (49.8)
Age	≤12	670 (14.1)	303 (9.0)	367 (17.0)
	13-15	2571 (52.1)	1,641 (47.4)	1,110 (54.8)
	16-17	1832 (28.6)	1,324 (35.4)	508 (24.9)
	≥18	439 (5.1)	370 (8.2)	69 (3.3)
Grade †	7	1247 (23.5)	730 (22.8)	517 (23.9)
	8	1125 (20)	645 (17.6)	480 (21.4)
	9	783 (17.1)	440 (12.6)	343 (19.6)
	10	959 (15.0)	737 (20.5)	222 (11.9)
	11	708 (12.9)	441 (14.1)	267 (12.3)
	12	859 (11.5)	633 (12.3)	226 (11.0)
Nationality	Lebanese	5105 (92.3)	3201 (88.6)	1904 (94.4)
	Syrian	336 (4.4)	310 (9.3)	26 (1.6)
	Palestinian	83 (1.8)	39 (1.1)	44 (2.2)
	Some other nationality	70 (1.5)	36 (1)	34 (1.7)

† No statistically significant differences were observed between sex and school type and grade and school type

II. Main findings by sex, grade, and school type

This section presents the findings per theme. The valid percentage and corresponding 95% in the total sample is first presented; then findings are presented stratified by gender (male/female), grade (7th-12th), and school type (public/private). When present, statistically significant differences are highlighted. Statistically significant differences are identified by comparing the 95% confidence Intervals of the two groups being compared, and checking for non-overlap (non-overlapping 95% CIs denote statistically significant differences at critical alpha level of 5%).

A. BMI, perception of weight status, and losing weight

Table 2A describes the students' recorded weight status, perceived weight status, and reported attempts to lose weight, in the total sample, and then by sex, grade level and school type. Around 4% of the students were underweight. About 1 in 4 students were overweight and an additional 6.4% were obese (so a third of the sample was overweight or obese). Males were more likely than females to be overweight (31.1% vs. 20.9%) and obese (8.7% vs. 4.3%). A similar percentage of students (1 in 4) perceived themselves to be slightly or very overweight as compared to other boys or girls their age. Of the total sample, 5.3% *"took any diet pills, powders, or liquids without a doctor's advice to lose weight or to keep from gaining weight"*, in the preceding 30 days. A statistically significantly higher percentage of students in grade 10 reported trying to lose weight as compared to students in grades 11 (5.2% vs. 2.3%).

B. Dietary behaviours

Table 2B describes the students' eating habits in the total sample, and then by sex, grade level and school type. About 3% of the total sample reported having gone hungry most of the times or always during the past 30 days because there was not enough food in their home, an indicator of food insecurity that did not vary by students' sex, grade, or school type.

With regards to their recommended levels of fruit and vegetable intake, about half (47.5%) of the students ate fruits twice or more daily during the preceding month. The percentage of students who ate vegetables (such as salads, spinach, eggplant, tomatoes and cucumbers) two or more times per day or at least three times per day during the same period was 37% and 16.6%, respectively.

About 1 in 2 of the of the total sample of students (48%) reported drinking carbonated soft drinks like Pepsi, Coca cola, Fanta and Seven-Up (not including diet soft drinks) at least once per day during the past 30 days with males more likely to do so as compared to females (53.2% versus 42.5%), and students who were in grade 7 as compared to those who were in grade 8 (54.7% vs. 46.8%). In addition, almost 1 in 4 of the students reported having eaten from a fast food restaurant such as hamburger, shawarma, falafel, pizza, or manakish on three or more days during the past week (higher percentage in males than females, 27.8% vs. 21.7%, respectively).

Table 2A. Recorded Weight, Perceived Weight and Attempts to Lose Weight by sex, grade level and school type among total sample of 7th-12th graders

Recorded Weight, Perceived Weight and Losing Weight	Total	By Sex		By Grade						By School Type	
	All	Male	Female	7	8	9	10	11	12	Public	Private
	% (95 % CI)	% (95 % CI)	% (95 % CI)	% (95 % CI)	% (95 % CI)	% (95 % CI)	% (95 % CI)	% (95 % CI)	% (95 % CI)	% (95 % CI)	% (95 % CI)
Percentage of students who were underweight (<-2SD from median for BMI by age and sex)	4.3 (3.6,5.1)	5.1 (4.3,6.1)	3.5 (2.4,5.0)	7.7 (5.0,11.7)	4.0 (2.4,6.8)	5.8 (3.8,8.7)	3.0 (1.8,4.9)	2.0 (0.9,4.4)	1.8 (1.0,3.0)	3.9 (2.7,5.5)	4.5 (3.1,6.5)
Percentage of students who were overweight (>+1SD from median for BMI by age and sex)	25.7 (23.6,27.9)	31.1 * (28.2,34.3)	20.9 (18.3,23.7)	32.3 (27.3,37.8)	25.9 (21.0,31.6)	22.8 (17.9,28.7)	24.5 (19.6,30.2)	22.9 (19.2,27.0)	23.9 (19.9,28.4)	27.8 (24.2,31.7)	24.1 (21.4,27.1)
Percentage of students who were obese (>+2SD from median for BMI by age and sex)	6.4 (5.0,8.0)	8.7* (6.3,11.8)	4.3 (3.2,5.8)	10.3 (6.8,15.5)	6.1 (4.2,8.8)	4.6 (2.6,7.9)	5.5 (3.7,8.2)	5.6 (3.6,8.5)	5.2 (3.7,7.3)	7.8 (6.0,10.0)	5.3 (3.7,7.7)
Percentage of students who described their weight as slightly or very overweight compared to other boys or girls their age	24.3 (22.7,25.8)	25.2 (23.1,27.5)	23.4 (21.0,26.0)	20.2 (17.1,23.6)	24.6 (21.5,28.1)	24.3 (19.9,29.4)	25.7 (22.5,29.2)	26.1 (21.4,31.4)	28.0 (23.7,32.8)	21.3 (19.2,23.7)	25.9 (23.0,28.9)
Percentage of students who took any diet pills, powders, or liquids without a doctor's advice to lose weight or to keep from gaining weight (during the 30 days before the survey)	5.3 (4.6,6.1)	5.1 (3.8,6.9)	5.4 (4.3,6.8)	6.5 * (4.9,8.6)	5.9 (4.9,7.0)	5.6 (3.6,8.5)	5.2 (3.5,7.7)	2.3 (1.5,3.4)	4.9 (3.4,6.9)	4.8 (3.9,5.8)	5.6 (4.7,6.6)

* Statistical significance due to non-overlapping confidence intervals between males/females, or private/public schools; for grade differences, * is indicated when estimates in any two levels are statistically significantly different from one another.

Table 2B. Eating habits by sex, grade level and school type among total sample of 7th-12th graders

Eating Habits	Total	By Sex		By Grade						By School Type	
	All	Male	Female	7	8	9	10	11	12	Public	Private
	% (95 % CI)	% (95 % CI)	% (95 % CI)	% (95 % CI)	% (95 % CI)	% (95 % CI)	% (95 % CI)	% (95 % CI)	% (95 % CI)	% (95 % CI)	% (95 % CI)
Percentage of students who most of the time or always went hungry (because there was not enough food in their home during the 30 days before the survey)	3.3 (2.9,3.9)	3.5 (2.7,4.7)	3.2 (2.5,3.9)	3.3 (1.9,5.7)	2.3 (1.5,3.7)	4.7 (2.6,8.3)	3.8 (2.7,5.1)	3.0 (2.0,4.5)	2.9 (2.1,3.9)	2.5 (2.0,3.1)	3.8 (3.1,4.7)
Percentage of students who usually ate fruit two or more times per day (during the 30 days before the survey)	47.5 (45.0,50.1)	49.7 (45.6,53.8)	45.6 (42.8,48.3)	51.4 (48.4,54.4)	54.1 (49.4,58.8)	48.7 (41.1,56.5)	40.7 (35.6,46.1)	41.9 (37.4,46.5)	41.3 (34.7,48.3)	47.6 (43.9,51.2)	47.5 (43.7,51.3)
Percentage of students who usually ate vegetables two or more times per day (during the 30 days before the survey)	37.0 (33.8,40.3)	38.8 (34.5,43.2)	35.4 (32.7,38.1)	39.7 (33.8,45.9)	40.7 (36.9,44.6)	38.2 (33.3,43.3)	35.0 (28.3,42.4)	31.6 (26.0,37.8)	31.6 (26.9,36.7)	36.2 (32.7,39.8)	37.4 (32.5,42.6)
Percentage of students who usually ate vegetables three or more times per day (during the 30 days before the survey)	16.6 (14.4,18.9)	18.0 (14.9,21.7)	15.3 (13.1,17.7)	18.9 (16.0,22.1)	18.5 (15.5,21.8)	18.1 (13.2,24.5)	14.6 (10.4,20.1)	13.0 (9.4,17.9)	12.9 (9.0,18.2)	15.7 (13.6,18.1)	17.0 (14.2,20.3)
Percentage of students who usually drank carbonated soft drinks one or more times per day (during the 30 days before the survey)	47.5 (44.0,51.1)	53.2 * (48.9,57.4)	42.5 (38.7,46.5)	54.7* (50.9,58.6)	46.8 (44.0,49.7)	54.6 (46.7,62.4)	41.0 (33.4,49.0)	39.7 (33.1,46.6)	40.9 (35.0,47.1)	50.7 (45.3,56.2)	45.7 (39.9,51.6)
Percentage of students who ate food from a fast food restaurant three or more days (during the 7 days before the survey)	24.6 (22.6,26.7)	27.8 * (24.8,31.2)	21.7 (19.6,23.9)	21.7 (18.2,25.8)	24.5 (20.9,28.6)	26.2 (23.0,29.7)	24.3 (20.4,28.6)	24.3 (21.1,27.8)	29.0 (23.3,35.4)	24.4 (21.9,27.0)	24.7 (21.8,27.8)

* Statistical significance due to non-overlapping confidence intervals between males/females, or private/public schools; for grade differences, * is indicated when estimates in any two levels are statistically significantly different from one another.

C. Physical Activity and sedentary lifestyle

On the one hand, about 1 in 4 students (27%) were not physically active for at least 60 minutes per day on any day during the past 7 days. Being physically inactive was more common in females (32% vs. 20%), in grades 11 and 12 versus grade 10 (32.5% and 37.6% vs. 23.3%), and in public versus private schools (33.4% vs. 22.5%). On the other hand, overall, around 1 in 5 students were physically active for 60 minutes per day or more on 5 or more days during the past week and 14% were physically active on all 7 days, with males more likely than females to be physically active on 5 or more days during the past week (28.5% vs. 14.3%) and on all 7 days (20% vs. 9.6%). Students in private schools were more likely than those in public schools to engage in physical activity at least 1 hour a day on five or more days during the past week.

Around 45% of students reported spending three or more hours per day *“doing sitting activities such as sitting and watching television, playing computer games, talking with friends when not in school or doing homework during a typical or usual day”*. Almost two-thirds (63%) of students did not walk or ride a bicycle to or from school during the past week, a higher percent of females than males (67.6% vs. 58%).

At school, 41.3% of students did not attend weekly physical education classes during this school year; 22% of students attended physical education classes on at least 3 days each week during the school year and 17.4% did so on five or more days. Males were more likely than females to attend physical education classes on at least three (27.6% vs. 17.9%) or five days per week (21.5% vs. 13.9%).

D. Violence

Violence including physical attacks and physical fights are summarized in Table 2D. About 1 in 5 students reported being physically attacked in the preceding 12 months, and about 38% were in a physical fight at least once, also during the preceding year. Males were more likely than females to be physically attacked (25% vs. 16.6%); however, females were more likely than males to be in a physical fight (55.1% vs. 38.3%). Younger students in grade 7 as compared to those in grade 9 were also more likely to report being physically attacked (27.9% vs. 17.4%, respectively). About 1 in 10 students (11%) reported *“being hit, slapped, or physically hurt by their teacher on purpose”* during the past year (more in males than females, 16.4% vs. 5.9%, respectively).

E. Injuries

Students were also asked to report their experiences with having serious injuries. Results are presented in Table 2E. Overall, 37% of the students were seriously injured at least once during the past 12 months. A higher percentage of serious injury was reported by males (43.5% vs. 31.5% in females) and students in private schools (39.4% vs. 33.1% in public schools). Of the students who were seriously injured, 26 % reported that their most serious injury was a broken bone or dislocated joint (30.1% in males vs. 20.4% in females), and 11.4% mentioned that it was caused by a motor vehicle accident or by being hit by a motor vehicle (15.9% in males vs. 5.7% in females). In fact, among students who rode in a motor vehicle driven by someone else during the past 30 days, almost half of them never or rarely used a seat belt. Non seatbelt use was significantly more prevalent among students in public schools as compared to those in private schools (60.8% vs. 48.7%).

Table 2C. Physical activity by sex, grade level and school type among total sample of 7th-12th graders

Physical activity	Total	By Sex		By Grade						By School Type	
	All	Male	Female	7	8	9	10	11	12	Public	Private
	% (95 % CI)	% (95 % CI)	% (95 % CI)	% (95 % CI)	% (95 % CI)	% (95 % CI)	% (95 % CI)	% (95 % CI)	% (95 % CI)	% (95 % CI)	% (95 % CI)
Percentage of students who were not physically active (for at least 60 minutes per day on any day during the 7 days before the survey)	26.5 (24.2,29.0)	20.0 * (18.3,21.9)	32.0 (28.6,35.6)	24.1 * (19.8,28.9)	22.7 (18.4,27.7)	25.1 (21.3,29.3)	23.3 (20.7,26.2)	32.5 (28.0,37.3)	37.6 (30.0,45.9)	33.4* (30.7,36.2)	22.5 (19.1,26.3)
Percentage of students who were physically active at least 60 minutes per day on 5 or more days (during the 7 days before the survey)	20.7 (18.9, 22.7)	28.5 * (26.5,30.6)	14.3 (12.5,16.2)	26.6 (21.9,32.0)	22.8 (18.7,27.5)	20.5 (14.8,27.6)	17.8 (12.7,24.2)	15.9 (12.3,20.2)	15.4 (11.5,20.2)	17.1 * (15.2,19.2)	22.9 (20.0,26.0)
Percentage of students who were physically active at least 60 minutes per day on all 7 days (during the 7 days before the survey)	14.4 (12.8,16.1)	20.0 * (17.3,23.1)	9.6 (8.4,11.0)	20.7 (16.5,25.6)	18.4 (14.6,22.8)	14.3 (11.1,18.2)	8.9 (6.1,12.9)	9.6 (7.1,13.0)	7.4 (5.2,10.4)	12.4 (10.8,14.3)	15.5 (13.2,18.0)
Percentage of students who did not walk or ride a bicycle to or from school (during the 7 days before the survey)	63.2 (60.1,66.2)	58.0 * (55.1,60.8)	67.6 (63.6,71.4)	66.4 (62.6,70.0)	62.6 (57.8,67.0)	58.6 (50.7,66.1)	62.5 (55.5,69.1)	68.0 (62.3,73.1)	59.7 (50.4,68.3)	60.3 (56.1,64.5)	64.9 (59.6,69.8)
Percentage of students who did not attend physical education classes (each week during this school year)	41.3 (36.3,46.3)	36.5 (32.7,40.5)	45.2 (39.1,51.4)	40.1 (35.0,45.4)	37.6 (31.2,44.5)	48.0 (36.9,59.4)	28.7 (21.6,37.2)	36.9 (28.3,46.3)	62.1 (50.1,72.8)	50.1 (41.6,58.5)	36.1 (28.6,44.4)

* Statistical significance due to non-overlapping confidence intervals between males/females, or private/public schools; for grade differences, * is indicated when estimates in any two levels are statistically significantly different from one another.

Table 2C(continued). Physical activity by sex, grade level and school type

Physical activity	Total	By Sex		By Grade						By School Type	
	All	Male	Female	7	8	9	10	11	12	Public	Private
	% (95 % CI)	% (95 % CI)	% (95 % CI)	% (95 % CI)	% (95 % CI)	% (95 % CI)	% (95 % CI)	% (95 % CI)	% (95 % CI)	% (95 % CI)	% (95 % CI)
Percentage of students who attended physical education classes on three or more days (each week during this school year)	22.3 (19.3,25.6)	27.6 * (24.9,30.4)	17.9 (14.9,21.4)	26.6 (21.0,33.1)	24.8 (21.0,28.9)	21.3 (15.3,28.8)	23.2 (18.4,28.8)	18.0 (13.4,23.6)	15.0 (11.6,19.2)	19.1 (15.1,23.8)	24.2 (20.2,28.7)
Percentage of students who attended physical education classes on five or more days (each week during this school year)	17.4 (14.9,20.1)	21.5 * (19.2,23.9)	13.9 (11.5,16.7)	21.7 (17.2,27.1)	18.9 (15.5,22.8)	16.5 (12.4,21.7)	17.1 (12.2,23.4)	14.8 (11.2,19.4)	10.6 (7.7,14.4)	13.7 (10.3,18.1)	19.5 (16.4,22.9)
Percentage of students who spent three or more hours per day doing sitting activities (sitting and watching television, playing computer games, talking with friends when not in school or doing homework during a typical or usual day)	44.8 (42.0,47.7)	44.1 (41.1,47.3)	45.5 (42.0,49.0)	29.9 (26.2,33.9)	37.1 (32.6,41.9)	45.7 (39.6,51.8)	57.8 (50.3,65.0)	60.5 (55.5,65.4)	51.2 (44.9,57.6)	42.3 (37.5,47.2)	46.3 (42.3,50.5)

* Statistical significance due to non-overlapping confidence intervals between males/females, or private/public schools; for grade differences, * is indicated when estimates in any two levels are statistically significantly different from one another.

Table 2D. Violence by sex, grade level and school type among total sample of 7th-12th graders

Violence	Total	By Sex		By Grade						By School Type	
	All	Male	Female	7	8	9	10	11	12	Public	Private
	% (95 % CI)	% (95 % CI)	% (95 % CI)	% (95 % CI)	% (95 % CI)	% (95 % CI)	% (95 % CI)	% (95 % CI)	% (95 % CI)	% (95 % CI)	% (95 % CI)
Percentage of students who were physically attacked one or more times (during the 12 months before the survey)	20.5 (18.4,22.9)	25.0 * (22.3,27.9)	16.6 (14.0,19.5)	27.9* (23.9,32.4)	20.7 (16.4,25.8)	17.4 (13.7,21.9)	18.6 (15.0,22.9)	15.7 (12.5,19.4)	17.7 (13.5,23.0)	20.1 (18.0,22.2)	20.8 (17.5,24.5)
Percentage of students who were in a physical fight one or more times (during the 12 months before the survey)	38.3 (35.6,41.0)	38.3 * (35.6,41.0)	55.1 (52.9,57.3)	41.0 (35.8,46.4)	38.4 (31.8,45.5)	39.7 (35.5,44.1)	37.6 (32.0,43.6)	36.2 (30.2,42.7)	33.7 (28.8,39.0)	33.5 (29.5,37.8)	41.0 (37.7,44.3)
Percentage of students who were hit, slapped, or physically hurt by their teacher on purpose (during the 12 months before the survey)	10.8 (9.8,11.8)	16.4 * (14.9,17.9)	5.9 (5.0,6.9)	14.7 (12.0,17.8)	12.7 (9.2,17.4)	11.5 (8.0,16.2)	7.4 (5.0,10.7)	7.4 (5.1,10.8)	6.4 (4.7,8.7)	12.0 (9.5,15.0)	10.1 (8.4,12.1)

* Statistical significance due to non-overlapping confidence intervals between males/females, or private/public schools; for grade differences, * is indicated when estimates in any two levels are statistically significantly different from one another.

Table 2E. Injuries by sex, grade level and school type among total sample of 7th-12th graders

Injuries	Total	By sex		By Grade						By School Type	
	All	Male	Female	7	8	9	10	11	12	Public	Private
	% (95 % CI)	% (95 % CI)	% (95 % CI)	% (95 % CI)	% (95 % CI)	% (95 % CI)	% (95 % CI)	% (95 % CI)	% (95 % CI)	% (95 % CI)	% (95 % CI)
Percentage of students who were seriously injured (one or more times during the 12 months before the survey)	37.1 (34.9,39.3)	43.5 * (40.1,47.0)	31.5 (28.9,34.1)	37.3 (32.8,42.2)	37.2 (33.8,40.7)	40.1 (34.2,46.3)	34.6 (29.7,39.8)	36.7 (31.7,42.0)	35.9 (31.5,40.5)	33.1 * (30.9,35.3)	39.4 (36.1,42.7)
Percentage of students who reported that their most serious injury was a broken bone or dislocated joint (among students who were seriously injured during the 12 months before the survey)	25.8 (22.6,29.4)	30.1 * (25.8,34.7)	20.4 (16.4,25.1)	24.2 (20.0,29.0)	26.2 (19.8,33.8)	25.2 (19.6,31.6)	30.3 (21.6,40.8)	25.9 (19.1,34.1)	23.4 (17.5,30.5)	26.7 (22.1,31.9)	25.4 (21.1,30.3)
Percentage of students who reported that their most serious injury was caused by a motor vehicle accident or being hit by a motor vehicle (among students who were seriously injured during the 12 months before the survey)	11.4 (8.9,14.4)	15.9 * (12.5,19.9)	5.7 (3.5,9.2)	12.7 (7.4,21.0)	13.7 (7.9,22.6)	9.3 (5.2,16.3)	6.7 (3.5,12.5)	13.7 (6.6,26.4)	12.2 (7.9,18.4)	10.1 (6.8,14.8)	12.0 (9.2,15.5)
Percentage of students who never or rarely used a seat belt when riding in a car or other motor vehicle driven by someone else (during the 30 days before the survey, among students who rode in a motor vehicle driven by someone else)	52.9 (49.2,56.6)	53.8 (49.3,58.2)	52.2 (47.7,56.6)	47.5 (43.5,51.5)	47.3 (42.7,51.9)	54.4 (45.8,62.8)	55.2 (48.6,61.6)	57.5 (49.8,64.8)	62.4 (55.0,69.2)	60.8* (56.8,64.6)	48.7 (43.7,53.8)

*Statistical significance due to non-overlapping confidence intervals between males/females, or private/public schools; for grade differences, * is indicated when estimates in any two levels are statistically significantly different from one another.*

F. Bullying

Table F presents findings on experiences of bullying. Of the total sample, 16.5% of students were bullied on one or more days during the 30 days before the survey. Males were more likely than females to report bullying (21% vs. 12.6%). Among students who were bullied at least once, around 1 in 4 students reported being bullied most physically by being hit, kicked, pushed, shoved around, or locked indoors; again a higher percentage of males than females (32.8% vs. 13.1%) reported physical bullying. Other ways of being bullied were also reported among students who were bullied including being made fun of with sexual jokes, comments or gestures (14.6%), with a much larger percentage of grade 10 students reporting so compared to grade 11 (22.5% versus 5.3%, respectively). Students were also bullied most often by being made fun of because of their race, nationality or colour (10.1%), because of how their body or face looks (8.1%), because of their religion (5.6%), or simply by being left out of activities on purpose or completely ignored (3.3%). Moreover, 5% of the students were also "teased in a mean way or called hurtful names most of times or always" during the preceding 30 days (no differences by sex, grade or school type were observed). Quite importantly, 33% of the students who reported being bullied in the preceding 30 days reported that they experienced bullying in "some other way" (other than any of the above-mentioned ways), more so among the females (47.1% vs. 24.1% in females).

GSHS also asked students whether they themselves had bullied others, and almost 16% reported bullying others whether alone or as part of a group, higher among males (23% vs. 10.5% in females) and students in private schools (18.3% vs. 12.4% in public schools). Among students who reported bullying others, 39% admitted to most often "*hitting, kicking, pushing, shoving others, or locking them indoors*" during the 30 days preceding the survey, whether they did that alone or as part of a group. Males were more likely to report bullying 44.7%, versus 27.3% of the females). Also, around 11% of the students who bullied anyone whether alone or as part of a group did so most often by "*making fun of others with sexual jokes, comments or gestures*" or "*making fun of others because of their body, face or the way they looked*". Again, a substantial proportion (23.6%) of the students who bullied others reported doing so in "some other way", again more commonly reported in females than males (33.1% vs. 18.7%, respectively).

G. Mental Health Indicators

In Table 2G, we present findings of several questions that assessed students' overall mental health wellbeing. Almost 12% of students felt lonely most of the time or always during the 12 months preceding the survey. Females were more likely than males to experience loneliness (15.2% vs. 8.2%). In addition, almost 14% of students felt so worried about something most of the time or always that they could not sleep at night during the past 12 months. Differences by sex were observed as well as intra middle school differences, whereby females were more likely than males to be so worried (17.2% vs. 9.6%) and so were students in grade 9 (16.5%) as compared to those in grades 8 (10.7%) and grades 7 (10.3%). Only about a third (37%) of students slept 8 hours or more on an average school night.

In the total sample, about 13.5 % of students seriously considered attempting suicide during the past year, 8.5 % made a plan about how they would attempt suicide, and 9.7 % actually attempted suicide one or more times.

When asked about social support, only few students (4.1%) reported that they did not have any close friends. Students in public schools were more likely to report not having close friends as compared to students in private schools (5.8% vs. 3.1%). Among students who

had a mental health problem and talked with someone about it, more than half (56.8%) talked most often with their friends about it, but males were less likely to disclose about their mental health problem with their friends as compared to females (51.1% vs. 60.4%).

Table 2F. Bullying experiences by sex, grade level and school type among total sample of 7th-12th graders

Bullying	Total	By Sex		By Grade						By School Type	
	All	Male	Female	7	8	9	10	11	12	Public	Private
	% (95 % CI)	% (95 % CI)	% (95 % CI)	% (95 % CI)	% (95 % CI)	% (95 % CI)	% (95 % CI)	% (95 % CI)	% (95 % CI)	% (95 % CI)	% (95 % CI)
Percentage of students who were bullied (on one or more days) during the 30 days before the survey)	16.5 (14.8,18.3)	21.0* (18.8,23.2)	12.6 (10.5,15.0)	19.5 (17.2,21.9)	17.2 (13.5,21.7)	15.6 (11.1,21.5)	15.6 (11.6,20.8)	15.7 (12.4,19.7)	12.7 (9.6,16.8)	13.9 (11.6,16.5)	17.9 (15.6,20.6)
Percentage of students who were bullied most often by being hit, kicked, pushed, shoved around, or locked indoors (among students who were bullied during the 30 days before the survey)	24.8 (22.0,27.9)	32.8 * (28.1,37.9)	13.1 (9.1,18.5)	27.9 (21.4,35.6)	28.7 (19.7,39.6)	- (-)	18.5 (10.4,30.7)	- (-)	- (-)	21.6 (16.5,27.6)	26.3 (21.3,31.9)
Percentage of students who were bullied most often by being made fun of because of their race, nationality, or color (among students who were bullied during the 30 days before the survey)	10.1 (8.2,12.4)	11.3 (8.4,15.0)	8.4 (5.7,12.1)	9 (5.6,13.9)	12.8 (6.7,23.2)	13.1 (7.6,21.6)	5.7 (1.7,17.7)	12.3 (4.0,32.0)	7.9 (2.7,21.0)	11.3 (7.8,16.2)	9.5 (7.3,12.2)
Percentage of students who were bullied most often by being made fun of because of their religion (among students who were bullied during the 30 days before the survey)	5.6 (3.9,8.1)	5.6 (3.3,9.4)	5.5 (3.9,7.8)	4.5 (1.9,10.0)	2.5 (0.8,7.5)	4.7 (1.1,18.0)	4.3 (1.6,11.0)	12.1 (5.0,26.4)	9.1 (4.0,19.2)	8.4 (5.0,13.7)	4.4 (2.8,6.8)
Percentage of students who were bullied most often by being made fun of with sexual jokes, comments, or gestures (among students who were bullied during the 30 days before the survey)	14.6 (11.9,17.8)	16.4 (12.8,20.7)	12.2 (7.9,18.4)	23.1* (14.1,35.5)	11.2 (4.7,24.3)	9.9 (3.7,24.0)	22.5 (15.4,31.7)	5.3 (2.1,13.1)	6.9 (2.1,20.3)	12.1 (9.2,15.6)	16.6 (12.4,21.9)

Percentage of students who were bullied most often by being left out of activities on purpose or completely ignored (among students who were bullied during the 30 days before the survey)	3.3 (2.1,5.2)	3.5 (2.1,5.8)	3.0 (1.2,7.1)	4.3 (1.7,10.3)	6.1 (2.6,13.6)	3.1 (0.6,14.8)	1.8 (0.6,5.5)	2 (0.3,10.9)	0.6 (0.05,6.3)	2.6 (1.5,4.6)	3.9 (2.5,5.9)
Percentage of students who were bullied most often by because of how my body or face looks (among students who were bullied during the 30 days before the survey)	8.1 (6.1,10.6)	6.3 (3.9,10.1)	10.7 (7.1,15.8)	6.7 (3.2,13.5)	5.3 (2.4,11.2)	6.8 (2.1,19.7)	12.2 (5.0,26.7)	9.3 (2.9,25.9)	10.1 (5.3,18.6)	8.8 (5.9,12.9)	7.8 (4.9,12.2)
Percentage of students who were bullied most often in some other way (among students who were bullied during the 30 days before the survey)	33.4 (29.0,38.1)	24.1* (19.7,29.2)	47.1 (40.3,54.1)	24.6 (18.4,31.9)	33.4 (24.2,44.0)	37.5 (19.4,60.0)	34.5 (22.9,49.3)	36.3 (17.6,60.4)	42.0 (24.3,62.0)	35.3 (28.4,43.0)	31.7 (25.8,38.3)
Percentage of students who were teased in a mean way or called hurtful names most of the time or always (during the 30 days before the survey)	5.0 (4.1,6.1)	5.7 (4.4,7.3)	4.4 (3.1,6.2)	5.7 (4.5,7.3)	5.9 (3.7,9.2)	4.9 (3.2,7.4)	4.1 (2.7,6.3)	4.1 (2.5,6.8)	4.2 (2.6,6.6)	4.4 (3.4,5.8)	5.3 (4.2,6.7)
Percentage of students who bullied others whether alone or as part of a group	16.3 (15.1-17.6)	23.0 * (21.1-25.1)	10.5 (9.5-11.6)	16 (13.3-19.2)	14.3 (12.3-16.6)	18.0 (13.9-23.0)	16.6 (12.7-21.4)	17.3 (13.0-22.7)	16.7 (13.0-21.2)	12.4 * (10.9-14.1)	18.3 (16.3-20.5)
Percentage of students who whether alone or as part of a group, hit, kicked, pushed, or shoved others or locked others indoors most often (during the 30 days before the survey, among students who bullied anyone)	38.8 (34.3,43.4)	44.7 * (37.7,51.9)	27.3 (20.8,34.9)	46.4 (37.8,55.1)	40.1 (27.2,54.5)	46.2 (31.3,61.8)	33.6 (24.7,43.9)	33.8 (23.3,46.2)	22.4 (12.9,36.0)	38.3 (32.6,44.4)	38.9 (33.4,44.7)
Percentage of students who whether alone or as part of a group, made fun of others because of their race, nationality, or color (during the 30 days	9.2 (7.3,11.6)	10.8 (8.0,14.6)	6.2 (3.9,9.6)	14.5 (8.6,23.4)	14.1 (6.9,26.7)	3.4 (0.9,11.0)	7.0 (2.9,16.0)	9.0 (5.0,15.8)	3.9 (1.4,10.0)	11.8 (7.6,17.9)	8.4 (6.1,11.5)

before the survey, among students who bullied anyone)												
Percentage of students who whether alone or as part of a group, made fun of others because of their religion (during the 30 days before the survey, among students who bullied anyone)	3.9 (2.5,5.9)	4.6 (2.8,7.5)	2.5 (1.2,5.4)	5.9 (2.7,12.4)	5.2 (2.5,10.6)	3.1 (0.7,11.9)	2.2 (0.3,14.9)	4.2 (0.9,17.7)	0.9 (0.2,5.0)	4.8 (2.6,8.7)	3.4 (1.8,6.3)	
Percentage of students who whether alone or as part of a group, made fun of others with sexual jokes, comments, or gestures (during the 30 days before the survey, among students who bullied anyone)	10.7 (8.3,13.8)	11.5 (8.3,15.7)	9.2 (5.5,15.1)	10.1 (6.4,15.5)	7.2 (3.3,15.2)	6.4 (3.9,10.3)	15.4 (7.1,30.1)	15.3 (7.3,29.2)	12.8 (5.5,27.1)	8.5 (5.7,12.6)	11.9 (8.9,15.8)	
Percentage of students who whether alone or as part of a group, completely ignored others or left them out of activities on purpose (during the 30 days before the survey, among students who bullied anyone)	2.2 (1.1,4.4)	1.8 (0.7,4.6)	3.0 (1.4,6.7)	4.0 (1.2,12.5)	3.2 (1.00,9.5)	1.2 (0.1,10.3)	2.1 (0.5,9.0)	- (-)	2.1 (0.3,12.2)	2.5 (0.9,6.7)	2.2 (0.9,5.2)	
Percentage of students who whether alone or as part of a group, made fun of others because of their body, their face, or the way they looked (during the 30 days before the survey, among students who bullied anyone)	11.6 (8.7,15.3)	7.9* (5.3,11.5)	18.7 (12.8,26.3)	9.7 (5.0,18.1)	13.2 (6.7,24.4)	8.6 (4.6,15.7)	12.3 (5.2,26.5)	14.7 (7.2,27.7)	13.1 (6.3,25.3)	8.9 (6.0,13.0)	12.6 (9.1,17.1)	
Percentage of students who whether alone or as part of a group, bullied others in some other way (during the 30 days before the survey, among students who bullied anyone)	23.6 (18.9,29.1)	18.7* (12.9,26.3)	33.1 (26.7,40.2)	9.5 * (7.1,12.8)	17.0 (10.8,25.7)	31.1 (18.0,48.1)	27.3 (15.8,43.0)	22.9 (13.1,37.0)	44.9 (32.7,57.7)	25.1 (19.4,31.7)	23.1 (17.6,29.7)	

* Statistical significance due to non-overlapping confidence intervals between males/females, or private/public schools; for grade differences, * is indicated when estimates in any two levels are statistically significantly different from one another. -: Fewer than 100 students in this subgroup

Table 2G. Mental health indicators by sex, grade level and school type among total sample of 7th-12th graders

Mental Health	Total	By Sex		By Grade						By School Type	
	All	Male	Female	7	8	9	10	11	12	Public	Private
	% (95 % CI)	% (95 % CI)	% (95 % CI)	% (95 % CI)	% (95 % CI)	% (95 % CI)	% (95 % CI)	% (95 % CI)	% (95 % CI)	% (95 % CI)	% (95 % CI)
Percentage of students who most of the time or always felt lonely (during the 12 months before the survey)	11.9 (10.3,13.7)	8.2 * (6.5,10.1)	15.2 (13.1,17.5)	9.1 (7.3,11.1)	9.3 (7.3,11.8)	11.9 (8.9,15.6)	13.2 (9.7,17.5)	14.6 (11.0,19.0)	17.2 (12.9,22.6)	14.2 (12.3,16.3)	10.6 (8.4,13.3)
Percentage of students who most of the time or always were so worried about something that they could not sleep at night (during the 12 months before the survey)	13.7 (12.2,15.3)	9.6 * (8.0,11.5)	17.2 (15.0,19.6)	10.3 * (8.1,13.1)	10.7 (9.0,12.7)	16.5 (13.6,19.8)	14.5 (11.3,18.5)	17.1 (12.8,22.4)	16.0 (10.7,23.3)	15.8 (13.5,18.6)	12.4 (10.5,14.6)
Percentage of students who seriously considered attempting suicide (during the 12 months before the survey)	13.5 (12.0,15.0)	12.7 (11.4,14.1)	14.1 (12.2,16.2)	11.6 (9.0,14.8)	15.2 (12.1,18.9)	14.9 (11.8,18.6)	13.6 (10.6,17.2)	12.9 (9.9,16.6)	12.7 (9.7,16.4)	14.4 (13.1,15.8)	12.9 (10.8,15.4)
Percentage of students who made a plan about how they would attempt suicide (during the 12 months before the survey)	8.5 (7.5,9.5)	7.8 (6.8,8.9)	9.1 (7.7,10.7)	8.1 (6.3,10.3)	8.1 (6.0,10.9)	9.8 (7.8,12.2)	9.4 (6.8,13.0)	6.8 (4.7,9.7)	8.3 (6.2,11.1)	9.9 (8.7,11.1)	7.7 (6.2,9.5)
Percentage of students who attempted suicide (one or more times during the 12 months before the survey)	9.7 (8.7,10.9)	9.3 (7.8,11.2)	10.1 (8.9,11.4)	9.4 (7.3,12.2)	9.5 (7.4,12.1)	11.9 (9.7,14.4)	10.0 (7.7,12.9)	9.4 (7.6,11.6)	7.7 (5.6,10.6)	10.8 (9.0,13.0)	9.1 (7.9,10.6)
Percentage of students who did not have any close friends	4.1 (3.5,4.8)	3.5 (2.5,5.0)	4.6 (3.9,5.3)	3.4 (2.2,5.2)	2.7 (1.9,3.8)	3.6 (2.1,6.2)	5.3 (4.2,6.5)	5.4 (3.3,8.7)	5.5 (3.4,8.5)	5.8 * (4.8,7.0)	3.1 (2.3,4.2)
Percentage of students who talked most often with their friends about a mental health problem they were having (during the 12 months before the survey, among students who had a mental health problem and talked with someone about it)	56.8 (53.1,60.4)	51.1* (47.2,54.9)	60.4 (56.7,64.0)	46.7 (39.8,53.8)	51.1 (44.0,58.1)	59.7 (51.5,67.3)	60.5 (55.3,65.4)	61.6 (54.7,68.1)	62.7 (57.9,67.2)	60.9 (57.9,63.9)	54.5 (49.6,59.3)
Percentage of students who slept 8 hours or more on an average school night	37.2 (34.2,40.3)	35.2 (31.4,39.3)	38.9 (36.3,41.7)	46.1 (41.0, 51.3)	42.9 (38.7,47.3)	37.9 (33.9,42.1)	34.9 (28.7,41.6)	27.7 (21.8,34.6)	23.0 (17.9,29.0)	31.7 (28.2,35.5)	40.5 (35.5,45.6)

* Statistical significance due to non-overlapping confidence intervals between males/females, or private/public schools; for grade differences, * is indicated when estimates in any two levels are statistically significantly different from one another.

H. Substance Use

Substance use questions assessed the use of tobacco products (cigarettes, waterpipe, and medwakh), alcohol drinking, illegal drug use, as well as the nonmedical psychoactive medications. Findings are summarized in Table 2H (2Ha for tobacco, 2Hb for alcohol, 2Hc for illegal drugs, and 2Hd for prescription medications).

Tobacco

One in 4 students or 24.3% of the students reported ever trying cigarettes. Lifetime cigarette use was higher among males than females (32.7% vs. 17%) and students in grade 12 (41.9%) as compared to those who were in grade 10 (28.9%). Among students who ever smoked cigarettes, almost 66% tried their first cigarette before the age of 14, with students in grade 7 more likely to report so compared to students in grade 9 (94.4% vs. 75.7%). In fact, an alarming trend is observed whereby a larger percentage of students reported having their first cigarette before age 14 in the lower grade levels (94.4%, 83.1%, 75.7%, 55.3%, 53.7% and 42.8% in the 7th, 8th, 9th, 10th, 11th and 12th graders respectively). Note that the differences between students who are transitioning from middle to high school (75.7% vs. 55.3% in grades 9 and 10) were statically significant.

About 35% of the students used any form of tobacco, 13% smoked cigarettes on one or more days, and 31% particularly used tobacco products other than cigarettes on one or more days, all within 30 days preceding the survey. Males were more likely to be current cigarette smokers (20.1% vs. 7.1%) and were also more likely to report attempts to quit smoking (65.7% vs. 48.5%). Intra middle and high school differences were observed. Students in grades 8 and 9 were more likely to report current use of any form of tobacco as compared to students in grade 7 (30.2% and 36.3% vs. 22.3% respectively) and of tobacco products other than cigarettes at least once during the past month (27.7% and 32.6% vs. 20% respectively). Similarly, students in grade 12 were also more likely to report use of any tobacco product as compared to students in grade 10 (54.7% vs. 37.4%), and to use any tobacco products other than cigarettes (49.3% vs. 34%).

To better understand students' use of other forms of tobacco, questions assessing specifically waterpipe smoking and medwakh use were included. Around 42% of students reported lifetime waterpipe smoking, a higher percentage of grade 9 students (43.1%) than grade 7 (26.8%). More than half of the students who reported lifetime waterpipe smoking smoked it before the age of 14. Students in grades 7 and 8 (88.4% and 78.5%) were more likely to report trying waterpipe before the age of 14, as compared to students in grade 9 (63.6%). Similarly, students in grade 10 were also more likely to report waterpipe smoking before the age of 14 as compared to those who were in grade 12 (45.3% vs. 30.7%). Similar to cigarette smoking in fact, there was a trend whereby a higher percentage of students reported smoking before age 14 in the lower grade levels: 88%, 78.5%, 63.6%, 45.3%, 40.8% and 30.7% in grades 7th, 8th, 9th, 10th, 11th and 12th, respectively. A comparatively new form of tobacco is the Medwakh or smoking pipe of Arabian origin, and 4.6% of students reported smoking it at least once during the past 30 days (males more likely than females, 6.7% vs. 2.7%).

Smoking in the immediate family was also self-reported as a proxy for second-hand smoke exposure. More than half (53%) of the students had parents or guardians who used any form of tobacco and around 70% reported that people smoked in their presence at least once during the past week. Students in grade 9 were more likely to report exposure to second-hand smoking as compared to students in grade 7 (71.7% vs. 58.1%). The majority of

students thought that cigarette and waterpipe use were either probably or definitely harmful to their health (92% and 88% respectively). Females were more likely than males to perceive cigarette smoking (95.1% vs. 88.9%) and waterpipe use (90.8% vs. 84.2%) as harmful.

Alcohol

Overall, one in four (26%) students reported ever having a drink of alcohol other than few sips (no differences by sex, grade or school type). About 3 in 4 (72%) of the lifetime alcohol drinkers reported having their first drink prior to the age of 14. Within middle school, students in grades 7 and 8 were more likely to try alcohol before age 14 compared to students in grade 9 (94.8% and 90.1% vs. 75.6% respectively); also, students in grade 10 as compared to those in grade 12 (66.3% vs. 53%). A trend was also observed whereby a higher percentage of students who had ever had a drink of alcohol other than a few sips reported drinking alcohol before age 14 in the lower grade levels (94.8%, 90.1%, 75.6%, 66.3%, 51.1% and 53% in the 7th, 8th, 9th, 10th, 11th and 12th graders respectively).

Of the total sample, 17.5% were current alcohol drinkers, or had had one or more alcoholic drinks at least once during the month preceding the survey.

Among the current drinkers, around 45% usually drank two or more drinks per day on the days they drank (more so in male drinkers than female drinkers, 53.3% vs. 33%, respectively). Also, students in grade 9 were more likely to report drinking at least two drinks per day as compared to those in grade 7 (47.4% vs. 26.5%), and those who were in grades 10 and 12 as compared to those in grade 11 (56% and 64.8% vs. 38.3% respectively).

About 12.4% of students reported ever getting drunk (17.4% of the males vs. 8.1% of the females). Quite importantly, more than 1 in 10 (about 14%) reported ever having gotten in trouble with their family or friends, missed school, or got into fights as a result of their alcohol drinking; Though the 95%CI overlap, notable differences are observed between males and females (19.3% vs. 9.6%), students in first year of middle school (8.9% in 7th graders) versus first year high school (21.8% in 10th graders), and finally public versus private students (10.3% versus 16.2%).

Current drinkers were also asked about the sources of obtaining alcohol; the top four reported sources were: family (53.1%), store, shop, or street vendor (23.5%), some other way (9.7%) and peers (8.6%). Females were more likely than males to get the alcohol they drank from their family (69.2% vs. 42.4%); however, males were more likely than females to report buying the alcohol they drank from a store, shop, or a street vendor (31.6% vs. 11.3%). Students in grade 7 were more likely than those who were in grade 9 to give someone else money to buy the alcohol they drank for them (8.4% vs. 1.9%). Also, overall about 11% of students reported that they "*would probably or definitely drink if one of their friends offered them a drink of alcohol*", males (15.6%) more so than females (6.6%).

Illegal Drugs

Of the total sample, 3.6% reported ever trying or using an illegal drug. Males were more likely to report lifetime drug use as compared to females (5.8% vs. 1.7%). Among those who reported ever trying any of the illegal drugs, almost 3 in 4 students reported that they were younger than 14 years of age when they first used drugs (differences by sex, grade or school type could not be calculated due to small numbers in some cells, see Table 2Hc). Though 3.6% were lifetime illegal drug users, a much higher percentage (12%) have had a chance to try an illegal drug even if they did not actually try it. Opportunities to try illegal drugs were more likely to occur among males than females (14.8% vs. 9.3%).

The GSHS assessed use of specific illegal substances mainly marijuana and amphetamines. Overall, about 2% of students reported lifetime and current marijuana use with higher odds for males than females (4% vs. 1% lifetime users and 3.6% vs. 0.7% current users). In addition, 1.5% of students used amphetamines or methamphetamines at least once during their lifetime. Students in grade 8 were more likely to report amphetamines or methamphetamines use as compared to those in grade 9 (2.6% vs. 0.8%).

Psychoactive Medications

Students were asked whether they had taken a psychoactive medication without a doctor's prescription or differently than how the doctor told them to use it during the past 12 months. About 18% reported that they had used a drug without a doctor's prescription, or differently than how the doctor told them to use it during the past 12 months. A higher percent of past-year non-medical use of psychoactive drugs was observed among females than males (20.9% vs. 14%) and students in grade 9 (18.4%) and 8 (13.7%) as compared to grade 7 (9%). Among students who used a drug during the past 12 months, the drugs most often used without a doctor's prescription or differently than how the doctor told them to use it were as follow: opioid pain relievers (such as Vicodin©, Tramal©, Dolosal©, Solpadeine©, or morphine) (59.8%) [higher in females (66.3%) than males (48.2%)], followed by sedatives, tranquilizers, or sleeping pills (such as Xanax©, Rivotril©, Rivo, Lexotanil©, Lexo, Valium©, Dormicum©, Stilnox©, or Inductal©) (10.5%) [higher in public than private schools (15.4% vs. 7%)]. Besides, around 24% of students who used a psychoactive drug reported that they had used some other drug without a doctor's prescription or differently than how the doctor told them to use it. Students in private schools were more likely than those in public schools to report some other drug use (29% vs. 17.5%). Females were more likely to report nonmedical use of pain relievers as compared to males (66.3% vs. 48.2%). Additionally, 60% of the students who used a drug, usually took from home, 37% from a family member (more so in females than males, with 40.8% and 30.2%, respectively), and 14% reported buying it from a pharmacy. Male users were more likely than female users to report having "some other ways" to get the prescription drug, which they usually took without a doctor's prescription or differently than how it was prescribed (6.6% vs. 1.4%, respectively).

Table 2Ha. Tobacco use by sex, grade level and school type among total sample of 7th-12th graders

Tobacco Use	Total	By Sex		By Grade						By School Type	
	All	Male	Female	7	8	9	10	11	12	Public	Private
	% (95 % CI)	% (95 % CI)	% (95 % CI)	% (95 % CI)	% (95 % CI)	% (95 % CI)	% (95 % CI)	% (95 % CI)	% (95 % CI)	% (95 % CI)	% (95 % CI)
Percentage of students who ever tried cigarettes	24.3 (20.1,27.8)	32.7* (28.7,36.8)	17.0 (14.5,19.8)	15.2 * (12.3,18.6)	18.1 (15.3,21.2)	23.0 (17.7,29.2)	28.9 (22.5,36.3)	30.5 (22.6,39.6)	41.9 (37.1,46.8)	23.7 (19.4,28.5)	24.8 (21.6,28.3)
Percentage of students who tried a cigarette before age 14 years for the first time among students who ever smoked cigarettes	65.6 (60.1,70.6)	67.5 (61.6,72.8)	62.4 (54.0,70.1)	94.4 * (87.9,97.5)	83.1 (72.9,90.1)	75.7 (67.3,82.5)	55.3 (46.4,63.8)	53.7 (46.6,60.6)	42.8 (36.5,49.4)	63.4 (54.9,71.1)	66.7 (59.4,73.3)
Percentage of students who currently smoked cigarettes (on at least 1 day during the 30 days before the survey)	13.1 (10.8,15.9)	20.1 * (16.9,23.7)	7.1 (5.6,8.8)	9.6 (7.4,12.3)	10.1 (7.6,13.3)	13.0 (9.5,17.6)	14.0 (10.2,19.0)	16.0 (11.0, 22.7)	21.4 (14.6,30.2)	12.9 (9.8,16.8)	13.2 (10.6,16.3)
Percentage of students who currently used any tobacco products other than cigarettes (on at least 1 day during the 30 days before the survey)	31.3 (27.9,34.9)	33.7 (28.6,39.2)	29.2 (25.6,33.2)	20.0 * (17.0,23.3)	27.7 (24.1,31.5)	32.6 (26.3,39.5)	34.0 (27.8,40.8)	37.0 (30.5,43.9)	49.3 (43.3,55.4)	34.7 (31.7,37.8)	29.4 (25.0,34.2)
Percentage of students who currently used any tobacco product (on at least 1 day during the 30 days before the survey)	34.5 (30.9,38.4)	38.6 (33.3,44.1)	31.1 (27.6,34.8)	22.3 * (19.3,25.7)	30.2 (25.8,34.9)	36.3 (30.4,42.6)	37.4 (31.5,43.7)	40.1 (33.0,47.5)	54.7 (47.8,61.5)	37.1 (33.7,40.6)	33.1 (28.5,37.9)
Percentage of students who tried to quit smoking cigarettes among students who smoked cigarettes during the 12 months before the survey	61.1 (55.2,66.7)	65.7 * (59.9,71.1)	48.5 (42.1,54.9)	- (-)	- (-)	- (-)	67.1 (57.3,75.6)	68.2 (55.9,78.3)	58.1 (50.8,65.1)	65.0 (60.1,69.7)	59.2 (51.2,66.8)
Percentage of students who ever tried a narghile or waterpipe	41.8 (37.6,46.0)	44.4 (39.1,49.9)	39.5 (35.3,43.8)	26.8 * (22.5,31.5)	35.9 (30.8,41.5)	43.1 (38.5,47.7)	48.4 (41.3,55.6)	49.7 (41.9,57.4)	63.4 (54.6,71.3)	43.6 (39.8,47.6)	40.6 (35.7,45.7)
Percentage of students who tried waterpipe for the first time before age 14 (among students who had ever tried waterpipe)	57.3 (52.0,62.5)	63.3 (56.8,69.4)	51.4 (45.5,57.3)	88.4 * (82.4,92.5)	78.5 (71.7,84.0)	63.6 (55.2,71.2)	45.3 (40.0,50.6)	40.8 (33.4,48.7)	30.7 (23.4,39.0)	50.9 (42.3,59.3)	61.3 (55.6,66.7)

* Statistical significance due to non-overlapping confidence intervals between males/females, or private/public schools; for grade differences, * is indicated when estimates in any two levels are statistically significantly different from one another. -: Fewer than 100 students in this subgroup

Table 2Ha (continued). Tobacco use by sex, grade level and school type among total sample of 7th-12th graders

Tobacco Use	Total	By Sex		By Grade						By School Type	
	All	Male	Female	7	8	9	10	11	12	Public	Private
	% (95 % CI)	% (95 % CI)	% (95 % CI)	% (95 % CI)	% (95 % CI)	% (95 % CI)	% (95 % CI)	% (95 % CI)	% (95 % CI)	% (95 % CI)	% (95 % CI)
Percentage of students who currently smoked a Medwakh or smoking pipe (one or more days during the 30 days before the survey)	4.6 (3.5,5.9)	6.7 * (5.1,8.8)	2.7 (1.9,3.7)	5.1 (2.9,9.0)	4.1 (2.9,5.7)	3.9 (2.9,5.2)	4.2 (2.7,6.6)	4.7 (2.5,8.8)	5.4 (4.1,7.0)	6.3 (4.1,9.7)	3.6 (2.7,4.7)
Percentage of students who reported that people smoked in their presence (on one or more days during the 7 days before the survey)	70.2 (67.6,72.8)	68.5 (63.7,73.0)	71.7 (68.6,74.7)	58.1 * (53.2,62.9)	64.5 (60.3,68.4)	71.7 (66.1,76.6)	77.8 (70.8,83.5)	79.3 (75.3,82.9)	83.1 (79.4,86.2)	72.9 (69.0,76.5)	68.7 (64.3,72.9)
Percentage of students who had parents or guardians who used any form of tobacco	53.0 (49.8,56.2)	50.1 (46.6,53.6)	55.6 (51.3,59.9)	39.5 (35.0,44.1)	48.3 (40.9,55.9)	53.8 (47.4,60.0)	63.8 (58.7,68.6)	60.1 (54.2,65.7)	65.7 (61.9,69.3)	56.2 (52.5,59.9)	51.2 (46.5,56.0)
Percentage of students who thought probably or definitely cigarette smoking was harmful to their health	92.2 (90.1,93.9)	88.9 * (85.6,91.5)	95.1 (93.7,96.2)	90.1 (87.1,92.5)	91.7 (89.0,93.8)	91.6 (89.0,93.7)	95.4 (92.0,97.4)	93.6 (88.9,96.4)	92.2 (87.3,95.3)	90.9 (86.1,94.2)	92.9 (90.8,94.6)
Percentage of students who thought probably or definitely smoking a waterpipe smoking was harmful to their health	87.7 (85.9, 89.4)	84.2 * (80.8,87.1)	90.8 (89.4,92.1)	84.4 (80.8,87.4)	85.3 (81.8,88.2)	87.5 (83.3,90.8)	91.5 (89.1,93.5)	90.7 (85.5,94.2)	90.7 (85.3,94.3)	86.9 (82.0,90.7)	88.2 (86.0,90.1)

* Statistical significance due to non-overlapping confidence intervals between males/females, or private/public schools; for grade differences, * is indicated when estimates in any two levels are statistically significantly different from one another.

Table 2Hb. Alcohol use by sex, grade level and school type among total sample of 7th-12th graders

Alcohol use	Total	By Sex		By Grade						By School Type	
	All	Male	Female	7	8	9	10	11	12	Public	Private
	% (95 % CI)	% (95 % CI)	% (95 % CI)	% (95 % CI)	% (95 % CI)	% (95 % CI)	% (95 % CI)	% (95 % CI)	% (95 % CI)	% (95 % CI)	% (95 % CI)
Percentage of students who ever had a drink of alcohol other than a few sips	26.0 (19.1,34.4)	34 (25.6,43.6)	19.5 (13.4,27.3)	18.0 (11.9,26.3)	22.8 (14.8,33.5)	26.1 (16.3,39.0)	35.0 (19.1,55.2)	31.7 (19.3,47.3)	28.7 (18.9,41.1)	17.1 (10.4,26.7)	31.1 (21.2,43.1)
Percentage of students who drank alcohol for the first time before age 14 years (among students who ever had a drink of alcohol other than a few sips)	72.3 (67.4,76.7)	75.7 (70.6,80.2)	67.2 (57.8,75.4)	94.8 * (89.3,97.5)	90.1 (83.9,94.0)	75.6 (68.6, 81.5)	66.3 (61.8,70.5)	51.1 (39.6,62.4)	53.0 (44.2,61.6)	70.7 (63.1,77.3)	72.8 (67.5,77.5)
Percentage of students who currently drank alcohol (at least one drink of alcohol on at least 1 day during the 30 days before the survey)	17.5 (12.2,24.3)	22.9 (16.9,30.1)	12.8 (8.1,19.7)	10.9 (7.3,16.0)	15.5 (9.4,24.4)	17.6 (11.5,26.0)	27.1 (16.4,41.4)	20.3 (11.7,32.8)	18.3 (12.2,26.5)	11.4 (6.4,19.6)	20.9 (13.0,32.0)
Percentage of students who usually drank two or more drinks per day (on the days they drank alcohol among students who drank alcohol during the 30 days before the survey)	45.1 (38.4,52.0)	53.3 * (45.3,61.2)	33.0 (26.3,40.5)	26.5 * (18.7,36.1)	36.3 (26.4,47.5)	47.4 (38.0,57.0)	56.0 (46.3,65.3)	38.3 (32.0,45.1)	64.8 (55.1,73.4)	48.5 (39.1,58.0)	44.1 (35.3,53.3)
Percentage of students who ever drank so much alcohol that they were really drunk (one or more times during their life)	12.4 (9.0,16.8)	17.4 * (13.1,22.7)	8.1 (5.2,12.4)	6.9 (4.5,10.4)	9.4 (5.6,15.4)	12.3 (7.5,19.4)	20.1 (12.4,30.8)	15.1 (9.7,22.6)	16.5 (11.4,23.3)	8.7 (5.0,14.5)	14.6 (9.5,21.7)
Percentage of students who ever got into trouble with their family or friends, missed school, or got into fights as a result of drinking alcohol (one or more times during their life)	13.9 (9.1,20.8)	19.3 (13.1,27.5)	9.6 (5.5,16.4)	8.9 (4.9,15.7)	10.2 (5.3,18.6)	14.6 (8.0, 25.2)	21.8 (12.9,34.5)	17.0 (10.9,25.6)	14.9 (9.1,23.3)	10.3 (5.4,18.6)	16.2 (8.4,28.8)

* Statistical significance due to non-overlapping confidence intervals between males/females, or private/public schools; for grade differences, * is indicated when estimates in any two levels are statistically significantly different from one another.

Table 2Hb (continued). Alcohol use by sex, grade level and school type among total sample of 7th-12th graders

Alcohol use	Total	By Sex		By Grade						By School Type	
	All	Male	Female	7	8	9	10	11	12	Public	Private
	% (95 % CI)	% (95 % CI)	% (95 % CI)	% (95 % CI)	% (95 % CI)	% (95 % CI)	% (95 % CI)	% (95 % CI)	% (95 % CI)	% (95 % CI)	% (95 % CI)
Percentage of students who probably or definitely would drink if one of their friends offered them a drink of alcohol	10.8 (8.1,14.2)	15.6 * (11.8,20.3)	6.6 (4.8,9.1)	5.5 (3.8,7.8)	7.0 (5.3,9.3)	10.4 (7.0,15.0)	17.3 (10.6,26.9)	13.6 (8.3,21.5)	17.0 (10.3,26.6)	7.3 (4.7,11.0)	12.8 (8.9,17.9)
Percentage of students who usually obtained the alcohol they drank from friends (among students who drank alcohol during the 30 days before the survey)	8.6 (6.0,12.2)	9.5 (6.5,13.6)	7.3 (4.4,12.1)	8.1 (4.0,15.6)	8.8 (3.4 ,21.2)	10.5 (5.2,19.9)	7.7 (4.9,11.9)	7.8 (4.5,13.1)	9.4 (3.5,22.6)	11.4 (9.2,13.9)	7.8 (4.9,12.2)
Percentage of students who usually bought the alcohol they drank in a store, shop, or from a street vendor (among students who drank alcohol during the 30 days before the survey)	23.5 (17.5,30.7)	31.6* (24.6,39.5)	11.3 (7.8,16.2)	30.4 (19.1,44.7)	22 (13.1,34.7)	20.6 (10.2,37.2)	20.3 (9.2,39.0)	19.1 (8.8,36.6)	33.3 (27.8,39.4)	33.5 (26.5,41.4)	21.0 (12.6,33.0)
Percentage of students who usually gave someone else money to buy the alcohol they drank for them (among students who drank alcohol during the 30 days before the survey)	3.7 (2.2,6.1)	5.4 (3.2,8.8)	1.2 (0.4,3.9)	8.4* (4.9,13.8)	7.4 (3.1,16.5)	1.9 (0.9,3.8)	2.6 (0.5,12.1)	- (-)	2.9 (0.4,16.4)	7.3 (3.2,15.5)	2.6 (1.2,5.5)
Percentage of students who usually got the alcohol they drank from their family (among students who drank alcohol during the 30 days before the survey)	53.1 (44.7,61.4)	42.4* (33.8,51.6)	69.2 (61.3,76.1)	38.6 (27.1,51.5)	54.8 (35.3,72.9)	51.9 (38.5,65.1)	59.9 (47.0,71.6)	62.1 (42.7,78.3)	44.6 (35.6,54.1)	38.3 (25.9,52.5)	57.5 (43.6,70.4)
Percentage of students who usually stole the alcohol they drank or got it without permission	1.3 (0.7,2.3)	1.4 (0.6,3.3)	1.2 (0.3,3.9)	6.2 (1.9,18.5)	0.4 (0.04,3.9)	0.4 (0.02,4.6)	0.9 (0.1,6.2)	- (-)	0.8 (0.1,4.9)	2.4 (1.0,5.5)	1.0 (0.3,2.9)
Percentage of students who usually got the alcohol they drank some other way (among students who drank alcohol during the 30 days before the survey)	9.7 (7.8,12.1)	9.7 (7.1,13.1)	9.7 (7.1,13.1)	8.4 (3.0,21.4)	6.6 (2.1,18.6)	14.7 (6.3,30.6)	8.6 (4.1,17.2)	11.0 (4.1,26.3)	9.0 (4.2,18.3)	7.2 (5.3,9.8)	10.7 (8.5,13.2)

* Statistical significance due to non-overlapping confidence intervals between males/females, or private/public schools; for grade differences, * is indicated when estimates in any two levels are statistically significantly different from one another. -: Fewer than 100 students in this subgroup

Table 2Hc. Illegal drug use by sex, grade level and school type among total sample of 7th-12th graders

Illegal drug use	Total	By Sex		By Grade						By School Type	
	All	Male	Female	7	8	9	10	11	12	Public	Private
	% (95 % CI)	% (95 % CI)	% (95 % CI)	% (95 % CI)	% (95 % CI)	% (95 % CI)	% (95 % CI)	% (95 % CI)	% (95 % CI)	% (95 % CI)	% (95 % CI)
Percentage of students who ever used drugs	3.5 (2.4,5.2)	5.8* (3.8,8.7)	1.7 (0.9,2.9)	2.9 (1.3,6.3)	3.6 (2.1,6.0)	3.5 (1.6,7.4)	2.9 (1.5,5.5)	3.0 (0.9,9.4)	6.5 (3.3,12.5)	4.4 (2.3,8.3)	3.2 (2.0,5.2)
Percentage of students who used drugs for the first time before age 14 years (among students who ever used drugs)	73.5 (61.7,82.7)	73.5 (61.7,82.7)	- (-)	- (-)	- (-)	- (-)	- (-)	- (-)	- (-)	80.9 (67.7,89.6)	- (-)
Percentage of students who ever used marijuana (one or more times during their life)	2.4 (1.6,3.6)	4.0 * (2.8,5.7)	1.0 (0.5,2.1)	2.1 (1.1,3.9)	2.1 (1.3,3.5)	1.2 (0.5,2.7)	2.2 (1.3,4.0)	2.3 (0.8,6.5)	5.4 (3.0,9.7)	3.0 (1.6,5.6)	2.0 (1.2,3.3)
Percentage of students who currently used marijuana (one or more times during the 30 days before the survey)	2.0 (1.2,3.2)	3.6 * (2.2, 5.7)	0.7 (0.3,1.8)	1.5 (0.6,3.4)	1.9 (1.1,3.3)	2.6 (1.0,6.3)	1.3 (0.5,3.3)	1.2 (0.4,3.9)	4.4 (2.2,8.6)	2.4 (1.1,5.0)	1.8 (1.0,3.3)
Percentage of students who ever used amphetamines or methamphetamines (one or more times during their life)	1.5 (1.0,2.3)	2.4 (1.5,3.8)	0.8 (0.4,1.5)	1.3 * (0.6,2.9)	2.6 (1.5,4.4)	0.3 (0.1,1.1)	1.4 (0.6,2.9)	1.6 (0.6,4.4)	2.0 (0.9,4.4)	2.3 (1.2,4.6)	1.1 (0.6,1.8)
Percentage of students who had a chance to try an illegal drug, even if they did not try it (during the 12 months before the survey)	11.9 (9.9,14.2)	14.8 * (12.8,17.2)	9.3 (7.2,12.0)	10.0 (7.4,13.3)	10.7 (8.8,12.9)	12.9 (9.3,17.4)	11.5 (8.0,16.2)	11.4 (7.2,17.6)	17.4 (13.7,21.8)	11.2 (8.4,14.9)	12.2 (10.0,14.9)

* Statistical significance due to non-overlapping confidence intervals between males/females, or private/public schools; for grade differences, * is indicated when estimates in any two levels are statistically significantly different from one another.

-: Fewer than 100 students in this subgroup

Table 2Hd. Psychoactive medication use by sex, grade level and school type among total sample of 7th-12th graders

Psychoactive medications	Total	By Sex		By Grade						By School Type	
	All	Male	Female	7	8	9	10	11	12	Public	Private
	% (95 % CI)	% (95 % CI)	% (95 % CI)	% (95 % CI)	% (95 % CI)	% (95 % CI)	% (95 % CI)	% (95 % CI)	% (95 % CI)	% (95 % CI)	% (95 % CI)
Percentage of students who use a drug without a doctor's prescription or differently than how a doctor told me to use it during the past 12 months	17.8 (15.4,20.4)	14.0 * (12.5,15.6)	20.9 (17.3,25.1)	9.0 * (7.1,11.3)	13.7 (11.9,15.7)	18.4 (14.9,22.5)	25.3 (18.4,33.9)	21.8 (15.3,30.1)	26.9 (17.9,38.3)	19.9 (17.5,22.5)	16.3 (14.2,18.6)
Percentage of students who used sedatives, tranquilizers, or sleeping pills most often without a doctor's prescription or differently than how the doctor told them to use it (during the 12 months before the survey, among students who used a psychoactive drug)	10.5 (9.1,12.1)	14.8 (11.4,19.0)	8.1 (5.4,11.9)	20.8 (12.9,31.9)	10.9 (6.4,17.9)	10.2 (5.7,17.7)	6.4 (3.5,11.5)	7.8 (3.6,16.2)	11.4 (5.7,21.4)	15.4* (11.7,20.0)	7.0 (4.9,9.9)
Percentage of students who used pain relievers most often without a doctor's prescription or differently than how the doctor told them to use it (during the 12 months before the survey, among students who used a psychoactive drug)	59.8 (54.7,64.6)	48.2 * (40.3,56.1)	66.3 (60.0,72.0)	47.6 (34.9,60.6)	59.2 (48.4,69.2)	63.5 (54.9,71.4)	58.9 (49.8, 67.5)	58.7 (42.7,73.0)	66.4 (54.4,76.7)	59.8 (51.6,67.4)	59.8 (51.7,67.4)
Percentage of students who used stimulants most often without a doctor's prescription or differently than how the doctor told them to use it (during the 12 months before the survey, among students who used a psychoactive drug)	2.5 (1.5,4.2)	3.4 (1.4,7.8)	2.0 (1.0,3.9)	6.3 (3.3,11.7)	3.6 (1.0,11.7)	1.7 (0.5,5.5)	2.4 (0.7,8.0)	0.9 (0.1,12.5)	0.9 (0.1,5.6)	3.8 (1.9,7.5)	1.7 (0.7,4.2)

Percentage of students who used anti-depressants most often without a doctor's prescription or differently than how the doctor told them to use it (during the 12 months before the survey, among students who used a psychoactive drug)	3.0 (1.7,5.4)	5.0 (2.4,10.4)	1.9 (0.8,4.1)	5.2 (2.0,13.2)	3.4 (1.5,7.4)	3.5 (1.1,10.3)	3.1 (1.0,8.6)	3.2 (0.6,15.3)	0.3 (0.0,3.6)	3.5 (1.9,6.2)	2.6 (1.0,6.8)
Percentage of students who used some other drug most often without a doctor's prescription or differently than how the doctor told them to use it (during the 12 months before the survey, among students who used a psychoactive drug)	24.2 (20.4,28.5)	28.6 (21.1,37.5)	21.8 (17.1,27.4)	20.1 (8.8,40.0)	22.9 (13.9,35.4)	21.1 (13.3,31.7)	29.2 (18.6,42.8)	29.4 (12.3,55.2)	20.9 (13.3,31.3)	17.5 * (15.0,20.4)	29.0 (21.8,37.5)
Percentage of students who usually took the drug that they used most often without a doctor's prescription or differently than how the doctor told them to use it from home (during the 12 months before the survey, among students who used a drug)	39.8 (34.9,44.8)	37.3 (26.9,49.0)	41.0 (37.6,44.6)	30.9 (17.2, 48.9)	30.3 (24.1,37.4)	32.8 (20.8,47.7)	45.7 (37.0,54.6)	51.5 (39.6,63.2)	43.7 (32.4,55.7)	37.1 (31.7,42.9)	41.6 (36.4,46.9)
Percentage of students who usually took the drug that they used most often without a doctor's prescription or differently than how the doctor told them to use it from a family member (during the 12 months before the survey, among students who used a drug)	37.0 (33.8,40.2)	30.2* (24.8,36.2)	40.8 (37.4,44.3)	36.3 (22.8,52.4)	46.6 (40.4,52.9)	38.1 (30.3,46.5)	35.3 (28.3,42.9)	25.8 (19.0,33.9)	40.6 (26.7,56.2)	38.5 (33.8,43.5)	36.8 (33.3,40.4)
Percentage of students who usually took the drug that they used most often without a doctor's prescription or differently than how the doctor told them to use it from a friend for free (during the 12 months before the survey, among students who used a drug)	2.0 (1.0,4.1)	4.2 (1.9,9.2)	0.8 (0.2,2.4)	4.6 (1.3,15.3)	3.4 (1.2,9.4)	2.1 (0.6,7.3)	1.1 (0.1,11.6)	0.5 (0.03,8.2)	0.8 (0.2,2.9)	2.4 (1.0,5.6)	1.6 (0.6,4.0)

Percentage of students who usually took the drug that they used most often without a doctor's prescription or differently than how the doctor told them to use it by buying it from a friend (during the 12 months before the survey, among students who used a drug)	2.3 (0.8,6.1)	4.0 (1.3,11.8)	1.3 (0.5,3.6)	9.9 (2.6,31.3)	2.3 (0.6,9.0)	- (-)	2.2 (0.8,5.9)	- (-)	1.0 (0.2,4.9)	3.9 (1.1,12.7)	1.1 (0.3,4.2)
Percentage of students who usually took the drug that they used most often without a doctor's prescription or differently than how the doctor told them to use it by buying it from a pharmacy (during the 12 months before the survey, among students who used a drug)	14.1 (11.2,17.4)	15.9 (9.1,26.1)	13.1 (1.0,17.0)	11.1 (4.6,24.3)	11.0 (6.9,17.2)	19.2 (9.8,34.2)	12.6 (7.8,19.5)	17.1 (9.1,29.7)	13.0 (6.3,24.7)	12.4 (9.4,16.3)	14.7 (10.0,21.0)
Percentage of students who usually took the drug that they used most often without a doctor's prescription or differently than how the doctor told them to use it from a doctor (during the 12 months before the survey, among students who used a drug)	1.7 (1.0,3.0)	1.8 (0.7,4.6)	1.6 (0.8,3.2)	1.9 (0.3,11.8)	2.1 (0.5,8.0)	2.0 (0.4,8.1)	1.3 (0.2,8.3)	3.1 (0.8,11.0)	0.2 (0.0,4.1)	1.8 (1.0,3.1)	1.7 (0.7,4.4)
Percentage of students who usually took the drug that they used most often without a doctor's prescription or differently than how the doctor told them to use it some other way (during the 12 months before the survey, among students who used a drug)	3.2 (2.0,5.3)	6.6* (3.1,13.7)	1.4 (0.7,2.4)	5.4 (2.0,13.9)	4.2 (1.4,11.8)	5.9 (2.0,16.1)	1.9 (0.8,4.3)	2.1 (0.4,11.3)	0.8 (0.1,4.1)	3.9 (2.3,6.3)	2.5 (0.9,6.7)

* Statistical significance due to non-overlapping confidence intervals between males/females, or private/public schools; for grade differences, * is indicated when estimates in any two levels are statistically significantly different from one another.

-: Fewer than 100 students in this subgroup

I. Sexual and Reproductive Health

Table 2I presents findings related to questions on reproductive health issues including puberty, pregnancy, sexually transmitted infections, and HIV infection or AIDS. The majority (72%) of students had heard of HIV infection or AIDS; students in grades 8 and 9 were more likely to have ever heard about HIV as compared to those in grade 7 (66% vs. 38.4% and 78.2% vs. 38.4% respectively). About one third (30%) of those who had heard of HIV had looked for related information about it most often through the internet or social media; students who were in grade 9 were more likely than students who were in grade 7 to have searched about it on the internet or social media (31.5% vs. 15.6%). A third of the students ever talked about HIV or AIDS with their parents or guardians; communication about HIV infection or AIDS with parents or guardians differed by grade level within middle school. Parental communication about HIV/AIDS was more likely to occur among students in grades 8 and 9 as compared to those in grade 7 (30.1% vs. 17.9% and 36.4% vs. 17.9% respectively).

Around 16% of students reported ever having had intimate physical relationships, a higher percent in males than females (25.8% vs. 8.1%). Almost 73% of students who ever had intimate physical relationships did so for the first time before age 14. Students in grades 7 (96.3%) and 8 (94.8%) were more likely than those in grade 9 to report an intimate physical relationship before the age of 14 (84.7%); students in grade 10 also more likely as compared to students in grade 12 (58.3% vs. 28.8%). In addition, students in their last year of middle school (grade 9) were more likely to report engaging in intimate physical relationship for the first time before age of 14 as compared to those in their first year of high school (grade 10) (84.7% vs. 58.3%). Among students who ever had physical relationships, a trend was observed with the higher percentage of students who initiated intimate physical relationships before age 14 in lower grades (96.3%, 94.8%, 84.7%, 58.3%, 40% and 28.8% in grades 7, 8, 9, 10, 11 and 12 respectively)

Among students who were ever asked to be in an intimate physical relationship, 62% reported that they were able to say no (noting 38% were not able to say no). Almost 1 in 5 (17.5%) of students reported that *"a few of their friends had intimate physical relationships"*, higher percent among males than females (24.5% vs. 11.5%).

More than half of the students *"would support being taught about reproductive health in school"* and thought that *"reproductive health education should start before and during the age of puberty"*. Males were more likely than females to support reproductive health education in schools (55.2% vs. 47.3%) and students in grades 8 and 9 as compared to those who were in grade 7 (44.9% vs. 32.5% and 51.7% vs. 32.5% respectively). Yet, around 47% of the students believed that *"education about reproduction should be taught separately in boys only and girls' only classes"*.

J. Personal and Oral Hygiene

Table 2J includes findings on personal and oral hygiene. The percentage of students who reported never or rarely washing their hands before eating or after using the toilet during the past 30 days were few, only 5% and 1.7% of the total sample, respectively. Moreover, only 2.3% said they had *"never or rarely used soap when washing their hands"* during the past 30 days, a percentage that was higher in males (3.4%) than females (1.4%).

Similarly, with regards to oral hygiene, the majority of students (91.4%) reported usually cleaning or brushing their teeth one or more times per day during the past 30 days, with females more likely to do so as compared to males (94.2% vs. 88.3%) and students in private schools more so as compared to those in public schools (92.8% vs. 89.1%). Nonetheless, of the students who visited the dentist during the past 12 months, only 8.7% went for a check-up or exam as the main reason, a significantly higher percentage of students in public versus private schools (16.6% vs. 4.6%).

K. Protective Factors

Protective factors including school attendance, perceived social support at school and parental regulation and monitoring are presented in Table 2K by sex, school type and grade level.

School Attendance

16.4 % of students missed classes or school without permission on one or more days during the past 30 days, signifying that a majority of the students (83.6%) hadn't missed class/school without permission in the month preceding the survey; a higher percentage of males than females, 20.2% vs. 13.3% reported absenteeism but no differences by grade level or school type were noted.

Perceived Social Support at School

About 69% of the students reported that "*most of the students in their school were most of the time or always kind and helpful during the past 30 days*", more commonly reported by females than males (72.8% vs. 64.3%, respectively).

Parental Regulation and Monitoring

Regarding parental regulation and monitoring, about 46% of students reported that during the past 30 days their parents or guardians checked their homework most of the time or always to see if it was done. Only 48% of students reported that their parents or guardians really knew what they were doing in their free time most of the time or always during the past month, a higher percent of females than males (54.5% vs. 40.9%). The majority (84%) of students reported that their parents or guardians never or rarely went through their things without their approval during the past 30 days. In addition, 89% of students reported that their parents/ guardians never or rarely embarrassed them in public or in front of friends during the past month. Nearly two-thirds (63%) mentioned that they gave them attention and listened to them most of the time or always and around half of the sample (48%) reported that their parents understood their problems and worries most of the time or always during the past 30 days.

Table 2I. Reproductive health by sex, grade level and school type among total sample of 7th-12th graders

Reproductive health	Total	By Sex		By Grade						By School Type	
	All	Male	Female	7	8	9	10	11	12	Public	Private
	% (95 % CI)	% (95 % CI)	% (95 % CI)	% (95 % CI)	% (95 % CI)	% (95 % CI)	% (95 % CI)	% (95 % CI)	% (95 % CI)	% (95 % CI)	% (95 % CI)
Percentage of students who thought education on reproductive health should start before and during the age of puberty	65.4 (62.8,68.0)	71.1 * (67.6,74.4)	60.5 (56.6,64.4)	54.2 (49.3,58.9)	59.5 (55.2,63.6)	61.4 (52.1,70.0)	73.7 (68.7,78.1)	77.2 (72.2,81.5)	80.5 (74.9,85.0)	65.7 (60.3,70.8)	65.2 (61.4,68.9)
Percentage of students who would support being taught about reproductive health in school	50.9 (48.7,53.1)	55.2* (51.9,58.4)	47.3 (44.2,50.4)	32.5 * (29.1 ,36.1)	44.9 (38.8,51.1)	51.7 (46.2,57.2)	58.7 (53.6,63.6)	66.9 (61.3,72.0)	68.9 (59.4,77.0)	50.6 (43.8,57.4)	51.1 (46.5,55.6)
Percentage of students who believed education about reproduction should be taught in boys only and girls only classes	47.4 (42.4,52.5)	43.8 (39.3,48.4)	50.4 (44.3,56.4)	45.4 (37.7,53.3)	45.3 (39.0,51.8)	47.1 (38.0,56.4)	49.6 (42.5,56.8)	47.8 (39.1,56.7)	51.9 (44.1,59.5)	53.7 (47.6,59.7)	43.8 (37.8,50.1)
Percentage of students who ever heard of HIV infection or AIDS	72.2 (67.1,76.8)	70.8 (64.3,76.5)	73.4 (67.8,78.4)	38.4 * (34.4,42.6)	66.0 (56.7,74.2)	78.2 (67.6,86.1)	89.6 (84.1,93.3)	93.9 (91.9,95.4)	93.7 (88.6,96.6)	74.1 (65.5,81.3)	71.1 (63.7,77.5)
Percentage of students who looked for information about HIV infection or AIDS on the Internet or social media most often (among students who looked for information about HIV infection or AIDS)	30.2 (27.0,33.5)	32.1 (27.2,37.4)	28.6 (24.6,33.0)	15.6 * (11.4,20.9)	21.0 (13.7, 30.7)	31.5 (25.4,38.4)	35.5 (28.7,42.8)	36.1 (29.7,43.1)	43.2 (37.7,48.8)	31.0 (26.8,35.6)	29.6 (25.0,34.8)
Percentage of students who ever talked about HIV infection or AIDS with their parents or guardians	32.4 (30.2,34.7)	31.8 (29.3,34.5)	32.9 (30.1,35.9)	17.9 * (15.3,20.9)	30.1 (25.8,34.8)	36.4 (29.9,43.4)	35.3 (30.1,41.0)	43.4 (38.9,48.1)	43.9 (40.3,47.6)	33.7 (30.3,37.3)	31.7 (28.6,35.1)

* Statistical significance due to non-overlapping confidence intervals between males/females, or private/public schools; for grade differences, * is indicated when estimates in any two levels are statistically significantly different from one another.

Table 2I (continued). Reproductive health by sex, grade level and school type among total sample of 7th-12th graders

Reproductive health	Total	By Sex		By Grade						By School Type	
	All	Male	Female	7	8	9	10	11	12	Public	Private
	% (95 % CI)	% (95 % CI)	% (95 % CI)	% (95 % CI)	% (95 % CI)	% (95 % CI)	% (95 % CI)	% (95 % CI)	% (95 % CI)	% (95 % CI)	% (95 % CI)
Percentage of students who ever had intimate physical relationships	16.2 (13.7,19.1)	25.8* (23.0,28.9)	8.1 (6.3,10.3)	16.0 (12.4,20.3)	16.8 (13.0,21.3)	16.6 (12.3,21.9)	13.5 (9.6,18.6)	15.7 (9.0,26.0)	19.8 (15.5,24.9)	17.7 (14.5,21.5)	15.8 (12.3,20.0)
Percentage of students who had a few of their friends have intimate physical relationships	17.5 (15.3,19.8)	24.5 * (20.8,28.6)	11.5 (9.5,13.9)	10.8 (8.3,14.0)	12.2 (10.1,14.6)	15.8 (12.8,19.3)	23.0 (18.3,28.5)	25.7 (20.1,32.4)	25.4 (20.9,30.5)	17.2 (13.8,21.2)	17.6 (15.1,20.5)
Percentage of students who had intimate physical relationships for the first time before age 14 (among students who ever had intimate physical relationships)	72.5 (62.8,80.5)	72.4 (61.0,81.4)	73.2 (63.4,81.1)	96.3 * (90.7,98.6)	94.8 (90.3,97.3)	84.7 (76.8,90.2)	58.3 (45.0,70.5)	40.0 (29.4,51.6)	28.8 (20.8,38.5)	70.7 (57.8,81.0)	73.7 (63.8,81.8)
Percentage of students who reported that they were able to say no to someone who wanted to have intimate physical relationships with them (among students who ever were asked to be in an intimate physical relationship)	61.9 (56.8,66.8)	57.1 (50.4,63.5)	67.1 (60.1,73.4)	46.2 (34.6,58.2)	59.8 (53.7,65.6)	62.4 (49.4,73.9)	67.3 (56.3,76.7)	66.6 (59.4,73.1)	75.6 (62.4,85.3)	62.5 (57.2,67.6)	61.6 (54.3,68.4)

* Statistical significance due to non-overlapping confidence intervals between males/females, or private/public schools; for grade differences, * is indicated when estimates in any two levels are statistically significantly different from one another.

Table 2J. Personal and oral hygiene by sex, grade level and school type among total sample of 7th-12th graders

Personal Hygiene/ Oral Health	Total	By Sex		By Grade						By School Type	
	All	Male	Female	7	8	9	10	11	12	Public	Private
	% (95 % CI)	% (95 % CI)	% (95 % CI)	% (95 % CI)	% (95 % CI)	% (95 % CI)	% (95 % CI)	% (95 % CI)	% (95 % CI)	% (95 % CI)	% (95 % CI)
Percentage of students who usually cleaned or brushed their teeth one or more times per day (during the 30 days before the survey)	91.4 (90.5,92.3)	88.3 * (86.7,89.7)	94.2 (93.5,94.8)	92.1 (90.3,93.6)	92.4 (90.3,94.1)	90.2 (87.4,92.3)	91.7 (89.0,93.8)	90.1 (86.9,92.5)	91.2 (88.8,93.2)	89.1 * (87.6,90.4)	92.8 (91.1,94.1)
Percentage of students who never or rarely washed their hands before eating (during the 30 days before the survey)	5.0 (4.2,6.0)	5.5 * (4.0,7.5)	4.5 (4.1,5.1)	3.2 (2.0,5.0)	4.6 (2.9,7.2)	5.4 (3.4,8.6)	5.5 (3.8,7.9)	6.5 (4.4,9.6)	6.4 (4.3,9.4)	5.1 (4.3,6.1)	4.9 (3.6,6.6)
Percentage of students who never or rarely washed their hands after using the toilet or latrine (during the 30 days before the survey)	1.7 (1.3,2.3)	2.2 (1.4,3.6)	1.3 (0.9,1.9)	1.8 (1.1,2.9)	1.5 (0.8,3.1)	2.4 (1.0,5.8)	1.3 (0.6,2.5)	1.7 (1.1,2.7)	1.6 (0.7,3.2)	1.7 (1.2,2.5)	1.7 (1.1,2.6)
Percentage of students who never or rarely used soap when washing their hands (during the 30 days before the survey)	2.3 (1.9,2.9)	3.4 (2.6,4.3)	1.4 (1.0,1.9)	3.1 (2.0,4.9)	2.1 (1.1,4.2)	2.2 (1.7,2.9)	2.6 (1.3,5.0)	1.7 (0.8,3.3)	1.4 (0.6,3.6)	2.9 (2.1,4.1)	1.9 (1.4,2.8)
Percentage of students who went to the dentist for a check-up or exam as the main reason (during the 12 months before the survey, among students who visited the dentist)	8.7 (6.2,12.1)	6.9 (4.6,10.3)	10.1 (7.0,14.3)	13.5 (9.5,18.9)	8.5 (5.6,12.7)	6.7 (3.9,11.5)	8.8 (4.8,15.4)	5.0 (2.1,11.4)	6.4 (2.9,13.5)	16.6* (11.2,23.8)	4.6 (1.8,10.9)

* Statistical significance due to non-overlapping confidence intervals between males/females, or private/public schools; for grade differences, * is indicated when estimates in any two levels are statistically significantly different from one another.

Table 2K. Risk and protective factors by sex, grade level and school type among total sample of 7th-12th graders

Risk and Protective factors	Total	By Sex		By Grade						By School Type	
	All	Male	Female	7	8	9	10	11	12	Public	Private
	% (95 % CI)	% (95 % CI)	% (95 % CI)	% (95 % CI)	% (95 % CI)	% (95 % CI)	% (95 % CI)	% (95 % CI)	% (95 % CI)	% (95 % CI)	% (95 % CI)
Percentage of students who missed classes or school without permission (on one or more days during the 30 days before the survey)	16.4 (13.9,19.3)	20.2 * (17.0,23.8)	13.3 (11.1,15.8)	14.5 (11.9,17.5)	13.9 (10.3,18.5)	16.0 (13.0,19.7)	15.9 (10.8,22.8)	20.1 (14.3,27.4)	21.9 (17.2,27.4)	18.2 (15.6,21.1)	15.4 (11.9,19.6)
Percentage of students who reported that most of the students in their school were most of the time or always kind and helpful (during the 30 days before the survey)	68.9 (66.2,71.6)	64.3 * (61.0,67.5)	72.8 (69.9,75.4)	64.6 (58.8,70.0)	68.3 (62.6,73.5)	72.0 (68.5,75.2)	71.3 (64.9,77.0)	71.5 (64.5,77.6)	67.8 (62.3,72.8)	64.3 (58.6,69.6)	71.7 (68.7,74.5)
Percentage of students who reported that their parents or guardians most of the time or always checked to see if their homework was done (during the 30 days before the survey)	46.2 (43.3,49.2)	47.0 (43.2,50.9)	45.5 (42.3,48.8)	59.9 (54.9,64.7)	54.8 (50.3,59.3)	48.4 (39.9,57.0)	35.2 (28.0,43.1)	32.0 (26.2,38.3)	33.1 (28.1,38.6)	45.0 (40.8,49.3)	46.9 (41.9,52.1)
Percentage of students who reported that their parents or guardians most of the time or always understood their problems and worries (during the 30 days before the survey)	48.2 (45.6,50.8)	46.6 (43.3,50.0)	49.4 (46.2,52.7)	51.7 (46.5,56.8)	53.6 (48.7,58.4)	48.1 (40.8,55.5)	45.4 (38.8,52.2)	43.7 (37.1,50.5)	40.6 (34.2,47.4)	44.7 (41.1,48.3)	50.2 (46.5,53.9)

Protective factors	Total	By Sex		By Grade						By School Type	
	All	Male	Female	7	8	9	10	11	12	Public	Private
	% (95 % CI)	% (95 % CI)	% (95 % CI)	% (95 % CI)	% (95 % CI)	% (95 % CI)	% (95 % CI)	% (95 % CI)	% (95 % CI)	% (95 % CI)	% (95 % CI)
Percentage of students who reported that their parents or guardians most of the time or always really knew what they were doing with their free time (during the 30 days before the survey)	48.4 (46.1,50.7)	40.9 * (39.0,42.9)	54.5 (50.6,58.3)	48.2 (43.6, 52.9)	52.5 (47.1,57.8)	48.6 (42.2,55.0)	48.3 (45.8,50.9)	46.1 (37.8,54.6)	43.7 (37.8,49.7)	45.6 (41.5,49.8)	50.0 (45.3,54.8)
Percentage of students who reported that their parents or guardians never or rarely went through their things without their approval (during the 30 days before the survey)	84.0 (82.2,85.6)	82.4 (80.0,84.5)	85.3 (83.3,87.1)	83.1 (80.0,85.8)	81.3 (76.3,85.4)	86.0 (81.9,89.2)	85.1 (81.5,88.2)	83.6 (76.9,88.7)	86.0 (80.7,90.0)	85.5 (82.8,87.7)	83.1 (81.1,85.0)
Percentage of students who reported that their parents or guardians never or rarely embarrassed them in public or in front of friends (during the 30 days before the survey)	89.2 (87.5,90.6)	88.6 (85.7,91.0)	89.6 (88.0,91.0)	89.9 (86.6,92.4)	89.9 (87.4,91.9)	90.3 (87.8,92.4)	86.9 (82.2,90.5)	88.1 (84.1,91.3)	88.9 (85.2,91.8)	89.9 (88.1,91.4)	88.7 (86.2,90.9)
Percentage of students who reported that their parents or guardians most of the time or always gave them attention and listened to them (during the 30 days before the survey)	63.2 (60.7,65.6)	61.0 (56.2,65.6)	64.9 (62.3,67.4)	65.7 (59.0,71.9)	67.2 (61.4,72.5)	62.2 (58.5,65.8)	59.0 (55.8,62.2)	60.9 (56.0,65.5)	60.7 (55.3,65.8)	59.7 (55.3,63.8)	65.3 (62.6,67.8)

* Statistical significance due to non-overlapping confidence intervals between males/females, or private/public schools; for grade differences, * is indicated when estimates in any two levels are statistically significantly different from one another.

L. Health Education and Promotion in Schools

At the end of each module/for each theme, a question was included that asked students whether they had received any formal health education or information about that topic within their classes or schools. To be able to draw a more holistic picture of school health education, Table 2L presents findings related to health education and promotion in schools during the past 12 months by sex, grade level, and school type.

Around 42% of students were taught about the benefits of healthy eating, which did not vary by sex, school type, and grade level.

In addition, school health education on the importance of hand washing with soap and water was reported by 35% of the students in the total sample (slight yet statistically significant difference between grade 8 and grade 9 students, 48.2% vs. 40.1%, respectively).

With regards to substance use, around 38% of students reported that they covered in any of their classes topics related to the problems associated with alcohol drinking and drug use (more among the males than females, 40.4% vs. 34.2%, respectively).

In addition, about 29% of the students reported that they were taught in any of their classes on how to prevent HIV infection or AIDS and avoid pregnancy or sexually transmitted infections (STIs). Students in grades 8 and 9 were more likely to report having received education on HIV/AIDS prevention as compared to students in grade 7 (33.3% vs. 15.1% and 31.6% vs. 15.1% respectively). Also, as compared to students in grade 10, those who were in grade 12 were more likely to be taught about HIV/AIDS prevention (37.3% vs. 27.4%) and how to prevent pregnancy or STIs (43.2% vs. 28.3%).

Table 2L. Health education and promotion in schools by sex, grade level and school type among total sample of 7th-12th graders

School Health Education	Total	By Sex		By Grade						By School Type	
	All	Male	Female	7	8	9	10	11	12	Public	Private
	% (95 % CI)	% (95 % CI)	% (95 % CI)	% (95 % CI)	% (95 % CI)	% (95 % CI)	% (95 % CI)	% (95 % CI)	% (95 % CI)	% (95 % CI)	% (95 % CI)
Percentage of students who were taught in any of their classes the benefits of healthy eating (during the 12 months before the survey)	42.3 (37.3,47.6)	41.6 (35.7,47.7)	43.0 (37.9,48.2)	45.8 (38.0,53.8)	42.7 (35.8,49.9)	51.3 (41.6,61.0)	35.7 (30.1,41.7)	35.8 (29.9,42.2)	37.0 (30.7,43.9)	47.1 (41.7,52.5)	39.7 (33.5,46.3)
Percentage of students who were taught in any of their classes the importance of hand washing with soap and water (during the 12 months before the survey)	34.6 (31.3,38.0)	35.8 (31.1,40.7)	33.5 (30.3,36.9)	48.2 * (41.6,54.8)	40.1 (34.9,45.4)	35.1 (30.1,40.5)	25.8 (20.0,32.5)	22.8 (17.3,29.4)	21.2 (17.6,25.2)	40.6 (35.6,45.9)	31.2 (27.1,35.6)
Percentage of students who were taught in any of their classes the problems associated with drinking alcohol (during the 12 months before the survey)	37.1 (35.0,39.2)	40.4* (37.5,43.4)	34.2 (31.9,36.7)	38.3 (33.9,42.9)	35.1 (31.7,38.7)	37.6 (32.3,43.2)	33.8 (29.1,38.9)	37.5 (31.7,43.7)	40.5 (33.2,48.3)	39.7 (35.6,44.0)	35.6 (31.5,39.9)
Percentage of students who were taught in any of their classes the problems associated with using drugs (during the 12 months before the survey)	37.9 (35.5,40.3)	38.8 (35.1,42.6)	37.1 (34.3,40.0)	29.7 (24.0,36.2)	34.5 (29.4,39.9)	37.1 (31.6,43.0)	42.6 (36.7,48.7)	45.5 (39.9,51.2)	46.6 (37.2,56.2)	40.6 (37.1,44.2)	36.3 (32.4,40.5)
Percentage of students who were taught in any of their classes how to avoid HIV infection or AIDS (during the 12 months before the survey)	29.2 (25.7,33.0)	30.5 (26.3,35.1)	28.2 (24.3,32.4)	15.1 * (10.9,20.5)	33.3 (25.8,41.7)	31.6 (22.9,41.6)	27.4 (22.2,33.3)	40.6 (32.3,49.4)	37.3 (34.2,40.4)	32.6 (28.8,36.6)	27.3 (22.2,33.0)
Percentage of students who were taught in any of their classes how to avoid pregnancy or sexually transmitted infections (during the 12 months before the survey)	28.9 (25.4,32.5)	32.6 (28.9,36.5)	25.7 (22.3,29.4)	18.6 * (13.6,24.9)	28.2 (22.8,34.4)	30.0 (23.0,38.1)	28.3 (24.2,32.8)	34.7 (27.2,43.1)	43.2 (37.5,49.1)	30.2 (25.2,35.7)	28.1 (23.7,32.9)

* Statistical significance due to non-overlapping confidence intervals between males/females, or private/public schools; for grade differences, * is indicated when estimates in any two levels are statistically significantly different from one another.

III. Summary of 2017 GSHS findings: differences by sex, grade and school type

This section summarizes the main differences seen by sex (Table 3a), grade level (Table 3b), and school type (Table 3c). Tables 3a-3b-3c summarize the statistically significant findings described mentioned above. However, one should be careful in interpreting the findings by grade level and school type, as they may signify differences due to gender (confounding bias).

Summary of differences by sex

Table 3a summarizes all the observed statistically significant sex differences. As can be seen, statistically significant gender differences were observed almost across all the modules. With regards to weight and dietary habits, males were more likely to be overweight or obese, and to have unhealthy dietary practices such as eating frequently at a fast food chain or drinking daily carbonated soft drinks. Males were also more likely to be physically attacked and to experience violence from a teacher on purpose. Males were more likely to be injured, and to report a broken bone or a dislocated joint as their most serious injury. Bullying (especially physical) was also more likely to be experienced by male students. Among students who bullied others, males were more likely to physically bully others as well, while females were more likely to verbally bully others by making fun of their body, face, or the way they looked. Tobacco and illegal drug use was also common in males. Although higher percent of males than females reported receiving information in any of their classes about the problems associated with alcohol drinking, yet, males were still more likely than females to report current drinking and lifetime drunkenness. Sex differences were also observed with regards to the sources of obtaining alcohol, whereby males who drank alcohol were more likely to report buying it from a store, shop or street vendor, whereas females were more likely to report getting the alcohol they drank from their family. Males were also more likely to miss classes or school without permission, and were less likely to report that their parents/guardians really knew what they were doing with their free time.

Overall, males reported experiencing more risk. However, females were less likely to be physically active, and more likely to report feeling lonely or worried to the extent they could not sleep at night. Nonmedical use of prescription drugs was also more prevalent in female students, who were also more likely to report obtaining the drug from a family member. Overall, females were also less likely to report ever having had intimate physical relationships.

Summary of differences by grade level

Table 3b summarizes the statistically significant differences by grade. Since the students' grade levels ranged from 7th to 12th grade, we present the findings as such: (1) within middle school (comparing grade 8 vs. grade 7; grade 9 vs. grade 7; and grade 9 vs. grade 8); (2) within high school (comparing grade 11 vs. grade 10; grade 12 vs. grade 10; and grade 12 vs. grade 11), (3) transition from middle to high school (comparing students in grade 10 vs. grade 9), and (4) first year of middle school versus first year of high school (comparing students in grade 7 vs. grade 10).

Within middle school differences

Middle school students in grade 7 were more likely than those who were in grade 8 to report past 30-day drinking of carbonated soft drinks. Among cigarette smokers, students in grade 7 were also more likely than those who were in grade 9 to report trying their first cigarette before the age of 14. In addition, a higher percentage of students in grades 7 and 8 as compared to grade 9 who had ever smoked waterpipe (narghile) reported doing so for the first time before age 14. Similarly, among students who ever had a drink of alcohol other than a few sips, a higher percent of students who reported drinking alcohol for the first time before age 14 years were in grades 7 and 8 (vs. grade 9) and among students who ever had intimate physical relationships, those who were in grades 7 and 8 were also more likely than those in grade 9 to do so for the first time before age 14. Thus, younger grade levels were more likely to report smoking, drinking and having an intimate relationship before 14 years compared to their older peers. Students who were physically attacked at least once during the past 12 months were also more likely to be in grade 7 as compared to grade 9.

However, as compared to students in grade 7, those who were in grades 8 and 9 were more likely to report current use of any tobacco products other than cigarettes. Students in grade 9 (versus 7) were also more likely to report that others smoked in their presence on at least 1 day during the past week. In addition, among current alcohol drinkers, grade 9 students were more likely than grade 7 students to report drinking two or more drinks per day. Students in grade 9 were more likely than those who were in grades 7 and 8 to report being so worried about something that they could not sleep at night. As compared to grade 7 students, those who were in grades 8 and 9 were more likely to report that they have heard of HIV infection or AIDS and have talked about it with their parents or guardians and would support being taught about reproductive health in school. Among students who looked for information about HIV infection or AIDS, those who were in grade 9 were also more likely than those in grade 7 to have most often looked for information on the internet or social media. Reproductive health education on how to avoid HIV infection or AIDS was more likely to take place among middle school students in grades 8 and 9 (vs. grade 7).

Only lifetime amphetamines or methamphetamines use was more likely to be reported by grade 8 students as compared to those who were in grade 9.

Within high school differences

Intra high school differences were also observed. Grade 10 students were more likely than grade 11 students to report that they took any diet pills, powders, or liquids without a doctor's advice to lose weight or to keep from gaining weight. Students who had ever tried waterpipe smoking and reported doing so for the first time before age 14, were also more likely to be in grade 10 as compared to grade 12. Also, among students who ever had a drink of alcohol other than a few sips, a higher percent of students who reported drinking alcohol for the first time before age 14 years were in grade 10 (vs. grade 12). Among current alcohol drinkers, students in grades 10 and 12 (versus grade 11) were more likely to report drinking two or more drinks per day. In addition, among students who ever had intimate physical relationships, those who were in grades 10 were also more likely than those in grade 12 to do so for the first time before age 14. Thus, for multiple risk outcomes, students in grade 10 reported larger prevalence estimates compared to older students.

However, as compared to students in grade 10, those who were in grade 12 were more likely to currently use any tobacco products other than cigarettes. Physical inactivity was also reported more among students in grades 11 and 12 than those who were in grade 10.

With regards to sexual and reproductive health education specifically on how to avoid HIV infection or AIDS, as well as on how to avoid pregnancy or sexually transmitted infections, the latter was more common among students in grade 12 (vs. grade 10).

The transition from middle to high school

Comparing students transitioning from middle (grade 9) to high school (grade 10), we found only two statistically significant differences, both with respect to having their first cigarette before the age of 14 (grade 9>grade 10), and the second initiating physical relationship before age 14 (also grade 9>grade10).

Comparing first year middle to first year high school

Considering the age differences, one would expect differences in the prevalence of behaviors between 7th graders and 10th graders. However, and since many of these are risk outcomes, we thought of comparing students in first year middle school to those in first year high school just to highlight the extent of 'change' that happens throughout middle school, since our previous analyses of comparing 9th to 10th graders showed not much of an immediate leap or change in behaviors.

Comparing first year middle school (grade 7) to first year high school (grade 10), we observed several important and statistically significant differences. With regards to their substance use, while first year high school students were more likely than first year middle school students to think that smoking a waterpipe is probably or definitely harmful to their health, they nonetheless were more likely to report ever trying cigarettes, narghile or waterpipe smoking and were also more likely to be current users of any tobacco products other than cigarettes at the time of the survey. They were also more likely to report that their parents or guardians used any form of tobacco and that people smoked in their presence. A higher percentage of students in grade 10 were also current alcohol drinkers, usually drank two or more drinks per day, and were ever drunk in their lifetime; they were also more likely to report that they would probably or definitely drink if one of their friends offered them a drink of alcohol. In addition, grade 10 students were more likely than grade 7 students to report using a drug without a doctor's prescription or differently than how it was prescribed.

Students in grades 10 and 7 also differed with respect to other mental health indicators. Among students who bullied anyone, students in grade 10 were more likely than those in grade 7 to report "bullying others in some other way' whether alone or as part of a group. Among students who had a mental health problem and talked with someone about it, grade 10 students were more likely than grade 7 students to disclose their mental health issue to their friends. Students in grade 10 (vs. grade 7) were also more likely to have ever heard of HIV infection or AIDS, looked for information about it most often on the internet or social media, and ever talked about it with their parents or guardians. They were also more likely to report that a few of their friends had intimate physical relationships.

Compared to grade 7, a higher percentage of students in grade 10 reported that they had received school education around the problems associated with using drugs and on how to avoid HIV infection or AIDS. They were more likely to support being taught about reproductive health in schools and thought that reproductive health education should start before and during the age of puberty.

Grade 10 students reported more sedentary behavior, specifically were more likely to report spending three or more hours per day doing sitting activities (sitting and watching television, playing computer games, talking with friends when not in school or doing homework during a typical or usual day). Grade 10 students were less likely to eat fruit two

or more times per day, more likely to drink carbonated drinks daily, and less likely to physically active at least 60 minutes per day on all 7 days.

As can be seen, almost all risk behaviors were more prevalent among 10th graders compared to 7th graders. Compared to grade 10, grade 7 students were more likely to be underweight, to report being physically attacked, and to experience violence from their teacher on purpose. Quite importantly, more first year middle school students than first year high school students reported starting to use cigarette, narghile, and alcohol before the age of 14, as well as to have had an intimate physical relationship before age 14. They were also more likely to use sedatives, tranquilizers, or sleeping pills most often without a doctor's prescription or differently than how it was prescribed by the doctor. Younger students in grade 7 were also more likely to report their parents or guardians checking either most of the time or always to see if their homework was done.

Summary of differences by school type

Table 3c summarizes significant differences by private and public schools. These differences were scattered and not consistent across modules, and could signify some confounding by gender or grade/age.

Students in public schools were less likely than those in private schools to report cleaning or brushing their teeth at least once per day, but were more likely to have visited the dentist, for a check-up or exam as the main reason.

Students enrolled in private schools were more likely than those in public schools to report being seriously injured at least once during the past 12 months, though among those who rode in a motor vehicle driven by someone else, public schools' students were more likely to never or rarely use a seat belt. Students in public schools who used a psychoactive drug were more likely to report using sedatives, tranquilizers or sleeping pills without a doctor's prescription or differently than how it was prescribed but were less likely to report using some other drugs.

In addition, students in public schools were more likely than those in private schools to report that they did not have any close friends. Finally physical activity for at least 60 minutes per day on five or more days during the past 7 days was more common among private school students.

Table 3a. Summary of main Findings-Differences by sex among total sample of 7th-12th graders

Themes surveyed	Male vs. Female
<i>Eating Habits</i>	
Percentage of students who usually drank carbonated soft drinks one or more times per day (during the 30 days before the survey)	M>F
Percentage of students who ate food from a fast food restaurant three or more days (during the 7 days before the survey)	M>F
Percentage of students who were overweight (>+1SD from median for BMI by age and sex)	M>F
Percentage of students who were obese (>+2SD from median for BMI by age and sex)	M>F
<i>Personal Hygiene/ Oral Health</i>	
Percentage of students who usually cleaned or brushed their teeth (one or more times per day) during the 30 days before the survey)	F>M
Percentage of students who never or rarely used soap when washing their hands (during the 30 days before the survey)	M>F
<i>Violence</i>	
Percentage of students who were physically attacked (one or more times) during the 12 months before the survey)	M>F
Percentage of students who were in a physical fight (one or more times) during the 12 months before the survey)	F>M
Percentage of students who were hit, slapped, or physically hurt by their teacher on purpose (during the 12 months before the survey)	M>F
<i>Injuries</i>	
Percentage of students who were seriously injured (one or more times during the 12 months before the survey)	M>F
Percentage of students who reported that their most serious injury was a broken bone or dislocated joint (among students who were seriously injured during the 12 months before the survey)	M>F
Percentage of students who reported that their most serious injury was caused by a motor vehicle accident or being hit by a motor vehicle (among students who were seriously injured during the 12 months before the survey)	M>F
<i>Bullying</i>	
Percentage of students who were bullied (on one or more days during the 30 days before the survey)	M>F
Percentage of students who were bullied most often by being hit, kicked, pushed, shoved around, or locked indoors (among students who were bullied during the 30 days before the survey)	M>F
Percentage of students who bullied others whether alone or as part of a group	M>F
Percentage of students who whether alone or as part of a group, hit, kicked, pushed, or shoved others or locked others indoors most often (during the 30 days before the survey, among students who bullied anyone)	M>F
Percentage of students who were bullied most often in some other way (among students who were bullied during the 30 days before the survey)	F>M
Percentage of students who whether alone or as part of a group, made fun of others because of their body, their face, or the way they looked (during the 30 days before the survey, among students who bullied anyone)	F>M
Percentage of students who whether alone or as part of a group, bullied others in some other way (during the 30 days before the survey, among students who bullied anyone)	F>M
<i>Mental Health</i>	
Percentage of students who most of the time or always felt lonely (during the 12 months before the survey)	F>M
Percentage of students who most of the time or always were so worried about something that they could not sleep at night (during the 12 months before the survey)	F>M

Percentage of students who talked most often with their friends about a mental health problem they were having (during the 12 months before the survey, among students who had a mental health problem and talked with someone about it)	F>M
Tobacco Use	
Percentage of students who currently smoked cigarettes (on at least 1 day during the 30 days before the survey)	M>F
Percentage of students who ever tried cigarettes	M>F
Percentage of students who tried to quit smoking cigarettes (among students who smoked cigarettes during the 12 months before the survey)	M>F
Percentage of students who smoked a Medwakh or smoking pipe (one or more days during the 30 days before the survey)	M>F
Percentage of students who thought probably or definitely cigarette smoking was harmful to their health	F>M
Percentage of students who thought probably or definitely smoking a narghile or waterpipe was harmful to their health	F>M
Alcohol Use	
Percentage of students who usually drank two or more drinks per day (on the days they drank alcohol among students who drank alcohol during the 30 days before the survey)	M>F
Percentage of students who ever drank so much alcohol that they were really drunk (one or more times during their life)	M>F
Percentage of students who probably or definitely would drink if one of their friends offered them a drink of alcohol	M>F
Percentage of students who usually bought the alcohol they drank in a store, shop, or from a street vendor (among students who drank alcohol during the 30 days before the survey)	M>F
Percentage of students who usually got the alcohol they drank from their family (among students who drank alcohol during the 30 days before the survey)	F>M
Illegal Drug Use	
Percentage of students who ever used drugs	M>F
Percentage of students who ever used marijuana (one or more times during their life)	M>F
Percentage of students who currently used marijuana (one or more times during the 30 days before the survey)	M>F
Percentage of students who had a chance to try an illegal drug , even if they did not try it (during the 12 months before the survey)	M>F
Psychoactive Medications	
Percentage of students who use a drug without a doctor's prescription or differently than how a doctor told me to use it during the past 12 months	F>M
Percentage of students who used pain relievers most often without a doctor's prescription or differently than how the doctor told them to use it (during the 12 months before the survey, among students who used a drug)	F>M
Percentage of students who usually took the drug that they used most often without a doctor's prescription or differently than how the doctor told them to use it from a family member (during the 12 months before the survey, among students who used a drug)	F>M
Percentage of students who usually took the drug that they used most often without a doctor's prescription or differently than how the doctor told them to use it some other way (during the 12 months before the survey, among students who used a drug)	M>F
Reproductive Health	
Percentage of students who thought education on reproductive health should start before and during the age of puberty	M>F
Percentage of students who would support being taught about reproductive health in school	M>F
Percentage of students who had a few of their friends have intimate physical relationships	M>F
Percentage of students who ever had intimate physical relationships	M>F
Physical Activity	

Percentage of students who were not physically active (for at least 60 minutes per day on any day during the 7 days before the survey)	F>M
Percentage of students who were physically active at least 60 minutes per day on 5 or more days (during the 7 days before the survey)	M>F
Percentage of students who were physically active at least 60 minutes per day on all 7 days (during the 7 days before the survey)	M>F
Percentage of students who did not walk or ride a bicycle to or from school (during the 7 days before the survey)	F>M
Percentage of students who attended physical education classes on three or more days (each week during this school year)	M>F
Percentage of students who attended physical education classes on five or more days (each week during this school year)	M>F
Protective Factors	
Percentage of students who missed classes or school without permission (on one or more days during the 30 days before the survey)	M>F
Percentage of students who reported that most of the students in their school were most of the time or always kind and helpful (during the 30 days before the survey)	F>M
Percentage of students who reported that their parents or guardians most of the time or always really knew what they were doing with their free time (during the 30 days before the survey)	F>M
School Health Education	
Percentage of students who were taught in any of their classes the problems associated with drinking alcohol (during the 12 months before the survey)	M>F

Table 3b. Summary of main Findings-Differences by grade level among total sample of 7th-12th graders

	Intra Middle School (MS) differences			Intra High School (HS) differences			Transition from MS to HS	1 st yr. MS vs. 1 st yr. HS
	8 vs. 7	9 vs. 7	9 vs.8	11 vs. 10	12 vs. 10	12 vs. 11	10 vs. 9	7 vs. 10
Eating Habits								
Percentage of students who were underweight (<-2SD from median for BMI by age and sex)								7>10
Percentage of students who usually drank carbonated soft drinks one or more times per day (during the 30 days before the survey)	7>8							7>10
Percentage of students who took any diet pills, powders, or liquids without a doctor’s advice to lose weight or to keep from gaining weight (during the 30 days before the survey)				10>11				
Percentage of students who usually ate fruit two or more times per day (during the 30 days before the survey)								7>10
Violence								
Percentage of students who were physically attacked (one or more times during the 12 months before the survey)		7>9						7>10
Percentage of students who were hit, slapped, or physically hurt by their teacher on purpose (during the 12 months before the survey)								7>10
Mental Health								
Percentage of students who most of the time or always were so worried about something that they could not sleep at night (during the 12 months before the survey)		9>7	9>8					
Percentage of students who talked most often with their friends about a mental health problem they were having (during the 12 months before the survey, among students who had a mental health problem and talked with someone about it)								10>7
Bullying								
Percentage of students who were bullied most often by being made fun of with sexual jokes, comments, or gestures (among students who were bullied during the 30 days before the survey)				10>11				
Percentage of students who whether alone or as part of a group, bullied others in some other way (during the 30 days before the survey, among students who bullied anyone)		9>7						10>7

Tobacco Use							
Percentage of students who tried a cigarette before age 14 years (for the first time among students who ever smoked cigarettes)		7>9				9>10	7>10
Percentage of students who ever tried cigarettes					12>10		10>7
Percentage of students who currently used any tobacco products other than cigarettes (on at least 1 day during the 30 days before the survey)	8>7	9>7			12>10		10>7
Percentage of students who currently used any tobacco product (on at least 1 day during the 30 days before the survey)	8>7	9>7			12>10	12>11	10>7
Percentage of students who tried narghile or waterpipe for the first time before age 14 (among students who had ever tried a narghile or waterpipe)		7>9	8>9		10>12		7>10
Percentage of students who ever tried a narghile or waterpipe		9>7					10>7
Percentage of students who reported that people smoked in their presence (on one or more days during the 7 days before the survey)		9>7					10>7
Percentage of students who had parents or guardians who used any form of tobacco							10>7
Percentage of students who thought probably or definitely smoking a waterpipe smoking was harmful to their health							10>7
Alcohol Use							
Percentage of students who drank alcohol before age 14 years (for the first time among students who ever had a drink of alcohol other than a few sips)		7>9	8>9		10>12		7>10
Percentage of students who currently drank alcohol (at least one drink of alcohol on at least 1 day during the 30 days before the survey)							10>7
Percentage of students who usually drank two or more drinks per day (on the days they drank alcohol among students who drank alcohol during the 30 days before the survey)		9>7		10>11		12>11	10>7
Percentage of students who usually gave someone else money to buy the alcohol they drank for them (among students who drank alcohol during the 30 days before the survey)		7>9					
Percentage of students who ever drank so much alcohol that they were really drunk (one or more times during their life)							10>7
Percentage of students who probably or definitely would drink if one of their friends offered them a drink of alcohol							10>7

Illegal Drug Use								
Percentage of students who ever used amphetamines or methamphetamines (one or more times during their life)			8>9					
Psychoactive medications								
Percentage of students who use a drug without a doctor's prescription or differently than how a doctor told me to use it during the past 12 months	8>7	9>7						10>7
Percentage of students who used sedatives, tranquilizers, or sleeping pills most often without a doctor's prescription or differently than how the doctor told them to use it (during the 12 months before the survey, among students who used a psychoactive drug)								7>10
Reproductive Health								
Percentage of students who would support being taught about reproductive health in school	8>7	9>7						10>7
Percentage of students who thought education on reproductive health should start before and during the age of puberty								10>7
Percentage of students who ever heard of HIV infection or AIDS	8>7	9>7						10>7
Percentage of students who looked for information about HIV infection or AIDS on the Internet or social media most often (among students who looked for information about HIV infection or AIDS)		9>7						10>7
Percentage of students who ever talked about HIV infection or AIDS with their parents or guardians	8>7	9>7						10>7
Percentage of students who had intimate physical relationships for the first time before age 14 (among students who ever had intimate physical relationships)		9<7	8>9		10>12		9>10	7>10
Percentage of students who had a few of their friends have intimate physical relationships								10>7
Physical Activity								
Percentage of students who were not physically active (for at least 60 minutes per day on any day during the 7 days before the survey)				11>10	12>10			
Percentage of students who were physically active at least 60 minutes per day on all 7 days (during the 7 days before the survey)								7>10
Percentage of students who spent three or more hours per day doing sitting activities (sitting and watching television, playing computer games, talking with friends when not in school or doing homework during a typical or usual day)								10>7

Risk and protective factors								
Percentage of students who reported that their parents or guardians most of the time or always checked to see if their homework was done (during the 30 days before the survey)								7>10
School Health Education								
Percentage of students who were taught in any of their classes the importance of hand washing with soap and water (during the 12 months before the survey)		7>9						7>10
Percentage of students who were taught in any of their classes the problems associated with using drugs (during the 12 months before the survey)								10>7
Percentage of students who were taught in any of their classes how to avoid HIV infection or AIDS (during the 12 months before the survey)	8>7	9>7			12>10			10>7
Percentage of students who were taught in any of their classes how to avoid pregnancy or sexually transmitted infections (during the 12 months before the survey)					12>10			

Table 3c. Summary of main Findings-Differences by school type among total sample of 7th-12th graders

	Public vs. Private
Personal Hygiene/ Oral Health	
Percentage of students who usually cleaned or brushed their teeth (one or more times per day during the 30 days before the survey)	Private>Public
Percentage of students who went to the dentist for a check-up or exam as the main reason (during the 12 months before the survey, among students who visited the dentist)	Public>Private
Injuries	
Percentage of students who were seriously injured (one or more times during the 12 months before the survey)	Private>Public
Percentage of students who never or rarely used a seat belt when riding in a car or other motor vehicle driven by someone else (during the 30 days before the survey, among students who rode in a motor vehicle driven by someone else)	Public>Private
Mental Health	
Percentage of students who did not have any close friends	Public>Private
Bullying	
Percentage of students who bullied others whether alone or as part of a group	Private>Public
Psychoactive medications	
Percentage of students who used sedatives, tranquilizers, or sleeping pills most often without a doctor's prescription or differently than how the doctor told them to use it (during the 12 months before the survey, among students who used a psychoactive drug)	Public >Private
Percentage of students who used some other drug most often without a doctor's prescription or differently than how the doctor told them to use it (during the 12 months before the survey, among students who used a psychoactive drug)	Private >Public
Physical activity	
Percentage of students who were not physically active (for at least 60 minutes per day on any day during the 7 days before the survey)	Public>Private
Percentage of students who were physically active at least 60 minutes per day on 5 or more days (during the 7 days before the survey)	Private>Public

IV. Time trends: Comparing 2011 and 2017 Lebanon Data among 7th-9th graders

In the results section, we summarized the main findings of the 2017 GSHS by sex, grade and school type. In line with one of the aims of GSHS, which is monitoring trends, we begin our discussion section by investigating and understanding any important time trends by comparing 2011 and 2017 GSHS findings. However, 2011 GSHS was only conducted among 7th-9th graders, and so for comparative purposes, Table 4.1 presents the estimates in 2011 and 2017 Lebanon GSHS data only among 7th-9th graders; table first presents the estimates in the total sample of 7th-9th graders, and then stratified by sex (within males, and within females), reporting within each gender, the relative change in estimates between 2011 and 2017. The same is presented by grade level (Table 4.2) and school type (Table 4.3).

Important to note while interpreting the estimates from the two GSHS waves:

- Only estimates of variables measured similarly across the two waves are compared to allow for such comparisons.
- Since 2011 Lebanon GSHS was only conducted among students in grades 7-9, the sample for this analysis was restricted to middle school students.
- These are crude comparisons of prevalence within each stratum (i.e. females only or males only); in other words, they are not age-sex standardized estimates.
- Statistical significance is determined by comparing the 95% CI between the two waves; non-overlapping confidence intervals between 2011 and 2017 data indicates statistical significant difference. These results are **bolded** in the table.
- Only in the case where the relative change between 2011 and 2017 is sizeable but the 95%CI are overlapping, the finding is highlighted. (Please refer to 'interpretation of the findings' under Methods section).

Comparing 2011 and 2017 Lebanon Data in the total sample

In the total sample, while the prevalence estimates among 7th-9th graders were still substantial, significant declines were noted. Among students who reported visiting a dentist during the 12 months preceding the survey, we noted a significant decrease between 2011 and 2017 (-49%) in the percentage of students who went to the dentist for a check-up or exam as the main reason was observed. In addition, a significant drop was also noted in the percentage of students who were physically attacked (-44.2%), who were in a physical fight (-18%), and who were bullied also (28.2%). Similarly, suicide attempt decreased by 26.8%. Lifetime drunkenness also significantly decreased over the past 5 years by 54.9%. A significant decrease between the two waves was also noted in the percentage of students who ever heard of HIV infection or AIDS (-16.7%). While, physical activity decreased between 2011 and 2017, with a significant drop in the percentage of students who were physically active at least 1 hour per day on 5 or more days (-31.6%), the percentage of students who spent three or more hours per day doing sitting activities also decreased by 20.3%.

Comparing 2011 and 2017 Lebanon Data by sex

In males, going to the dentist for a check-up or exam as the main reason significantly decreased between 2011 and 2017 among males (58.6%); there was also a 43% decrease observed in males (slightly overlapping 95%CI). A decrease in the percentage of students who were physically attacked and those who were in a physical fight was observed among both males (-37.6% and -17.5% respectively) and females (-52.8% and 24.5% respectively).

Bullying which was reported more among males than females in 2017 significantly decreased by 25.5% among males over the past 5 years; the decrease was more pronounced in females (-34%, slightly overlapping 95%CI). Also, current drinking and lifetime drunkenness significantly decreased among males between 2011 and 2017 by 47.6% and 49.8% respectively; the relative decrease was 49% and 63% in females, respectively (overlapping 95%CI in both cases). The overall decrease in the percentage of students who most of the time or always felt lonely (22.7%) was mostly driven by the decrease in females (-28%). A drop in physical activity (41.2%) and sitting activities (-25%) was also noted among females between the two waves. In males, the percentage of students who had ever heard of HIV infection/AIDS decreased by 18.5% (15% decrease in females with overlapping 95%CI).

Comparing 2011 and 2017 Lebanon Data by grade level

Among grade 8 students, drinking carbonated drinks at least once per day during the past month decreased by 23.8% between 2011 and 2017 (versus a 7% decline in 7th and 9th graders). However, eating from a fast food restaurant on three or more days per week increased by 40% and physical activity (at least 60 minutes per day on five or more days) decreased (-42.6%) but so did the percent of students who spent three or more hours per day doing sitting activities in grades 7 (-21.9%) and 8 (-21.9%). Among students who visited the dentist, the percent of those who reported that they went for a check-up or exam as the main reason also decreased significantly among students in grade 8 (-59.1%); similar decline was observed among grade 9 students (from 15% to 7%, with overlapping 95%CI).

A significant drop in the percent of students who were physically attacked was observed across all grade levels between the two waves (-35%, -51.5% and -50% among 7th, 8th, and 9th grades respectively). Also, the percent of students who were bullied at least once during the past 30 days decreased by 26.1% among grade 7 students between 2011 and 2017. Alcohol drinking and lifetime drunkenness also significantly decreased among grade 7 students (-58.4% and -64.2% respectively). For bullying and lifetime drunkenness, similar declines observed in 8th and 9th graders (but with overlapping 95%CI). The percent of students who ever heard of HIV infection or AIDS decreased by 26.7% among grades 7 (-26.7%) and 8 (-17.2%) students and a decrease was also observed among grade 8 students who ever talked about HIV infection or AIDS with their parents or guardians (-29.2%).

Comparing 2011 and 2017 Lebanon Data by school type

A significant decrease in the percentage of students attending private schools who reported that they visited the dentist for a check-up or exam as the main reason was observed between 2011 and 2017 (-83.9%). In addition, physical activity (at least 60 minutes per day on five or more days) significantly decreased by 46.1% among students in public schools. The percent of students who were in a physical fight at least once during the past year also decreased in public schools over the past 5 years. (-18%). A drop in the percent of students who were physically attacked and those who were bullied at least once during the past 30 days was observed in both private (-45% and -27.3% respectively) and public schools (-42.2% and -33.6% respectively). In addition, a 31.7% decrease was observed in the percentage of students attending private schools who ever talked about HIV infection or AIDS with their parents or guardians.

Table 4.1. Time trends: Comparing 2011 and 2017 Lebanon Data in the total sample and by gender

	Total			Males			Females		
	GSHS 2011	GSHS 2017	% relative change	GSHS 2011	GSHS 2017	% relative change	GSHS 2011	GSHS 2017	% relative change
	OR (95 % CI)	OR (95 % CI)	GSHS 2017 vs. GSHS 2011	OR (95 % CI)	OR (95 % CI)	GSHS 2017 vs. GSHS 2011	OR (95 % CI)	OR (95 % CI)	GSHS 2017 vs. GSHS 2011
Eating Habits									
Percentage of students who usually ate fruit two or more times per day (during the 30 days before the survey)	50.7 (46.9,62.4)	51.6 (49.1,54)	(+) 1.8	54.6 (50.8,58.4)	52.5 (48.8,56.1)	(-) 3.8	47.2 (42.7,51.7)	50.6 (47.1,54.1)	(+)7.2
Percentage of students who usually ate vegetables three or more times per day (during the 30 days before the survey)	21.0 (18.9,23.1)	18.5 (16.1,21.2)	(-) 11.9	23.4 (21.5,25.4)	21.1 (17.3,25.4)	(-) 9.8	18.8 (15.5,22.7)	16.2 (13.8,18.8)	(-) 13.8
Percentage of students who usually drank carbonated soft drinks one or more times per day (during the 30 days before the survey)	59.9 (54.9,64.8)	52.1 (48.4,55.8)	(-)13.0	65.2 (59.9,70.2)	57.8 (53.8,61.6)	(-) 11.3	55.3 (49.9,60.6)	46.8 (42.8,50.8)	(-) 15.4
Percentage of students who ate food from a fast food restaurant three or more days (during the 7 days before the survey)	18.7 (15.9,21.8)	23.9 (21.6,26.4)	(+) 27.8	22.1 (18.6,26.1)	27.6 (23.9,31.7)	(+) 24.9	15.6 (13.0,18.7)	20.4 (17.7,23.3)	(+)30.8
Percentage of students who were underweight (<-2SD from median for BMI by age and sex)	5.4 (4.2,7.0)	5.9 (4.9,7.0)	(+) 9.3	4.7 (3.1,7.2)	6.6 (5.3,8.1)	(+) 40.4	6.1 (4.1,9.0)	5.2 (3.6,7.3)	(-) 14.8

Percentage of students who were overweight (>+1SD from median for BMI by age and sex)	25.6 (21.0,30.8)	27.3 (24.4,30.4)	(+)6.6	35.2 (27.6,43.5)	30.8 (26.9,34.9)	(-) 12.5	15.9 (12.5,19.9)	23.9 (19.9,28.5)	(+) 50.3
Percentage of students who were obese (>+2SD from median for BMI by age and sex)	7 (5.2,9.3)	7.2 (5.5,9.3)	(+)2.9	9.6 (7.2,12.7)	5.6 (6.0,12.2)	(-) 41.7	4.3 (2.7,6.8)	5.8 (4.3,7.6)	(+) 34.9
Personal and Oral Hygiene									
Percentage of students who never or rarely washed their hands before eating (during the 30 days before the survey)	6 (5.1,7.0)	4.3 (3.2,5.7)	(-)28.3	6.3 (4.8,8.2)	5.2 (3.2,8.2)	(-) 17.5	5.7 (4.6,7.1)	3.5 (2.6,4.7)	(-) 38.6
Percentage of students who never or rarely washed their hands after using the toilet or latrine (during the 30 days before the survey)	2.2 (1.4,3.8)	1.9 (1.2,3.0)	(-)13.6	2.8 (1.4,5.6)	2.5 (1.2,5.1)	(-) 10.7	1.9 (1.2,2.9)	1.3 (0.9,2.0)	- (31.6)
Percentage of students who never or rarely used soap when washing their hands (during the 30 days before the survey)	1.9 (1.4,2.7)	2.6 (2.0,3.2)	(+)36.8	2.8 (1.7,4.5)	3.6 (2.7,4.9)	(+)28.6	1.2 (0.7,2.2)	1.5 (1.0,2.4)	(+) 25
Percentage of students who went to the dentist for a check-up or exam as the main reason (during the 12 months before the survey, among students who visited the dentist)	19.6 (17.1,22.4)	10 (7.1, 13.7)	(-) 49 *	18.1 (15.8,20.7)	7.5 (5.2,10.9)	(-) 58.6*	20.8 (16.5,26.0)	11.9 (8.1,17.3)	(-) 42.8
Violence									
Percentage of students who were physically attacked (one or more times during the 12 months before the survey)	40.5 (37.4,43.5)	22.6 (20.2,25.1)	(-)44.2 *	46.0 (42.0,50.2)	28.7 (25.7,32.0)	(-) 37.6*	35.6 (32.2,39.1)	16.8 (13.8,20.4)	(-) 52.8*
Percentage of students who were in a physical fight (one or more times during the 12 months before the survey)	48.8 (46,51.7)	40 (35.8,44.0)	(-) 18 *	70.2 (67.3,72.9)	57.9 (52.9,62.8)	(-) 17.5*	30.2 (27.0,33.6)	22.8 (20.0,25.9)	(-)24.5 *

Injuries									
Percentage of students who were seriously injured (one or more times during the 12 months before the survey)	39.3 (35.9,42.8)	38.1 (35.0,41.2)	(-)3.1	44.0 (39.6,48.5)	46.7 (41.9,51.6)	(+) 6.1	35.3 (32.3,38.4)	30.0 (27.0,33.2)	(-) 15
Percentage of students who reported that their most serious injury was caused by a motor vehicle accident or being hit by a motor vehicle (among students who were seriously injured during the 12 months before the survey)	12 (8.7,16.5)	12 (8.2, 17.1)	0	12.4 (7.2,20.7)	15.2 (10.3,22.0)	(+) 22.6	11.5 (6.8,19.0)	7.0 (4.7,10.1)	(-) 39.0
Percentage of students who never or rarely used a seat belt when riding in a car or other motor vehicle driven by someone else (during the 30 days before the survey, among students who rode in a motor vehicle driven by someone else)	56.4 (51,61.7)	49.5 (45.5,53.4)	(-) 12.2	60.4 (55.3,65.2)	53.0 (46.8,59.0)	(-) 12.3	53.0 (45.7,60.1)	46.1 (43.0,49.2)	(-) 13
Bullying									
Percentage of students who were bullied (on one or more days during the 30 days before the survey)	24.5 (22.7,26.3)	17.6 (15.0,20.6)	(-) 28.2*	33.3 (29.2,37.7)	24.8 (21.2,28.6)	(-) 25.5 *	16.6 (13.4,20.5)	11.0 (8.5,14.3)	(-) 33.7
Mental Health									
Percentage of students who most of the time or always felt lonely (during the 12 months before the survey)	12.8 (10.9,15)	9.9 (8.4,11.7)	(-) 22.7	8.6 (6.5,11.3)	8.0 (5.9,10.7)	(-) 7	16.4 (14.4,18.7)	11.8 (9.9,13.9)	(-) 28 *
Percentage of students who most of the time or always were so worried about something that they could not sleep at night (during the 12 months before the survey)	11.9 (9.8,14.3)	12.2 (10.9,13.6)	(+)2.5	8.9 (6.6,11.9)	9.8 (7.8,12.4)	(+) 10.1	14.5 (12.0,17.4)	14.4 (12.4,16.7)	(-) 0.7
Percentage of students who seriously considered	15.2 (13.1,17.5)	13.7 (12.0,15.7)	(-) 9.9	12.1 (8.5,17.1)	14.5 (12.5,16.7)	(+) 19.8	17.8 (15.7,20.2)	13.0 (10.7,15.8)	(-) 27

attempting suicide (during the 12 months before the survey)									
Percentage of students who made a plan about how they would attempt suicide (during the 12 months before the survey)	11.6 (9.4,14.3)	8.6 (7.4,9.9)	(-) 25.9	10.2 (7.6,13.4)	8.4 (7.4,9.7)	(-) 17.6	12.9 (9.1,18.0)	8.8 (6.9,11.1)	(-) 31.8
Percentage of students who attempted suicide (one or more times during the 12 months before the survey)	13.8 (11.9,15.9)	10.1 (8.8,11.7)	(-) 26.8 *	13.1 (11.4,15.0)	10.4 (8.5,12.6)	(-) 20.6	14.3 (10.9,18.6)	9.9 (8.4,11.7)	(-) 30.8
Alcohol Use									
Percentage of students who currently drank alcohol (at least one drink of alcohol on at least 1 day during the 30 days before the survey)	27.4 (19.3,37.4)	14.3 (9.8,20.5)	(-) 47.8	35.7 (26.2,46.5)	18.7 (13.1,26.0)	(-) 47.6 *	20.3 (12.7,30.7)	10.4 (6.4,16.2)	(-) 48.8
Percentage of students who ever drank so much alcohol that they were really drunk (one or more times during their life)	20.4 (13.6, 29.5)	9.2 (6.2,13.4)	(-) 54.9 *	25.9 (18.7,34.6)	13.0 (9.1,18.1)	(-) 49.8 *	15.8 (9.0,26.2)	5.8 (3.3,10.1)	(-) 63.3
Illegal drug use									
Percentage of students who ever used marijuana (one or more times during their life)	3.3 (1.8, 5.9)	1.9 (1.3,2.7)	(-)42.4	5.7 (2.8,11.4)	3.0 (2.0,4.4)	(-) 47.4	1.1 (0.5,2.3)	0.8 (0.3,2.1)	(-) 27.3
Reproductive Health									
Percentage of students who ever heard of HIV infection or AIDS	70.7 (66.5,74.7)	58.9 (53.0,64.5)	(-) 16.7 *	70.4 (66.0,74.6)	57.4 (51.3,63.4)	(-) 18.5 *	71.0 (65.9,75.6)	60.1 (53.3,66.6)	(-) 15.4
Percentage of students who ever talked about HIV infection or AIDS with their parents or guardians	28.7 (25.5,32.2)	27.1 (24.1,30.4)	(-)5.6	30.2 (25.3,35.6)	26.8 (23.7,30.0)	(-) 11.3	27.5 (23.9,31.4)	27.4 (23.8,31.3)	(-) 0.4
Physical Activity									
Percentage of students who were physically active at least 60	34.5 (31.5,37.7)	23.6 (20.2,27.4)	(-) 31.6 *	41.5 (36.2,47.1)	31.4 (26.8,36.5)	(-) 24.3	28.4 (25.3,31.8)	16.7 (13.9,19.9)	(-) 41.2*

minutes per day on 5 or more days (during the 7 days before the survey)									
Percentage of students who spent three or more hours per day doing sitting activities	46.2 (41.8,50.6)	36.8 (32.9,40.8)	(-) 20.3 *	45.1 (40.1,50.1)	38.4 (33.5,43.5)	(-) 14.9	47.2 (42.4,51.9)	35.4 (31.0,40.0)	(-) 25 *

"+"

indicates an increase

"-" indicates a decrease

*Bolded * Statistical significance due to non-overlapping confidence intervals between 2011 and 2017 data among the total sample and by sex*

Table 4.2. Time trends: Comparing 2011 and 2017 Lebanon Data in the total sample and by grade level

	Total			7 th grade			8 th grade			9 th grade		
	GSHS 2011	GSHS 2017	% relative change	GSHS 2011	GSHS 2017	% relative change	GSHS 2011	GSHS 2017	% relative change	GSHS 2011	GSHS 2017	% relative change
	OR (95 % CI)	OR (95 % CI)	GSHS 2017 vs. GSHS 2011	OR (95 % CI)	OR (95 % CI)	GSHS 2017 vs. GSHS 2011	OR (95 % CI)	OR (95 % CI)	GSHS 2017 vs. GSHS 2011	OR (95 % CI)	OR (95 % CI)	GSHS 2017 vs. GSHS 2011
Eating Habits												
Percentage of students who usually ate fruit two or more times per day (during the 30 days before the survey)	50.7 (46.9,62.4)	51.6 (49.1,54)	(+) 1.8	53.0 (48.8,57.1)	51.4 (48.4,54.4)	(-) 3	53.0 (48.1,57.8)	54.1 (49.4,58.8)	(+) 2.1	45.0 (38.5,51.6)	48.7 (41.1,56.5)	(+) 8.2
Percentage of students who usually ate vegetables three or more times per day (during the 30 days before the survey)	21.0 (18.9,23.1)	18.5 (16.1,21.2)	(-) 11.9	22.7 (20.3,25.3)	18.9 (16.0,22.1)	(-) 16.7	18.0 (15.6,20.6)	18.5 (15.5,21.8)	(+) 2.8	22.0 (17.8,26.9)	18.1 (13.2,24.5)	(-) 17.7
Percentage of students who usually drank carbonated soft drinks one or more times per day (during the 30 days before the survey)	59.9 (54.9,64.8)	52.1 (48.4,55.8)	(-)13.0	59.4 (55.6,63.1)	54.8 (50.9,58.6)	(-)7.7	61.4 (55.6,67.0)	46.8 (44.0,50.0)	(-)23.8*	58.9 (49.2,68.0)	54.6 (46.7,62.3)	(-)7.3

Percentage of students who ate food from a fast food restaurant three or more days (during the 7 days before the survey)	18.7 (15.9,21.8)	23.9 (21.6,26.4)	(+) 27.8	18.7 (15.5,22.4)	21.7 (18.2,25.8)	(+) 16	17.5 (15.3,19.8)	24.5 (20.9,28.6)	(+) 40*	19.9 (14.1,27.3)	26.2 (23.0,29.7)	(+) 31.7
Percentage of students who were underweight (<-2SD from median for BMI by age and sex)	5.4 (4.2,7.0)	5.9 (4.9,7.0)	(+) 9.3	5.6 (4.0,7.7)	7.7 (5.0,11.7)	(+) 37.5	5.1 (3.3,8.0)	4.0 (2.4,6.8)	(-) 21.6	5.6 (2.0,14.4)	5.8 (3.8,8.7)	(+) 3.6
Percentage of students who were overweight (>+1SD from median for BMI by age and sex)	25.6 (21.0,30.8)	27.3 (24.4,30.4)	(+)6.6	30.6 (24.4,37.5)	32.3 (27.3,37.8)	(+) 5.6	25.1 (21.1,29.6)	25.9 (21.0,31.6)	(+) 3.2	20.5 (10.3,36.7)	22.8 (17.9,28.7)	(+) 11.2
Percentage of students who were obese (>+2SD from median for BMI by age and sex)	7 (5.2,9.3)	7.2 (5.5,9.3)	(+)2.9	7.8 (5.5,11.0)	10.3 (6.8,15.5)	(+) 32.1	6.3 (3.9,9.9)	6.1 (4.2,8.8)	(-) 3.2	6.8 (3.3,13.3)	4.6 (2.6,7.9)	(-) 32.4
Personal and Oral Hygiene												
Percentage of students who never or rarely washed their hands before eating (during the 30 days before the survey)	6 (5.1,7.0)	4.3 (3.2,5.7)	(-)28.3	4.0 (3.0,5.2)	3.2 (2.0,5.0)	(-) 20	5.6 (4.0,7.8)	4.6 (2.9,7.2)	(-) 17.9	8.9 (7.5,10.6)	5.4 (3.4,8.6)	(-) 39.3

Percentage of students who never or rarely washed their hands after using the toilet or latrine (during the 30 days before the survey)	2.2 (1.4,3.8)	1.9 (1.2,3.0)	(-)13.6	2.1 (1.3,3.4)	1.8 (1.1,2.9)	(-) 14.3	1.4 (0.7,2.8)	1.5 (0.8,3.1)	(+) 7.1	3.6 (1.5,8.2)	2.4 (1.0,5.8)	(-) 33.3
Percentage of students who never or rarely used soap when washing their hands (during the 30 days before the survey)	1.9 (1.4,2.7)	2.6 (2.0,3.2)	(+)36.8	2.2 (1.3,3.7)	3.1 (2.0,4.9)	(+) 40.9	1.9 (1.3,2.8)	2.1 (1.1,4.2)	(+) 10.5	1.6 (0.8,3.1)	2.2 (1.7,2.9)	(+) 37.5
Percentage of students who went to the dentist for a check-up or exam as the main reason (during the 12 months before the survey, among students who visited the dentist)	19.6 (17.1,22.4)	10 (7.1,13.7)	(-) 49 *	21.9 (17.2,27.3)	13.5 (9.5,18.9)	(-) 38.4	20.8 (16.8,25.6)	8.5 (5.6,12.7)	(-) 59.1*	15.4 (9.7,23.7)	6.7 (3.9,11.5)	(-) 56.5
Violence												
Percentage of students who were physically attacked (one or more times during the 12 months before the survey)	40.5 (37.4,43.5)	22.6 (20.2,25.1)	(-) 44.2 *	42.9 (36.6,49.3)	27.9 (23.9,32.4)	(-) 35*	42.7 (36.5,49.1)	20.7 (16.4,25.8)	(-) 51.5*	34.8 (28.4,41.8)	17.4 (13.7,21.9)	(-) 50*

Percentage of students who were in a physical fight (one or more times during the 12 months before the survey)	48.8 (46,51.7)	40 (35.8,44.0)	(-) 18 *	50.0 (44.4,55.5)	41.0 (35.8,46.4)	(-)18	47.9 (42.5,53.3)	38.4 (31.8,45.5)	(-) 19.8	48.3 (42.1,54.5)	39.7 (35.5,44.1)	(-) 17.8
Injuries												
Percentage of students who were seriously injured (one or more times during the 12 months before the survey)	39.3 (35.9,42.8)	38.1 (35.0,41.2)	(-)3.1	39.6 (35.9,43.3)	37.3 (32.8,42.2)	(-) 5.8	43.0 (37.8,48.2)	37.2 (33.8,40.7)	(-) 13.5	34.8 (29.2,40.8)	40.1 (34.2,46.3)	(+) 15.2
Percentage of students who reported that their most serious injury was caused by a motor vehicle accident or being hit by a motor vehicle (among students who were seriously injured during the 12 months before the survey)	12 (8.7,16.5)	12 (8.2, 17.1)	0	10.8 (6.4,17.7)	12.7 (7.4,21.0)	(+)17.6	10.5 (6.9,15.8)	13.7 (7.9,22.6)	(+) 30.5	15.6 (6.2,34.2)	9.3 (5.2,16.3)	(-) 40.4
Percentage of students who never or rarely used a seat belt when riding in a car or other motor vehicle driven by someone else (during the 30 days before the	56.4 (51,61.7)	49.5 (45.5,53.4)	(-) 12.2	52.7 (46.9,58.5)	47.5 (43.5,51.5)	(-) 9.9	55.9 (51.3,60.5)	47.3 (42.7,51.9)	(-) 15.4	61.5 (50.5,71.5)	54.4 (45.8,62.8)	(-) 11.5

survey, among students who rode in a motor vehicle driven by someone else)												
Bullying												
Percentage of students who were bullied (on one or more days during the 30 days before the survey)	24.5 (22.7,26.3)	17.6 (15.0,20.6)	(-) 28.2*	26.4 (23.6,29.3)	19.5 (17.2,21.9)	(-) 26.1 *	23.6 (19.3,28.4)	17.2 (13.5,21.7)	(-) 27.1	22.9 (18.8,27.6)	15.6 (11.1,21.5)	(-) 31.9
Mental Health												
Percentage of students who most of the time or always felt lonely (during the 12 months before the survey)	12.8 (10.9,15)	9.9 (8.4,11.7)	(-) 22.7	10.8 (8.8,13.2)	9.1 (7.3,11.1)	(-) 15.7	11.2 (9.5,13.1)	9.3 (7.3,11.8)	(-) 17	17.1 (13.0,22.2)	11.9 (8.9,15.6)	(-) 30.4
Percentage of students who most of the time or always were so worried about something that they could not sleep at night (during the 12 months before the survey)	11.9 (9.8,14.3)	12.2 (10.9,13.6)	(+)2.5	9.3 (7.4,11.5)	10.3 (8.1,13.1)	(+) 10.8	12.5 (10.4,14.9)	10.7 (9.0,12.7)	(-) 14.4	14.6 (9.5,21.7)	16.5 (13.6,19.8)	(+) 13

Percentage of students who seriously considered attempting suicide (during the 12 months before the survey)	15.2 (13.1,17.5)	13.7 (12.0,15.7)	(-) 9.9	13.5 (10.8,16.8)	11.6 (9.0,14.8)	(-) 14.1	14.7 (12.0,18.0)	15.2 (12.1,18.9)	(+) 3.4	17.7 (14.3,21.8)	14.9 (11.8,18.6)	(-) 15.8
Percentage of students who made a plan about how they would attempt suicide (during the 12 months before the survey)	11.6 (9.4,14.3)	8.6 (7.4,9.9)	(-) 25.9	10.0 (7.6,12.9)	8.1 (6.3,10.3)	(-) 19	11.7 (8.9,15.4)	8.1 (6.0,10.9)	(-) 30.8	13.6 (10.6,17.2)	9.8 (7.8,12.2)	(-) 27.9
Percentage of students who attempted suicide (one or more times during the 12 months before the survey)	13.8 (11.9,15.9)	10.1 (8.8,11.7)	(-) 26.8*	13.7 (11.3,16.6)	9.4 (7.3,12.2)	(-) 31.4	12.6 (9.7,16.3)	9.5 (7.4,12.1)	(-) 24.6	15.0 (12.0,18.7)	11.9 (9.7,14.4)	(-) 20.7
Alcohol Use												
Percentage of students who currently drank alcohol (at least one drink of alcohol on at least 1 day during the 30 days before the survey)	27.4 (19.3,37.4)	14.3 (9.8,20.5)	(-) 47.8	26.2 (20.4,33.0)	10.9 (7.3,16.0)	(-)58.4*	29.2 (21.0,39.1)	15.5 (9.4,24.4)	(-) 46.9	26.9 (10.6,53.4)	17.6 (11.5,26.0)	(-) 34.6
Percentage of students who ever drank so much alcohol that they were really drunk (one or	20.4 (13.6,29.5)	9.2 (6.2,13.4)	(-)54.9*	19.3 (14.7,24.9)	6.9 (4.5,10.4)	(-)64.2*	20.9 (14.9,28.5)	9.4 (5.6,15.4)	(-) 55	21.4 (8.0,46.1)	12.3 (7.5,19.4)	(-) 42.5

more times during their life)												
Illegal drug use												
Percentage of students who ever used marijuana (one or more times during their life)	3.3 (1.8,5.9)	1.9 (1.3,2.7)	(-)42.4	2.3 (1.3, 4.2)	2.1 (1.1,3.9)	(-) 8.7	3.2 (2.0 ,4.9)	2.1 (1.3,3.5)	(-) 34.4	4.4 (1.0,17.0)	1.2 (0.5,2.7)	(-) 72.7
Reproductive Health												
Percentage of students who ever heard of HIV infection or AIDS	70.7 (66.5,74.7)	58.9 (53.0,64.5)	(-)16.7 *	52.4 (46.4 ,58.4)	38.4 (34.4,42.6)	(-) 26.7*	79.7 (74.3,84.1)	66.0 (56.7,74.2)	(-) 17.2 *	84.4 (80.6,87.6)	78.2 (67.6,86.1)	(-) 7.3
Percentage of students who ever talked about HIV infection or AIDS with their parents or guardians	28.7 (25.5,32.2)	27.1 (24.1,30.4)	(-)5.6	24.9 (20.1,30.3)	17.9 (15.3,20.9)	(-)28.1	42.5 (37.8,47.4)	30.1 (25.8,34.8)	(-) 29.2*	43.0 (37.7,48.5)	36.4 (29.9,43.4)	(-) 15.3

Physical Activity												
Percentage of students who were physically active at least 60 minutes per day on 5 or more days (during the 7 days before the survey)	34.5 (31.5,37.7)	23.6 (20.2,27.4)	(-)31.6 *	34.6 (31.2,38.3)	26.6 (21.9,32.0)	(-) 23.1	39.7 (34.5,45.0)	22.8 (18.7,27.5)	(-) 42.6*	28.7 (24.6,33.2)	20.5 (14.8,27.6)	(-) 28.6
Percentage of students who spent three or more hours per day doing sitting activities	46.2 (41.8,50.6)	36.8 (32.9,40.8)	(-)20.3 *	42.2 (37.9,46.7)	29.9 (26.2,33.9)	(-) 29.1*	52.3 (47.3,57.2)	37.1 (32.6,41.9)	(-) 29.1*	44.3 (34.7,54.3)	45.7 (39.6,51.8)	(+) 3.2

"+" indicates an increase

"-" indicates a decrease

Bolded * Statistical significance due to non-overlapping confidence intervals between 2011 and 2017 data among the total sample and across the different grade levels

Table 4.3. Time trends: Comparing 2011 and 2017 Lebanon Data in the total sample and by school type

	Total			Public schools			Private schools		
	GSHS 2011	GSHS 2017	% relative change	GSHS 2011	GSHS 2017	% relative change	GSHS 2011	GSHS 2017	% relative change
	OR (95 % CI)	OR (95 % CI)	GSHS 2017 vs. GSHS 2011	OR (95 % CI)	OR (95 % CI)	GSHS 2017 vs. GSHS 2011	OR (95 % CI)	OR (95 % CI)	GSHS 2017 vs. GSHS 2011
Eating Habits									
Percentage of students who usually ate fruit two or more times per day (during the 30 days before the survey)	50.7 (46.9,62.4)	51.6 (49.1,54)	(+) 1.8	53.6 (48.6,58.6)	51.3 (47.4,55.1)	(-) 4.3	48.8 (43.3,54.4)	51.6 (48.5,54.8)	(+) 5.7
Percentage of students who usually ate vegetables three or more times per day (during the 30 days before the survey)	21.0 (18.9,23.1)	18.5 (16.1,21.2)	(-) 11.9	20.2 (16.9,23.9)	18.1 (15.2,21.5)	(-) 10.4	21.4 (18.7,24.5)	19.0 (16.1,22.2)	(-) 11.2
Percentage of students who usually drank carbonated soft drinks one or more times per day (during the 30 days before the survey)	59.9 (54.9,64.8)	52.1 (48.4,55.8)	(-)13.0	64.9 (61.3,68.3)	56.4 (50.6,62.0)	(-)13.1	57.0 (48.5,65.1)	50.0 (42.8,57.1)	(-)12.3
Percentage of students who ate food from a fast food restaurant three or more days (during the 7 days before the survey)	18.7 (15.9,21.8)	23.9 (21.6,26.4)	(+) 27.8	19.1 (14.9,24.3)	25.0 (21.7,28.5)	(+) 30.9	18.4 (14.6,23.0)	23.7 (20.2,27.6)	(+) 28.8
Percentage of students who were underweight (<-2SD from median for BMI by age and sex)	5.4 (4.2,7.0)	5.9 (4.9,7.0)	(+) 9.3	5.8 (3.5,9.5)	5.1 (3.1,8.2)	(-) 12.1	5.2 (3.7,7.3)	6.1 (4.1,9.0)	(+) 17.3
Percentage of students who were overweight (>+1SD from median for BMI by age and sex)	25.6 (21.0,30.8)	27.3 (24.4,30.4)	(+)6.6	26.9 (23.5,30.7)	31.0 (27.6,34.6)	(+) 15.2	24.9 (18.0,33.4)	24.6 (20.4,29.4)	(-) 1.2

Percentage of students who were obese (>+2SD from median for BMI by age and sex)	7 (5.2,9.3)	7.2 (5.5,9.3)	(+)2.9	8.7 (6.0,12.3)	9.5 (7.4,12.1)	(+) 9.2	6.1 (3.9,9.6)	5.3 (3.4,8.4)	(-) 13.1
Personal and Oral Hygiene									
Percentage of students who never or rarely washed their hands before eating (during the 30 days before the survey)	6 (5.1,7.0)	4.3 (3.2,5.7)	(-)28.3	6.8 (4.9,9.4)	4.4 (3.5,5.6)	(-) 35.3	5.5 (4.5,6.6)	4.1 (2.7,6.2)	(-) 25.5
Percentage of students who never or rarely washed their hands after using the toilet or latrine (during the 30 days before the survey)	2.2 (1.4,3.8)	1.9 (1.2,3.0)	(-)13.6	2.3 (1.4,4.0)	1.7 (1.0,3.1)	(-) 26.1	2.3 (1.0,5.1)	1.9 (1.1,3.4)	(-) 17.4
Percentage of students who never or rarely used soap when washing their hands (during the 30 days before the survey)	1.9 (1.4,2.7)	2.6 (2.0,3.2)	(+)36.8	2.8 (1.8,4.3)	3.5 (2.3,5.4)	(+) 25	1.5 (0.8,2.7)	2.0 (1.2,3.2)	(+) 33.3
Percentage of students who went to the dentist for a check-up or exam as the main reason (during the 12 months before the survey, among students who visited the dentist)	19.6 (17.1,22.4)	10 (7.1,13.7)	(-) 49 *	15.2 (12.7,18.2)	24.3 (16.8,33.7)	(+) 59.9	22.3 (18.3,26.8)	3.6 (1.8,6.9)	(-) 83.9*
Violence									
Percentage of students who were physically attacked (one or more times during the 12 months before the survey)	40.5 (37.4,43.5)	22.6 (20.2,25.1)	(-)44.2 *	39.8 (34.5,45.4)	23.0 (19.8,26.5)	(-) 42.2 *	40.9 (36.9,45.0)	22.5 (18.5,27.0)	(-) 45*
Percentage of students who were in a physical fight	48.8 (46,51.7)	40	(-) 18 *	44.4 (39.7,49.2)	34.3 (29.9,39.0)	(-) 22.7*	51.5 (47.7,55.3)	42.5 (37.1,48.0)	(-) 17.5

(one or more times during the 12 months before the survey)		(35.8,44.0)							
Injuries									
Percentage of students who were seriously injured (one or more times during the 12 months before the survey)	39.3 (35.9,42.8)	38.1 (35.0,41.2)	(-)3.1	38.8 (34.4,43.4)	34.1 (30.8,37.6)	(-) 12.1	39.6 (34.4,45.1)	40.2 (36.1,44.5)	(+) 1.5
Percentage of students who reported that their most serious injury was caused by a motor vehicle accident or being hit by a motor vehicle (among students who were seriously injured during the 12 months before the survey)	12 (8.7,16.5)	12 (8.2, 17.1)	0	10.5 (5.7,18.5)	10.9 (6.3,18.2)	(+) 3.8	13.0 (8.5,19.4)	12.4 (8.6,17.6)	(-) 4.6
Percentage of students who never or rarely used a seat belt when riding in a car or other motor vehicle driven by someone else (during the 30 days before the survey, among students who rode in a motor vehicle driven by someone else)	56.4 (51,61.7)	49.5 (45.5,53.4)	(-) 12.2	62.5 (57.0,67.7)	57.4 (53.2,61.5)	(-)8.2	52.8 (44.0,61.4)	45.9 (41.5,50.4)	(-) 13.1
Bullying									
Percentage of students who were bullied (on one or more days during the 30 days before the survey)	24.5 (22.7,26.3)	17.6 (15.0,20.6)	(-) 28.2*	22.6 (19.5,26.0)	15.0 (12.4,18.0)	(-) 33.6 *	25.6 (23.3,27.9)	18.6 (14.9,22.9)	(-) 27.3*

Mental Health									
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Percentage of students who most of the time or always felt lonely (during the 12 months before the survey)	12.8 (10.9,15)	9.9 (8.4,11.7)	(-) 22.7	15.2 (12.0,19.0)	11.8 (9.5,14.6)	(-) 22.4	11.3 (8.8,14.4)	9.1 (7.1,11.5)	(-) 19.5
Percentage of students who most of the time or always were so worried about something that they could not sleep at night (during the 12 months before the survey)	11.9 (9.8,14.3)	12.2 (10.9,13.6)	(+)2.5	15.2 (11.9,19.2)	13.9 (10.6,18.1)	(-) 8.6	9.8 (7.0,13.6)	11.3 (9.6,13.2)	(+) 15.3
Percentage of students who seriously considered attempting suicide (during the 12 months before the survey)	15.2 (13.1,17.5)	13.7 (12.0,15.7)	(-) 9.9	16.7 (13.7,20.2)	14.4 (12.5,16.6)	(-) 13.8	14.3 (11.3,17.8)	13.3 (11.3,15.6)	(-) 7
Percentage of students who made a plan about how they would attempt suicide (during the 12 months before the survey)	11.6 (9.4,14.3)	8.6 (7.4,9.9)	(-) 25.9	13.9 (11.0,17.6)	10.2 (8.8,11.8)	(-) 26.6	10.2 (7.1,14.6)	7.7 (6.2,9.5)	(-) 24.5
Percentage of students who attempted suicide (one or more times during the 12 months before the survey)	13.8 (11.9,15.9)	10.1 (8.8,11.7)	(-)26.8 *	16.3 (12.9,20.4)	11.1 (8.6,14.4)	(-) 31.9	12.2 (9.9,15.0)	9.5 (8.2,11.0)	(-) 22.1
Alcohol Use									
Percentage of students who currently drank alcohol (at least one drink of alcohol on at least 1 day during the 30 days before the survey)	27.4 (19.3,37.4)	14.3 (9.8,20.5)	(-) 47.8	11.8 (7.7,17.8)	10.6 (5.5,19.5)	(-) 10.2	37.1 (23.2,53.5)	16.2 (10.4,24.2)	(-) 56.3
Percentage of students who ever drank so much alcohol that they were really drunk (one or more times during their life)	20.4 (13.6, 29.5)	9.2 (6.2,13.4)	(-)54.9 *	10.5 (7.5,14.6)	7.5 (4.1,13.2)	(-) 28.6	26.7 (15.3, 42.2)	10.1 (6.5,15.3)	(-) 62.2
Illegal drug use									

Percentage of students who ever used marijuana (one or more times during their life)	3.3 (1.8,5.9)	1.9 (1.3,2.7)	(-)42.4	2.8 (1.5,5.0)	2.5 (1.3,5.1)	(-) 10.7	3.6 (1.4,8.5)	1.5 (0.9,2.4)	(-) 58.3
Reproductive Health									
Percentage of students who ever heard of HIV infection or AIDS	70.7 (66.5,74.7)	58.9 (53.0,64.5)	(-)16.7 *	68.1 (62.9,72.8)	60.0 (52.3,66.6)	(-) 11.9	72.4 (65.5,78.3)	59.4 (50.3,67.9)	(-) 18
Percentage of students who ever talked about HIV infection or AIDS with their parents or guardians	28.7 (25.5,32.2)	27.1 (24.1,30.4)	(-)5.6	33.0 (29.9,36.2)	29.5 (25.5,33.9)	(-) 10.6	37.9 (32.3,43.7)	25.9 (21.6,30.8)	(-) 31.7 *
Physical Activity									
Percentage of students who were physically active at least 60 minutes per day on 5 or more days (during the 7 days before the survey)	34.5 (31.5,37.7)	23.6 (20.2,27.4)	(-)31.6 *	36.9 (33.1,40.8)	19.9 (16.9,23.3)	(-) 46.1 *	33.1 (28.6,37.9)	25.4 (20.7,30.7)	(-) 23.3
Percentage of students who spent three or more hours per day doing sitting activities	46.2 (41.8,50.6)	36.8 (32.9,40.8)	(-)20.3 *	42.2 (37.0,47.6)	33.7 (29.9,37.8)	(-) 20.1	48.6 (41.7,55.6)	38.6 (34.0,43.4)	(-) 20.6

"+" indicates an increase

"-" indicates a decrease

*Bolded * Statistical significance due to non-overlapping confidence intervals between 2011 and 2017 data among the total sample and by school type*

V. Comparison of GSHS findings: Lebanon and other Eastern Mediterranean Region Countries among 13-17 year olds only

Table 5 compares GSHS 2017 Lebanon data to other four countries from the Eastern Mediterranean Region (Oman, Bahrain, Kuwait, and Morocco) who have completed the GSHS between 2015 and 2017 and have publically accessible fact sheets.

For the purpose of this analysis, the sample was restricted to students aged 13-17 years old. Statistical significance was determined by comparing confidence intervals (CIs) between two groups. Non-overlapping CIs indicates statistical significance. These findings are **bolded** in the table.

The prevalence of students who were overweight was higher in Bahrain (38.6%) and Kuwait (48.2%) as compared to Lebanon (24.6%). These differences held true among both males and females. In addition, as compared to female students in Oman, females in Lebanon were less likely to be overweight (19.7% vs. 29.8%). However, there were significantly more students who were overweight in Lebanon than in Morocco (13.9% vs. 24.6%), higher in males (30.2% vs. 10.7%). With regards to obesity levels, the prevalence higher among students in Oman (12.5%), Bahrain (17.9%) and Kuwait (23.1%) as compared to Lebanon (5.9%). Significantly higher percentages were observed among females in all three countries and among males in Kuwait and Bahrain as compared to Lebanon. However, males in Morocco were less likely to be obese as compared to males in Lebanon (2.7% vs. 7.6%).

Comparing dietary habits, drinking carbonated soft drinks at least once per day during the past 30 days was higher among males and females in Lebanon as compared to males and females in Bahrain and Morocco. Males in Bahrain were more likely than males in Lebanon to report physical activity at least 60 minutes seven days per week (26% vs. 18.6%). Females in Bahrain (12.6%) and Kuwait (13.1%) were also more likely than females in Lebanon (8.7%) to report physical activity. However, in Lebanon, there were significantly less male and female students who reported spending three or more hours per day doing sitting activities as compared to males and females in Bahrain and Kuwait (but more than females in Oman and Morocco).

Substance use estimates were also compared. The percent of male students who ever used marijuana in Lebanon was lower than males in Morocco (8.6% vs. 3.6%). However, the percent of students who currently used any tobacco products was higher in Lebanon (36.6%) as compared to Oman (8.4%), Bahrain (22%), Kuwait (27.6%) and Morocco (12.5%).

In addition, bullying at least once during the past 30 days was reported less among both males and females in Lebanon as compared to all other Arab countries. Males in Lebanon were also less likely than those in Oman, Kuwait and Morocco to report not having any close friends. The percentage of students who attempted suicide at least once during the past year was higher in Bahrain (13.4%), Kuwait (16.9%) and Morocco (13.9%) as compared to Lebanon (9.8%).

Protective factors were also compared. The percent of students who reported that their parents knew what they were doing with their free time most of the time or always was higher among males in Bahrain than males in Lebanon (53.3% vs. 40.2%) but lower among both males and females in Morocco than males and females in Lebanon. Still males in Lebanon (46.3%) were more likely than males in Oman (36.6%), Kuwait (34.3%) and Morocco (21.8%) to report that their parents most of the time or always understand their problems or worries. Similarly, females in Lebanon (48.1%) were also more likely than females in Kuwait (32.2%) and Morocco (28.2%) to that their parents most of the time or always understand their problems or worries.

Table 5. Comparison between Lebanon and other Eastern Mediterranean Region Countries who have completed the GSHS between 2015 and 2017 and have fact sheets on the web
<http://www.who.int/ncds/surveillance/gshs/factsheets/en/>

Among students aged 13-17 yrs.	Lebanon	Oman	Bahrain	Kuwait	Morocco
	2017	2015	2016	2015	2016
% overweight					
Total	24.6(22.3-27.1)	29.0 (26.7-31.3)	38.6 (37.0-40.3)*	48.2(43.5-53.0)*	13.9(11.1-17.2)*
Males	30.2(26.6-34.0)	28.1 (24.8-31.6)	39.3 (37.1-41.4)*	52.9(48.4-57.3)*	10.7(8.2-13.8)*
Females	19.7(17.4-22.2)	29.8 (26.8-33.0)*	38.0 (35.9-40.1)*	43.7(38.5-49.1)*	17.8(14.3-21.8)
% obese					
Total	5.9(4.6-7.7)	12.5 (11.2-14.0)*	17.9 (16.6-19.3)*	23.1(18.2-28.8)*	3.0(2.2-4.0)*
Males	7.6(5.3-10.9)	11.6 (9.9-13.7)	18.6 (16.5-20.9)*	28.2(22.4-34.8)*	2.7(1.8-4.1)*
Females	4.4(3.3-5.9)	13.4 (11.7-15.3)*	17.1 (15.9-18.4)*	18.1(14.4-22.5)*	3.3(2.4-4.6)
% drank soft drinks 1+ in past 30 days					
Total	47.7(43.9-51.6)	42.7 (38.4-47.0)	35.0(31.5-38.7)*	53.9(47.4-60.4)	33.0(29.9-36.3)*
Males	54.4(49.5-59.2)	48.6 (43.6-53.6)	40.8(37.7-44.0)*	56.4(46.6-65.7)	32.8(29.4-36.5)*
Females	41.9(38.0-45.9)	37.1 (32.5-42.0)	28.8 (25.3-32.5)*	51.5(44.1-58.9)	32.9(29.5-36.5)*
% ever used marijuana					
Total	2.1(1.5-3.2)	2.5 (1.5-4.3)	2.1(1.4-3.2)	na	5.8(4.5-7.3)*
Males	3.6(2.4-5.3)	4.5 (2.8-7.2)	3.8(2.8-5.0)	na	8.6(6.7-10.9)*
Females	0.9(0.5-1.7)	0.6 (0.3-1.4)	0.3(0.2-0.7)	na	2.4(1.6-3.4)
% who did not have any close friends					
Total	4.2(3.7-4.8)	7.3 (6.3-8.4)*	5.6 (4.8-6.6)	7.5(6.0-9.4)*	10.1(9.1-11.3)*
Males	3.4(2.4-4.8)	7.6 (6.4-9.1)*	5.0.(4.0-6.3)	7.4(5.6-9.7)*	9.1(7.5-10.9)*
Females	4.9(4.0-5.9)	6.9 (5.5-8.5)	6.2(5.1-7.6)	7.6(5.2-10.8)	11.2(9.8-12.8)*
% attempted suicide 1+ in past yr.					
Total	9.8(8.6-11.2)	na	13.4 (11.9-15.1)*	16.9(14.5-19.6)*	13.9(12.3-15.6)*
Males	9.2(7.3-11.6)	na	12.9(10.8-15.4)	15.1(10.2-21.7)	13.6(11.7-15.9)*
Females	10.3(8.8-12.1)	na	14.0(11.9-16.3)	18.1(13.6-23.7)*	13.8(12.0-15.9)
% physically active 60'+ everyday past week					
Total	13.2(11.5-15.2)	11.7 (9.9-13.7)	19.5(17.0-22.3)*	15.6(13.3-18.2)	11.0(9.7-12.4)
Males	18.6(15.4-22.2)	15.4 (12.9-18.3)	26.0(24.1-27.9)*	18.1(15.2-21.3)	13.5(11.4-15.8)
Females	8.7(7.3-10.4)	8.3 (6.8-10.1)	12.6(11.2-14.1)*	13.1(11.0-15.4)*	8.2(7.1-9.4)
% spent 3hrs+ sedentary					
Total	47.6(44.1-51.1)	39.7 (37.1-42.3)*	60.9 (56.6-65.0)*	65.0(60.8-76.7)*	32.9(29.0-37.0)*
Males	45.8(42.4-49.1)	40.7(36.9-44.7)	52.6(49.4-55.9)*	63.7(58.3-68.8)*	33.7(29.6-38.0)*
Females	49.2(44.7-53.6)	38.7(33.8-43.9)*	69.8(66.1-73.3)*	66.2(60.1-71.8)*	31.8(27.6-36.5)*
% whose parents knew what they were doing with their free time most of the time/always					
Total	48.1(45.4-50.7)	42.9(40.2-49.9)	54.3(51.8-56.7)*	42.4(38.1-46.8)	35.7(33.9-37.6)*
Males	40.2(38.2-42.3)	37.3(34.7-40.0)	52.3(49.2-55.4)*	42.4(36.4-48.5)	31.4(29.2-33.6)*
Females	54.7 (50.6-58.7)	48.1(44.8-51.3)	56.4(53.5-59.2)	42.5(36.9-48.4)*	40.8(38.3-43.5)*
% whose parents understand their problems or worries most of the time/always					
Total	47.3(44.6-49.9)	41.1 (38.1-44.1)*	51.0(49.3-52.7)	33.2(30.1-36.4)*	24.6(23.3-26.0)*
Males	46.3(42.5-50.2)	36.6(32.8-40.5)*	50.1(47.9-52.4)	34.3(30.7-38.2)*	21.8(19.5-24.3)*
Females	48.1(44.3-51.8)	45.2(41.6-48.9)	52.0(49.7-54.3)	32.2(27.0-37.7)*	28.2(26.6-29.8)*
% who currently used any tobacco products					
Total	36.6(33.1-40.2)	8.4 (6.4-11.1)*	22.0(17.5-27.3)*	27.6(20.6-35.8)*	12.5(11.2-13.9)*
Males	40.9(35.8-46.1)	14.0 (11.3-17.2)*	32.0(27.6-36.7)	35.8(27.5-45.2)	18.1(16.2-20.1)*
Females	32.9(29.9-36.0)	3.0(2.0-4.5)*	11.2(9.2-13.5)*	19.1(12.8-27.3)*	5.6(4.4-7.3)*
% bullied 1+ days past 30 days					
Total	16.6(14.7-18.8)	42.8 (41.2-44.5)*	28.2(25.7-30.9)*	30.6(26.6-34.9)*	38.4(36.4-40.4)*
Males	21.0(18.6-23.6)	44.7 (41.6-47.8)*	33.9(31.7-36.2)*	33.2(28.9-37.9)*	42.5(40.6-44.5)*
Females	12.9(10.5-15.6)	41.0(38.5-43.5)*	22.1(20.1-24.2)*	27.8(22.3-34.0)*	33.4(30.4-36.5)*

na: data not available

*Statistical significance due to non-overlapping confidence intervals between different Arab countries and Lebanon among the total sample and between males/females

Part IV: Discussion and evidence-informed recommendations

Adolescence is recognized as a critical period in life characterized by pubertal maturation [Patton et al., 2016]. The World Health Organization (WHO) defines it as the period between ages 10 and 19 years. This is the phase when individuals acquire the social, economic, cognitive and other important resources that needed for achieving human potential. It is often perceived as the healthiest time of life. Nonetheless, it is this phase also during which young individuals may develop physical and mental health issues due to emerging interests in sexual exploration or activity, or experiences such bullying and violence, or emergence of general unhealthy lifestyles.

To help us draw a clearer picture of adolescents wellbeing based on GSHS 2017, we attempted to answer for main epidemiological questions when attempting to understand and address a public health issue. Under Results (*Part III, II. Main findings in total sample, and by sex, grade, and school type*), we addressed these two questions: (1) “how much” – or what is the current extent of the surveyed behaviors based on GSHS 2017 findings; and (2) “where” – which typically explores the public health issue by person, place time, and here we checked for differences by students’ characteristics (sex/grade level/school), time (by comparing 2011 and 2017 GSHS data among 7th-9th graders in section IV), and place (by comparing data from Lebanon 2017 GSHS to that of other countries in the EMR where GSHS was also recently conducted in section V).

With the above in mind, we suggest below some evidence-based recommendations to address one additional question about “what can be done” at the research, policy and/or practice levels’, depending on the finding. This section will comment on the prevalence of specific adolescent behaviors based on the results presented in the 2017 GSHS report, and make specific evidence-based recommendations. Some of the recommendations made in the 2011 report continue to apply, and so are restated below.

I. Weight, Dietary Behaviors and Physical Activity

Globally, the prevalence of childhood obesity (2 to 19 years) has been on the rise at a disturbing pace with current rates almost ten times higher than those in the 1970s (Branca, Nikogosian, & Lobstein, 2007). The rise has been occurring at a faster pace in economically developed countries and in urbanized populations (1), including Arab countries within the Middle East region. In a recent review (Musaiger, 2011), the number of overweight and obese school children was reported to have reached alarming levels in most Eastern Mediterranean (EMR) countries, reaching an unprecedented number of 41.7 million in 2010. Childhood overweight and obesity rates in the EMR have been estimated to be second to the U.S., exceeding that of European countries (Kosti & Panagiotakos, 2006). Overweight estimates (BMI \geq 85th percentile) (1) in various countries vary as follows among school children aged 2-18 years: 11%-28.8% in the Kingdom of Saudi Arabia (KSA) (Al-Dossary, Sarkis, Hassan, Ezz El Regal, & Fouda, 2010; Amin, Al-Sultan, & Ali, 2008; El Mouzan et al., 2010), 12.3% - 34.5% in United Arab Emirates (UAE) (Malik & Bakir, 2007; Zaal, Brebner, Musaiger, & Souza, 2011), 20.2% - 31.8% in Kuwait (Al-Isa, 2004; Al-Isa, Campbell, & Desapriya, 2010) and 15.7% -29.4% in Bahrain (Bader, Musaiger, Al-Roomi, & D'Souza, 2008; Gharib & Rasheed, 2008). The prevalence of obesity (BMI \geq 95th percentile) (1) among school-children also varied between 5% and 26.4% in KSA (5-7, 13), 3% to 21.6% in UAE (8, 9), 13.1% to 16.8% in Kuwait (10-12), and 12.7% to 19.4% in Bahrain (13, 14).

In Lebanon, and according to a monitoring study reporting on overweight and obesity trends in Lebanon in 1997 and 2009, a rapid increase in BMI was also seen among 6-19 year olds (L. Nasreddine et al., 2012). This study also showed that childhood obesity which continues through adolescence occurs before age 11 (L. Nasreddine et al., 2012). Coupled with the low physical activity levels reported by children (Fazah et al., 2010), these risk factors may work together to explain the increased prevalence of overweight and obesity in Lebanon (L. Nasreddine et al., 2012; Salameh & Chacar, 2011).

In this survey, about 1 in 3 students were overweight or obese. Half the sample was not eating the recommended fruit intake, and much less were consuming recommended levels of vegetables (such as salads, spinach, eggplant, tomatoes and cucumbers). Substantial proportions were drinking non-diet carbonated soft drinks like Pepsi, Coca cola, Fanta and Seven-Up once or more per day, or eating 3 or more times per week at a fast food restaurant foods like hamburger, shawarma, falafel, pizza, or manakish. These behaviors were generally more common among male students, although the latter were more physically active than females. Still, sedentary behaviors were prevalent, with about half the sample spending three or more hours doing sitting activities (such as sitting and watching television, playing computer games, talking with friends when not in school or doing homework during a typical or usual day).

No major changes when comparing 2011 and 2017 GSHS data (among 7th-9th graders only), except that the percentage who are physically active daily decreased (-30%), but so did the percentage of students reporting a sedentary lifestyle (-20%). Comparing 13-17 years old in Lebanon versus other neighboring countries, we see that being overweight was more common in countries like Oman, Bahrain and Kuwait (in males and females).

The lack of healthy diet (too few fruits and vegetables, having daily carbonated drinks, frequent consumption of fast food), coupled with little or no physical activity perhaps explains the levels of overweight and obesity. A school-based intervention on public and private schools' students from Lebanon has concluded that culturally appropriate, theory-based interventions that used a whole school approach and included interactive learning can enhance students' nutritional knowledge and self-efficacy, as well as decrease their purchase and consumption of high energy dense snacks and beverages (C. Habib-Mourad et al., 2014; Lock, Pomerleau, Knai, & McKee, 2004). The educational material must be informative but also fun, interactive, and students must relate to it. Integrating any nutritional program into the school curriculum would also allow for longer periods of learning, observation and re-assessment, and may accomplish more positive behavioral changes, while allowing schools to develop ownership of the program (Carla Habib-Mourad & Ghandour, 2015).

Recommendations for practice:

- Health education in schools should continue to promote healthy nutrition. The format of this education should be interactive, fun and focused on skill building and changing attitudes and improving self-efficacy.
- Schools should strive to ensure the availability of healthy and nutritious foods, including fruits and vegetables in their cafeterias or snack shops (canteens).
- Parents must be engaged to help create a supportive home environment so that healthier nutritional choices and dietary behaviors are made as a family.
- Engage the local community and municipalities to offer more green spaces that would allow adolescents to become more physically active, beyond the PE sessions at school (which were also infrequent and perhaps not as engaging or mandatory as they should be).

- The MEHE should attempt to increase the hours of physical activity in schools, and PE should be provided by qualified instructors. Physical activity should become a habit, and students must understand that PE has social, psychological and physical benefits. PE sessions in schools should be fun and varied.

Recommendations for future GSHS or other surveillance research:

- Assess skipping meals, particularly breakfast, which is a major risk factor for becoming overweight or obese as they grow older (Lara Nasreddine et al., 2012). Having breakfast on a daily basis has been consistently shown to decrease overweight and obesity among children and adolescents (Szajewska & Rusczyński, 2010).
- Additional questions to assess the extent of enabling environment including provision of healthy foods/snacks in schools' canteens, would also be informative and important to collect for surveillance of school-based health initiatives (Story, Nannery, & Schwartz, 2009).
- The contextual relevance of some questions may need to be re-evaluated. For example, the question inquiring about "walking or riding a bike to/from school" may not be a relevant or accurate indicator of physical activity particularly that it does not reflect neither the time nor distance walked.

II. Hygiene related behaviors

Handwashing with soap, especially after using the toilet and before eating can significantly reduce the incidence gastrointestinal illnesses including diarrhea (Ejemot, Ehiri, Meremikwu, & Critchley, 2009), as well as respiratory tract infections, and absences from school (Willmott et al., 2015). In the current 2017 GSHS, the prevalence of good hygienic behavior is relatively high, despite some setbacks since 2011 among 7th-9th graders. While very few students report never or rarely washing their hands before eating or using the toilet, and the vast majority report using soap, nonetheless, within closed school environments where most surfaces are shared, even a small percentage of 2%-5% can be detrimental for the transmission of viruses using the fecal-oral route. Handwashing with soap can be considered as a "do-it-yourself" vaccine if done correctly using five key steps (Wet, Lather, Scrub, Rinse, Dry) to avoid getting sick, and prevent the spread of germs to others (CDC, 2018).

Recommendations for practice:

- Reminder (booster) health education sessions on the importance of proper hand washing, with soap, especially after using the toilets, can be useful to avoid the transmission of infectious diseases.
- Nudge-based interventions may be useful in improving handwashing with soap among school-aged children. Nudges are environmental cues engaging unconscious decision-making processes to prompt behavior change (Dreibelbis, Kroeger, Hossain, Venkatesh, & Ram, 2016).

With respect to dental health, the majority of students reported usually cleaning or brushing their teeth one or more times per day during the past 30 days (only 9% don't), with females more likely to do so as compared to males (6% of the females don't versus 12% of the males). However, quite worrisome is the low of students who had gone for a check-up or an exam as the main reason, among those who visited the dentist in the past 12 months.

Dental caries is a major oral health problem in most developed countries, and considering that 1 in 2 of the students surveyed drank sugary carbonated drinks, and 1 in 3 used any tobacco product, oral health warrants closer attention among school children despite the high percentage of students who reported brushing their teeth.

Schools are an important component of a national oral health program. Schools can both provide education as early as possible in the curriculum, as well as provide a supportive environment by ensuring that safe water and sanitation facilities essential for oral health are available.

Recommendations for practice:

- The MEHE should continue to offer free dental exams to school children. Education about teeth brushing should be enhanced to increase the proportion of children brushing at least twice per day.
- Private schools could also consider offering free dental check-ups, which can be incorporated as part of a health package on World Health Day, for example.
- Nudge-based interventions may be useful in improving frequency and technique of teeth brushing.

III. Violence, Bullying and Injuries

Violence in schools is a common problem that necessitates greater attention from educators, policy makers, and researchers (Eisenbraun, 2007). Bullying, per se, is also an international problem (Carney & Merrell, 2001), and several studies have discussed the deleterious consequences of bullying on mental health (Catone et al., 2015; E. J. Costello, 2014; Takizawa, Maughan, & Arseneault, 2014), as well as prevention strategies (Carney & Merrell, 2001; Whitted & Dupper, 2005).

In Lebanon, in a recent population-based study on children and adolescents, 6.9% of those aged 11-18 years old were frequently involved in bullying as both bullies and victims, 14.4% as bullies only, and 8.5% as victims only, so a third of the sample was frequently involved in at least one form of bullying as either perpetrators, victims or both (Halabi, Ghandour, Dib, Zeinoun, & Maalouf, 2017). The study highlighted the complexity of the association between psychiatric disorders and bullying in settings like Lebanon (Halabi et al., 2017).

The prevalence of violence was high in the 2017 Lebanon GSHS, whether it is through being physically attacked, physically bullied, or "hit, slapped, or physically hurt by their teacher on purpose" (which was reported by 1 in 10 students when it should be not tolerated at all). Injuries were also prevalent (third seriously injured once or more during the past 12 months).

Recommendations for practice:

- The results reported here suggest the **vital** need to address violence and bullying at an early age – before 7th grade since 20% of the 7th graders had already been bullied, 10% had bullied others. Such education can be integrated into lesson plans and classroom activities, allowing students to themselves think of ways to prevent bullying in school.
- Providing skills to teachers in problem solving and non-violent disciplining is also critical, as students should not be physically attacked by their teachers (10% of the students). Hitting and slapping by teachers should not be tolerated and should be grounds for expulsion.

- Children should be supervised during recess; locations in schools without adult supervision should be limited; school officials must take quick and appropriate actions against perpetrators, and victims should be offered the necessary attentiveness and care.
- Bullying prevention strategies should be practical and multilevel involving students, teachers, parents and other stakeholders, and must target individuals, classrooms, and schools (Carney & Merrell, 2001; Whitted & Dupper, 2005)

Recommendations for research:

- Qualitative research should be considered to understand the problem of bullying more in depth from both the perspective of those who bully and who are bullied.

IV. Substance use

Alcohol, tobacco and other drug use continue to pose serious public health concerns among youth, and they all warrant further monitoring and intervention (Patton et al., 2016). Tobacco consumption by youth has reached pandemic levels (Page & Danielson, 2011). A relatively newer and growing public health problem is the nonmedical use of psychoactive prescription drugs (Martins & Ghandour, 2017). Alcohol drinking among youth in Lebanon is particularly worrisome considering the marked increase in young drinkers between 2005 and 2011 (L. Ghandour, Afifi, Fares, El Salibi, & Rady, 2015), in the absence of any harm reduction policies to regulate alcohol advertising, affordability and availability (L. Ghandour et al., 2016). Early onset alcohol drinking is a public health concern because it has been consistently linked with alcohol-related harms including road traffic crashes (WHO, 2016), physical fights (Hingson, Heeren, & Zakocs, 2001) among other risky behaviors, in addition to developing alcohol and other substance use disorders later in adulthood (Grant & Dawson, 1997). Nonmedical prescription drug use, generally defined as use without a prescription or use for reasons other than what the medication is intended for, is a global concern, primarily driven by the high and rising phenomenon of nonmedical use of prescription opioids in young populations (Martins & Ghandour, 2017). Prescription drugs are legal and hence tend to be more easily available than most illegal drugs. Nonmedical use of stimulants and prescription opioids among adolescents and young adults has also been linked to increased harmful use of other substances (Zahlan et al., 2014), reporting of psychiatric symptoms, psychiatric disorders and suicidal ideation (Kuramoto, Chilcoat, Ko, & Martins, 2012).

In this study, one in four 7th-9th graders had already smoked a whole cigarette, two thirds of whom tried it before age 14, and younger cohorts more likely to report early onset compared to older ones. A third used tobacco products other than cigarettes, and 5% use new form of tobacco known as Medwakh. Three quarters of drinkers consumed their first drink before age of 14, and almost half of current drinkers usually have 2 or more drinks on the days they drink. One in 10 had already ever been drunk, and more importantly 1 in 10 had gotten in trouble with their family or friends, missed school, or got into fights as a result of their alcohol drinking. Though only 3% had ever tried an illegal drug, this is a high percentage considering these are adolescents with a developing brain, and being caught using illegal drugs in Lebanon in a crime. This percentage becomes more worrisome knowing that 75% of the lifetime users tried the drug before the age of 14, and that a much larger percentage (1 in 10) had had the opportunity to have tried drugs only means that adolescents are resisting use. Nonmedical use of prescription drugs is a global concern, as taking these medications without medical supervision, or simultaneously with other drugs or alcohol, or for longer periods than recommended can lead to significant health issues, and death. A substantial number of students (20% almost) reported that they had used a drug without a doctor's

prescription, or differently than how the doctor told them to use it during the past 12 months. As with other adolescents globally, the majority of students (59.8%) who had nonmedically used a prescription drug during the past 12 months, mostly used opioid pain relievers (such as Vicodin©, Tramal©, Dolosal©, Solpadeine©, or morphine).

The home environment can play a key role in either preventing or encouraging substance use. With regards to tobacco use, 1 in 2 students had parents or guardians who used any form of tobacco and around 70% reported that people smoked in their presence at least once during the past week. Current drinkers were also asked about the sources of obtaining alcohol, and the top sources was family (53.1%). Among nonmedical prescription drug users, 60% of the students reported usually taking it from home and 37% reported specifically from a family member.

But the policy environment has a great role to play. Other reported sources of obtaining alcohol among current drinkers were also store, shop, or street vendor (23.5%), keeping in mind these are all minors. However, in the absence of any alcohol harm reduction policy for Lebanon, no regulations exist to penalize vendors for selling alcohol to minors (<18 years). About 1 in 10% of the nonmedical users who had taken a psychoactive medication without a doctor's prescription or differently than how the doctor told them to use it during the past 12 months bought it from a pharmacy. So while pharmacists should be penalized for selling without a prescription, the blame is shared between parents (who may leave such drugs unlocked in cabinets), family doctors (who may be prescribing such medications with ease), peers (who may be diverting their prescribed medications), society at large (for misperceiving that such medications are harmless compared to other substances), and finally the system (for not centralizing the dispensing of prescriptions so that they be tracked across all pharmacies in the country).

Recommendation for policy and practice:

- Educating about the harms of tobacco, alcohol, illegal drugs as well as prescription medication use without supervision should begin at a very young age (<14 years), especially that students in lower grade levels are reporting earlier ages of onset of multiple substances.
- Parents needs to be educated about the harms and dangers of smoking in the presence of their children, but also leaving alcohol, prescription drugs, and other harmful substances unlocked and accessible within the home. Parents/guardians may be misled to believe that it is permissible and harmless for adolescents to drink even if occasionally or to use prescription medication without medical supervision.
- Media literacy is an important skill to provide in schools to allow youth to critically dissect and analyze the marketing of unhealthy and potentially harmful products to them including alcohol.
- Educational approaches at the individual and/or family or community levels are among the most common approaches to the prevention and reduction of substance use among youth, despite limited effectiveness in the absence of more effective public policy level strategies such as pricing policies, marketing restrictions, law enforcement initiatives, among others. An effective strategy requires a comprehensive approach.
- National harm reduction policies are a **fundamental need** and should involve and engage all stakeholders (schools, parents, pharmacists, vendors, policymakers and implementers, and young people themselves); such policies must be frequently evaluation and adapted to ensure that the social and policy environment continues to discourage young people's use of harmful substances.

V. Mental Health Wellbeing

Adolescence is a critical age for the development of psychiatric disorders. With the epidemiological transition we begin to see health problems of a non-infectious nature, including mental health problems comprising self-harm and suicide. Mental health surveys (E.J. Costello, Mustillo, Erkanli, Keeler, & Angold, 2003; R.C. Kessler et al., 2007; R.C. Kessler et al., 2005) point toward an early age of onset of psychiatric disorders, with a substantial percentage of people developing at least one psychiatric disorder before late adolescence. Such data draw attention to adolescence as a critical period for the early detection of mental illness and early intervention.

The burden of psychiatric disorders among adolescents in Lebanon is not extensively investigated. A recent population-based study among 11-18 year olds found that 26.1% had any psychiatric disorder in 30 days preceding the survey, with anxiety disorders (13.1 %) and ADHD (10.2 %) being the most prevalent disorders. Nonetheless, only 6 % of those with disorders reported seeking professional help. (Maalouf, Ghandour, Halabi, Zeinoun, & Tavitian, 2016)

In the 2017 GSHS study, almost 12% of students felt lonely most of the time or always during the 12 months preceding the survey; 14% of students felt so worried about something most of the time or always that they could not sleep at night during the past 12 months; 13.5 % seriously considered attempting suicide, 8.5 % made a plan about how they would attempt suicide, and 9.7 % actually attempted suicide one or more times. Though the percentage of students in 7th-9th graders who had reported contemplating, planning or attempting suicide slightly decreased between 2011 and 2016, it still signifies a shocking proportion of adolescents.

Recommendation for policy and practice:

- There is a need to **urgently** include such psychosocial education into the curriculum. The format of such education should be participatory, engaged, and focus on providing skills to cope with important stressors.
- Youth-friendly mental health care should be made available, in and outside school-settings, to allow adolescents to seek care and talk comfortably and confidentially with a health professional about their mental health problems. Integrating mental health in primary health care settings ensures greater access to young people who may not be able to afford costly services in private health care settings.
- Given the aforementioned results related to violence, bullying and now mental health wellbeing, schools in Lebanon should be assessed for their school psychosocial profile.

We reference here a WHO report from 2003 that had identified key aspects of a healthy school psycho-social environment and developed a tool to measure it (WHO, 2003). The report states that: "A school's environment can enhance social and emotional well-being, and learning when it: (i) is warm, friendly and rewards learning, (ii) promotes cooperation rather than competition; (iii) facilitates supportive, open communications' (iv) views the provision of creative opportunities as important; (v) prevents physical punishment, bullying, harassment and violence, by encouraging the development of procedures and policies that do not support physical punishment and that promote non-violent interaction on the playground, in class and among staff and students; and (vi) promotes the rights of boys and girls through equal opportunities and democratic procedures.

Recommendation for research:

- More research is needed to understand the national prevalence of mental health disorders among children and adolescents, with a deep understanding of the variations

by regions, socioeconomic backgrounds and other personal characteristics to ensure proper allocation of resources.

- Monitoring and Evaluation of all new and existing mental health interventions (school-based, community-based, or facility-based) are needed to ensure the delivery of effective programs and services, and ensure continued adaptation to the population needs.

VI. Sexual and Reproductive Health

Globalization, the emergence of the internet, and exposure to different cultures through multimedia and literature have also contributed to the shift in social values, where young people are not only becoming tolerant, but also engaging in premarital sex at an earlier age (Barbour & Salameh, 2009). By 2004, the mean age of first marriages in Lebanon had significantly increased to 32.8 years among males and 28.8 years among females (Act, 2005). This is important to note as it amplifies the biosocial gap and correlates with the higher chance of pre-marital sex in the country.

In Lebanon, sexual practices of young people are not often investigated given the social taboo associated with sexuality and sexual health among unmarried youth (L. A. Ghandour, Mouhanna, Yasmine, & El Kak, 2014). In a recent survey of university students, 10% admitted of sexually active students (mean age of sexual debut = 17 years) reported having had consumed alcohol or taken drugs at sexual debut. Students who used alcohol/drugs at sexual debut were found to exhibit more risky sexual practices such as engaging in sex with unfamiliar partners, having multiple sexual partners, engaging in something sexual they did not want to do, among others (L. A. Ghandour et al., 2014).

The GSHS does not assess explicitly sexual behaviors among middle and school students, but 16% did report having had an intimate physical relationship, 73% of whom reported doing so before the age of 14 years. By 12th grade, 20% had reported an intimate physical relationship, or 1 in 5 students.

Recommendation for policy and practice:

- School health counselors and educators must be educated about the delivery of accurate and age-appropriate information to student, to address solicited and unsolicited questions.
- There is a need for schools to integrate sexual and reproductive health topics within their curriculum and to direct students to sites and resources that offer accurate and age-appropriate material (30% of the students who in the 2017 GSHS who looked for information about HIV/AIDS did so using the internet or social media that can be frequently bombarded with misleading and incorrect information).
- The educational system should also provide students with skills (in peer resistance and others) to increase their self-efficacy and encourage them to apply what they know.
- Youth-friendly services for sexual and reproductive health are necessary to also allow the young to seek information and care from health professionals in a safe and confidential setting, when unable to have such discussions with parents (although latter is encouraged pending making sure the parents are equipped with the correct knowledge and skills to transmit age-appropriate messages).
- Intra-familial communication around sexual and reproductive health issues should be also enhanced by involving both parents and youth. Parents should be trained regarding sexual and reproductive health communication so that they are able to deliver appropriate and timely information to their children.

VII. Protective Factors

Although adolescents strive for autonomy, family continues to play a big and influential role. Families are a main protective factor for children's health and wellbeing. A consistent, secure and supportive relationship with parents built on communication, trust and mutual respect is one of the key protective factors. Parents must respect adolescent's autonomy, while continuously monitoring their whereabouts, acquaintances, social media, academic performance, and other critical areas of an adolescent's life.

Recommendation for policy and practice:

- Schools can play a role in fostering positive child-parent relationships by encouraging parent involvement in school activities, and engaging parents as stakeholders via parental committees (that could potentially invite students to attend and provide feedback as primary stakeholders).

VIII. Health education in schools

In the 2017 GSHS, health education in schools was not reported by the majority. Less than 50% were educated in schools about health eating, less than a third were taught about the importance of handwashing with soap and water, a third said they covered topics such as problems associated with alcohol/drug use, and less than a third were taught about how to prevent HIV/AIDS or avoid pregnancy or STIs. Thus, private and public schools should make bigger efforts to ensure that their students are being exposed to age-appropriate information about various health behaviors.

Recommendation for policy and practice:

- School-based education must focus not only on raising awareness, but on changing attitudes and providing skills through participatory – rather than didactic - forms of education.
- Schools must go beyond the traditional way in which schools have addressed adolescent issues such as violence, substance use and sexual health risks is via 'health education' – delivered in classrooms. The most effective school-based interventions however are those that are participatory in nature, multicomponent with curriculum elements, but also targeting the physical environment, working with parents and families, and community.
- Educators must focus on building skills, changing attitudes in addition to providing information. This is contingent on the educators being skilled themselves, and empowered to perceive youth as positive assets (not a risk population) that should be active players in ensuring their own health and wellbeing.

Part V. Conclusions

In the absence of a much needed adolescent health surveillance system in Lebanon and other neighboring countries (AlBuhairan et al., 2015), GSHS remains an asset for the collection of important indicators of adolescent health for informing policy and practice, and future research. In future surveys, additional lobbying for such important surveys should be perhaps conducted by all relevant ministries to ensure the inclusion and active participation of all selected schools. Sampling with replacement may be another potential solution to replacing non-participating schools, although in the present study, the response rate was relatively high (88%) after great efforts to meet with school administrators. As an incentive, aggregate-level findings from this study should be communicated back to all participating schools to provide them with the data necessary to understand adolescent health in the country. The scantron answer sheets reduce data entry error, but may be complex for adolescents to fill; future surveys should consider using tablets with an interface that could be youth- and user-friendly. The timing of data collection is also crucial, and it is recommended to always consider key learning cycle milestones (e.g. exams in February and long seasonal breaks – e.g. Christmas) as they directly affect participant availability and therefore data gathering.

GSHS assesses comprehensively several adolescent behaviors that may put adolescents at risk for serious health problems in the short-run as well as later during their adult life. Based on 2017 findings, we find that younger kids are starting to smoke, drink, and have intimate relationships at an earlier age. Adolescents report “home/parents” as a source for obtaining substances, or being exposed to substance use, while few feel comfortable talking about their problems to their parents. Structural determinants are also highlighted whereby the surrounding ‘environment’ and ‘policy systems’ are not supportive, with some schools potentially still offering unhealthy food choices and failing to address sexual and reproductive health or substance in their curriculum or as early as they should; public green spaces being nearly obsolete; and national harm reduction policies generally non-existent. Regardless of the numbers and percentages, adolescents should not be able to obtain alcohol from shops/stores, or buy prescription drugs from pharmacies without a prescription, or ride with adults without having a seatbelt on, or be physically attacked by teachers. It is very important to note and understand that these issues do not happen in silos, and often the same adolescent is being bullied, feeling anxious, eating unhealthy and having trouble discussing his/her issues with a close friend or parent. Therefore, a holistic and comprehensive approach to adolescent health must be adopted, contextualized to the Lebanese context, and involving youth as active agents of change in their own wellbeing.

The 2017 GSHS report summarizes descriptively the main findings, but much additional analyses can and will be undertaken to further investigate the correlation between the various behaviors, while controlling for potential confounders, as well as perhaps identifying classes of adolescents with variable risk profiles. We hope that this report serves as a platform for national researchers to begin investigating underlying factors associated with the surveyed adolescents risk behaviors, and constant monitoring and evaluation of existing and new prevention strategies or other interventions to circumvent them. It is also important take a more positive approach and understand why the majority of youth do not engage in risky behaviors, and perhaps learn both qualitatively and quantitatively how existing protective and risk factors can interplay to impact youth health. Since GSHS is being repeated approximately every 5 years, the results of the current 2017 GSHS report should be disseminated to all governmental agencies, and schools, and other stakeholders, and a national action plan or a 5-year national strategy for adolescent health in Lebanon can be launched, monitored and evaluated. This strategy should build on all the great work that the MEHE (through the national school health program) and other ministries as well as academic institutions are all involved

in to ensure overall adolescent physical, social and mental health wellbeing and not just the absence of disease.

Appendices

Appendix A: GSHS questionnaire in English

2016 LEBANON GLOBAL SCHOOL-BASED STUDENT HEALTH SURVEY

This survey is about your health and the things you do that may affect your health. Students like you all over your country are doing this survey. Students in many other



countries around the world also are doing this survey. The information you give will be used to develop better health programs for young people like yourself.

DO NOT write your name on this survey or the answer sheet. The answers you give will be kept private. No one will know how you answer. Answer the questions based on what you really know or do. There are no right or wrong answers.

Completing the survey is voluntary. Your grade or mark in this class will not be affected whether or not you answer the questions. If you do not want to answer a question, just leave it blank.

Make sure to read every question. Fill in the circles on your answer sheet that match your answer. Use only the pencil you are given. When you are done, do what the person who is giving you the survey says to do.

Here is an example of how to fill in the circles:

Fill in the circles like this  Not like this  or 

Survey

1. Do fish live in water?
 - A. Yes
 - B. No

Answer sheet

1.        

Thank you very much for your help.

1. How old are you?
 - A. 11 years old or younger
 - B. 12 years old
 - C. 13 years old
 - D. 14 years old
 - E. 15 years old
 - F. 16 years old
 - G. 17 years old
 - H. 18 years old or older

2. What is your sex?
 - A. Male
 - B. Female

3. In what grade are you?
 - A. Grade 7
 - B. Grade 8
 - C. Grade 9
 - D. Grade 10
 - E. Grade11
 - F. Grade 12

4. What is your nationality?
 - A. Lebanese
 - B. Syrian
 - C. Palestinian
 - D. Some other nationality

The next 5 questions ask about your height, weight, and going hungry.

5. How tall are you without your shoes on? ON THE ANSWER SHEET, WRITE YOUR HEIGHT IN THE SHADED BOXES AT THE TOP OF THE GRID. THEN FILL IN THE OVAL BELOW EACH NUMBER.

Example

Height (cm)		
1	5	3
0	0	0
	1	1
2	2	2
	3	
	4	4
		5
	6	6
	7	7
	8	8
	9	9
I do not know		
9		

6. How much do you weigh without your shoes on? ON THE ANSWER SHEET, WRITE YOUR WEIGHT IN THE SHADED BOXES AT THE TOP OF THE GRID. THEN FILL IN THE OVAL BELOW EACH NUMBER.

Example

Weight (kg)		
0	5	2
	0	0
1	1	1
2	2	
	3	3
	4	4
		5
	6	6
	7	7
	8	8
	9	9
I do not know		
9		

7. How do you describe your weight compared to other boys or girls your age?
- A. Very underweight
 - B. Slightly underweight
 - C. About the right weight
 - D. Slightly overweight
 - E. Very overweight
8. During the past 30 days, did you **take any diet pills, powders, or liquids** without a doctor's advice to lose weight or to keep from gaining weight?
- A. Yes
 - B. No
9. During the past 30 days, how often did you go hungry because there was not enough food in your home?
- A. Never
 - B. Rarely
 - C. Sometimes
 - D. Most of the time
 - E. Always

The next 5 questions ask about what you might eat and drink.

10. During the past 30 days, how many times per day did you **usually** eat fruit, such as apples, bananas, or oranges?
- A. I did not eat fruit during the past 30 days
 - B. Less than one time per day
 - C. 1 time per day
 - D. 2 times per day
 - E. 3 times per day
 - F. 4 times per day
 - G. 5 or more times per day
11. During the past 30 days, how many times per day did you **usually** eat vegetables, such as salad, spinach, eggplant, tomatoes, or cucumbers?
- A. I did not eat vegetables during the past 30 days
 - B. Less than one time per day
 - C. 1 time per day
 - D. 2 times per day
 - E. 3 times per day
 - F. 4 times per day
 - G. 5 or more times per day

12. During the past 30 days, how many times per day did you **usually** drink carbonated soft drinks, such as Pepsi, Coca Cola, Fanta, or 7-Up? (Do **not** include diet soft drinks.)
- A. I did not drink carbonated soft drinks during the past 30 days
 - B. Less than one time per day
 - C. 1 time per day
 - D. 2 times per day
 - E. 3 times per day
 - F. 4 times per day
 - G. 5 or more times per day
13. During the past 7 days, on how many days did you eat food from a fast food restaurant, such as hamburger, shawarma, falafel, pizza, or mnakish?
- A. 0 days
 - B. 1 day
 - C. 2 days
 - D. 3 days
 - E. 4 days
 - F. 5 days
 - G. 6 days
 - H. 7 days
14. During the past 12 months, were you taught in any of your classes the benefits of healthy eating?
- A. Yes
 - B. No
 - C. I do not know

The next 4 questions ask about cleaning your teeth and washing your hands.

15. During the past 30 days, how many times per day did you **usually** clean or brush your teeth?
- A. I did not clean or brush my teeth during the past 30 days
 - B. Less than 1 time per day
 - C. 1 time per day
 - D. 2 times per day
 - E. 3 times per day
 - F. 4 or more times per day
16. During the past 30 days, how often did you wash your hands before eating?
- A. Never
 - B. Rarely
 - C. Sometimes
 - D. Most of the time

E. Always

17. During the past 30 days, how often did you wash your hands after using the toilet or latrine?

- A. Never
- B. Rarely
- C. Sometimes
- D. Most of the time
- E. Always

18. During the past 30 days, how often did you use soap when washing your hands?

- A. Never
- B. Rarely
- C. Sometimes
- D. Most of the time
- E. Always

19. During the past 12 months, were you taught in any of your classes the importance of hand washing with soap and water?

- A. Yes
- B. No
- C. I do not know

The next question asks about oral health.

20. During the past 12 months, what was the **main reason** for your visit to the dentist?

- A. I have not been to the dentist during the past 12 months
- B. Something was wrong with my teeth or gums
- C. For follow-up treatment from an earlier visit
- D. As part of a dental check-up or exam at school
- E. As part of a dental check-up or exam outside of school
- F. Some other reason
- G. I do not know

The next 2 questions ask about physical attacks. A physical attack occurs when one or more people hit or strike someone, or when one or more people hurt another person with a weapon (such as a stick, knife, or gun). It is not a physical attack when two students of about the same strength or power choose to fight each other.

21. During the past 12 months, how many times were you physically attacked?

- A. 0 times
- B. 1 time

- C. 2 or 3 times
- D. 4 or 5 times
- E. 6 or 7 times
- F. 8 or 9 times
- G. 10 or 11 times
- H. 12 or more times

22. During the past 12 months, did your teacher ever hit, slap, or physically hurt you on purpose?

- A. Yes
- B. No

The next question asks about physical fights. A physical fight occurs when two students of about the same strength or power choose to fight each other.

23. During the past 12 months, how many times were you in a physical fight?

- A. 0 times
- B. 1 time
- C. 2 or 3 times
- D. 4 or 5 times
- E. 6 or 7 times
- F. 8 or 9 times
- G. 10 or 11 times
- H. 12 or more times

The next 3 questions ask about serious injuries that happened to you. An injury is serious when it makes you miss at least one full day of usual activities (such as school, sports, or a job) or requires treatment by a doctor or nurse.

24. During the past 12 months, how many times were you seriously injured?

- A. 0 times
- B. 1 time
- C. 2 or 3 times
- D. 4 or 5 times
- E. 6 or 7 times
- F. 8 or 9 times
- G. 10 or 11 times
- H. 12 or more times

25. During the past 12 months, what was the most serious injury that happened to you?
- A. I was not seriously injured during the past 12 months
 - B. I had a broken bone or a dislocated joint
 - C. I had a cut or stab wound
 - D. I had a concussion or other head or neck injury, was knocked out, or could not breathe
 - E. I had a gunshot wound
 - F. I had a bad burn
 - G. I was poisoned or took too much of a drug
 - H. Something else happened to me
26. During the past 12 months, **what was the major cause** of the most serious injury that happened to you?
- A. I was not seriously injured during the past 12 months
 - B. I was in a motor vehicle accident or hit by a motor vehicle
 - C. I fell
 - D. Something fell on me or hit me
 - E. I was attacked or abused or was fighting with someone
 - F. I was in a fire or too near a flame or something hot
 - G. I inhaled or swallowed something bad for me
 - H. Something else caused my injury

The next 4 questions ask about bullying. Bullying occurs when a student or group of students say or do bad and unpleasant things to another student. It is also bullying when a student is teased a lot in an unpleasant way or when a student is left out of things on purpose. It is not bullying when two students of about the same strength or power argue or fight or when teasing is done in a friendly and fun way.

27. During the past 30 days, on how many days were you bullied?
- A. 0 days
 - B. 1 or 2 days
 - C. 3 to 5 days
 - D. 6 to 9 days
 - E. 10 to 19 days
 - F. 20 to 29 days
 - G. All 30 days
28. During the past 30 days, how were you bullied **most often**?
- A. I was not bullied during the past 30 days
 - B. I was hit, kicked, pushed, shoved around, or locked indoors
 - C. I was made fun of because of my race, nationality, or color
 - D. I was made fun of because of my religion
 - E. I was made fun of with sexual jokes, comments, or gestures
 - F. I was left out of activities on purpose or completely ignored
 - G. I was made fun of because of how my body or face looks

H. I was bullied in some other way

29. During the past 30 days, how did you bully others **most often**, whether alone or as part of a group?

- A. I did not bully anyone during the past 30 days
- B. I hit, kicked, pushed, or shoved around others or locked others indoors
- C. I made fun of others because of their race, nationality, or color
- D. I made fun of others because of their religion
- E. I made fun of others with sexual jokes, comments, or gestures
- F. I completely ignored others or left them out of activities on purpose
- G. I made fun of others because of their body, their face, or the way they looked
- H. I bullied others in some other way

30. During the past 30 days, how often were you teased in a mean way or called hurtful names?

- A. Never
- B. Rarely
- C. Sometimes
- D. Most of the time
- E. Always

The next question asks about seat belt use.

31. During the past 30 days, how often did you use a seat belt when riding in a car or other motor vehicle driven by someone else?

- A. I did not ride in a motor vehicle driven by someone else
- B. Never
- C. Rarely
- D. Sometimes
- E. Most of the time
- F. Always

The next 7 questions ask about your feelings and friendships.

32. During the past 12 months, how often have you felt lonely?

- A. Never
- B. Rarely
- C. Sometimes
- D. Most of the time
- E. Always

33. During the past 12 months, how often have you been so worried about something that you could not sleep at night?
- A. Never
 - B. Rarely
 - C. Sometimes
 - D. Most of the time
 - E. Always
34. During the past 12 months, did you ever **seriously** consider attempting suicide?
- A. Yes
 - B. No
35. During the past 12 months, did you make a plan about how you would attempt suicide?
- A. Yes
 - B. No
36. During the past 12 months, how many times did you actually attempt suicide?
- A. 0 times
 - B. 1 time
 - C. 2 or 3 times
 - D. 4 or 5 times
 - E. 6 or more times
37. How many close friends do you have?
- A. 0
 - B. 1
 - C. 2
 - D. 3 or more
38. During the past 12 months, who did you talk with **most often** about a mental health problem you were having?
SELECT ONLY ONE RESPONSE.
- A. I did not have a mental health problem during the past 12 months
 - B. I did not talk with anyone about a mental health problem I was having during the past 12 months
 - C. My friends
 - D. My parents
 - E. A religious leader
 - F. A social worker, counselor, or psychologist
 - G. A doctor or nurse
 - H. Someone else

The next 10 questions ask about cigarette and other tobacco use.

39. How old were you when you first tried a cigarette?

- A. I have never smoked cigarettes
- B. 7 years old or younger
- C. 8 or 9 years old
- D. 10 or 11 years old
- E. 12 or 13 years old
- F. 14 or 15 years old
- G. 16 or 17 years old
- H. 18 years old or older

40. During the past 30 days, on how many days did you smoke cigarettes?

- A. 0 days
- B. 1 or 2 days
- C. 3 to 5 days
- D. 6 to 9 days
- E. 10 to 19 days
- F. 20 to 29 days
- G. All 30 days

41. During the past 12 months, have you ever tried to stop smoking cigarettes?

- A. I have never smoked cigarettes
- B. I did not smoke cigarettes during the past 12 months
- C. Yes
- D. No

42. During the past 7 days, on how many days have people smoked in your presence?

- A. 0 days
- B. 1 or 2 days
- C. 3 or 4 days
- D. 5 or 6 days
- E. All 7 days

43. During the past 30 days, on how many days did you use any tobacco products other than cigarettes, such as a narghile or waterpipe?

- A. 0 days
- B. 1 or 2 days
- C. 3 to 5 days
- D. 6 to 9 days
- E. 10 to 19 days

- F. 20 to 29 days
- G. All 30 days

44. How old were you when you first tried a narghile or waterpipe?

- A. I have never tried a narghile or waterpipe
- B. 7 years old or younger
- C. 8 or 9 years old
- D. 10 or 11 years old
- E. 12 or 13 years old
- F. 14 or 15 years old
- G. 16 or 17 years old
- H. 18 years old or older

45. During the past 30 days, on how many days did you smoke a Medwakh or smoking pipe?

- A. 0 days
- B. 1 or 2 days
- C. 3 to 5 days
- D. 6 to 9 days
- E. 10 to 19 days
- F. 20 to 29 days
- G. All 30 days

46. Which of your parents or guardians use any form of tobacco?

- A. Neither
- B. My father or male guardian
- C. My mother or female guardian
- D. Both
- E. I do not know

47. Do you think cigarette smoking is harmful to your health?

- A. Definitely not
- B. Probably not
- C. Probably yes
- D. Definitely yes

48. Do you think smoking a narghile or waterpipe is harmful to your health?

- A. Definitely not
- B. Probably not
- C. Probably yes
- D. Definitely yes

The next 8 questions ask about drinking alcohol. This includes drinking beer, arak, whiskey, wine, vodka, and juices that contain alcohol (Smirnoff ice, Barcardi breeze, XLL, or Buzz). Drinking alcohol does not include drinking a few sips of wine for religious purposes. A “drink” is a glass of wine, a bottle of beer, a small glass of liquor, or a mixed drink.

49. How old were you when you had your first drink of alcohol other than a few sips?
- A. I have never had a drink of alcohol other than a few sips
 - B. 7 years old or younger
 - C. 8 or 9 years old
 - D. 10 or 11 years old
 - E. 12 or 13 years old
 - F. 14 or 15 years old
 - G. 16 or 17 years old
 - H. 18 years old or older
50. During the past 30 days, on how many days did you have at least one drink containing alcohol?
- A. 0 days
 - B. 1 or 2 days
 - C. 3 to 5 days
 - D. 6 to 9 days
 - E. 10 to 19 days
 - F. 20 to 29 days
 - G. All 30 days
51. During the past 30 days, on the days you drank alcohol, how many drinks did you **usually** drink per day?
- A. I did not drink alcohol during the past 30 days
 - B. Less than one drink
 - C. 1 drink
 - D. 2 drinks
 - E. 3 drinks
 - F. 4 drinks
 - G. 5 or more drinks
52. During the past 30 days, how did you **usually** get the alcohol you drank? SELECT ONLY ONE RESPONSE.
- A. I did not drink alcohol during the past 30 days
 - B. I bought it in a store, shop, or from a street vendor
 - C. I gave someone else money to buy it for me
 - D. I got it from my friends
 - E. I got it from my family
 - F. I stole it or got it without permission
 - G. I got it some other way

53. If one of your best friends offered you a drink of alcohol, would you drink it?

- A. Definitely not
- B. Probably not
- C. Probably yes
- D. Definitely yes

Staggering when walking, not being able to speak right, and throwing up are some signs of being really drunk.

54. During your life, how many times did you drink so much alcohol that you were really drunk?

- A. 0 times
- B. 1 or 2 times
- C. 3 to 9 times
- D. 10 or more times

55. During your life, how many times have you got into trouble with your family or friends, missed school, or got into fights, as a result of drinking alcohol?

- A. 0 times
- B. 1 or 2 times
- C. 3 to 9 times
- D. 10 or more times

56. During the past 12 months, were you taught in any of your classes the problems associated with drinking alcohol?

- A. Yes
- B. No
- C. I do not know

The next 8 questions ask about drug use. This includes using marijuana, amphetamines, cocaine, and inhalants.

57. How old were you when you first used drugs?

- A. I have never used drugs
- B. 7 years old or younger
- C. 8 or 9 years old
- D. 10 or 11 years old
- E. 12 or 13 years old
- F. 14 or 15 years old
- G. 16 or 17 years old
- H. 18 years old or older

58. During your life, how many times have you used marijuana (also called hash or hashish)?

- A. 0 times
- B. 1 or 2 times
- C. 3 to 9 times
- D. 10 to 19 times
- E. 20 or more times

59. During the past 30 days, how many times have you used marijuana (also called hash or hashish)?

- A. 0 times
- B. 1 or 2 times
- C. 3 to 9 times
- D. 10 to 19 times
- E. 20 or more times

60. During your life, how many times have you used amphetamines or methamphetamines (also called Captagon, MDMA (Ecstasy), Adderall, Ritalin, Concerta, Ephedrine, Bupropion, or Pseudoephedrine)?

- A. 0 times
- B. 1 or 2 times
- C. 3 to 9 times
- D. 10 to 19 times
- E. 20 or more times

61. During past 12 months, have you ever had a **chance** to try an illegal drug (such as someone offered you drugs or you were with other people who were using drugs), even if you did not try it?

- A. Yes
- B. No
- C. I do not know

62. During the past 12 months, which of these drugs did you use **most often** without a doctor's prescription or differently than how a doctor told you to use it? **SELECT ONLY ONE RESPONSE.**

- A. I did not use a drug without a doctor's prescription or differently than how a doctor told me to use it during the past 12 months
- B. Sedatives, tranquilizers, or sleeping pills (such as Xanax, Rivotril, Rivo, Lexotanil, Lexo, Valium, Dormicum, Stilnox, or Inductal)
- C. Pain relievers (such as Vicodin, Tramal, Dolosal, Solpadeine, or morphine)
- D. Stimulants (such as Ritalin or Concerta)
- E. Anti-depressants (such as Prozac, Zoloft, Seroxat, Cipralext, or Effexor)
- F. Some other drug

63. During the past 12 months, how did you **usually** get the drug you used most often without a doctor's prescription or differently than how a doctor told you to use it?

- A. I did not use a drug without a doctor's prescription or differently than how a doctor told me to use it during the past 12 months
- B. I took it from home
- C. A family member gave it to me
- D. A friend gave it to me for free
- E. I bought it from a friend
- F. I bought it from a pharmacy
- G. A doctor gave it to me
- H. I got it some other way

64. During the past 12 months, were you taught in any of your classes the problems associated with using drugs?

- A. Yes
- B. No
- C. I do not know

The next 9 questions ask about education on reproductive health including physical changes that occur during adolescence (which is called puberty), pregnancy, sexually transmitted infections, and HIV infection or AIDS.

65. When do you think education on reproductive health should start?

- A. Before the age of puberty
- B. During the age of puberty
- C. When one is getting ready for marriage
- D. At marriage
- E. I do not know

66. Would you support being taught about reproductive health in school?

- A. Yes
- B. No
- C. I do not know

67. Should education about reproduction be taught in "boys only" or "girls only" classes or in classes with both boys and girls?

- A. Boys only and girls only classes
- B. Classes with both boys and girls
- C. I do not know

68. Have you ever heard of HIV infection or the disease called AIDS?

- A. Yes
- B. No

69. Where do you look **most often** for information about HIV infection or AIDS? SELECT ONLY ONE RESPONSE.

- A. I do not look for information about HIV infection or AIDS
- B. To my parents or guardians
- C. To my teachers at school
- D. To my friends or peers
- E. To the Internet or social media
- F. To magazines
- G. To the TV or radio
- H. Some other place

70. Have you ever talked about HIV infection or AIDS with your parents or guardians?

- A. Yes
- B. No

71. How many of your friends have had intimate physical relationships?

- A. None of them
- B. A few of them
- C. Most of them
- D. All of them
- E. I do not know

72. How old were you when you had intimate physical relationships for the first time?

- A. I have never had intimate physical relationships
- B. 11 years old or younger
- C. 12 years old
- D. 13 years old
- E. 14 years old
- F. 15 years old
- G. 16 or 17 years old
- H. 18 year old or older

73. Have you ever said **no** to someone who wanted to have intimate physical relationships with you?

- A. No, I was never asked
- B. Yes, I was asked and **was able** to say **no**
- C. Yes, I was asked and I **was not able** to say **no**
- D. I do not know

The next 2 questions asks about what you have been taught in school.

74. During the past 12 months, were you taught in any of your classes how to avoid HIV infection or AIDS?

- A. Yes
- B. No
- C. I do not know

75. During the past 12 months, were you taught in any of your classes how to avoid pregnancy or sexually transmitted infections?

- A. Yes
- B. No
- C. I do not know

The next 3 questions ask about physical activity. Physical activity is any activity that increases your heart rate and makes you get out of breath some of the time. Physical activity can be done in sports, playing with friends, or walking to school. Some examples of physical activity are running, fast walking, biking, dancing, football, and basketball.

76. During the past **7 days**, on how many days were you physically active for a total of at least 60 minutes per day?
ADD UP ALL THE TIME YOU SPENT IN ANY KIND OF PHYSICAL ACTIVITY EACH DAY.

- A. 0 days
- B. 1 day
- C. 2 days
- D. 3 days
- E. 4 days
- F. 5 days
- G. 6 days
- H. 7 days

77. During the past 7 days, on how many days did you walk or ride a bicycle to or from school?

- A. 0 days
- B. 1 day
- C. 2 days
- D. 3 days
- E. 4 days
- F. 5 days
- G. 6 days
- H. 7 days

78. During this school year, on how many days did you go to physical education (PE) class each week?

- A. 0 days
- B. 1 day
- C. 2 days
- D. 3 days

- E. 4 days
- F. 5 or more days

The next question asks about the time you spend mostly sitting when you are not in school or doing homework.

79. How much time do you spend during a **typical or usual** day sitting and watching television, playing computer games, talking with friends, or doing other sitting activities, such as playing with a PC or video games, playing on an Ipad or other tablet, or chatting with your friends on the phone.
- A. Less than 1 hour per day
 - B. 1 to 2 hours per day
 - C. 3 to 4 hours per day
 - D. 5 to 6 hours per day
 - E. 7 to 8 hours per day
 - F. More than 8 hours per day

The next question asks about your sleep.

80. On an average school night, how many hours of sleep do you get?
- A. 4 or less hours
 - B. 5 hours
 - C. 6 hours
 - D. 7 hours
 - E. 8 hours
 - F. 9 hours
 - G. 10 or more hours

The next 8 questions ask about your experiences at school and at home.

81. During the past 30 days, on how many days did you miss classes or school without permission?
- A. 0 days
 - B. 1 or 2 days
 - C. 3 to 5 days
 - D. 6 to 9 days
 - E. 10 or more days
82. During the past 30 days, how often were most of the students in your school kind and helpful?
- A. Never
 - B. Rarely
 - C. Sometimes
 - D. Most of the time
 - E. Always

83. During the past 30 days, how often did your parents or guardians check to see if your homework was done?

- A. Never
- B. Rarely
- C. Sometimes
- D. Most of the time
- E. Always

84. During the past 30 days, how often did your parents or guardians understand your problems and worries?

- A. Never
- B. Rarely
- C. Sometimes
- D. Most of the time
- E. Always

85. During the past 30 days, how often did your parents or guardians **really** know what you were doing with your free time?

- A. Never
- B. Rarely
- C. Sometimes
- D. Most of the time
- E. Always

86. During the past 30 days, how often did your parents or guardians go through your things without your approval?

- A. Never
- B. Rarely
- C. Sometimes
- D. Most of the time
- E. Always

87. During the past 30 days, how often did your parents or guardians embarrass you in public or in front of your friends?

- A. Never
- B. Rarely
- C. Sometimes
- D. Most of the time
- E. Always

88. During the past 30 days, how often did your parents or guardians give you attention and listen to you?

- A. Never
- B. Rarely

- C. Sometimes
- D. Most of the time
- E. Always

Appendix B: GSHS questionnaire in Arabic

المسح الصحي العالمي المرتكز على تلامذة المدارس

لبنان - 2016

ان محور هذه الدراسة هو صحتك لذا نسأل عن معرفتك و مواقفك و التصرفات التي تقوم بها والتي قد تؤثر عليها.

ان عدد كبير من التلامذة على كل الأراضي اللبنانية يشاركون بهذه الدراسة، كما وان تلامذة في بلدان اخرى حول العالم ينفذونها.

ان المعلومات التي ستقدمها سوف تستخدم لتطوير البرامج الصحية المتعلقة بالشباب الذين في عمرك والمعلومات التي تتعلق بك شخصيا ستبقى سرية ولن يسمح لأحد بالاطلاع عليها وانما ستستخدم فقط لأهداف هذا المسح. والمطلوب فقط هو الاجابة عن ماذا تعرف بالفعل، و كيف تتصرف فعليا ، كما وانه ليس هناك أجوبة صحيحة وأخرى غير صحيحة .

ان المشاركة بهذا المسح هي طوعية ولن تتأثر علاماتك في الصف اذا أجبت عن الأسئلة او لم تجب . اذا اردت عدم الإجابة عن اي سؤال اترك مكان الإجابة فارغا.

اتبع تعليمات المشرف على تنفيذ هذا المسح :

- 1- لا تذكر اسمك على وثيقة الأسئلة ولا على بطاقة الاجابة .
- 2- تأكد من قراءة كل سؤال بدقة
- 3- ضع اجاباتك على الورقة المخصصة خلال الوقت المحدد.
- 4- استعمل القلم الذي اعطي لك للإجابة على بطاقة الاجابة
- 5- املاً خانات الإجابات هكذا ● وليس هكذا ✕



مثال

سؤال :

1. هل يعيش السمك في الماء:

A. نعم

B. لا

على بطاقة الإجابة:

1. B C D E F G H

نحن نشكركم ونقدر لك هذه المشاركة

1. كم عمرك؟

- A. 11 سنة أو أقل
- B. 12 سنة
- C. 13 سنة
- D. 14 سنة
- E. 15 سنة
- F. 16 سنة
- G. 17 سنة
- H. 18 سنة أو أكثر

2. هل انت ذكر ام انثى؟

- A. ذكر
- B. انثى

3. في أي صف انت؟

- A. السابع الأساسي
- B. الثامن الأساسي
- C. التاسع الأساسي
- D. اول ثانوي
- E. ثاني ثانوي
- F. ثالث ثانوي

4. ما هي جنسيتك؟

- A. لبناني
- B. سوري
- C. فلسطيني
- D. غيره

تستفسر الأسئلة الخمسة التالية عن طولك ووزنك وشعورك بالجوع .

5. كم يبلغ طولك بدون ارتداء حذائك؟ اكتب طولك في المستطيل المظلل في أعلى الجدول، ثم إملا الأشكال البيضاوية تحت كل رقم. مثال: اذا كان طولك 153 سم، اكتب الرقم واملا الدوائر كالتالي:

الطول (سم)		
1	5	3
①	①	①
●	①	①
②	②	②
	③	●
	④	④
	●	⑤
	⑥	⑥
	⑦	⑦
	⑧	⑧
	⑨	⑨
⑨	لا أعرف	

6. كم يبلغ وزنك بدون ارتداء حذائك؟ اكتب وزنك في المستطيل المظلل في أعلى الجدول، ثم إملا الأشكال البيضاوية تحت كل رقم. مثال: اذا كان وزنك 52 كيلوغرام (كجم)، اكتب الرقم واملا الدوائر كالتالي:

الوزن (كجم)		
0	5	2
●	①	①
①	①	①
②	②	●
	③	③
	④	④
	●	⑤
	⑥	⑥

	⑦	⑦
	⑧	⑧
	⑨	⑨
⑨	لا أعرف	

7. كيف تصف وزنك مقارنة مع الفتيان / الفتيات في عمرك؟

- A. أقل كثيراً من الوزن المناسب
- B. أقل قليلاً من الوزن المناسب
- C. مقارب للوزن المناسب
- D. أكثر قليلاً من الوزن المناسب
- E. أكثر كثيراً من الوزن المناسب

8. خلال الثلاثين يوماً الماضية، هل تناولت أي نوع من الأدوية المخففة للوزن مثال: الحبوب، البودرة أو السوائل، للتخفيف أو لعدم زيادة وزنك؟

- A. نعم
- B. لا

9. خلال الثلاثين يوماً الماضية، كم عدد المرات التي شعرت فيها بالجوع لعدم وجود طعام كافٍ في منزلك؟

- A. أبداً ولا مرة
- B. نادراً (قليلاً جداً)
- C. أحياناً (في بعض الأوقات)
- D. في أكثر الأحيان
- E. دائماً

الأسئلة الخمسة التالية تسأل عن انواع المأكولات والمشروبات التي يمكن ان تتناولها.

10. خلال الثلاثين يوماً الماضية، كم مرة تقريباً في اليوم الواحد تناولت فاكهة مثل التفاح والموز والبرتقال؟

- A. لم أتناول الفواكه خلال الثلاثين يوماً الماضية
- B. أقل من مرة واحدة في اليوم (اي ليس يومياً)
- C. مرة واحدة في اليوم
- D. مرتين في اليوم
- E. 3 مرات في اليوم
- F. 4 مرات في اليوم
- G. 5 مرات في اليوم أو اكثر

11. خلال الثلاثين يوماً الماضية، كم مرة تقريباً في اليوم الواحد تناولت الخضار، مثل السلطات والسبانخ والباذنجان والبندورة والخيار؟

- A. لم أتناول الخضروات خلال الثلاثين يوماً الماضية
- B. أقل من مرة واحدة في اليوم (اي ليس يومياً)
- C. مرة واحدة في اليوم
- D. مرتين في اليوم
- E. 3 مرات في اليوم
- F. 4 مرات في اليوم
- G. 5 مرات في اليوم أو اكثر

12. خلال الثلاثين يوماً الماضية، كم مرة تقريباً في اليوم الواحد تناولت المشروبات الغازية مثل بيبسي أو كوكا كولا أو فاننا أو سفن أب؟ (لا تشمل المشروبات الغازية الدايت)

- A. لم اتناول المشروبات الغازية (مثل بيبسي أو كوكا كولا او فاننا او سفن أب) خلال الثلاثين يوماً الماضية
- B. أقل من مرة واحدة في اليوم (اي ليس يومياً)
- C. مرة واحدة في اليوم
- D. مرتين في اليوم
- E. 3 مرات في اليوم
- F. 4 مرات في اليوم
- G. 5 مرات في اليوم أو اكثر

13. خلال السبعة أيام الماضية، ما هو عدد الأيام التي تناولت فيها طعامك من مطعم يقدم وجبات سريعة مثل الهمبرغر والشاورما والفلافل والمعجنات مثل البيتزا والمناقيش وغيرها... الخ (سواء طلبت توصيله الى البيت او ذهبت الى المطعم)؟

- A. ولا يوم
- B. يوم واحد
- C. يومان
- D. 3 أيام

- .E 4 أيام
- .F 5 أيام
- .G 6 أيام
- .H 7 أيام

14. خلال الاثني عشر شهرا الماضية، هل علمك احد عن فوائد التغذية الصحية في أي من الحصص المدرسية؟

- .A نعم
- .B لا
- .C لا اعرف

الأسئلة الأربعة التالية تستفسر عن ممارساتك المتعلقة بتنظيف أسنانك ويديك.

15. خلال الثلاثين يوما الماضية، كم عدد المرات في اليوم التي نظفت فيها أسنانك ؟

- .A لم أنظف أسناني او افركها بالفرشاة خلال الثلاثين يوما الماضية
- .B اقل من مرة واحدة في اليوم
- .C مرة واحدة في اليوم
- .D مرتين في اليوم
- .E 3 مرات في اليوم
- .F 4 مرات في اليوم أو أكثر

16. خلال الثلاثين يوما الماضية، هل غسلت يديك قبل الأكل؟

- .A أبدا
- .B نادرا (قليل جداً)
- .C احيانا (في بعض الأوقات)
- .D في اكثر الاحيان
- .E دائما

17. خلال الثلاثين يوما الماضية، هل غسلت يديك بعد استعمال المراض او الحمام؟

- .A أبدا
- .B نادرا (قليل جداً)
- .C احيانا (في بعض الأوقات)
- .D في اكثر الاحيان
- .E دائما

18. خلال الثلاثين يوماً الماضية، كم استعملت الصابون عندما غسلت يداك؟

- A. أبداً
- B. نادراً (قليلاً جداً)
- C. أحياناً (في بعض الأوقات)
- D. في أكثر الأحيان
- E. دائماً

19. خلال الاثني عشر شهراً الماضية، هل علمك احد عن أهمية غسل اليدين بالماء والصابون في أي من الحصص المدرسية؟

- A. نعم
- B. لا
- C. لا أعرف

السؤال التالي يسأل عن صحة الفم والأسنان

20. خلال الاثني عشر شهراً الماضية، ما كان السبب الرئيسي لزيارتك لطبيب الأسنان؟

- A. لم يعاين أسناني أي طبيب في الأشهر الاثني عشر الماضية
- B. كان لدي مشكلة في أسناني ولتني
- C. لمتابعة علاج بدأته في زيارة سابقة
- D. خلال الكشف المدرسي على الأسنان
- E. للكشف على أسناني خارج المدرسة
- F. سبب آخر
- G. لا أعرف

السؤالان التاليان يسألانك عن الاعتداءات الجسدية. الاعتداء الجسدي يحدث عندما يقوم شخص أو أكثر بضرب أو جرح شخص آخر عمداً بواسطة اليدين أو باستخدام سلاح (عصا، أو سكين، أو حجر، أو مسدس، أو حجر أو أي من الأدوات الحادة أو المؤذية الأخرى) ولا يعتبر اعتداءً جسدياً عندما يختار اشخاص ان يتعاركوا لعباً أو مزحاً. امثلة عن الاعتداء الجسدي: الضرب، الدفع، النكز المؤذي، شد الشعر أو قرص الأنف أو الأذنين.

21. خلال الاثني عشر شهراً الماضية، كم عدد المرات التي تعرضت فيها للإعتداء الجسدي؟

- A. ولا مرة
- B. مرة واحدة
- C. من 2 الى 3 مرات
- D. من 4 الى 5 مرات
- E. من 6 الى 7 مرات
- F. من 8 الى 9 مرات
- G. من 10 الى 11 مرة

H. 12 مرة أو اكثر

22. خلال الاثني عشر شهراً الماضية، هل صدف ان قام أحد المعلمين بضربك ،أو صفحك او الإعتداء عليك جسدياً عمداً؟

- A. نعم
B. لا

السؤال التالي هو حول العراك الجسدي. نعني بالعراك الجسدي عندما يقرر شخصان أو اكثر أن يتعاركا.

23. خلال الاثني عشر شهراً الماضية، كم عدد المرات التي تعاركت فيها جسدياً؟

- A. ولا مرة
B. مرة واحدة
C. من 2 الى 3 مرات
D. من 4 الى 5 مرات
E. من 6 الى 7 مرات
F. من 8 الى 9 مرات
G. من 10 الى 11 مرة
H. 12 مرة أو اكثر

الأسئلة الثلاثة التالية تسألك عن أخطر إصابة حدثت لك. تعتبر الإصابة خطيرة عندما تعطلك يوماً كاملاً على الأقل عن انشطتك المعتادة (مثل الحركة او الذهاب الى المدرسة) او عندما تحتاج الى علاج من قبل طبيب أو ممرضة.

24. خلال الاثني عشر شهراً الماضية، كم عدد المرات التي اصبت فيها بإصابات خطيرة؟

- A. ولا مرة
B. مرة واحدة
C. من 2 الى 3 مرات
D. من 4 الى 5 مرات
E. من 6 الى 7 مرات
F. من 8 الى 9 مرات
G. من 10 الى 11 مرة
H. 12 مرة أو اكثر

25. خلال الاثني عشر شهراً الماضية، ما كانت اخطر الإصابات التي حدثت لك؟

- A. لم تحدث لي إصابة خطيرة خلال الاثني عشر شهراً الماضية
B. أصبت بكسر في إحدى العظام أو بخلع في أحد المفاصل
C. أصبت بجرح أو طعنة بأداة حادة
D. أصبت بارتجاج أو إصابة أخرى في الرأس والعنق، أو أغمي علي، أو لم أستطع التنفس

- E. أصبت بطلق ناري او مواد متفجرة
- F. أصبت بحروق شديدة
- G. فقدت قدما أو ساقا أو ذراعا أو جزءا منها
- H. حدث لي شيء آخر

26. خلال الاثني عشر شهرا الماضية، ماذا كنت تفعل عندما حدثت لك اشد الإصابات خطورة؟

- A. لم تحدث لي اصابة خطيرة خلال الاثني عشر شهرا الماضية
- B. كنت أركب أو أقود سيارة أو مركبة أخرى ذات محرك
- C. وقعت
- D. شيء ما وقع علي أو أصابني
- E. لقد هوجمت أو تم الإعتداء علي أو تعاركت مع احدهم
- F. كنت محاصرا بالنيران أو قريب جدا من اللهب أو من شيء ساخن جدا
- G. تنشقت أو بلعت مواد مؤذية
- H. شيء آخر تسبب في الإصابة

الأسئلة الأربعة التالية هي حول الاستقواء. يحدث الاستقواء، التهديد، أو الملاحقة عندما يقوم شخص أو مجموعة من الأشخاص بقصد الإيذاء وبشكل متكرر بقول كلام أو إيصال رسائل مكتوبة مهددة أو مؤذية أو عندما يقوم بأعمال مهددة أو مؤذية جسديا لشخص آخر.

27. خلال الثلاثين يوما الماضية، كم عدد الأيام التي تعرضت فيها للإستقواء؟

- A. ولا مرة
- B. من يوم الى اثنين
- C. من 3 الى 5 أيام
- D. من 6 الى 9 أيام
- E. من 10 الى 19 يوما
- F. من 20 الى 29 يوما
- G. 30 يوماً بكاملها

28. خلال الثلاثين يوما الماضية، ما هو نوع الإستقواء الذي تعرضت له في أغلب الأحيان؟

- A. لم أتعرض للإستقواء خلال الثلاثين يوما الماضية
- B. تعرضت للضرب – للدفع (للدفش)- للحبس في مكان مغلق
- C. تعرضت للسخرية بسبب انتمائي المناطقي/اصلي العائلي/ انتمائي السياسي
- D. تعرضت للسخرية بسبب ديني او طائفتي
- E. تعرضت للسخرية بتعليقات جنسية (مزحات او حركات بذيئة)
- F. تم استثنائي من الانشطة عمدا وتم اهمالي كليا

- G. تعرضت للسخرية بسبب مظهري
H. تعرضت للإستقواء بطرق أخرى

29. خلال الثلاثين يوماً الماضية، ما هو نوع الإستقواء الذي عرضت غيرك له، سواء كنت وحدك أو كجزء من مجموعة؟

- A. لم أعرض أحد للإستقواء خلال الثلاثين يوماً الماضية
B. عرضت أحد للضرب – للدفع (للدفش) - للحبس في مكان مغلق
C. عرضت أحد للسخرية بسبب انتمائي المناطقي/اصلي العائلي/ انتمائي السياسي
D. عرضت أحد للسخرية بسبب ديني او طائفتي
E. عرضت أحد للسخرية بتعليقات جنسية (مزحات او حركات بذيئة)
F. استثنيت أحد الأولاد من الانشطة عمدا وأهملتهم كلياً
G. عرضت أحد للسخرية بسبب مظهره
H. عرضت أحد للإستقواء بطرق أخرى

30. خلال الثلاثين يوماً الماضية، ما مدى تعرضك للسخرية أو إطلاق عليك أسماء مهينة؟

- A. أبداً
B. نادراً (قليلاً جداً)
C. أحياناً (في بعض الأوقات)
D. في أكثر الأحيان
E. دائماً

السؤال التالي يسأل عن استخدام حزام الأمان

31. خلال الثلاثين يوماً الماضية، ما مدى استخدامك لحزام الأمان عند ركوبك سيارة أو مركبة آلية أخرى يقودها شخص آخر؟

- A. لم أركب في سيارة أو مركبة آلية يقودها شخص آخر
B. أبداً ولا مرة
C. نادراً (قليلاً جداً)
D. أحياناً (في بعض الأوقات)
E. في أكثر الأحيان
F. دائماً

تدور الأسئلة السبعة التالية حول صداقاتك ومشاعرك.

32. خلال الاثني عشر شهرا الماضية، هل شعرت بالوحدة؟

- A. أبدا
- B. نادرا (قليلاً جداً)
- C. احيانا (في بعض الأوقات)
- D. في اكثر الاحيان
- E. دائما

33. خلال الاثني عشر شهرا الماضية، هل شعرت بالقلق حيال شيء ما لدرجة انك لم تستطع النوم في الليل؟

- A. أبدا
- B. نادرا (قليلاً جداً)
- C. احيانا (في بعض الأوقات)
- D. في اكثر الاحيان
- E. دائما

34. خلال الاثني عشر شهرا الماضية، هل فكّرت جدياً في الانتحار؟

- A. نعم
- B. لا

35. خلال الاثني عشر شهرا الماضية، هل اعددت خطة لمحاولة انتحار؟

- A. نعم
- B. لا

36. خلال الاثني عشر شهرا الماضية، ما هو عدد المرات التي حاولت فيها فعليا الإنتحار؟

- A. أبدا ولا مرة
- B. مرة واحدة
- C. من 2 الى 3 مرات
- D. من 4 الى 5 مرات
- E. 6 مرات أو أكثر

37. كم عدد الأصدقاء المقربين لديك؟

- A . 0
- B . 1
- C . 2
- D . 3 أو أكثر

38. خلال الاثني عشر شهرا الماضية، مع من تحدثت أكثر الأحيان عن مشكلة نفسية كنت تواجهها؟ (اختر جوابا واحدا)

- A. لم يكن لدي مشكلة نفسية خلال ال 12 شهرا الماضية
- B. لم أتحدث إلى أي شخص عن مشكلة نفسية كنت أعاني منها خلال ال 12 شهرا الماضية
- C. اصدقائي
- D. أهلي
- E. رجال الدين
- F. عامل اجتماعي، طبيب نفسي أو معالج نفسي
- G. طبيب أو ممرض(ة)
- H. غيره

الأسئلة العشرة التالية تسأل حول استخدام السجائر والتبغ

39. كم كان عمرك عندما حاولت تدخين السجائر للمرة الأولى؟

- A. لم أدخن السجائر أبداً
- B. 7 سنوات أو أقل
- C. 8-9 سنوات
- D. 10-11 سنة
- E. 12-13 سنة
- F. 14-15 سنة
- G. 16-17 سنة
- H. 18 سنة أو أكثر

40. خلال الثلاثين يوماً الماضية، كم يوماً دخنت فيه السجائر؟

- A. لم أدخن السجائر في أي يوم يوم خلال الشهر الماضي
- B. يوم أو يومين
- C. 3 إلى 5 أيام
- D. 6 إلى 9 أيام
- E. 10 إلى 19 يوماً
- F. 20 إلى 29 يوماً
- G. 30 يوماً بكاملها

41. خلال الاثني عشر شهرا الماضية، هل حاولت الإقلاع عن تدخين السجارة؟

- A. لم أدخن السجارة أبداً
- B. لم أدخن السجارة في السنة الماضية
- C. نعم
- D. لا

42. خلال الأيام السبعة الماضية، كم يوم دخن أحد سجارة بحضورك؟

- A. لم يدخن أحد في أي يوم
- B. يوم أو يومان
- C. 3 أو 4 أيام
- D. 5 أو 6 أيام
- E. 7 أيام بكاملها

43. خلال الثلاثين يوماً الماضية، هل جربت أي نوع آخر من أنواع التبغ غير السجائر، مثل النرجيلة؟

- A. لم أدخن النرجيلة في أي يوم خلال الشهر الماضي
- B. يوم أو يومين
- C. 3 إلى 5 أيام
- D. 6 إلى 9 أيام
- E. 10 إلى 19 يوماً
- F. 20 إلى 29 يوماً
- G. 30 يوماً بكاملها

44. كم كان عمرك عندما حاولت تدخين النرجيلة للمرة الأولى؟

- A. لم أدخن النرجيلة أبداً
- B. 7 سنوات أو أقل
- C. 8-9 سنوات
- D. 10-11 سنة
- E. 12-13 سنة
- F. 14-15 سنة
- G. 16-17 سنة
- H. 18 سنة أو أكثر

45. خلال الثلاثين يوماً الماضية، كم يوماً دخنت فيه مدوخ (MEDWAKH)؟

- A. لم أدخن مدوخ في أي يوم خلال الشهر الماضي
- B. يوم أو يومين
- C. 3 إلى 5 أيام
- D. 6 إلى 9 أيام
- E. 10 إلى 19 يوماً
- F. 20 إلى 29 يوماً
- G. 30 يوماً بكاملها

46. من من والديك أو أولياء لأمرك يستخدمون أي نوع من أنواع التبغ؟

- A. لا أحد
- B. والدي أو ولي أمري (ذكر)
- C. والدي أو ولية أمري (أنثى)
- D. كلاهما
- E. لا اعرف

47. هل تعتقد بأن تدخين السجارة يضر بصحتك؟

- A. لا بدون شك
- B. أظن لا
- C. أظن نعم
- D. نعم بدون شك

48. هل تعتقد بأن تدخين النرجيلة يضر بصحتك؟

- A. لا بدون شك
- B. أظن لا
- C. أظن نعم
- D. نعم بدون شك

نسألك في الأسئلة الثمانية التالية عن تناول الكحول مثل البيرة، والعرق والويسكي والنيبيذ والفودكا، والعصائر التي تحتوي على (الكحول، Smirnoff Ice ، Bacardi Breezer ،، BUZZ،XLL الخ). ملاحظة: لا يشمل تناول الكحوليات شرب بضع رشقات من الخمر في الطقوس الدينية مثل المناولة في الكنيسة، كما نعني بكأس واحد أي كوب واحد من أي من هذه المشروبات.

49. كم كان عمرك عندما تناولت اول مشروب كحولي (كاس واحد على الأقل) ؟

- A. لم اتناول أبدا كأسا من الكحول
- B. 7 سنوات أو أقل
- C. من 8 الى 9 سنوات
- D. من 10 الى 11 سنة
- E. من 12 الى 13 سنة
- F. من 14 الى 15 سنة
- G. من 16 الى 17 سنة
- H. 18 سنة أو أكثر

50. خلال الثلاثين يوماً الماضية، كم عدد الأيام التي تناولت فيها مشروب يحتوي على كحول (كأس على الأقل)؟

- A. ولا يوم
- B. من 1 الى 2 يوم
- C. من 3 الى 5 أيام
- D. من 6 الى 9 أيام
- E. من 10 الى 19 يوماً
- F. من 20 الى 29 يوماً
- G. 30 يوماً بكاملها

51. خلال الثلاثين يوماً الماضية، عندما تناولت الكحول، ما هو عدد الكؤوس التي تناولتها في اليوم الواحد؟

- A. لم اتناول اي كحول في الأيام الثلاثين الماضية
- B. اقل من كأس واحد
- C. كأس واحد
- D. كأسين
- E. 3 كؤوس
- F. 4 كؤوس
- G. 5 كؤوس او اكثر

52. خلال الثلاثين يوماً الماضية، كيف كنت تحصل عادةً على الكحول التي كنت تتناولها؟ (اختر جوابا واحدا)

- A. لم اتناول اي كحول في الأيام الثلاثين الماضية
- B. اشتريتها من احد المتاجر، أو من بائع متجول
- C. اعطيت شخصاً آخر نقوداً كي يشتريها لي
- D. حصلت عليها من اصدقائي
- E. حصلت عليها من المنزل
- F. قمت بسرقتها
- G. حصلت عليها بطرق اخرى

53. في حال عرض عليك واحد من افضل اصدقائك الكحول، هل تتناوله؟

- A. أكيد لن اتناوله
- B. على الأرجح لن اتناوله (اتردد في تناوله)
- C. على الأرجح سأتناوله
- D. اكيد سأتناوله

السؤالان التاليان يتناولان حالة الثمالة (السكر). الترنح عند المشي وعدم القدرة على الكلام الصحيح والتقيؤ هي علامات جازمة عن الثمالة أي حالة السكر.

54. في حياتك كلها، كم عدد المرات التي اكثرت فيها من شرب الكحول، حتى اصبحت ثملاً (سكران)؟

- A. لم اتناول ولا مرة كحولا في حياتي
- B. ثملت مرة او مرتين
- C. ثملت من 3 الى 9 مرات
- D. 10 مرات او اكثر

55. في حياتك كلها، كم عدد المرات التي تورطت فيها في مشاكل مع عائلتك او الأصدقاء، او تغيبت فيها عن المدرسة، او تشاجرت فيها مع احد، نتيجة تناولك الكحول؟

- A. تناولت كحول و لكن لم أتورط في مشاكل
- B. تورطت في المشاكل نتيجة تناولي الكحول مرة او مرتين
- C. تورطت في المشاكل نتيجة تناولي الكحول من 3 الى 9 مرات
- D. 10 مرات او اكثر

56. خلال الاثني عشر شهرا الماضية، هل علمك احد عن مخاطر تناول الكحول في أي من الحصص المدرسية ؟

- A. نعم
- B. لا
- C. لا أعرف

تدور الأسئلة الثمانية التالية حول موضوع المخدرات التي تشمل الحشيشة Marijuana، انفيتامين Amphetamines، الكوكايين، المستنشقات، الهيروين، الاكستازي Ecstasy، وكافة الأدوية المهدنة والمنشطة للأعصاب دون وصفة طبية.

57. كم كان عمرك عندما تناولت أي نوع من المخدرات لأول مرة ؟

- A. لم اتناول المخدرات ابدا
- B. 7 سنوات أو أقل
- C. 8 أو 9 سنوات
- D. 10 أو 11 سنة
- E. 12 أو 13 سنة
- F. 14 أو 15 سنة
- G. 16 أو 17 سنة
- H. 18 سنة أو أكثر

58. في حياتك ما هو عدد المرات التي تناولت فيها الحشيشة (marijuana) ؟

- A. لم اتناول الحشيشة ابدا
- B. مرة او مرتين
- C. من 3 الى 9 مرات
- D. من 10 الى 19 مرة
- E. 20 مرة او اكثر

59. خلال الثلاثين يوماً الماضية، ما هو عدد المرات التي تناولت فيها الحشيشة (marijuana) ؟

- A. لم اتناول الحشيشة ابدا
- B. مرة او مرتين
- C. من 3 الى 9 مرات
- D. من 10 الى 19 مرة
- E. 20 مرة او اكثر

60. في حياتك ما هو عدد المرات التي تناولت فيها الأمفيتامينات أو الميثامفيتامين؟
(Captagon, MDMA (Ecstasy), Adderall, Ritalin, Concerta, Ephedrine, Bupropion, or Pseudoephedrine)

- A. لم اتناول الأمفيتامينات أو الميثامفيتامين ابدا
- B. مرة او مرتين
- C. من 3 الى 9 مرات
- D. من 10 الى 19 مرة
- E. 20 مرة او اكثر

61. خلال الثلاثين يوماً الماضية، هل كان لديك فرصة لتجربة المخدرات (شخص قدمها لك أو كنت في صحبة أشخاص يستخدمون المخدرات)، حتى لو لم تقم بتجربتها ؟

- A. نعم
B. لا
C. لا أعرف

62. خلال الاثني عشر شهرا الماضية، أي من هذه الأدوية استخدمتها معظم الوقت بدون وصفة طبية من الطبيب؟ (اختر جوابا واحدا)

- A. لم استخدم الأدوية بدون وصفة طبية أو بشكل مختلف عن وصفة الطبيب خلال ال 12 شهرا الماضية.
B. المهدئات / الحبوب المنومة (مثل Xanax®، Rivotril / Rivo®، Lexotanil / Lexo®، Valium®، Inductal®، Stilnox®، Dormicum® أو غيرها)
C. مسكنات الألم (مثل Vicodin®، Tramal®، Dolosal®، Antalvic®، Solpadeine®، Morphine® أو غيرها)
D. المنشطات (مثل Concerta®، Ritalin® أو غيرها)
E. المضادة للاكتئاب (مثل Prozac®، Zoloft®، Seroxat®، Cipralex®، Effexor®، أو غيرها)
F. غيرها

63. خلال الأشهر الاثني عشر الماضية، كيف حصلت في معظم على الأدوية التي استخدمتها بدون وصفة طبية من الطبيب أو بشكل مختلف عن كيف قال لك الطبيب لاستخدامه؟

- A. لم أكن استخدم دواء بدون وصفة طبية من الطبيب أو بشكل مختلف عن كيف قال لي الطبيب لاستخدامها خلال الأشهر الاثني عشر الماضية
B. أخذته من خزانة تخزين الدواء في المنزل
C. اعطاني إياه أحد أفراد الأسرة
D. اعطاني إياه مجاناً صديق مقرب
E. اشتريته من أحد الأصدقاء
F. اشتريته من صيدلية أعرفها من دون وصفة طبية
G. طبيب صديق للعائلة أعطاه لي
H. حصلت عليه بطريقة أخرى

64. خلال الاثني عشر شهراً الماضية، هل علمك احد في المدرسة مخاطر تناول أو تعاطي المخدرات؟

- A. نعم
B. لا
C. لا أعرف

الأسئلة الأحد عشر التالية تسأل عن مواضيع التربية المتعلقة بالصحة الإيجابية وهي تشمل التحولات خلال المراهقة، البلوغ، الصحة والنظافة الشخصية في المراهقة، الحمل، الأمراض المنقولة جنسياً مثل مرض السيدا/الإيدز والوقاية منها بما فيها من تقييم المخاطر والقدرة على اتخاذ القرارات المناسبة.

65. برأيك متى يجب ان تبدأ التربية حول الصحة الإنجابية؟

- A. قبل سن البلوغ
- B. عند سن البلوغ
- C. عند التحضير للزواج
- D. عند الزواج
- E. لا اعرف

66. هل تؤيد ان تتم مناقشة مواضيع الصحة الإنجابية خلال الحصص المدرسية؟

- A. نعم
- B. لا
- C. لا اعرف

67. هل تفضّل ان تتم مناقشة مواضيع الصحة الانجابية عندما يكون التلامذة مقسمين في مجموعات "للشبان فقط" او "للبنات فقط" (اي غير مختلطة) او خلال مجموعات مختلطة؟

- A. افضل ان تتم المناقشة خلال مجموعات للشبان او للشابات فقط
- B. افضل ان تتم المناقشة خلال مجموعات مختلطة
- C. لا أعرف

68. هل سمعت من قبل عن مرض الإيدز أو مرض السيدا؟

- A. نعم
- B. لا

69. في أي من المصادر التالية تبحث معظم الأحيان عن معلومات حول التهاب السيدا أو مرض الإيدز؟ (اختر جوابا واحدا)

- A. لا أبحث عن معلومات حول التهاب السيدا أو مرض الإيدز
- B. الأهل/ أولياء الأمر
- C. المعلمين / مدرسة
- D. أصدقاء / الأقران
- E. الإنترنت / وسائل الاعلام الاجتماعية
- F. مجلات
- G. تلفزيون / راديو
- H. مصادر أخرى

70. هل سبق لك ان تكلمت مع أهلك أو أولياء امرك عن فيروس أو مرض الإيدز/السيدا؟

- A. نعم
- B. لا

71. هل عندك اصدقاء أقاموا علاقة حميمة؟

- A. لا أحد
- B. عدد قليل منهم
- C. معظمهم
- D. جميعهم
- E. لا أعرف

72. كم كان عمرك عندما أقيمت أول علاقة حميمة؟

- A. لم أقم بأي علاقة حميمة
- B. 11 سنة أو أقل
- C. 12 سنة
- D. 13 سنة
- E. 14 سنة
- F. 15 سنة
- G. 16 أو 17 سنة
- H. 18 سنة أو أكثر

73. هل سبق وقلت لا لشخص أراد إقامة علاقة حميمة معك؟

- A. لا، لم أسئل
- B. نعم، لقد طلب مني، وكنت قادرا على قول لا
- C. نعم، لقد طلب مني ولم أكن قادرا على قول لا
- D. لا أعرف

74. خلال الاثني عشر شهرا الماضية، هل علمك احد خلال الحصص المدرسيّة أو في أي من الأنشطة اللاصفية عن كيفية تجنب الإصابة بفيروس مرض السيدا/الإيدز؟

- A. نعم
- B. لا
- C. لا أعرف

75. خلال الاثني عشر شهرا الماضية، هل علمك احد خلال الحصص المدرسيّة أو في أي من الأنشطة اللاصفية عن كيفية تجنب الحمل او الأمراض المنقولة جنسياً؟

- A. نعم
- B. لا
- C. لا أعرف

الأسئلة الثلاثة التالية تسأل عن النشاط البدني. النشاط البدني هو أي نشاط يرفع وتيرة نبضات قلبك ويجعلك تلهث. إن تنفيذ النشاط البدني يمكن ان يتم خلال حصص الرياضة، او اللعب مع الأصدقاء أو خلال المشي قدوما الى المدرسة أو خلال اي نشاط بدني خارج المدرسة. بعض الأمثلة عن النشاط البدني: الركض، الهرولة (المشي السريع)، ركوب دراجة، الرقص، لعب كرة القدم، لعب كرة السلة.

76. خلال السبعة أيام الماضية، ما هو عدد الأيام التي مارست فيها نشاطا رياضيا خارج المدرسة لمدة 60 دقيقة مثل: كرة الطائرة، كرة السلة، كرة القدم، الركض، الهرولة، السباحة، الرقص، الحركات الرياضية؟

إجمع الوقت الذي قضيته في أي نوع من النشاط الرياضي كل يوم.

- A. ولا يوم
- B. يوم واحد
- C. يومان
- D. 3 أيام
- E. 4 أيام
- F. 5 أيام
- G. 6 أيام
- H. 7 أيام

77. خلال السبعة أيام الماضية، ما هو عدد الأيام التي مشيت أو ركبت الدراجة من أو إلى المدرسة؟

- A. ولا يوم
- B. يوم واحد
- C. يومان
- D. 3 أيام
- E. 4 أيام
- F. 5 أيام
- G. 6 أيام
- H. 7 أيام

78. خلال هذا العام الدراسي، كم مرة تقريبا شاركت في حصة التربية البدنية في المدرسة كل اسبوع؟

- A. ولا يوم
- B. يوم واحد
- C. يومان
- D. 3 أيام

- E. 4 أيام
F. 5 أيام أو أكثر

السؤال التالي يتعلق بالوقت الذي غالبا ما تمضيه في وضعية الجلوس عندما لا تكون في المدرسة أو عندما تنهي فروضك.

79. خلال يوم عادي، كم تمضي من الوقت تقريبا جالسا تشاهد التلفاز أو تلهو بألعاب الكمبيوتر، أو تتحدث مع الأصدقاء أو تفعل أي شيء آخر من الأنشطة التي لا تتطلب الحركة الجسدية مثل : لعب ورق، لعب طاولة، الألعاب الإلكترونية والهواتف الذكية، PlayStation، iPhone، iPad ؟

- A. أقل من ساعة واحدة في اليوم
B. من ساعة الى ساعتين في اليوم
C. من 3 ساعات الى 4 ساعات في اليوم
D. من 5 ساعات الى 6 ساعات في اليوم
E. من 7 ساعات الى 8 ساعات في اليوم
F. أكثر من 8 ساعات في اليوم

السؤال التالي يسأل عن نمط نومك

80. خلال ليلة يوم مدرسي عادي، ما هو عدد ساعات نومك تقريبا ؟

- A. 4 ساعات أو أقل
B. 5 ساعات
C. 6 ساعات
D. 7 ساعات
E. 8 ساعات
F. 9 ساعات
G. 10 ساعات أو أكثر

الاسئلة الثمانية التالية تسأل عن امورك في المدرسة وفي المنزل.

81. خلال الثلاثين يوما الماضية، كم يوم تقريبا تغيبت عن الصف او عن المدرسة بدون موافقة الأهل؟

- A. ولا يوم
B. من يوم الى يومين
C. من 3 الى 5 أيام
D. من 6 الى 9 أيام
E. 10 أيام أو أكثر

82. خلال الثلاثين يوماً الماضية، الى اي مدى كان فيها تلامذة مدرستك لطفاء ومتعاونين معك؟

- A. أبداً لم يكونوا لطفاء ومتعاونين
- B. نادراً (قليلاً جداً)
- C. أحيانا (في بعض الأوقات)
- D. في اكثر الأحيان
- E. دائماً

83. خلال الثلاثين يوماً الماضية، كم مرّة تقريباً قام والداك او أولياء امرك بالتأكد من انك قمت باداء واجباتك المدرسية؟

- A. أبداً ولا مرة
- B. نادراً (قليلاً جداً)
- C. أحيانا (في بعض الأوقات)
- D. في اكثر الأحيان
- E. دائماً
- F.

84. خلال الثلاثين يوماً الماضية، كم مرّة تقريباً شعرت بتفهم والديك او اولياء امرك لمشاكلك وهمومك؟

- A. أبداً ولا مرة
- B. نادراً (قليلاً جداً)
- C. أحيانا (في بعض الأوقات)
- D. في اكثر الأحيان
- E. دائماً

85. خلال الثلاثين يوماً الماضية، كم مرّة تقريباً كان يعرف والداك او أولياء أمرك حقيقة ماذا كنت تفعل في اوقات فراغك؟

- A. أبداً ولا مرة
- B. نادراً (قليلاً جداً)
- C. أحيانا (في بعض الأوقات)
- D. في اكثر الأحيان
- E. دائماً

86. خلال الثلاثين يوماً الماضية، كم مرّة تقريباً اطلع والداك او أولياء أمرك على الأشياء الخاصة بك دون موافقتك؟

- A. أبداً ولا مرة
- B. نادراً (قليلاً جداً)
- C. أحيانا (في بعض الأوقات)
- D. في اكثر الأحيان

E. دائماً

87. خلال الثلاثين يوماً الماضية، كم مرّة تقريباً أخرجك والداك أو أولياء امرك امام الجميع أو الأصدقاء؟

- A. أبداً ولا مرة
- B. نادراً (قليلاً جداً)
- C. أحياناً (في بعض الأوقات)
- D. في أكثر الأحيان
- E. دائماً

88. خلال الثلاثين يوماً الماضية، كم مرّة تقريباً منحك والداك أو أولياء امرك الاهتمام واستمعوا إليك؟

- A. أبداً ولا مرة
- B. نادراً (قليلاً جداً)
- C. أحياناً (في بعض الأوقات)
- D. في أكثر الأحيان
- E. دائماً

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