
Massachusetts Comprehensive Health Curriculum Framework



October, 1999



David P. Driscoll
Commissioner of Education

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Dear Colleagues,

I am pleased to present to you the Massachusetts *Comprehensive Health Curriculum Framework* that was adopted by the Board of Education in September 1999. This second edition of the *Comprehensive Health Curriculum Framework* presents the new statewide guidelines for learning, teaching, and assessment in health for the Commonwealth's public schools. Based on scholarship, sound research, and effective practice, the *Framework* will enable teachers and administrators to strengthen curriculum and instruction from PreKindergarten through grade 12.

I am proud of the work that has been accomplished. The comments and suggestions received on the first edition of the *Comprehensive Health Curriculum Framework* of 1996, as well as comments on subsequent working drafts, have strengthened this new edition. I want to thank everyone who worked with us to create a high quality document that provides challenging learning standards for Massachusetts students.

We will continue to work with schools and districts in implementing the *Comprehensive Health Curriculum Framework* over the next several years, and we encourage you to offer us your comments as you use it. All of the curriculum frameworks are subject to continuous review and improvement, for the benefit of the students of the Commonwealth.

Thank you again for your ongoing support and commitment to achieving the goals of education reform.

Sincerely,

David P. Driscoll
Commissioner of Education

Table of Contents

SECTION I	Overview	5
SECTION II	Introduction	8
SECTION III	Core Concept	10
SECTION IV	Guiding Principles	11
SECTION V	Considerations in Health Education	16
SECTION VI	Strands and Learning Standards	17
	Physical Health Strand	18
	Growth and Development	20
	Physical Activity and Fitness	23
	Nutrition	27
	Reproduction/Sexuality	30
	Social and Emotional Health Strand	33
	Mental Health	35
	Family Life	38
	Interpersonal Relationship	41
	Safety and Prevention Strand	44
	Disease Prevention and Control	46
	Safety and Injury Prevention	49
	Tobacco, Alcohol, and Other Substance Use/Abuse Prevention	52
	Violence Prevention	55
	Personal and Community Health Information Strand	58
	Consumer Health and Resource Management	60
	Ecological Health	63
	Community and Public Health	65
APPENDICES		
	A Massachusetts Guiding Principles and National Standards	68
	B Law & Policy Around Health and Health Education	72
	C Technology Literacy and Health Education	81
REFERENCES AND SOURCES		84
SELECTED RESOURCES		86

Massachusetts Comprehensive Health Curriculum Framework

Massachusetts Comprehensive Health Curriculum Framework

Core Concept

Health Literacy / Healthy Self-Management Skills / Health Promotion

Guiding Principles

Comprehensive Health Education is:

- I. Sequential, PreK–12, Coordinated Teaching of Health, Physical Education, and Family and Consumer Sciences
- II. Assessment of Risks, Consideration of Consequences, and Making Healthy Decisions
- III. Communication of Health Information
- IV. Acknowledgment of Similarities and Differences to Create a Safe and Supportive Environment
- V. Collaboration Among Components to Strengthen the Coordinated School Health Program

Strands

Physical Health	Social & Emotional Health	Safety & Prevention	Personal & Community Health
<p>Standards</p> <ul style="list-style-type: none"> • Growth and Development • Physical Activity & Fitness • Nutrition • Reproduction/ Sexuality 	<p>Standards</p> <ul style="list-style-type: none"> • Mental Health • Family Life • Interpersonal Relationships 	<p>Standards</p> <ul style="list-style-type: none"> • Disease Prevention and Control • Safety and Injury Prevention • Tobacco, Alcohol and Other Substance Use/Abuse Prevention • Violence Prevention 	<p>Standards</p> <ul style="list-style-type: none"> • Consumer Health and Resource Management • Ecological Health • Community and Public Health

PreK–12 Standards

Pre-K–12 Standards

Growth & Development	Students will learn the basic characteristics of physical growth and development, including body functions and systems throughout the life cycle, and will acquire skills to promote and maintain positive growth and development.
Physical Activity & Fitness	Students will, by repeated practice, acquire and refine a variety of manipulative, locomotor, and non-locomotor movement skills, and will utilize principles of training and conditioning, will learn biomechanics and exercise physiology, and will apply the concept of wellness to their lives.
Nutrition	Students will gain the knowledge and skills to select a diet that supports health and reduces the risk of illness and future chronic diseases.
Reproduction/Sexuality	Students will acquire the knowledge and skills necessary to make effective personal decisions that promote their emotional, sexual, and reproductive health.
Mental Health	Students will acquire knowledge about emotions and physical health, the management of emotions, personality and character development, and social awareness; and will learn skills to promote self-acceptance, make decisions, and cope with stress, including suicide prevention.
Family Life	Students will gain knowledge about the significance of the family on individuals and society, and will learn skills to support the family, balance work and family life, be an effective parent, and nurture the development of children.
Interpersonal Relationships	Students will learn that relationships with others are an integral part of the human life experience and the factors that contribute to healthy interpersonal relationships, and will acquire skills to enhance and make many of these relationships more fulfilling through commitment and communication.
Disease Prevention & Controls	Students will learn the signs, symptoms, and treatment of chronic and communicable diseases, and will gain skills related to health promotion, disease prevention, and health maintenance.
Safety & Injury Prevention	Students will gain the knowledge and skills to administer first aid and carry out emergency procedures, including cardiopulmonary resuscitation, will avoid, recognize, and report verbal, physical, and emotional abuse situations, and will assess the factors that contribute to intentional and unintentional injury, including motor vehicle accidents, fire safety, and weapons safety.
Tobacco, Alcohol, & other Substances	Students will acquire the knowledge and skills to be competent in making health-enhancing decisions regarding the use of medications and avoidance of substances, and in communicating about substance use/abuse prevention for healthier homes, schools, and communities.
Violence Prevention	Students will learn how their actions affect others, will understand the power that positive character traits can have in violence prevention, will gain skills to report incidents of violence and hurtful behavior to adults in the school and community, will avoid engaging in violence, and identify constructive alternatives to violence, including how to discourage others from engaging in violence.
Consumer Health & Resource Management	Students will acquire the knowledge and skills necessary to obtain, manage, and evaluate resources to maintain physical and mental health and well being for themselves, their family, and the community.
Ecological Health	Students will gain knowledge of the interdependence between the environment and physical health, and will acquire skills to care for the environment.
Community & Public Health	Students will learn the influence of social factors on health and contribution of public health, and will gain skills to promote health and to collaborate with others to facilitate healthy, safe, and supportive communities.

Overview

Core Concept

Through health literacy, healthy self-management skills, and health promotion, comprehensive health education teaches fundamental health concepts, promotes habits and conduct that enhance health and wellness, and guides efforts to build healthy families, relationships, schools, and communities.

Fundamental health knowledge and skills need to be taught starting in pre-kindergarten and early elementary years, and reinforced and expanded regularly in subsequent grades. A planned, sequential curriculum addresses a variety of topics with increasing degrees of complexity appropriate to students' developmental levels as they move from early to middle childhood and then into adolescence. Such a program ensures thorough, balanced coverage of health content areas, and its success relies on skilled teachers who readily adapt to incorporate emerging health topics.

Guiding Principles

Comprehensive Health education teaches students fundamental health concepts and skills that foster healthy habits and behaviors for the individual and others through **sequential and coordinated teaching** of health education, physical education, and family and consumer sciences education at each grade level, prekindergarten through grade 12.

Comprehensive Health education teaches students to use fundamental health concepts to **assess risks**, to consider potential consequences, and to make health enhancing decisions.

Comprehensive Health education teaches skills that assist students to understand and **communicate** health information clearly for self-management and health promotion.

Comprehensive Health education contributes to the capacity of students to work in a positive manner with families, school staff, peers, and community members to enhance personal health and create **a safe and supportive environment** where individual similarities and differences are acknowledged.

Comprehensive Health education is strengthened through **collaboration** and partnerships among all components of the coordinated school health program and other subjects.

Strands and Standards

STRAND	PREK–12 STANDARDS
<p>Physical Health Strand Students will recognize decisions that all individuals will make with respect to their bodies in daily living and identify the relationships among actions, conduct and wellness.</p>	<p>PreK–12 Standard 1 GROWTH AND DEVELOP <i>Students will learn the basic characteristics of physical growth and development, including body functions and systems throughout the life cycle, and will acquire skills to promote and maintain positive growth and development.</i></p> <p>PreK–12 Standard 2 PHYSICAL ACTIVITY & FITNESS <i>Students will, by repeated practice, acquire and refine a variety of manipulative, locomotor, and non-locomotor movement skills, and will utilize principles of training and conditioning, will learn biomechanics and exercise physiology, and will apply the concept of wellness to their lives.</i></p> <p>PreK–12 Standard 3 NUTRITION <i>Students will gain the knowledge and skills to select a diet that supports health and reduces the risk of illness and future chronic diseases.</i></p> <p>PreK–12 Standard 4 REPRODUCTION/SEXUALITY <i>Students will gain the knowledge and skills necessary to make effective personal decisions that promote their emotional, sexual, and reproductive health.</i></p>
<p>Social and Emotional Health Strand Students will develop the top skills needed in daily life as they come to learn about their identity and how to manage interactions with other people.</p>	<p>PreK–12 Standard 5 MENTAL HEALTH <i>Students will acquire knowledge about emotions and physical health, the management of emotions, personality and character development, and social awareness; and will learn skills to promote self-acceptance, make decisions, and cope with stress, including suicide prevention. .</i></p> <p>PreK–12 Standard 6 FAMILY LIFE <i>Students will gain knowledge about the significance of the family on individuals and society, and will learn skills to support the family, balance work and family life, be an effective parent, and nurture the development of children. .</i></p> <p>PreK–12 Standard 7 INTERPERSONAL RELATIONSHIPS <i>Students will gain the knowledge and skills necessary to understand that relationships with others are an integral part of the human life experience and the factors that contribute to healthy interpersonal relationships, and will acquire skills to enhance and make many of these relationships more fulfilling through commitment and communication.</i></p>
<p>Safety and Prevention Strand Students will learn how they make decisions and weigh the probable consequences of their actions.</p>	<p>PreK–12 Standard 8 DISEASE PREVENTION AND CONTROL <i>Students will learn the signs, symptoms, and treatment of chronic and communicable diseases, and will gain skills related to health promotion, disease prevention, and health maintenance.</i></p> <p>PreK–12 Standard 9 SAFETY AND INJURY PREVENTION <i>Students will gain the knowledge and skills to administer first aid and carry out emergency procedures, including cardiopulmonary resuscitation, will avoid, recognize, and report verbal, physical, and emotional abuse situations, and will assess the factors that contribute to intentional and unintentional injury, including motor vehicle accidents, fire safety, and weapons safety.</i></p> <p>PreK–12 Standard 10 TOBACCO, ALCOHOL & OTHER SUBSTANCE USE/ABUSE PREVENTION <i>Students will acquire the knowledge and skills to be competent in making health-enhancing decisions regarding the use of medications and avoidance of substances, and in communicating about substance use/abuse prevention</i></p>

	<p><i>for healthier homes, schools, and communities.</i></p> <p>PreK–12 Standard 11 VIOLENCE PREVENTION</p> <p><i>Students will understand how their actions affect others, will understand the power that positive character traits can have in violence prevention, will gain skills to report incidents of violence and hurtful behavior to adults in the school and community, will avoid engaging in violence, and identify constructive alternatives to violence, including how to discourage others from engaging in violence.</i></p>
<p>Personal and Community Health Strand</p> <p>Develop a clearer understanding of their personal, social and civic responsibilities by acting on accurate information to improve health in their communities.</p>	<p>PreK–12 Standard 12 CONSUMER HEALTH AND RESOURCE MANAGEMENT</p> <p><i>Students will acquire the knowledge and skills necessary to obtain, manage, and evaluate resources to maintain physical and mental health and well being for themselves, their family, and the community.</i></p> <p>PreK–12 Standard 13 ECOLOGICAL HEALTH</p> <p><i>Students will gain knowledge of the interdependence between the environment and physical health, and will acquire skills to care for the environment.</i></p> <p>PreK–12 Standard 14 COMMUNITY AND PUBLIC HEALTH</p> <p><i>Students will understand the influence of social factors on health and the contribution of public health, and will gain skills to promote health and to collaborate with others to facilitate healthy, safe, and supportive communities.</i></p>

Introduction

The purpose of the Massachusetts Comprehensive Health Curriculum Framework is to provide guidance for Massachusetts school districts in designing local programs to guide the acquisition of the knowledge, skills, and habits needed by students. Comprehensive health education includes health education, physical education, and family and consumer sciences education. Teachers within these subjects need to work collaboratively with counselors, school nurses, nutrition services staff, other teachers, families, and students from pre-kindergarten through grade 12.

The Framework synthesizes current research and sets learning standards for students from pre-kindergarten through grade twelve. The Framework presents a broad outline upon which Massachusetts school health curricula, instruction, and locally designed and administered assessments can be based.

Organization of the Health Curriculum Framework

- The **Core Concept** presents the fundamental purpose of a comprehensive health curriculum.
- The **Guiding Principles** direct and inform health education and the building of school communities that promote the health and well being of students, families, teachers, and staff.
- The **Strands** organize the areas included in comprehensive health education as outlined in the Massachusetts General Laws, particularly Chapter 71. (see Appendix B)
- The **PreK-12 Standards** define topic oriented content and set expectations for knowledge and skills that students should acquire from their study in health.
- The **Learning Standards** reflect measurable student competencies and are grade span specific (PreK-5, 6-8, 9-12). Selected examples are provided in the Framework.
- The **Interdisciplinary Learning Objectives** included in several Health strands provide sample opportunities to address health content within other subject areas, i.e., History & Social Sciences and Mathematics.
- The **Appendices** present (A) a comparison of the Massachusetts Health Curriculum Framework Guiding Principles with the National Standards for Health Education, Physical Education and Family and Consumer Sciences; (B) selected Laws and Policies relating to Health Education in Massachusetts schools; and (C) guidance on developing Technology Literacy Skills through Health Education.
- The **Selected Resources and Health Websites** provide quick reference to sources of Health Education information.

This Health Framework is built upon the work of the panel who developed the first Health Framework. The current Health Framework was developed by a committee of Massachusetts teachers of health, physical education, family and consumer sciences, health educators from higher education, physicians, and school nurses. The Health Framework is intended to be used in conjunction with the other Massachusetts Curriculum Frameworks to make connections among all subjects.

There are specific areas of particular relevance to health education. Two of these that are notable are the links between health and school performance, and health education and family involvement.

Education in all subjects can be more effective when health is a priority throughout the school. Health and learning are closely related. Students who are unhealthy or troubled are students whose learning may not be optimal. Because good health is linked with better school performance, schools have a vested interest in preventing risk behaviors that have a negative impact on health.¹ For example, students who use tobacco products can experience difficulty concentrating. Alcohol and drug use impairs the brain's ability to process information, form memories, and recall information. Teen pregnancy is related to dropping out of school. Poor nutrition decreases cognitive functioning in the areas of language, concentration, alertness, and attention.

Some students who have participated in school health education programs, compared to similar students who have not participated in such programs, have increased cognitive development and awareness, better school attendance, higher graduation rates, increased goal-setting, and better application of decision-making skills. Certain components of the school health program have also been found to be related even more directly to school performance. For example, after controlling for other explanatory factors, participation in school breakfast programs was associated with increased scores in mathematics, language, and reading, and with decreases in school absence and tardiness. Similar results have been found with students who participated in more comprehensive school health programs. For example, students at risk for school failure who participated in school-linked health and human services had improved grades and earned more credits compared to similar peers who did not receive such services.

Even as adults, education is related to less involvement in certain risk behaviors and higher participation in healthy behaviors. The results of a recent survey conducted by the Massachusetts Department of Public Health among Massachusetts adults found a relationship between more years of education and several health related behaviors, such as lower rates of smoking, eating the recommended daily allowance of fruits and vegetables, and participation in recommended levels of physical activity.

Today, Massachusetts students face many potential health problems related to their social environment, but the risk behaviors associated with these problems are largely preventable. Comprehensive health education addresses the knowledge and skills for both reducing risk behaviors and increasing actions and habits that increase wellness.

A major component of comprehensive school health education is parental and family involvement. Parents and families are their children's first and continuing teachers and they influence the health decisions that are made by their children. Family and community involvement is important in the planning of appropriate health education and in strengthening health lessons and skills development. Schools have historically worked side by side with families and communities to promote acceptable standards of conduct and the attributes that foster them, such as civility and being responsible for one's actions. Health education supports this through an emphasis on skills of decision-making, problem-solving, and critical thinking for responsible conduct.

Comprehensive health education occurs in relation to many contextual factors. Health sometimes involves sensitive topics that may have social, economic, genetic, or religious implications. Of note, Massachusetts public schools must notify parents before implementing curriculum that involves human sexuality. The approach of the Massachusetts Comprehensive Health Curriculum Framework is to encourage each district to work with family and community members in the development and implementation of the health education curriculum in the schools of that district.

¹ The following research is cited in the References and Sources of the Framework.

Core Concept

Through health literacy, self-management skills, and health promotion, comprehensive health education teaches fundamental health concepts, promotes habits and conduct that enhance health and wellness, and guides efforts to build healthy families, relationships, schools, and communities.

Health Literacy focuses on acquisition of knowledge and includes:

- the capacity to obtain, understand, and evaluate health information and services;
- learning about physical changes and how the body functions; and
- knowledge of the relationship between movement and health.

Through reading, observation, discussion, and actions students learn to locate information and assess its reliability, make reasoned decisions based on accurate information, and apply their knowledge to their own health and safety. Students learn what it is to be healthy, about development, and about the importance of physical fitness in their overall level of health and wellness. Health literacy is critical for healthy self-management and health promotion.

Healthy Self-Management enables students to:

- integrate and apply knowledge and skills with respect to their health-related decisions, actions, and conduct;
- learn to assume increased responsibility for their health-related decisions, actions, and conduct; and
- consider potential consequences and evaluate outcomes.

Healthy self-management entails self-assessment, goal setting, and decision-making based on an understanding of risk and probability. By practicing a repertoire of developmentally appropriate behaviors that promote health, students can significantly increase the likelihood of good physical, emotional, cognitive, social, and environmental health.

Health Promotion helps students demonstrate:

- competence in using information and services;
- how to present accurate information about health; and
- the capability to respond to health concerns, including emergencies.

Knowledge and good communication skills are critical to health promotion. Students learn how to present factual information about health in ways that promote responsible actions while still considering the rights of individuals. Health promotion can take many forms. By contributing to improvements in the health of the natural environment and the physical safety of their communities, students learn what can be accomplished by an individual as well as by a group. Students work with families, school staff, and community members to determine concrete steps they can take to build a strong social fabric that fosters positive growth and development.

Fundamental health knowledge and skills need to be taught starting in pre-kindergarten and early elementary years, and reinforced and expanded regularly in subsequent grades. A planned, sequential curriculum addresses a variety of topics with increasing degrees of complexity appropriate to students' developmental levels as they move from early to middle childhood and then into adolescence. Such a program ensures thorough, balanced coverage of health content areas, and its success relies on skilled teachers who readily adapt to incorporate emerging health topics.

Guiding Principles

The Massachusetts Curriculum Frameworks define and describe what all students should know, understand, and be able to do as a result of the education provided to them in the Commonwealth's public schools. The inclusion of comprehensive health education as a major component of the Massachusetts Curriculum Frameworks signals the fundamental importance of health and learning. Comprehensive health education imparts health knowledge and assists students in developing skills which promote health-enhancing behaviors. The guiding principles emphasize the importance of learning and practicing both content and skills as complimentary elements of sequentially planned, developmentally appropriate health education Pre-K through Grade 12. The following principles highlight the most important ideas that should inform the design of all comprehensive health education programs in Massachusetts.

Guiding Principle 1

*Comprehensive Health education teaches students fundamental health concepts and skills that foster healthy habits and behaviors for the individual and others through **sequential and coordinated teaching** of health education, physical education, and family and consumer sciences education at each grade level, prekindergarten through grade 12.*

Comprehensive health education provides a foundation in public health, medical knowledge, and modes of inquiry into how individuals and societies acquire their health-related knowledge, and empowers students to change unhealthy attitudes and behaviors. Students learn factual information and develop skills for finding and evaluating information and resources, for making decisions, and for setting goals to promote their own health and the health of others. These others may include family, friends, coworkers, neighbors, etc. Physical education focuses on body dynamics, movement, physical fitness, competition, and teamwork. Family and Consumer Sciences education examines the concepts of personal living, family life, parenting, work, nutrition, and consumerism.

Health education, physical education, and family and consumer sciences education each contribute to comprehensive health education. Together they increase students' knowledge of health concepts, life management skills, and habits that can facilitate lifelong health for the individual and for others. To be most effective, health should be taught regularly, beginning with a student's entry into school and continuing through grade 12. A sequential curriculum introduces concepts and skills in the early grades and reinforces them with more detailed and complex information and skills in the later grades.

Guiding Principle II

Comprehensive Health education teaches students to use fundamental health concepts to assess risks, to consider potential consequences, and to make health enhancing decisions.

Comprehensive health education equips students to assess risks in an informed manner in their everyday lives. Students learn how to identify and evaluate various types and degrees of health risk and become aware of specific behaviors that pose risks for themselves and others, now and in the future. Students learn how to determine the likely consequences of their actions and how to determine which information is needed to assess health risks and to make responsible decisions. Influences on personal health, including why people relapse into unhealthy conduct and behaviors and how relapse can sometimes be prevented, are important health concepts.

Comprehensive health education teaches students to inquire and solve problems competently. Students set goals, appraise risks, and demonstrate behaviors and conduct that protect and enhance their health. In this way, and in partnership with families and communities, health education supports the resilience of students.

Guiding Principle III

*Comprehensive Health education teaches skills that assist students to understand and **communicate** health information clearly for self-management and health promotion.*

Comprehensive health education teaches students to identify health information and resources that are current and applicable to their lives. Students learn the types of questions to ask and information to provide when talking with health professionals.

In our society, health information is communicated through a variety of means, such as through health care providers, the media, including professional publications, and health-related events. Through health education, students acquire media literacy by learning to determine if health information is accurate, with whom to share health information, and how to avoid communicating inaccurate information. Health education provides criteria for interpreting conflicting health research and in finding resources for independent research into health topics.

Guiding Principle IV

*Comprehensive Health education contributes to the capacity of students to work in a positive manner with families, school staff, peers, and community members to enhance personal health and create **a safe and supportive environment** where individual similarities and differences are acknowledged.*

Comprehensive health education provides opportunities for students to join with their families, peers, school staff, and community members to build safe schools and communities. As with the other Frameworks, health contributes to learning about similarities and differences among students.

Health education helps students recognize that personal health is part of the dynamic interaction between individuals and their social environments. Students study ways in which peers, families, mentors, groups, and institutions foster healthy attitudes and expectations of success. Students examine protective factors that support healthy behaviors and habits. Students learn how health promotion is related to caring appropriately for their own health needs and showing others how to maintain and improve their health. Comprehensive health education supports the connections between physical, emotional, cognitive, and social health.

Health education helps students recognize conditions that would make their school safe and accepting of the dignity and worth of all individuals regardless of race, gender, disability, sexual orientation, religion, or social or economic background. Students learn about the kinds of activities that build trust and community, the importance of a broad coalition in these activities, and how to make known the presence of support services in their school and community.

Guiding Principle V

*Comprehensive Health education is strengthened through **collaboration** and partnerships among all components of the coordinated school health program and other subjects.*

The components of a coordinated school health program include classroom-based education as well as program components that are support or service oriented. (*see Figure 1*)

- Comprehensive Health Education (PreK–12)
 - Health Education
 - Physical Education
 - Family and Consumer Sciences Education

- Support and Service Components
 - Food and Nutrition Services
 - Health Services
 - Counseling, Psychological, and Social Services
 - Parent, Family, and Community Involvement
 - Health Promotion for Staff
 - Safe and Healthful School Environment

Health education, physical education, and family and consumer sciences teachers collaborate with other school health program staff to connect students with services and activities and provide a healthy school environment for students. When these components are linked in a planned, coherent, mutually supportive system, they reinforce health knowledge and skills as well as attitudes and behaviors that help students stay healthy.

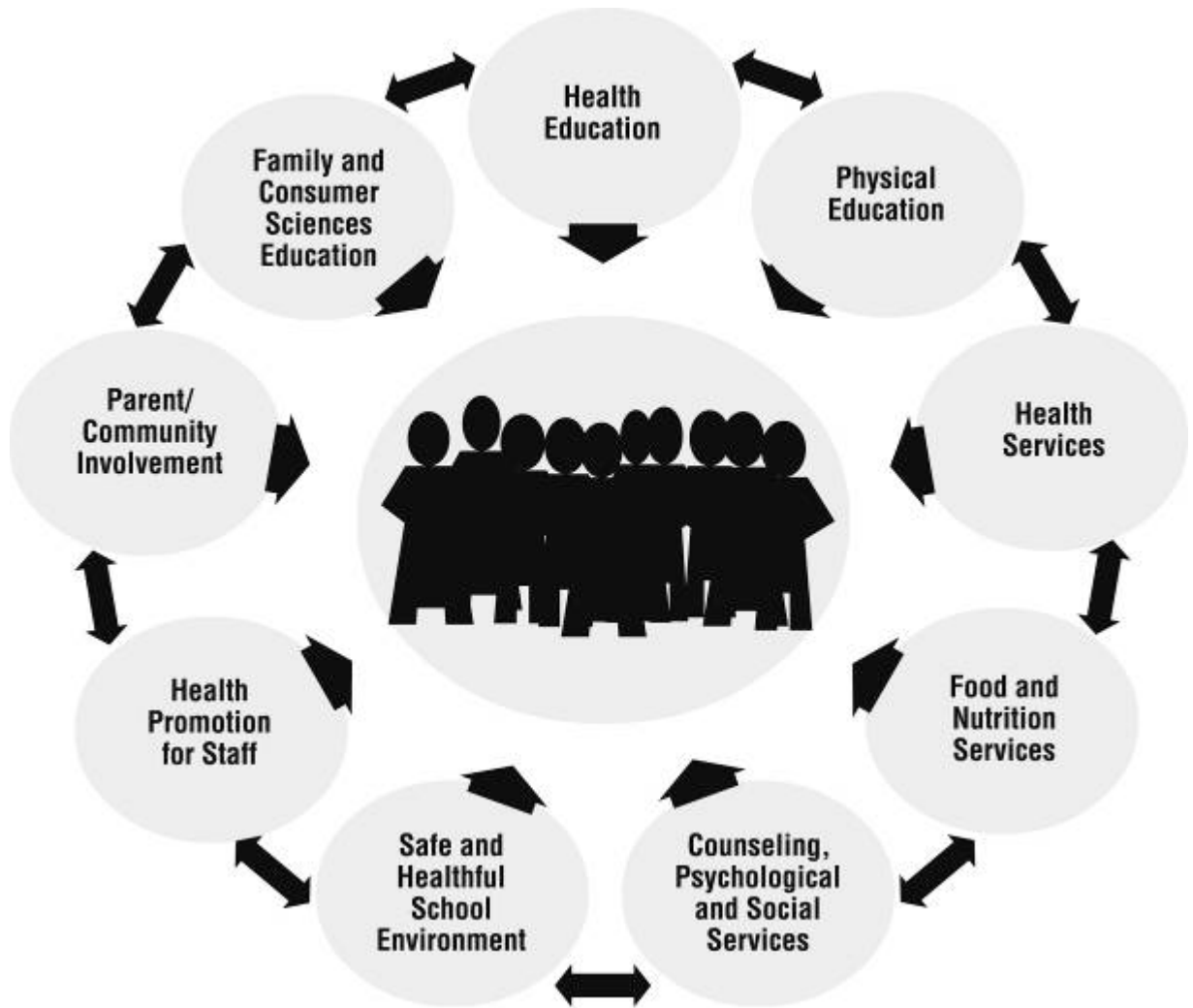
For example:

- Health services, food and nutrition services, and psychological and counseling services provide direct services to students.
- Health education involves families in the life of the school, helping them to support students' academic achievement and health.
- Health promotion programs for staff enable teachers and other staff members to recognize the importance of lifelong health, and to model healthy behaviors for students.

A safe and healthy school environment is a necessity for successful teaching and learning. When instruction and services work together, they can build alliances with the community that improve physical, educational, and social outcomes for all students. The district health coordinator is integral in planning and facilitating the implementation of a comprehensive and coordinated school health program.

Comprehensive health education is also related to other subjects in many ways. For example, health information that is based on scientific and quantitative research is linked to mathematics, science, and technology/engineering. The study of epidemiology and the effect of health on shaping human affairs are a part of the study of history. When health education focuses on human relationships it is connected to the social sciences. Health education is connected with practicing movement and behavioral skills and therefore has natural affinities with the performing arts. Health education focuses on communication skills and accurate reporting, which draw heavily on English language arts. Conversations in foreign language classrooms often include discussions of health-related areas such as food, families, household management, and vocabulary of directional movement, physical activities, and sports.

Figure 1: Components of a Massachusetts Comprehensive School Health Education Program



Suggested Activity for Collaboration Among Components of Coordinated School Health Program

The following activity is a sample of how the staff of a school health coordinated program can collaborate to teach a lesson that goes beyond the classroom for a fuller, more in-depth understanding of a specific health topic.

Lesson: Nutrition education and risk reduction for cardiovascular disease

Health Education

- Conduct classroom lessons in nutrition and its relationship to cardiovascular disease
- Invite guest speaker from American Heart Association to present on the topic.

Family and Consumer Sciences Education

- Practice reading fat content from food labels.
- Develop a heart healthy menu for one day.
- Prepare a reduced fat version of a favorite recipe.

Food and Nutrition Services

- Reduce the availability of high fat foods for lunch and replace with popular low fat options.
- Display educational posters around the cafeteria explaining benefits of fruits, vegetables, and grains.

Physical Education

- Have students participate in an aerobic activity and develop a cardiovascular fitness log to monitor their weekly progress.

Health Services

- Discuss dietary concerns with students one-on-one and do confidential growth assessments.
- Make referrals for students and their families to outside resources regarding diet and nutrition as needed.

Community Services

- Provide school contact with information about teen nutrition center program at local hospital or community health center.
- Create a referral process with the school.

Source: Adapted from *ASCD Curriculum Handbook*, 1995.

Considerations in Health Education

Health education addresses knowledge and skills as well as personal and social development. Knowledge and skills form the foundation of health education, while attention to personal and social aspects contributes to a more complete view of health education. Attributes internal to the individual and factors external to the individual both influence health decisions.

Health education is a field marked by rapid changes due to the pace at which medical breakthroughs occur. Through science, technology, business, and industry, we continue to gain a deeper understanding of disease related to genetics and the environment as well as a greater understanding of prevention and treatment options. In addition, single events occur that often influence health. The knowledge base in health therefore can change swiftly and is often informed by science, technology, business, and industry. The development of new knowledge and skills is often necessary for good health.

Attention to the physical, cognitive, and social/emotional development of students increases the likelihood of an effective health education program. Changes in behavior and capacities that are relatively enduring refer to development that occurs physically and psychologically. Development is an interaction between learning and maturation, and is also cumulative in nature. Much of health education has to do with the teaching of knowledge about physical changes as well as skills for the maintenance of the body. Physical education programs are specifically designed for the changes of the body throughout childhood and adolescence, in particular taking into consideration the skills that will be possible and the interests that children of different developmental periods have toward physical activities as related to maturation. Understanding of cognitive development is useful in teaching the concepts of health education in such a way as to best match with students' cognitive capabilities. Emotional and social development are integral to health education and awareness of these informs the teaching of health education in a way that is developmentally appropriate and addresses topics that coincide with the interests and concerns of students.

Within the research-based strategies that have been found to improve the effectiveness of health education, the following are among the most consistently supported in the health education research literature:

- Present health information that is accurate and current.
- Adopt curriculum, instruction, and assessment strategies that guide students toward self-directed, independent, and cooperative learning and living in line with real-life experiences.
- Incorporate materials, teaching methods, and outcomes that are appropriate to the age, experience, background, and readiness of the students.
- Employ a variety of teaching methods to involve participants, including experiential activities, role-play, and problem solving.
- Establish positive school climate by enlisting the involvement, support, and participation of students, parents, business and industry, voluntary and governmental agencies, and community leaders.

Strands and Learning Standards

Physical Health Strand

Physical Health includes those aspects of health that are often the most salient in our immediate lives and related closely to the natural progression inherent in human development. The knowledge and skills presented are the foundation for individual control over many of the factors related to a healthy lifestyle. The areas covered share common goals in their emphasis and focus on building and maintaining healthy habits.

The Strand of Physical Health includes:

- Growth and Development
- Physical Activity & Fitness
- Nutrition
- Reproduction/Sexuality

Growth and Development addresses the study of the structure and function of body systems, including how body systems function as a whole and their interdependence, throughout the human life cycle.

Physical Activity and Fitness addresses physical development. Knowledge about how the body functions increases awareness of the benefits of physical activity and fitness.

Nutrition addresses the development of a healthy body composition through the balance of food intake and physical activity and the relationship between food sources and behaviors and growth, current health needs and chronic disease, and healthy behaviors.

Reproduction/Sexuality encompasses emotional and social elements with a focus on factual knowledge about physical development.

The Physical Health Strand is designed to provide a foundation for good health. The maintenance of the body is related to the development of positive health care behaviors and habits. The purpose of this Strand is to enable students to recognize decisions that all individuals will make with respect to their bodies in daily living and to identify the relationships among actions, conduct, and wellness.

Note: Selected examples are provided.

Sample Learning Scenario for the Physical Health Strand

“How It Looks in the Classroom”

Middle school students walk into their physical education class in the gym and stare silently at an eight-foot wall. All at once they start chattering excitedly,

“I’ve been waiting for this. So, this is what a ‘Ropes’ course is, where are the ropes?”

Mrs. Cruz enters the gym, “Okay, everyone, your assignment today is to get everyone over the wall. We’ll do this in small teams. I’m going to set some ground rules . . .”

Afterwards, as students cool down from the physical exertion, Mrs. Cruz has them discuss what they’ve learned from the experience.

“I learned I can do something I was afraid of.”

“I found I can do something difficult alone.”

“Some things take more than one person.”

“I learned you can come up with an answer when you work together.”

“You have to have a plan to make it happen.”

Mrs. Cruz paraphrases, “So, you learned about communicating and working together as well as individual achievement?”

She asks additional questions to provoke more thought on the group effort at solving problems and teamwork, highlighting sensitivity to physical, mental, and emotional differences. Mrs. Cruz assigns each team the task of writing about their experiences for the school newspaper.

This activity can help students reinforce or achieve the following learning standards in this and in the other Frameworks:

Physical Activity

- movement concepts and game strategies *Learning Standard 2.14*
- responsible conduct *Learning Standard 2.7*
- interrelationships with emotional health and social environments *Learning Standard 2.12*

Mental Health

- decision-making *Learning Standard 5.5*

Interpersonal Relationships

- communication *Learning Standard 7.5*

History and Social Science: Civics and Government

- working effectively alone and with others

Growth and Development:

Growth and Development addresses the study of the structure and function of body systems, including how human body systems function as a whole and their interdependence, throughout the human life cycle.

The study of Growth and Development provides understanding of the complex process of natural progression through the life cycle as heredity and the environment influence it. By recognizing that growth and development have a reciprocal relationship and each of the body systems contributes to the survival and health of the total system, students can better see the influence that behavior has on health and overall well being. Growth and Development are fostered by responsible actions and conduct related to health needs and health concerns. The concepts learned in Growth and Development can contribute to decisions about caring for oneself and others. Topics generally covered in Growth and Development include: Body Systems and Life Cycle.

PreK–12 Standard 1: Growth and Development

Students will learn the basic characteristics of physical growth and development, including body functions and systems throughout the life cycle, and will acquire skills to promote and maintain positive growth and development.

Growth and Development

PreK–12 STANDARD 1: Growth and Development

Students will learn the basic characteristics of physical growth and development, including body functions and systems throughout the life cycle, and will acquire skills to promote and maintain positive growth and development.

GRADE LEVEL	LEARNING STANDARDS
By the end of grade 5	<p>Through the study of Body Systems students will</p> <p>1.1 Name the external and internal parts of the body and the body systems (nervous, muscular, skeletal, circulatory, respiratory, digestive, endocrine, and excretory systems)</p> <p>1.2 Identify behaviors and environmental factors that influence functioning of body systems</p> <p>1.3 Identify appropriate accommodations and aids for people with physical disabilities</p> <p><i>For example, students tour the school to determine all wheelchair accessible features and create a map of the school with these features labeled that can be displayed in the school</i></p> <p>1.4 Distinguish the characteristics of living and non-living organisms</p> <p>List the stages in the basic growth process of living organisms (fertilization, growth, reproduction, and death)</p>
By the end of grade 8	<p>Through the study of Body Systems students will</p> <p>1.6 Identify the stages of the human life cycle (from prenatal through late adulthood)</p> <p>1.7 Explain the function of human body systems and how body systems work together</p> <p><i>For example, in small groups, students create a puzzle from a diagram of the body with systems represented. To receive a puzzle piece, students tell how that system works. Before connecting the piece with others, students tell how it is interrelated with any other systems (pieces) it will be touching</i></p> <p>1.8 Describe the influence of health habits on growth and development</p> <p>1.9 Apply skills that increase immediate peak functioning of body systems (vigorous exercise, eating nutritious foods, adequate rest)</p> <p>Through the study of the Life Cycle students will</p> <p>1.10 Define genes and the concept of heredity</p>
By the end of grade 12	<p>Through the study of Body Systems students will</p> <p>1.11 Describe the impact of behavior and environment on failure of body systems (nervous, muscular, skeletal, circulatory, respiratory, endocrine, and excretory systems)</p> <p><i>For example, students design a maze or circuitry system that represents the human body. Include both obstacles and enhancements to functioning.</i></p> <p>Through the study of the Life Cycle students will</p> <p>1.12 Describe the growth patterns and body changes within human beings throughout the life cycle (from prenatal through late adulthood), including critical periods in growth and development</p> <p><i>For example, students design a dietary and/or exercise plan for each stage of life, giving a rationale for the choices</i></p>

	1.13 Describe how both heredity (including congenital factors) and the environment influence growth and development
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Physical Activity and Fitness:

Physical Activity and Fitness focuses on individual competence and versatility in movement skills, understanding movement concepts and body dynamics, and relating physical activity to lifelong health. Wellness captures the combination of activity and fitness and a healthy lifestyle.

Students can increase their awareness of the benefits of physical activity and fitness through knowledge about how the body functions. By identifying and experiencing the relationship of exercise to overall health, applying important social skills and safety in physical activity, integrating learning movement with other modes of learning, and practicing strategies to respond to stress, students can enhance their overall health and wellness. Topics generally covered in Physical Activity and Fitness include: Motor Skill Development, Fitness, and Personal and Social Competency.

PreK–12 Standard 2: Physical Activity and Fitness

Students will, by repeated practice, acquire and refine a variety of manipulative, locomotor, and non-locomotor movement skills, and will utilize principles of training and conditioning, will learn biomechanics and exercise physiology, and will apply the concept of wellness to their lives.

Physical Activity and Fitness

PreK–12 STANDARD 2: Physical Activity and Fitness

Students will, by repeated practice, acquire and refine a variety of manipulative, locomotor, and non-locomotor movement skills, and will utilize principles of training and conditioning, will learn biomechanics and exercise physiology, and will apply the concept of wellness to their lives.

GRADE LEVEL	LEARNING STANDARDS
By the end of grade 5	<p>Through the study of Motor Skill Development students will</p> <p>2.1 Apply movement concepts including direction, balance, level (high, low), pathway (straight, curve, zigzag), range (expansive, narrow), and force absorption (rigid, with bent knees) to extend versatility and improve physical performance</p> <p><i>In pairs, students practice throwing and catching different objects, then hitting a target. Observe partner and use movement concepts to provide feedback</i></p> <p>2.2 Use a variety of manipulative (throwing, catching, striking), locomotor (walking, running, skipping, hopping, galloping, sliding, jumping, leaping), and non-locomotor (twisting, balancing, extending) skills as individuals and in teams</p> <p>2.3 Perform rhythm routines, including dancing, to demonstrate fundamental movement skills</p> <p>Through the study of Fitness students will</p> <p>2.4 Identify physical and psychological changes that result from participation in a variety of physical activities</p> <p>2.5 Explain the benefits of physical fitness to good health and increased active lifestyle</p> <p>2.6 Identify the major behaviors that contribute to wellness (exercise, nutrition, hygiene, rest, and recreation, refraining from using tobacco, alcohol, and other substances)</p> <p>Through the study of Personal and Social Competency students will</p> <p>2.7 Demonstrate responsible personal and social conduct used in physical activity settings</p>
By the end of grade 8	<p>Through the study of Motor Skill Development students will</p> <p>2.8 Use combinations of manipulative, locomotor, and non-locomotor skills to develop movement sequences and patterns, both individually and with others</p> <p>2.9 Demonstrate developmentally appropriate basic manipulative and advanced specialized physical skills, including throwing and catching different objects with both accuracy and force, hand and foot dribbling while preventing an opponent from challenging, and accurate striking proficiency</p> <p>2.10 Perform a rhythm routine that combines traveling, rolling, balancing, and weight transfer into smooth flowing sequences with intentional changes in direction, speed, and flow</p> <p><i>Students create gymnastics or dance routines using objects (such as balls and flags)</i></p> <p>Through the study of Fitness students will</p> <p>2.11 Apply basic principles of training and appropriate guidelines of exercise to improve immediate and long-term physical fitness</p>

	<p><i>Students select an exercise related to one component of physical fitness (such as using proper sit-ups to increase endurance and strength of abdominal muscles, swimming laps to increase cardiorespiratory endurance). Record and graph the progress made over six weeks</i></p> <p>2.12 Participate in activities that promote physical fitness, decrease sedentary lifestyle, and relieve mental and emotional tension</p> <p>2.13 Explain the personal benefits of making positive health decisions and monitor progress towards personal wellness</p> <p>Through the study of Personal and Social Competency students will</p> <p>2.14 Apply advanced movement concepts and beginning game strategies to guide and improve individual and team performance</p> <p>2.15 Demonstrate strategies for inclusion of all students in physical activity settings related to strength and speed</p> <p><i>In teams, students identify and try various ways for players of different abilities to participate fully</i></p> <p>2.16 Describe the purpose and benefits of sports, games, and dance in modern society</p> <p><i>Students choose and participate in a game, sport, or dance and trace its history and its place in contemporary times</i></p>
By the end of grade 12	<p>Through the study of Motor Skill Development students will</p> <p>2.17 Demonstrate developmentally appropriate competence (basic skills, strategies, and rules) in many and proficiency in a few movement forms and motor skills (team sports, aquatics, individual/dual sports, outdoor pursuits, self-defense, dance, and gymnastics)</p> <p>2.18 Demonstrate activities for warming up and cooling down before and after aerobic exercise</p> <p>2.19 Apply concepts about sequential motor learning and development, biomechanics, exercise physiology, and sports psychology</p> <p>Through the study of Fitness students will</p> <p>2.20 Demonstrate exercises in strength training, cardiovascular activities, and flexibility training</p> <p>2.21 Identify the components of physical fitness and the factors involved in planning and evaluating fitness programs for individuals at different stages of the life cycle</p> <p>2.22 Conduct a personally developed physical activity program</p> <p><i>Students participate daily in any physical activity and keep a journal for one-month recording specifics (such as aerobic endurance, flexibility, and strength) and description of physical and psychological states before, during, and after participation. At the end of the month, summarize with personal recommendations regarding the amount and regularity of activity, as well as beliefs about future commitment to a daily or weekly schedule of exercise</i></p> <p>2.23 Meet developmentally appropriate health-related fitness benchmarks</p> <p>Through the study of Personal and Social Competency students will</p> <p>2.24 Identify life-management skills and protective factors that contribute to achieving personal wellness health goals, including researching, evaluating, and implementing strategies to manage personal wellness, monitor progress, and revise plans</p> <p><i>Students work with school health services to create personal risk profiles. After completing the</i></p>

	<p><i>forms, use research-based strategies to develop a plan to reduce risks identified. Implement the plan, determine points at which to monitor, do the monitoring, revise plan, and assess at a later point</i></p> <p>2.25: Understand how activity participation patterns are likely to change throughout life and identify strategies to deal with those changes, including a plan for life-long wellness</p> <p>2.26: Apply safe practices, rules, procedures, and sportsmanship etiquette in physical activity settings, including how to anticipate potentially dangerous consequences and outcomes of participation in physical activity</p> <p>2.27: Define the functions of leadership in team sports (increasing motivation, efficiency, and satisfaction)</p> <p><i>Students participate in an adventure activity in which they must work together to accomplish a group goal. At completion, based upon observations and student performance, self-report on contributions</i></p>
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Nutrition:

Nutrition addresses the development of a healthy body composition through the balance of food intake and physical activity. Nutrition includes many concepts, such as the relationships among food choices and growth, nutrition guidelines, food insecurity, current health needs, chronic disease, and a healthy lifestyle.

An adequate and healthy intake of food and nutrients is essential for students to take full advantage of the learning environment in school. Thus, students of all ages need the knowledge and skills to make wise food choices in the contemporary food environment and throughout their lives. Instruction in Nutrition includes evaluation of food promotion and media messages regarding realistic body size and shape, and consumer and nutrition skills needed to select appropriate foods in varied settings. Topics generally covered in Nutrition include: Improving Nutrition, Safe and Adequate Food Supply, and Social Influences.

PreK–12 Standard 3: Nutrition

Students will gain the knowledge and skills to select a diet that supports health and reduces the risk of illness and future chronic diseases.

Nutrition

PreK–12 STANDARD 3: Nutrition

Students will gain the knowledge and skills to select a diet that supports health and reduces the risk of illness and future chronic diseases.

GRADE LEVEL	LEARNING STANDARDS
By the end of grade 5	<p>Through the study of Improving Nutrition students will</p> <p>3.1 Identify the key nutrients in food that support healthy body systems (skeletal, circulatory) and recognize that the amount of food needed changes as the body grows</p> <p>3.2 Use the USDA Food Guide Pyramid and its three major concepts of balance, variety, and moderation to plan healthy meals and snacks</p> <p>3.3 Recognize hunger and satiety cues and how to make food decisions based upon these cues</p> <p><i>Sponsor a potluck lunch in the class and ask students to select and eat servings one at a time so that they eat slowly until their appetite is satisfied. Ask them to pay attention to their feelings of hunger and satiety. Students discuss their experiences</i></p> <p>3.4 Identify heredity, diet, and physical activity as key factors in body shape and size</p> <p>Through the study of Safe and Adequate Food Supply students will</p> <p>3.5 Identify the connection between food served in the home with regional food production</p> <p><i>Students interview a person in the home who prepares food to determine how food choices change according to season</i></p> <p>3.6 Describe personal hygiene and safety measures used in preparing foods</p> <p>Through the study of Social Influences students will</p> <p>3.7 Describe how food choices are influenced by availability, individual and family preferences, media, and background, and identify healthy foods within various social groups</p>
By the end of grade 8	<p>Through the study of Improving Nutrition students will</p> <p>3.8 List the functions of key nutrients and describe how the United States Dietary Guidelines relate to health and the prevention of chronic disease throughout the life span</p> <p><i>Working with the school food services director, students develop a menu that meets the requirements of the Federal School Meals Initiative for Healthy Children for different ages</i></p> <p>3.9 Describe a healthy diet and adequate physical activity during the adolescent growth spurt</p> <p>3.10 Describe the components of a nutrition label and how to use the information from labels to make informed decisions regarding food</p> <p>3.11 Analyze dietary intake and eating patterns</p> <p><i>Using diet analysis software, students input a sample diet of an adolescent, review key nutrients, and write a list of recommendations to improve the diet and eating behavior of the adolescent</i></p> <p>Through the study of Safe and Adequate Food Supply students will</p> <p>3.12 Explain factors associated with a safe food supply (food handling, production, food storage,</p>

	<p>and preparation techniques)</p> <p>Through the study of Social Influences students will</p> <p>3.13 Identify the behaviors and avenues of support for young people with disordered eating behaviors or eating disorders</p>
By the end of grade 12	<p>Through the study of Improving Nutrition students will</p> <p>3.14 Describe how food choices are influenced by availability, individual and family preferences, media, and background, and identify healthy foods within various social groups</p> <p>3.15 Explain the relationships among dietary intake (including nutritional supplements), eating behaviors, physical activity, and emotional health</p> <p><i>Students develop an exercise schedule and plan and prepare a menu for a meal that includes foods for people who need to gain or lose weight</i></p> <p>3.16 Describe the nutritional needs and outcomes associated with life stages (prenatal through late adulthood)</p> <p>Through the study of Safe and Adequate Food Supply students will</p> <p>3.17 Identify the effects of food preparation techniques on the nutritional value of the food</p> <p>3.18 Identify common food-borne illnesses</p> <p>3.19 Identify and practice resource management skills needed to maintain and improve nutritional health</p> <p><i>Working within a budget, students plan a week of nutritious meals for a family of four. Prepare one of these meals and evaluate for nutritional value, taste, and aesthetic appeal</i></p> <p>Through the study of Social Influences students will</p> <p>3.20 Identify and analyze dietary plans, costs, and long-term outcomes of weight management programs</p> <p>3.21 Identify how social and cultural messages about food and eating influence nutrition choices</p> <p><i>Students develop and deliver a presentation to the school health advisory council on the links promoted by the media to teens between smoking and nutrition choices, such as weight management</i></p>

Reproduction/Sexuality:

Reproduction/Sexuality involves physical development, emotions, and social elements. Instruction incorporates aspects of biology, psychology, sociology, literature, the arts, and philosophy.

The study of Reproduction/Sexuality provides young people with the knowledge and skills necessary to make informed choices. It addresses decisions about abstaining from and postponing sexual intercourse. Knowledge about how to avoid sexually transmitted infections that endanger one's health and well being as well as that of a partner is an important component of instruction. Communication skills can support such decisions. Addressing Reproduction/Sexuality in an appropriate and factual fashion leads to informed young people, increasing the likelihood of students making healthy decisions. It is particularly important in Reproduction/Sexuality to consider developmental appropriateness. Topics generally covered in Reproduction/Sexuality include: Development and Wellness.

Note: Please see parental notification law in Appendix B.

PreK–12 Standard 4: Reproduction/Sexuality

Students will acquire the knowledge and skills necessary to make effective personal decisions that promote their emotional, sexual, and reproductive health.

Reproduction/Sexuality

PreK–12 STANDARD 4: Reproduction/Sexuality

Students will acquire the knowledge and skills necessary to make effective personal decisions that promote their emotional, sexual, and reproductive health.

GRADE LEVEL	LEARNING STANDARDS
By the end of grade 5	<p>Through the study of Development students will</p> <p>4.1 Identify the components, functions, and processes of the reproductive system <i>Students label the functions and/or systems of the reproductive system on a blank diagram</i></p> <p>4.2: Identify the physical changes as related to the reproductive system during puberty <i>Invite the school nurse or a health care professional who specializes in children to discuss the changes that take place in boys and girls at puberty</i></p> <p>4.3 Define sexual orientation using the correct terminology (such as heterosexual, and gay and lesbian)</p>
	<p>Through the study of Wellness students will</p> <p>4.4 Recognize that diet, exercise, rest, and avoidance of risk behaviors such as smoking, drinking, and other substance use contribute to the health of a mother and fetus <i>Students write short answers to define the types of sexual orientation</i></p>
By the end of grade 8	<p>Through the study of Development students will</p> <p>4.5 Recognize the emotional and physical changes as related to the reproductive system during puberty</p> <p>Through the study of Wellness students will</p> <p>4.6 Explain the benefits of abstinence, postponing sexual behavior, and setting limits on sexual behavior</p> <p>4.7 Describe short- and long-term consequences of sexuality-related risk behaviors and identify barriers and supports for making health-enhancing decisions <i>Students discuss consequences around sexuality decisions. Determine and role-play steps that improve decision-making (such as with whom to consult, information overlooked)</i></p> <p>4.8 Describe behaviors and methods for pregnancy prevention, including abstinence</p> <p>4.9 Define the types of sexually transmitted infections (STIs), including HIV/AIDS, and how they are prevented <i>Students report on the policies of various states and countries regarding STIs prevention among youth</i></p> <p>4.10: Identify sexual discrimination and harassment <i>Students use current events or media portrayal to discuss the consequences of discrimination based on sexual orientation</i></p>
By the end	Through the study of Development students will

<p>of grade 12</p>	<p>4.11 Identify the stages of the male and female reproductive systems over the life cycle</p> <p>4.12: List the signs of pregnancy</p> <p>4.13 Describe the effectiveness and consequences of various pregnancy, HIV, and STI prevention methods, including abstinence</p> <p><i>Students identify ways to prevent pregnancy and sexually transmitted infections</i></p> <p>4.14 Identify possible determinants of sexual orientation and analyze the weight of each in light of available research</p> <p>Through the study of Wellness students will</p> <p>4.15 Explain the importance of examination of both genders for HIV and STIs before conception and the risks and precautions of delivery when HIV and STIs are present</p> <p>4.16 Describe proper prenatal care and identify types of birth defects</p> <p>4.17 Explain the importance of communication and setting limits in a sexual relationship</p> <p>4.18 Identify and distinguish among types and degrees of sexual risk (pregnancy, sexual assault, STIs, including HIV/AIDS)</p> <p>4.19 Evaluate the impact of HIV/AIDS on the community, medical resources, and family</p> <p>4.20 Identify resources available for treatment of reproductive health problems</p>
<p>Grades 9–12</p>	<p>Interdisciplinary Objectives: Reproduction/Sexuality</p> <p>4.a. (Law and Policy. Connects with History & Social Science: Civics & Government)</p> <p>Identify and explain laws about reproductive services</p> <p>4.b. (Law and Policy. Connects with History & Social Science: Civics & Government)</p> <p>Explain the laws and relevant court rulings concerning rights about consensual sexual relationships and reproduction (e.g., <i>Roe v. Wade</i>, <i>Bowers v. Hardwick</i>)</p>

Social and Emotional Health Strand

Social and Emotional Health includes those aspects of health that are particularly unique to human beings, namely being aware of ourselves, both as individuals and as members of social groups. The knowledge and skills presented in this Strand address and support our ability to interact with others in positive and socially acceptable ways.

The Strand of Social and Emotional Health includes:

- Mental Health
- Family Life
- Interpersonal Relationships

Mental Health includes information for personal development of knowledge and skills as well as social awareness as it relates to attitudes and behaviors. Being able to identify feelings and emotions that are common to everyone and explore how people are affected physically and emotionally by these feelings are important aspects of emotional health.

Family Life focuses on the importance of the family as a basic unit of society and the many responsibilities within a family.

Interpersonal Relationships helps students to understand that people do not live in isolation from others and therefore the ability to achieve healthy relationships is critical.

The Social and Emotional Health Strand is designed to promote skills that students need in daily life as they come to learn about their identity and how to manage interactions with other people. Supporting the development of a broad concept of the self enables students to understand the struggle to achieve success and to manage stress appropriately. Students understand how others can help them establish realistic expectations of success for them. The purpose of this Strand is to provide students with the opportunity to develop a positive sense of self and to understand their place in relationships with peers, family, and community members.

Note: Selected examples are provided.

Sample Learning Scenario for the Social and Emotional Health Strand

“How It Looks In the Classroom”

In addition to interviewing parents, Ms. Walter's high school family and consumer sciences class uses simulated parenting experiences to reflect on the question, “Am I ready to be a parent?” To represent a child, students use a five-pound bag of flour covered with a white tube sock with stuffing for its head. Each student is given an index card with the gender of the infant and the amount of money saved for expenses or available as support. Students are instructed to keep the infant with them at all times or place it under the care of a trusted person. At the end of two weeks, students submit a budget, their daily logs, and describe how the experience influenced their thinking about parenthood. Working together, the health teacher and teachers of other subjects with these students in their classes, plan a series of lessons that incorporate the “parenting” experience. In economics, students learn how to develop and keep a budget. The rationale for the importance of and correct method for recording observations are taught in science. In language arts, the class reads literature about parenting and learns journal keeping. In history and social science, students study the changes in the relationship of parent and child from farming to an urban setting along with the changes in the family that accompanied the Industrial Revolution.

This activity can help students reinforce or achieve the following learning standards in this and in the other Frameworks:

Family Life

- skills, maturity, and resources for parenting *Learning Standard 6.11*
- healthy environment for children *Learning Standard 6.10*
- teen parenting *Learning Standard 6.14*

Interpersonal Relationships

- commitment *Learning Standard 7.17*

Mental Health

- decision-making *Learning Standard 5.1*
- gender roles and major life tasks *Learning Standard 5.15*

History and Social Science: Economics

- saving money

Science and Technology/Engineering: Inquiry

- recording and interpreting data

English Language Arts: Literature

- theme of a selection representing a view of or comment on life

Mental Health:

Mental Health includes information to increase the development of knowledge and skills specific to one's inner life, as well as social awareness as it relates to attitudes and conduct. Mental Health is a multidimensional area involving all aspects of living, and is manifested in terms of emotional and social well being. Personality, character, heredity and environmental factors, self-esteem, and decision-making influence mental health.

Being able to identify feelings and emotions felt by all people and to explore how human beings are affected physically and psychologically by these feelings are important aspects of instruction in Mental Health. Skills development around the decision-making process, coping, resolving conflicts, and self-actualization can improve mental and emotional well being. Topics generally covered in Mental Health include: Feelings and Emotions, Identity, and Decision Making.

PreK–12 Standard 5: Mental Health

Students will acquire knowledge about emotions and physical health, the management of emotions, personality and character development, and social awareness; and will learn skills to promote self-acceptance, make decisions, and cope with stress, including suicide prevention.

Mental Health

PreK–12 STANDARD 5: Mental Health

Students will acquire knowledge about emotions and physical health, the management of emotions, personality and character development, and social awareness; and will learn skills to promote self-acceptance, make decisions, and cope with stress, including suicide prevention.

GRADE LEVEL	LEARNING STANDARDS
By the end of grade 5	<p>Through the study of Feelings and Emotions students will</p> <p>5.1 Identify the various feelings that most people experience and describe the physical and emotional reactions of the body to intense positive and negative feelings</p> <p><i>Students draw a picture of their family members after the birth of an additional family member and give an oral interpretation in small groups</i></p> <p>5.2: Apply methods to accommodate a variety of feelings in a constructive manner in order to promote well being</p> <p>Through the study of Identity students will</p> <p>5.3 Define character traits such as honesty, trustworthiness, self-discipline, respectfulness, and kindness and describe their contribution to identity, self-concept, decision-making, and interpersonal relationships</p> <p>5.4 Describe the effects of leadership skills on the promotion of teamwork</p> <p>Through the study of Decision Making students will</p> <p>5.5 Explain and practice a model for decision-making that includes gathering information, predicting outcomes, listing advantages and disadvantages, identifying moral implications, and evaluating decisions</p> <p><i>Students design a poster showing the steps used to solve a problem and post it in the classroom</i></p> <p>5.6 Explain how coping skills (such as perceiving situations as opportunities, taking action/exerting control where possible) positively influence self-concept</p>
By the end of grade 8	<p>Through the study of Feelings and Emotions students will</p> <p>5.7 Identify and describe the experience of different feelings (such as elation, joy, grief, and rage) and how feelings affect daily functioning</p> <p><i>After reading literature in which a young person experienced an intense feeling, students write a poem about the feeling(s) the character experienced</i></p> <p>5.8: Identify the causes and effects of depression and how to seek help.</p> <p>Through the study of Identity students will</p> <p>5.9 Describe the relationships among physical appearance, changes in the body, and self-concept and esteem</p> <p>Through the study of Decision Making students will</p> <p>5.10 Describe the contribution of a personal support system to good mental health</p> <p><i>Students compile a list of people available in the family, school, and community to help with</i></p>

By the end of grade 12	<i>decisions, to be a friend, or to ask advice</i>
	<p>Through the study of Feelings and Emotions students will</p> <p>5.11 Analyze healthy ways to express emotions and to cope with feelings, including the common causes of stress, its effects on the body, and managing stress</p> <p>5.12: Identify the factors that help people deal with grief</p> <p>5.13 Analyze research on health behaviors and brain chemistry and emotional functioning</p> <p style="padding-left: 40px;"><i>Students evaluate the latest research on eating breakfast and mood</i></p> <p>Through the study of Identity students will</p> <p>5.14 Describe theories of personality development, including identity formation, and differentiate among the concepts of ideal self, public self, and private self</p> <p>5.15 Describe the influence of gender on identity and self-concept</p> <p style="padding-left: 40px;"><i>Students have a class discussion on the influence of group stereotypes about gender roles on identity and self-concept</i></p> <p>5.16 Describe the signs of destructive behavior, and identify intervention strategies and kinds of professional intervention</p> <p style="padding-left: 40px;"><i>Working with the school counselors, students discuss signs of suicide and to whom to go to for help</i></p> <p>5.17 Identify common mental health disorders (for example, anxiety, schizophrenia, and mood, including depression and bipolar) and treatments (for example, psychological, biomedical)</p> <p>Through the study of Decision Making students will</p> <p>5.18 Identify ways in which decision-making is influenced by sound character, family, and personal beliefs</p> <p>5.19 Explain positive techniques for handling difficult decisions</p> <p style="padding-left: 40px;"><i>Students review Department of Public Health pamphlets on working teens and resources, then invite a speaker from this agency to address various conflict resolution strategies in the workplace</i></p>

Family Life:

Family Life focuses on the importance of the family as a basic unit of society and the many responsibilities within a family. Family Life highlights the diverse perspectives, needs, and characteristics of families and the internal and external supports that families rely on throughout the family life cycle. Family Life addresses parenting in a world where technology and research provide new information and options on a regular basis.

A critical focus of Family Life is helping students understand that while families differ, there are many similarities within all families. Through the study of Family Life, students can gain an understanding that a family, regardless of its composition, fulfills certain critical needs. Resilience can be fostered by the recognition that many factors may affect the stability and health of a family, but that many supports are available to help families. Family Life focuses on parenting as a choice and as a major responsibility. Both emotional maturity and parenting skills are necessary for child rearing. The development of good character in children is one important responsibility for parents and families. Understanding the stages of child development will make parenting more successful for both the child and the parent. Topics generally covered in the study of Family Life include: Functions and Purposes, Supports, and Parenting.

PreK–12 Standard 6: Family Life

Students will gain knowledge about the significance of the family on individuals and society, and will learn skills to support the family, balance work and family life, be an effective parent, and nurture the development of children.

Family Life

PreK–12 STANDARD 6: Family Life

Students will gain knowledge about the significance of the family on individuals and society, and will learn skills to support the family, balance work and family life, be an effective parent, and nurture the development of children.

GRADE LEVEL	LEARNING STANDARDS
By the end of grade 5	<p>Through the study of Functions and Purpose students will</p> <p>6.1 Describe different types of families, addressing membership and social influences, and the functions of family members</p> <p>6.2: Describe factors, such as character traits of individuals and life events, that can strengthen families</p> <p><i>As a class, design a bulletin board collage on the many different things adults know and are able to do. Discuss why a person with these skills, experiences, talents, and information would be a good person to talk to when you have a problem or have experienced a success</i></p> <p>Through the study of Supports students will</p> <p>6.3 Identify whom to talk with about family problems and successes</p> <p>Through the study of Parenting students will</p> <p>6.4 Identify what parents do to provide a safe, healthy environment for their children</p>
By the end of grade 8	<p>Through the study of Decision Making students will</p> <p>6.5 Describe how the functions, purposes, and responsibilities of family members change with life events</p> <p><i>Students list events (such as new baby, remarriage, or grandparent moving in) that can lead to changes in family composition and analyze their possible influence on family life</i></p> <p>6.6 Explain the family life cycle and recognize that raising a child is one of the most important functions of a family</p> <p>Through the study of Supports students will</p> <p>6.7 Describe those one can trust or turn to for help when needed, such as a support system that can include relatives, friends, neighbors, community organizations, and faith-based groups</p> <p>Through the study of Parenting students will</p> <p>6.8 Describe ways in which relationships among parents and children change during adolescence, and compare peer and parental influences</p>
By the end of grade 12	<p>Through the study of Decision Making students will</p> <p>6.9 Explain the functions, purposes, and social significance of family from various historical periods, including modern times</p> <p><i>Students view films that show changes in families in the last 50 years and identify what constants appear (e.g., caring for each other) and what changes appear evident (e.g., role changes in household and parenting tasks)</i></p> <p>6.10 Identify the traits of a healthy family (such as responsibility, communication, trust, loyalty, respect, commitment, love, affirmation, and self-reliance) and explain the interdependence and</p>

	<p>independence of family members</p> <p>Through the study of Supports students will</p> <p>6.11 Identify steps for getting support or help, including identifying resources for families whose members have special health needs</p> <p>Through the study of Parenting students will</p> <p>6.12: Identify the child-rearing skills (including emotional maturity to nurture children and knowledge of child development stages) and the financial resources needed for parenting</p> <p><i>In supervised small groups, students respond to the developmental and health needs of young children in a child care setting and evaluate skills with the supervisor</i></p> <p>6.13: Evaluate various types of discipline parents might use with children of different ages</p> <p>6.14: Describe the consequences of teen parenting from the perspectives of the teen mother, teen father, and the parents of the teens</p> <p>6.15: Identify desirable character traits (such as love, respectfulness, generosity, kindness, and forgiveness) and describe the development of good character, including the role of parents and family in the moral development of children</p> <p>6.16: Describe considerations relevant to becoming a parent (including the various ways of becoming a parent such as foster parenting, adoption, and stepparenting)</p> <p>6.17: Describe parental practices that encourage literacy in young children</p> <p><i>Design a pamphlet summarizing research and activities for parents to promote literacy in their young children. Have an early childhood specialist evaluate the pamphlet and provide feedback to students</i></p>
<p>Grades 9–12</p>	<p style="text-align: center;">Interdisciplinary Objective: Family Life</p> <p>6.a. <i>(Law and Policy. Connects with History & Social Science: Civics and Government)</i> Identify laws related to child abuse</p>

Interpersonal Relationships:

Interpersonal Relationships focuses on the importance of sound and stable relationships with other people with whom individuals share their lives, such as family, friends, co-workers, and community members. Communication skills are an essential component to help build safe and long-lasting relationships throughout the life cycle. Equally important are character attributes such as respect and responsibility, which are essential for healthy personal development, caring interpersonal relationships, and a humane and democratic society.

Instruction in Interpersonal Relationships facilitates students' understanding that very few events in life occur in isolation from other people, so the ability to achieve healthy relationships is critical for well being. This is especially true for major life events such as starting school, going away to college, entering the workforce, marriage, or child rearing. Students learn about the different kinds of relationships that people can have, such as neighborly relationships, family relationships, peer and friend relationships, and romantic relationships. Instruction in Interpersonal Relationships highlights the recognition that each person has internal personal choices and decisions to make regarding relationships, as well as providing the knowledge about the many external factors that can affect those relationships. Skills and strategies to relate to others as well as the recognition of the contribution of personality and good character to relationships can be learned through health education programs that address Interpersonal Relationships. Topics generally covered in Interpersonal Relationships include: Communication, Peer Relationships, and Romantic Relationships.

Note: Please see parental notification law in Appendix B.

PreK–12 Standard 7: Interpersonal Relationships

Students will learn that relationships with others are an integral part of the human life experience and the factors that contribute to healthy interpersonal relationships, and will acquire skills to enhance and make many of these relationships more fulfilling through commitment and communication.

Interpersonal Relationships

PreK–12 STANDARD 7: Interpersonal Relationships

Students will learn that relationships with others are an integral part of the human life experience and the factors that contribute to healthy interpersonal relationships, and will acquire skills to enhance and make many of these relationships more fulfilling through commitment and communication.

GRADE LEVEL	LEARNING STANDARDS
By the end of grade 5	<p>Through the study of Communication students will</p> <p>7.1 Explain why communication is essential in human relationships and identify people from whom children can learn how to communicate, such as family members, friends, community members, and members of faith-based groups</p> <p>7.2 Apply both verbal and non-verbal communication skills to develop positive relationships and improve the social environment of the school</p> <p><i>Students design posters, bulletin boards or web page components on the theme of the 3R's—Responsibilities, Rights, and Respect. Include examples of conduct and policies that reflect the 3R's in the school</i></p> <p>Through the study of Peer Relationships students will</p> <p>7.3 Describe the concept of friendship and contrast qualities that strengthen or weaken a friendship, including the importance of sound character in interacting with others</p> <p>7.4 Describe the concepts of prejudice and discrimination</p>
By the end of grade 8	<p>Through the study of Communication students will</p> <p>7.5 Apply attentive listening, feedback, and assertiveness skills to enhance positive interpersonal communication</p> <p>Through the study of Peer Relationships students will</p> <p>7.6 Explain how peer pressure influences choices and apply strategies for managing negative peer pressure and encouraging positive peer pressure</p> <p><i>Students identify risk-taking behaviors that a teen might consider. Working in small groups, practice and evaluate refusal skills for those risk behaviors that are dangerous</i></p> <p>7.7 Recognize the positive contribution of character traits (such as tolerance, honesty, self-discipline, respectfulness, and kindness) to relationships, the benefit to relationships which include understanding and respecting individual differences, and the detrimental effect of prejudice (such as prejudice on the basis of race, gender, sexual orientation, class, or religion) on individual relationships and society as a whole</p> <p>Students read literature on prejudice and write a paper on how it can cause conflict in communities</p> <p>Through the study of Romantic Relationships students will</p> <p>7.8: Describe the purpose of dating and acceptable dating attitudes (such as respect) and appropriate conduct</p> <p><i>Students identify social interaction patterns among young people and compare the functions</i></p>

	<p><i>those patterns serve in developing relationships with others. Invite the school counselor to discuss appropriate and inappropriate conduct in pre-adolescent friendships and dating</i></p> <p>7.9 Explain the benefits of abstinence, postponing sexual behavior, and setting limits on sexual behavior</p>
<p>By the end of grade 12</p>	<p>Through the study of Communication students will</p> <p>7.10 Identify techniques for handling anger and resolving conflicts in the family, friendships, and the workplace, including seeking help from professional and community organizations and faith-based groups</p> <p>7.11 Contrast the emotional impact on long-term relationships of positive communication (such as active listening, praise, and humor) with negative communication (such as teasing, name calling, bullying)</p> <p>7.12 Describe the influence of the larger social group on individual conduct (such as giving comfort, solving problems, and controlling deviant behavior through enforcing laws and the development of good character in the members of society)</p> <p>7.13 Explain the importance of communication in setting limits in a sexual relationship</p> <p>Through the study of Peer Relationships students will</p> <p>7.14 Explain the purpose of friendship in different stages of the life cycle and describe how friends can support one another in making healthy decisions</p> <p>7.15 Recognize and identify the concept of friendship without romantic involvement and how friendship may develop into romantic relationships</p> <p>Through the study of Romantic Relationships students will</p> <p>7.16 Explain the importance of responsibility and character traits such as love, respectfulness, generosity, kindness, and forgiveness, in committed relationships.</p> <p>7.17 Describe commitment in casual and serious relationships</p> <p>Students create skits that deal with various decisions made at the developmental stages of relationships. Videotape and analyze the skits with regard to the different decisions people might be faced with in these relationships</p>

Safety and Prevention Strand

Safety and Prevention includes those aspects of health most often related to risky and dangerous behaviors and conduct that can have negative life-long consequences on health. The topics are of particular importance for young people who are at the age when many of these behaviors are being contemplated. The knowledge and skills presented in the Personal Safety Strand provide a means for young people to avoid risky behavior, now and in the future, so that they can lead healthier lives.

The Strand of Safety and Prevention includes:

- Disease Prevention and Control
- Safety and Injury Prevention
- Tobacco, Alcohol, and Other Substance Use/Abuse Prevention
- Violence Prevention

Disease Prevention and Control focuses on factors contributing to chronic, degenerative, and communicable diseases, genetic factors, methods for detection, and strategies for prevention. Attention to these factors is present in many of the other areas in the Framework as well.

Safety and Injury Prevention includes information to promote knowledge and skills for personal safety and prevention and treatment of intentional or unintentional injury.

Tobacco, Alcohol, and Other Substance Use/Abuse Prevention addresses safe and unsafe substances, how these substances can affect the body and health, and the significance of drug dependence.

Violence Prevention addresses verbal and physical actions that bring harm to a person's body, feelings, or possessions and the aspects of sound character and conflict resolution that can reduce the incidence and influence of violence on individuals, families, and communities.

The Safety and Prevention Strand is designed to help students examine how they make decisions and weigh the probable consequences of their actions. Students consider risk in their personal lives, including the need to take risks such as standing up for one's opinion and the need to avoid other risks associated with dangerous situations or actions. The purpose of this Strand is to inform students so they may apply and defend health-enhancing decisions.

Note: Selected examples are provided.

Sample Learning Scenario for the Safety & Prevention Strand

“How It Looks in the Classroom”

Mr. Bradley's health class sometimes sounds like a movie set. Students raise their voices in role-play as Alicia and her friends argue about accepting a ride home from Mike who is drunk and refuses to let Tommy drive his car for him. Mike and Alicia's friends try to reason with Mike who takes hold of Alicia's arm. “Cut!” Mr. Bradley stops the action and begins a class discussion of the situation: What were the individual characters thinking and feeling? Why did some onlookers intervene and others move out of the way? What risks were involved—for Alicia? for Mike? for Tommy? What other strategies might have helped in this situation? Using role-play, the class is able to practice dealing with the decisions and the risks they may face in real life situations. Students choose between various writing assignments such as writing different endings for the situation with an interpretation based on the questions raised by the oral discussion or to research and write a report on adolescent drinking and driving.

This activity can help students reinforce or achieve the following learning standards in this and in the other Frameworks:

Tobacco, Alcohol, and Other Substance Use/Abuse Prevention

- influence of substances *Learning Standard 10.9*
- making informed decisions *Learning Standards 10.11, 10.13*

Safety and Injury Prevention

- personal responsibility *Learning Standard 9.8*
- accidents and injuries *Learning Standard 9.13*

Violence Prevention

- refusal skills *Learning Standard 11.18*

Interpersonal Relationships

- purpose of friendship *Learning Standard 7.14*

History and Social Science: History

- individual choices, action, and character

English Language Arts: Composition

- research open-ended questions

Disease Prevention and Control:

Disease Prevention and Control focuses on factors contributing to the development of chronic, degenerative, and communicable diseases, including genetic and environmental factors. Disease Prevention and Control addresses methods for detection and strategies for prevention of chronic and communicable diseases. Maintaining good health is a topic of importance in Disease Prevention and Control. **Because disease prevention and control is integral to health, these elements are also addressed in other specific areas of the Framework.**

Study in Disease Prevention and Control conveys the important message that students have a considerable measure of control over their health. The contribution of science and technology engineering has added greatly to disease prevention and control. Chances of contracting most illnesses can be greatly influenced by students' health-related choices and decisions. While the effects of heredity must be considered, behaviors and decisions also affect the development of such chronic diseases as cardiovascular disease, cancer, hypertension, strokes, diabetes, and osteoporosis. The risk factors for these diseases can be detected early in life and are heavily influenced by health-related choices. Instruction in Disease Prevention and Control also includes the skills necessary to act in a supportive yet safe manner toward people with diseases. Topics generally covered in Disease Prevention and Control include: Signs, Causes, and Treatment; Prevention, and Health Maintenance.

PreK–12 Standard 8: Disease Prevention and Control

Students will learn the signs, causes, and treatment of chronic and communicable diseases, and will gain skills related to health promotion, disease prevention, and health maintenance.

Disease Prevention and Control

PreK–12 STANDARD 8: Disease Prevention and Control

Students will learn the signs, causes, and treatment of chronic and communicable diseases, and will gain skills related to health promotion, disease prevention, and health maintenance.

GRADE LEVEL	LEARNING STANDARDS
By the end of grade 5	<p>Through the study of Prevention students will</p> <p>8.1 Describe how the body fights germs and disease naturally and with medicines and immunization</p> <p>Through the study of Signs, Causes, and Treatment students will</p> <p>8.2: Identify the common symptoms of illness and recognize that being responsible for individual health means alerting caretakers to any symptoms of illness</p> <p>Through the study of Health Maintenance students will</p> <p>8.3 Apply skills to prevent and control the spread of disease, including those that help promote cleanliness (such as correct handwashing, regular bathing, and washing clothes)</p> <p><i>Invite the school nurse or school physician to present a program to students about the relationship between hand washing and catching a cold and medicines that may help, including that medicines should only be taken with adult supervision</i></p> <p>8.4 Identify tooth functions and causes of tooth health and decay, and apply proper dental health skills (such as choosing healthy tooth snacks, brushing, flossing)</p> <p><i>Using a large cardboard model of the mouth with the teeth labeled, students close their eyes and floss with yarn covered with colored chalk. Students open their eyes and see which teeth were and were not missed. Practice until flossing is complete</i></p>
By the end of grade 8	<p>Through the study of Prevention students will</p> <p>8.5 Identify ways individuals can reduce risk factors related to communicable and chronic diseases</p> <p>8.6 Describe the importance of early detection in preventing the progression of disease</p> <p>Through the study of Signs, Causes, and Treatment students will</p> <p>8.7 Explain the need to follow prescribed health care procedures given by parents and health care providers</p> <p>8.8: Describe how to demonstrate safe care and concern toward ill and disabled persons in the family, school, and community</p> <p>Through the study of Health Maintenance students will</p> <p>8.9 Discuss how cleanliness and good grooming show consideration for self and others, and ways to promote cleanliness</p> <p>8.10 Describe the relationship between overexposure to the sun and skin cancer</p> <p><i>Students observe the characteristics of vegetable skins under a microscope. Place vegetables with and without sunscreen outdoors in the sun and shade. Periodically observe and record the same characteristics. Report the damage the sun has done under these various conditions</i></p>

	<p>8.11 List the factors contributing to tooth decay, diseases of the mouth, and preventive measures</p> <p>8.12 Describe the influence that rest has on physical functioning (recovering from fatigue, restoring energy), personal requirements for sleep, and methods for getting adequate sleep</p>
By the end of grade 12	<p style="text-align: center;">Through the study of Prevention students will</p> <p>8.13 Explain how the immune system functions to prevent and combat disease</p> <p>8.14 Identify positive health behaviors that reduce the risk of disease</p> <p>8.15 Learn how to use effective physical self-examination procedures and at what age they become necessary</p> <p style="text-align: center;"><i>Using materials provided by the American Cancer Society, students review the proper procedures for self-examination and plot regular intervals for examinations on a calendar</i></p> <p>8.16: Demonstrate how to discuss procedures and test results with health care providers</p> <p>Through the study of Signs, Causes, and Treatment students will</p> <p>8.17 Describe the leading causes of death for different age groups, symptoms of common diseases among youth, the importance of early diagnosis, and the need for active involvement in the treatment and management of disease and chronic health problems</p> <p>8.18 Analyze the interaction between genetics and disease</p> <p>Through the study of Health Maintenance students will</p> <p>8.19 Explain the prevention and control of common communicable infestations, diseases, and infections</p>
Grades 9–12	<p>Interdisciplinary Learning Objectives: Disease Prevention and Control</p> <p>8.a. <i>(Law & Policy. Connects with History & Social Science: Geography and Civics & Government)</i></p> <p>Analyze the influence of factors (such as social and economic) on the treatment and management of illness</p> <p>8.b. <i>(Law & Policy. Connects with History & Social Science: Civics & Government)</i></p> <p>Explain confidentiality laws and individuals' rights to seek medical treatment</p> <p>8.c. <i>(Law & Policy. Connects with History & Social Science: Geography)</i></p> <p>Analyze the effects of urbanization, medical advances, politics, and public opinion on the transmission, prevention, and treatment of disease</p>

Safety and Injury Prevention:

Safety and Injury Prevention includes information to promote knowledge and skills for personal safety for the prevention and treatment of intentional or unintentional injury.

Through the study of Safety and Injury Prevention, students identify, learn, and reinforce the use of rules and procedures for safe living at home, in school, and within the community to help reduce the incidence of hazardous situations. Safety and Injury Prevention teaches students strategies to reduce their risk of personal danger. Training students in first aid and emergency procedures to assist with accidents and injuries promotes potentially life-saving intervention. Topics generally covered in Safety and Injury Prevention include: Hazard Prevention, Self-Protection, and Emergency Intervention.

PreK–12 Standard 9: Safety and Injury Prevention

Students will gain the knowledge and skills to administer first aid and carry out emergency procedures, including cardiopulmonary resuscitation, will avoid, recognize, and report verbal, physical, and emotional abuse situations, and will assess the factors that contribute to intentional and unintentional injury, including motor vehicle accidents, fire safety, and weapons safety.

Safety and Injury Prevention

PreK–12 STANDARD 9: Safety and Injury Prevention

Students will gain the knowledge and skills to administer first aid and carry out emergency procedures, including cardiopulmonary resuscitation, will avoid, recognize, and report verbal, physical, and emotional abuse situations, and will assess the factors that contribute to intentional and unintentional injury, including motor vehicle accidents, fire safety, and weapons safety.

GRADE LEVEL	LEARNING STANDARDS
By the end of grade 5	<p>Through the study of Hazard Prevention students will</p> <p>9.1 List rules for fire safety, weapons safety, bus safety, and seatbelt use where applicable, such as at home, school, community, and play, and explain why the rules are important</p> <p>9.2: Name persons and community helpers (such as police officers, fire fighters, and emergency medical personnel) who can be contacted to help with health, safety, and injury prevention and describe the appropriate procedures for contacting healthcare personnel in an emergency</p> <p><i>Students role-play calling the operator, 911, or police, and giving name, address, and other information regarding an emergency. Discuss the circumstances under which not to call (such as a prank)</i></p> <p>9.3 Describe personal responsibility for reducing hazards and avoiding accidents</p> <p><i>Students develop a checklist of safety labels and features for helmets, sports equipment, and toys, and evaluate their possessions for safety</i></p> <p>Through the study of Self Protection students will</p> <p>9.4 Distinguish among safe, unsafe, and inappropriate touch</p> <p>9.5 Demonstrate the use of assertive behavior, refusal skills, and actions intended for personal safety</p> <p><i>Students role-play ways to deal with bullying, teasing, and name-calling, and how to get away from threatening strangers</i></p> <p>Through the study of Emergency Intervention students will</p> <p>9.6 Follow universal precautions for all first aid involving any blood and other body fluids</p> <p>9.7 Apply appropriate first aid for cuts and bruises, including observing universal precautions</p>
By the end of grade 8	<p>Through the study of Self Protection students will</p> <p>9.8 Describe actions and behaviors to protect oneself when alone at home or in the community or caring for small children (such as first aid and rescue breathing)</p> <p>9.9 List safety rules for recreational activities, including the use of helmets, pads, and the proper use of equipment</p> <p>9.10 Recognize sexual abuse and child abuse and how to get help</p> <p>Through the study of Emergency Intervention students will</p> <p>9.11 Distinguish among symptoms of bleeding, choking, shock, poisoning, burns, broken bones, and cardiac arrest</p>

	<p>9.12 Apply appropriate first aid for bleeding, choking, and burns</p> <p><i>Students use a mannequin to show the proper technique for applying first aid for bleeding, choking, and burns</i></p>
By the end of grade 12	<p>Through the study of Hazard Prevention students will</p> <p>9.13 Explain the connection between accidents and injuries, including the importance of using seatbelts</p> <p>9.14 Describe the precautions necessary for safety during violent weather conditions and natural disasters</p> <p>Through the study of Self Protection students will</p> <p>9.15 Define harassment based on gender, race, national origin, sexual orientation, religion, or handicap</p> <p>9.16 Define date and acquaintance rape, and describe both how to protect oneself in these situations and how to seek help</p> <p>9.17 Evaluate home safety conditions, including the presence and proper use of smoke detectors and fire extinguishers</p> <p>9.18 Describe practices related to safety conditions in the workplace (such as the use of eye protection, gloves, and hard hats)</p> <p>Through the study of Emergency Intervention students will</p> <p>9.19 Demonstrate appropriate first aid for stings, bites, broken bones, bleeding, choking, shock, poisoning, burns, and cardiac arrest (cardiopulmonary resuscitation—CPR)</p> <p><i>Students demonstrate the direct method for stopping bleeding, stressing the importance of placing a barrier between the victim and the assistant to avoid body fluid</i></p> <p>9.20 Describe symptoms and procedures for sudden illness conditions</p>
Grades 9 - 12	<p>Interdisciplinary Learning Objectives: Safety and Injury Prevention</p> <p>9.a. <i>(Law & Policy. Connects with History & Social Science: Civics & Government)</i></p> <p>Identify and explain the laws governing sexual harassment, and date and acquaintance rape</p> <p>9.b. <i>(Law & Policy. Connects with History & Social Science: Civics & Government)</i></p> <p>Describe laws related to safety conditions in the workplace (such as the use of eye protection, gloves, and hard hats)</p>

Tobacco, Alcohol, & Substance Use/Abuse Prevention:

Tobacco, Alcohol, and Other Substance Use/Abuse Prevention addresses safe and unsafe substances, effects on the body and health, and drug dependence. This area deals with critical thinking to incorporate accurate, relevant information into health-enhancing decisions and taking responsibility for one's health. This includes skills such as how to negotiate, refusal skills, and how to seek assistance for abuse and addiction. Tobacco, Alcohol, and Other Substance Use/Abuse Prevention provides information and skills training to promote good health for self, peers, family members, the school, and the larger community.

The use of tobacco, alcohol, and other substances is quite prevalent among young people and has major implications for the health of individuals and society. Tobacco use continues to be the leading preventable cause of death in the United States, while alcohol and other drug use also cause significant morbidity and exact a high social cost. Appropriate use of medications and avoidance of dangerous substances require an understanding about the benefits and risks of these substances, responsible personal conduct, and enhanced health decision-making that address the influence of peers, the family, and society. Health education provides appropriate information about behaviors related to substance use and abuse. Topics generally covered in Tobacco, Alcohol, and Other Substance Use/Abuse Prevention include: Effects on the Body and Healthy Decisions.

PreK–12 Standard 10: Tobacco, Alcohol, & Substance Use/Abuse Prevention

Students will acquire the knowledge and skills to be competent in making health-enhancing decisions regarding the use of medications and avoidance of substances, and in communicating about substance use/abuse prevention for healthier homes, schools, and communities.

Tobacco, Alcohol, & Substance Use/Abuse Prevention

PreK–12 STANDARD 10: Tobacco, Alcohol, & Substance Use/Abuse Prevention

Students will acquire the knowledge and skills to be competent in making health-enhancing decisions regarding the use of medications and avoidance of substances, and in communicating about substance use/abuse prevention for healthier homes, schools, and communities.

GRADE LEVEL	LEARNING STANDARDS
By the end of grade 5	<p>Through the study of Effects on the Body students will</p> <p>10.1 Identify and distinguish between substances that are safe and unsafe to be taken by mouth <i>Students sort pictures of food products, beverages, medicines, and vitamins into three categories—Safe to Eat, Not Safe to Eat, Things I Need to Ask About</i></p> <p>10.2: Describe the purpose of medicines (prescription and over-the-counter) and how they can be used or misused in the treatment of common medical problems</p> <p>10.3 Describe how tobacco and prolonged exposure to cigarette smoke affects the body</p> <p>Through the study of Healthy Decisions students will</p> <p>10.4 Identify whom to seek help from for a possible poisoning or overdose</p>
By the end of grade 8	<p>Through the study of Effects on the Body students will</p> <p>10.5 Describe addictions to alcohol, tobacco, and other drugs, and methods for intervention, treatment, and cessation</p> <p>10.6 List the potential outcomes of prevalent early and late adolescent risk behaviors related to tobacco, alcohol, and other drugs, including the general pattern and continuum of risk behaviors involving substances that young people might follow <i>Students generate ideas of what the term "gateway" means in relation to substance abuse and map out a series of behaviors that begin with such "gateway" behaviors</i></p> <p>Through the study of Healthy Decisions students will</p> <p>10.7 Identify internal factors (such as character) and external factors (such as family, peers, community, faith-based affiliation, and media) that influence the decision of young people to use or not to use drugs</p> <p>10.8 Demonstrate ways of refusing and of sharing preventive health information about tobacco, alcohol, and other drugs with peers <i>Students research and give an oral report on the effects of second-hand smoke</i></p>
By the end of grade 12	<p>Through the study of Effects on the Body students will</p> <p>10.9 Describe the relationship between multi-drug use and the increased negative effects on the body, including the stages of addiction, and overdose <i>Students research the increased chances of death from alcohol poisoning when alcohol is combined with marijuana</i></p> <p>10.10 Describe the harmful effects of tobacco, alcohol, and other substances on pregnant women and their unborn children</p>

Through the study of Healthy Decisions students will

10.11 Explain the consequences of driving under the influence of alcohol and other drugs, including the effects on passengers when the driver is impaired

Students role-play refusing to drive and/or ride in a vehicle when the driver is impaired by substances

10.12 Explain the physical, financial, social, and psychological cost of addiction

10.13 Demonstrate the ability to make informed decisions regarding the use of tobacco, alcohol, and other drugs

Students generate a list of alternatives to teenage drinking, tobacco, and other substance use

10.14 Describe the influence of drug abuse on family members

10.15 Apply promotion skills to encourage healthy behaviors (such as identifying and evaluating initiatives and opportunities for promotion, collecting and disseminating information, and modeling)

In a roundtable discussion, students identify and consider a variety of viewpoints when solving problems related to alcohol use enforcement during school sports and other school-related activities. Select strategies through consensus building and report solutions to the student government and parent-teacher groups

Violence Prevention:

Violence Prevention addresses actions that bring harm to a person's body, feelings, or possessions. Violence Prevention acknowledges that violence can affect everyone and that the interaction among a complex set of factors internal and external to individuals influences violence-related attitudes and behaviors. The foundation of Violence Prevention involves skills for teaching students methods to prevent and avoid violence while recognizing the contribution that individuals can make to violence prevention through having good character, acknowledging the rights of others, and living peacefully.

As violence has often been recognized as a major problem that affects not only the health of students in schools, but inhibits schools from accomplishing their primary mission of education, schools have both an obligation and an opportunity to become involved in violence prevention. Students explore personal attitudes and attributes and learn skills for violence prevention. Learning alternatives to violence, such as how to manage anger and resolve conflicts without violence, should be taught at early ages to counteract violence as an accepted way of life. Topics generally covered in Violence Prevention include: Awareness, Contributing Factors, and Alternatives. Self-protection is addressed in Violence Prevention and in Safety and Injury Prevention as well.

PreK–12 Standard 11: Violence Prevention

Students will learn how their actions affect others, will understand the power that positive character traits can have in violence prevention, will gain skills to report incidents of violence and hurtful behavior to adults in the school and community, will avoid engaging in violence, and will identify constructive alternatives to violence, including how to discourage others from engaging in violence.

Violence Prevention

PreK–12 STANDARD 11: Violence Prevention

Students will learn how their actions affect others, will understand the power that positive character traits can have in violence prevention, will gain skills to report incidents of violence and hurtful behavior to adults in the school and community, will avoid engaging in violence, and will identify constructive alternatives to violence, including how to discourage others from engaging in violence.

GRADE LEVEL	LEARNING STANDARDS
By the end of grade 5	<p>Through the study of Awareness students will</p> <p>11.1 Describe some of the ways that young children can be intentionally helpful and intentionally hurtful to one another</p> <p>Through the study of Contributing Factors students will</p> <p>11.2 Identify factors (such as internal character and personality attributes and forces external to individuals, such as the media or society) related to both violent and nonviolent attitudes</p> <p>Through the study of Alternatives students will</p> <p>11.3 Differentiate between one's personal rights and those of others and use communication and problem-solving to set personal boundaries, resolve conflicts, and develop positive relationships</p> <p><i>Using scenarios involving conflict and violence, students discuss the best strategy for resolving a particular situation (such as avoiding strangers, walking or running away, telling someone to stop, asking for help from trusted adults, encouraging others to walk away)</i></p> <p>11.4 Identify helping resources regarding violence in the school and community, such as counselors, neighbors, law enforcement, and members of faith-based groups</p>
By the end of grade 8	<p>Through the study of Awareness students will</p> <p>11.5 Identify reasons why some people choose to join gangs and understand how gangs undermine community and lead to violence</p> <p>11.6 Identify the social and emotional consequences of harassment (for example, gender, racial, handicap, sexual in nature, etc.)</p> <p>Through the study of Contributing Factors students will</p> <p>11.7 Define intolerance and explain how it can contribute to violence</p> <p>Through the study of Alternatives students will</p> <p>11.8 Describe the power of the individual in reducing violence and identify situations where individuals can become active about violence prevention</p> <p>11.9 Demonstrate effective communication, negotiation, and conflict resolution for resolving potentially violent conflicts</p> <p><i>Students view a video about other students' experiences with violence, particularly teasing, bullying, and fighting, and have a class discussion on solutions to such situations</i></p> <p>11.10 Explain the signs of abuse in relationships, including emotional abuse and physical assault, and identify the available resources in schools and the local community, such as counselors, law enforcement, and faith-based groups</p>

	<p><i>Students create advertisements to encourage other students to use resources for relationship abuse</i></p>
By the end of grade 12	<p>Through the study of Awareness students will</p> <p>11.11 Identify shared community and societal beliefs that underlie violence</p> <p><i>Students research the relationship between the presence of guns in the home and violent acts</i></p> <p>11.12 Describe the relationship between negative stress and violence</p> <p>11.13 Identify the mental health and legal consequences of harassment (for example, gender, racial, handicap, sexual in nature, etc.)</p> <p><i>Students research the academic writings on the possible unintended negative effects of sexual harassment laws, regulations, and policies on normal female and male relationships</i></p> <p>Through the study of Contributing Factors students will</p> <p>11.14 Describe the relationships among attitudes, behaviors, and vulnerability to violence</p> <p>11.15 Explain why some people admire others who gain social status through violence and how this can contribute to further violence</p> <p><i>Invite a specialist in gangs to discuss how young people may feel violence benefits them socially and how to avoid/leave gangs</i></p> <p>11.16 Identify those character traits that are connected with peaceful living in society, such as respectfulness, tolerance, honesty, self-discipline, kindness, and empathy</p> <p><i>Students report on a historical figure, figure from literature, popular figure, or an individual personally known to them who has the character traits of being respectful, affirming, and empathetic and the situation(s) in which these traits were exhibited</i></p> <p>Through the study of Alternatives students will</p> <p>11.17 Describe the responsibility of the family in teaching children non-violent attitudes and conduct</p> <p>11.18 Demonstrate skills for refusal, negotiation, and collaboration to avoid potentially harmful situations in personal, work, and community relationships</p> <p>11.19 Identify the health consequences of domestic violence, child abuse, rape, and other forms of violence and discuss strategies to deal with as well as prevent them</p>

Personal and Community Health Strand

Personal and Community Health includes those aspects of health most often related to our larger community and world. The knowledge and skills presented in this Strand lay the groundwork for participation in preserving and improving our surroundings and for dealing with future health-related events. The contribution of Public Health is addressed in this Strand.

The Strand of Personal and Community Health includes:

- Consumer Health and Resource Management
- Ecological Health
- Community & Public Health

Consumer Health and Resource Management provides information on the management of home, consumer, workplace, and environmental resources as well as obtaining and evaluating health-related information, services, and products.

Ecological Health addresses how the ecological environment affects individual, community, and global health through the condition of the earth's resources and how the condition of the earth is affected by the behavior of humans.

Community and Public Health addresses characteristics of a healthy community, functions of community agencies, and skills for health promotion and collaboration. Connections are made between all aspects of the community, both in and out of school, and the health of the student and the health of others.

The Personal and Community Health Strand is designed to help students demonstrate the competence to use information and services in ways that benefit themselves, their peers, their families, and their communities. By making improvements in the health of the natural environment and the physical safety of their communities, students learn to build coalitions with others. Students work with others to determine concrete steps they can take to build a strong social fabric. The purpose of this Strand is to assist students in developing a clearer understanding of their personal, social, and civic responsibilities by acting on accurate information to improve health in their communities.

Note: Selected examples are provided.

Sample Learning Scenario for the Personal and Community Health Information Strand

“How It Looks in the Classroom”

Three high school students research Lyme Disease in Massachusetts. Using the Internet, they obtain current statistics from the Centers for Disease Control and Prevention. They compare these with the reports of researchers at the Harvard School of Public Health and the Massachusetts Audubon Society. They use maps and graphs to compare the incidence of the disease in humans with the prevalence of the bacterium in ticks taken from deer mice nesting boxes. They estimate the likelihood of infection from a tick bite, which turns out to be lower than originally expected. In talking with researchers, students learn about the scientific and mathematical techniques used to monitor infectious diseases. The students determine factors that would make an effective statewide advertising campaign about seasonal precautions and early treatment.

This activity can help students reinforce or achieve the following learning standards in this and the other Frameworks:

Community and Public Health

- functions and purposes of health agencies *Learning Standard 14.11*
- impact of disease on community health *Learning Standard 14.7*

Disease Prevention and Control

- germs and diseases *Learning Standard 8.17*
- immune system *Learning Standard 8.13*

Science and Technology/Engineering: Inquiry

- responding to conclusions

Mathematics: Statistics and Probability

- probabilities of outcomes

English Language Arts: Media

- techniques

Consumer Health and Resource Management:

Consumer Health and Resource Management addresses obtaining and evaluating health-related information, services, and products. Information on the management of the home, the workplace, and resources is included in Consumer Health and Resource Management.

A major focus of Consumer Health and Resource Management is the concept that students have choices, as well as rights and responsibilities, in the management of their personal and health resources. Although laws protect the consumer, individuals must still take personal responsibility for decisions about purchases of goods and services. Money is not the only resource over which students have control. Effective time management can have a substantial influence on physical and mental health and well being. Consumer Health and Resource Management recognizes the contribution made by science and technology and business and industry to both health care as well as consumer products and choices. The information contained in Consumer Health and Resource Management can help students become wise consumers. Topics generally covered in Consumer Health and Resource Management include: Health Care and Resource Management Practices.

PreK–12 Standard 12: Consumer Health and Resource Management

Students will acquire the knowledge and skills necessary to obtain, manage, and evaluate resources to maintain physical and mental health and well being for themselves, their family, and the community.

Consumer Health and Resource Management

PreK–12 STANDARD 12: Consumer Health and Resource Management

Students will acquire the knowledge and skills necessary to obtain, manage, and evaluate resources to maintain physical and mental health and well being for themselves, their family, and the community.

GRADE LEVEL	LEARNING STANDARDS
By the end of grade 5	<p>Through the study of Health Care students will</p> <p>12.1 Identify and describe health careers</p> <p>12.2 Interpret the symbols and information provided on labels for health care products and food products</p> <p>Through the study of Resource Management Practices students will</p> <p>12.3 Identify advertising techniques</p> <p>12.4 Identify resources used by individuals to manage their daily lives (such as time and money)</p> <p><i>Students use scenarios of good or poor choices made by children using time or money resources. Discuss reasons why those choices were appropriate or inappropriate and if inappropriate, what choices could be made instead</i></p> <p>12.5 Name and weigh criteria for selecting a consumer product and evaluate the product's safety and health aspects</p>
By the end of grade 8	<p>Through the study of Health Care students will</p> <p>12.6 Describe how allowing time for healthy activities (such as exercise, preparing nutritious meals, getting adequate sleep) can improve health</p> <p>12.7 Evaluate both the physical effectiveness and cost effectiveness of health care products</p> <p>12.8 Identify ways consumer decisions and actions can influence physical and mental health</p> <p><i>Students interview peers about the physical and emotional effects of excessive video game playing</i></p> <p>Through the study of Resource Management Practices students will</p> <p>12.9 Describe the decision-making process when planning a budget to save money for a special purpose</p> <p>12.10 Identify ways that family and friends can positively or negatively influence consumer choices</p>
By the end of grade 12	<p>Through the study of Health Care students will</p> <p>12.11 Explain when and how to use self-care or professional health care services</p> <p><i>Using scenarios where health care is needed, students identify those situations in which self-care is appropriate and in which professional care is necessary</i></p> <p>12.12 Identify information needed to select and maintain relationships with health care providers to meet the needs of individuals and family members</p> <p>12.13 Describe the various methods for gaining access to health care and health insurance</p>

	<p><i>Student teams research and report on the health care system in Massachusetts as compared to the health care system in the United States</i></p> <p>Through the study of Resource Management Practices students will</p> <p>12.14 Apply planning and management skills to organize tasks and responsibilities</p> <p>12.15 Explain criteria for making consumer decisions about various kinds of products</p> <p>12.16 Review the positive and negative influences of the media that impact on health</p> <p>12.17 Describe the individual's responsibility to be a wise and informed consumer, including how to plan a budget that includes a spending and savings plan</p> <p><i>Given a specified income and a series of expenditures in teacher-developed case studies, students develop a budget that will meet needs while allowing for saving. Compare and analyze differences in the choices made within the class</i></p> <p>12.18 Analyze decisions about making specific purchases and maintaining those products or services</p> <p>12.19 Identify procedures for making consumer complaints, such as determining if/when a complaint is warranted, gathering relevant information, and identifying the appropriate agencies to contact</p> <p>12.20 Explain the contribution of business, industry, and technology to the improvement of consumer products and choices</p>
Grades 6–8	<p>Interdisciplinary Learning Objectives: Consumer Health and Resource Management</p> <p>12.a. <i>(Law & Policy. Connects with History & Social Science: Civics & Government)</i> Identify the contribution of state and federal public health laws and of government agencies for the protection of the consumer</p>
Grades 9–12	<p>12.b. <i>(Law & Policy. Connects with History & Social Science: Civics & Government)</i> Analyze the reciprocal relationships among consumer rights, policies and laws, and business and industry</p> <p>12.c. <i>(Health Statistics. Connects with Math: Probability & Statistics)</i></p> <p>Evaluate methods to determine the accuracy of emerging health research</p>

Ecological Health:

Ecological Health addresses the interdependence between the ecological environment and human physical health.

The ecological environment affects individual, community, and global health through the condition of the Earth's natural resources, which in turn is influenced by the behavior of humans on the environment. Ecological Health highlights understanding the relationships among energy use, water use, waste disposal, food production, and physical and social health in the areas of disease, hunger, and well being. Economic and social attitudes and practices influence the state of the environment. Responsible behavior and the contribution of business and industry and science and technology/engineering related to the care and improvement of the ecological environment can improve current ecological health and help facilitate good ecological health in the future. Topics generally covered in Ecological Health include: Interdependence and Improvement.

PreK–12 Standard 13: Ecological Health

Students will gain knowledge of the interdependence between the environment and physical health, and will acquire skills to care for the environment.

Ecological Health

PreK–12 STANDARD 13: Ecological Health

Students will gain knowledge of the interdependence between the environment and physical health, and will acquire skills to care for the environment.

GRADE LEVEL	LEARNING STANDARDS
By the end of grade 5	<p>Through the study of Interdependence students will</p> <p>13.1 Describe types of natural resources and their connection with health</p> <p>Through the study of Interdependence students will</p> <p>13.2 Describe how business, industry, and individuals can work cooperatively to solve ecological health problems, such as conserving natural resources and decreasing pollution</p> <p><i>Working with family volunteers, students clean up school grounds and plant flowers and other plants that help clean the air (such as spider plant or peace lily). Take before and after pictures and display</i></p>
By the end of grade 8	<p>Through the study of Improvement students will</p> <p>13.3 Describe methods and benchmarks for evaluating the state of the environment</p> <p><i>Using the Massachusetts Water Resources Authority Water Test Kit, students identify pollutant levels in local water sources, research the health effects, and send a report to municipal officials</i></p> <p>Through the study of Improvement students will</p> <p>13.4 Identify individual and community responsibility in ecological health</p> <p>13.5 Evaluate solutions generated by science, technology/engineering, and individuals regarding ecological health problems (such as energy use, water use, waste disposal, and food shortage)</p> <p><i>Students learn about companies that use environmentally friendly practices and the outcomes of such practices on the environment, then collaborate with a local business that has such practices to develop an environmentally related community service learning project</i></p>
Grades 9 – 12	<p>Interdisciplinary Learning Objectives: Ecological Health</p> <p>13.a. <i>(Law & Policy. Connects with History & Social Science: Geography)</i></p> <p>Identify the reciprocal relationships among social and economic factors and practices and ecological health</p> <p>13.b. <i>(Law & Policy. Connects with History & Social Science: Geography)</i></p> <p>Research strategies for improving global ecological health and evaluate them for their sensitivity to social background issues</p> <p>13.c. <i>(Law & Policy. Connects with History & Social Science: Civics & Govt)</i></p> <p>Analyze the influence and contribution of government legislation and individuals' actions on environmental health, particularly as related to disease and food production</p>

Community and Public Health:

Community and Public Health focuses on characteristics of a healthy community, the contribution of public health, the functions and purposes of community and public health agencies, and skills for health promotion and collaboration.

In Community and Public Health, students are introduced to the connections between all aspects of their community, both in and out of school, and the health of themselves and others. Students gain an understanding of why rules about health exist at home and at school and why those rules should be followed by themselves, their peers, and their family members. Opportunities to examine how laws, policies, and practices influence health locally, nationally, and internationally are an important part of Community and Public Health. The recognition of the contribution of public health to the quality of life is a key component of Community and Public Health. By learning how the actions of people affect the community as a whole, students understand how participating in school and community efforts supports positive health behaviors on many levels. Instruction in Community and Public Health also teaches students how to access community health services as well as information about agencies and organizations that support health. Topics generally covered in Community and Public Health include: School and Community Efforts, Social Factors, and Public Health.

PreK–12 Standard 14: Community and Public Health

Students will learn the influence of social factors on health, the contribution of public health, and will gain skills to promote health and to collaborate with others to facilitate healthy, safe, and supportive communities.

Community and Public Health

PreK–12 STANDARD 14: Community and Public Health

Students will learn the influence of social factors on health, the contribution of public health, and will gain skills to promote health and to collaborate with others to facilitate healthy, safe, and supportive communities.

GRADE LEVEL	LEARNING STANDARDS
By the end of grade 5	<p>Through the study of School and Community Efforts students will</p> <p>14.1 List the jobs carried out by people at school and in the community that support health and success in school</p> <p><i>Invite community helpers to speak about the contribution of their occupation to community and/or public health and answer questions from students</i></p> <p>Through the study of Social Factors students will</p> <p>14.2 Identify ways the physical environment is related to individual and community health</p> <p>Through the study of Public Health students will</p> <p>14.3 List practices and products that make living safer</p>
By the end of grade 8	<p>Through the study of School and Community Efforts students will</p> <p>14.4 Identify how individuals can be knowledgeable and active in the school and community to promote health</p> <p><i>Students create public service announcements about how community events (such as walk-a-thons, fund-raisers, forums, and screenings) support community health. Students may elect to participate with the permission of, or accompanied by, parents or guardians</i></p> <p>Through the study of Social Factors students will</p> <p>14.5 Identify the origins and accuracy of facts in social messages that promote healthy and unhealthy behaviors</p> <p>Through the study of Public Health students will</p> <p>14.6 Describe how local public health departments have developed and implemented policies to keep communities safe</p>
By the end of grade 12	<p>Through the study of School and Community Efforts students will</p> <p>14.7 Analyze the effects of diseases on the community and society</p> <p>14.8 Evaluate the availability and quality of services for community health</p> <p>14.9 Explain how service in community health can improve the physical health of community members</p> <p>Through the study of Social Factors students will</p> <p>14.10 Identify prevalent health concerns and health promotion initiatives in the United States and compare with other parts of the world</p> <p><i>Students select a communicable disease (such as tuberculosis, E. Coli, AIDS/HIV), chart the prevalence, and research the factors affecting their spread and types of treatment. Use e-mail to</i></p>

	<p><i>share information with student groups in other countries</i></p> <p>Through the study of Public Health students will</p> <p>14.11 Identify the functions of the school, health department, and other community and public health and social service agencies in health promotion and disease prevention through community health initiatives and observances</p>
Grades 6–8	<p>Interdisciplinary Learning Objectives: Community and Public Health</p> <p>14.a. <i>(Law & Policy. Connects with History & Social Science: Civics & Government)</i></p> <p>Describe local, state, and national laws and regulations that promote public health and the safety of the community</p>
Grades 9–12	<p>14.b. <i>(Law & Policy. Connects with History & Social Science: Civics & Government)</i></p> <p>Examine the public health legislative process</p> <p>14.c. <i>(Law & Policy. Connects with History & Social Science: Chronology & Cause)</i></p> <p>Analyze the reciprocal relationships among social, economic, and environmental factors and community and public health</p> <p>14.d. <i>(Law & Policy. Connects with History & Social Science: Civics & Government)</i></p> <p>Describe the implementation of public health policies, initiatives, and laws, and their subsequent contribution to the quality of life</p> <p>14.e. <i>(Health Statistics. Connects with Mathematics: Statistics & Probability)</i></p> <p>Learn to evaluate local, national, and international health related statistics</p>

Appendix A:
*Massachusetts Guiding Principles of Comprehensive
Health Education*

Linked with National Standards in Health Education, Physical
Education, and Family and Consumer Sciences Education

Much of the work being done on the local and national level in health education, physical education, and family and consumer sciences education uses national standards to some extent. The following pages show “matches” between the Massachusetts Health Curriculum Framework Guiding Principles (GP) and the National Standards in Health Education, Physical Education, and Family and Consumer Sciences Education. These can help inform schools, other states, and national programs about the work Massachusetts is doing in these areas.

MASSACHUSETTS GUIDING PRINCIPLES OF COMPREHENSIVE HEALTH EDUCATION

GUIDING PRINCIPLE I

Comprehensive health education teaches students fundamental health concepts and skills that foster habits and behaviors for oneself and others through the coordinated teaching of health, physical education and family and consumer sciences education at each grade level, prekindergarten through grade 12.

GUIDING PRINCIPLE II

Comprehensive health education teaches students to use fundamental health concepts to assess risks, to consider potential consequences, and to make health enhancing decisions.

GUIDING PRINCIPLE III

Comprehensive health education teaches skills that assist students to understand and communicate health information clearly for self-management and health promotion.

GUIDING PRINCIPLE IV

Comprehensive health education contributes to the capacity of students to work in a positive manner with families, school staff, peers and community members to enhance personal health and create a safe and supportive environment where individual similarities and differences are acknowledged.

GUIDING PRINCIPLE V

Comprehensive health education is strengthened through collaboration and partnerships among all components of the coordinated school health program and other subjects.

NATIONAL HEALTH EDUCATION STANDARDS

Students will comprehend concepts related to health promotion and disease prevention. (GP-I)

Students will demonstrate the ability to access valid health information and health-promoting products and services. (GP-II, GP-V)

Students will demonstrate the ability to practice health-enhancing behaviors and reduce health risks. (GP-I, GP-II, GP IV)

Students will analyze the influence of culture, media, technology, and other factors on health. (GP-IV)

Students will demonstrate the ability to use interpersonal communication skills to enhance health. (GP-III, GP-IV)

Students will demonstrate the ability to use goal-setting and decision-making skills to enhance health. (GP-II)

Students will demonstrate the ability to advocate for personal, family, and community health. (GP-III, GP-IV)

(GP = Massachusetts Guiding Principle)

Developed by the Joint Committee on National Health Education Standards, Association for the Advancement of Health Education, American School Health Association, and American Public Health Association. Sponsored by the American Cancer Society.

NATIONAL PHYSICAL EDUCATION STANDARDS

Demonstrates competency in many movement forms and proficiency in a few movement forms. (GP-I)

Applies movement concepts and principles to the learning and development of motor skills. (GP-I)

Exhibits a physically active lifestyle. (GP-I, GP-II)

Achieves and maintains a health-enhancing level of physical fitness. (GP-I, GP-II)

Demonstrates responsible personal and social behavior in physical activity settings. (GP-III, GP-IV)

Demonstrates understanding and respect for differences among people in physical activity settings. (GP-IV)

Understands that physical activity provides opportunities for enjoyment, challenge, self-expression, and social interaction. (GP-IV, GP-V)

(GP = Massachusetts Guiding Principle)

Developed by the National Association for Sport and Physical Education.

NATIONAL FAMILY AND CONSUMER SCIENCES EDUCATION STANDARDS

Integrate multiple life roles and responsibilities in family, work, and community settings. (GP I, III, IV)

Evaluate management practices related to the human, economic, and environmental resources. (GP I, III, V)

Integrate knowledge, skills, and practices required for careers in family and consumer sciences. (GP III, V)

Integrate knowledge, skills, and practices required for careers in early childhood education and services. (GP III, V)

Integrate knowledge, skills, and practices required for careers in facilities management and maintenance. (GP III, V)

Evaluate the significance of family and its impact on the well being of individuals and society. (GP IV)

Integrate knowledge, skills, and practices required for careers in family and community services. (GP III, V)

Integrate knowledge, skills, and practices required for careers in food production and services. (GP III, V)

Integrate knowledge, skills, and practices required for careers in food science, dietetics, and nutrition. (GP III, V)

Integrate knowledge, skills, and practices required for careers in hospitality, tourism, and recreation. (GP III, V)

Integrate knowledge, skills, and practices required for careers in housing, interiors, and furnishings. (GP III, V)

Analyze factors that impact human growth and development. (GP I, II)

Demonstrate respectful and caring relationships in the family, workplace, and community. (GP IV)

Demonstrate nutrition and wellness practices that enhance individual and family well being. (GP I, II)

Evaluate the impact of parenting roles and responsibilities on strengthening the well being of individuals and families. (GP IV)

Integrate knowledge, skills, and practices required for careers in textiles and apparel. (GP III, V)

(GP = Massachusetts Guiding Principle)

Developed by the National Association of State Administrators of Family and Consumer Sciences.

Appendix B

ORGANIZER LAW & POLICY

INSTRUCTION & CURRICULUM

HEALTH EDUCATION; MGL C.71, S.1 = Instruction in, Exemption from

PHYSICAL EDUCATION; MGL C.71, S.3 = Instruction in, Exemption from

ACADEMIC STANDARDS; MGL C.69, S.1D = Education Reform Act, Standards

HEALTH EDUCATION GRANT; MGL C.69, S.1L = Discretionary Grant

HIV/AIDS EDUCATION; Massachusetts Board of Education Policy, 1990 = HIV/AIDS Instruction

PARENTAL INVOLVEMENT & NOTIFICATION

SEXUALITY EDUCATION; MGL C.71, S.32A = Parental Notification, Exemption from

SURVEYS; U.S. Law SEC.1017, General Education Provisions Sec.439 = Available for Inspection, Exemption from

SERVICES

NUTRITION; MGL C.69, S.1= Standards, Regulations, Breakfast Programs

HEALTH SERVICES; MGL C.71, SS.53, 53A, 53B = Availability of Physicians and Nurses

HEALTH SERVICES; MGL C.71, S.54 = Medical Personal at Interscholastic Games

HEALTH SERVICES; MGL C.71, S.54B = Administration of Medications

HIV/AIDS PREVENTION EDUCATION; Massachusetts Board of Education Policy, 1990 = Consideration of Condom Availability in Schools

PROTECTION

SAFETY; MGL C.85, S.13A = Bicycle Helmet Requirement

SAFETY; MGL C.90, S. 7B (15)= Bus Safety

SAFETY; MGL C.71, S.55C = Eye Protection Devices, Students and Staff

SAFETY; MGL C.71, S.37H = Rules and Regulations, Conduct of Students and Staff

SAFETY; MGL C.71, S.37H _ = Delinquency Complaint, Hearing, Suspension, Expulsion

VIOLENCE

STUDENT POSSESSION OF WEAPONS; MGL C.71, S.37L = Reporting Requirements

FIREARMS AT SCHOOL; MGL C.269, S.10 = Prohibits Carrying of Firearms w/out Authorization

GUN-FREE SCHOOLS ACT; Federal, Title XIV, Part F—Gun Possession

HAZING; MGL C.269, SS. 17, 18, 19 = Prohibits, Notification

CHILD ABUSE AND NEGLECT; MGL C.119, S.51A; MGL C.71, S.37L = Mandated Reporter, Requirements

DOMESTIC & DATING VIOLENCE; MGL C.209A = Abuse Prevention

DOMESTIC & DATING VIOLENCE; MGL C.265 = Crimes of Assault, S.43 = Stalking, S.22 = Rape

SEX OFFENDERS; MGL C.6, ss178C-178O = Registry, Community Notification

DISCRIMINATION

SEXUAL DISCRIMINATION & HARASSMENT; MGL C.76, S.5, Federal Title IX = Prohibited

SEXUAL DISCRIMINATION & HARASSMENT; MGL C.151C = Harassment Defined

SEXUAL DISCRIMINATION & HARASSMENT; MGL C.71, S.84 = Student Discipline Prohibited

RACIAL DISCRIMINATION; Federal Title VI = Racial or National Origin Discrimination Prohibited

DISABILITY DISCRIMINATION; Rehabilitation Act, S.504; Americans w/Disabilities Act=Prohibited

SUBSTANCES; MGL C.71, S.37H = Publish School Policy Prohibiting Tobacco & Substances on Grounds/Events by All

SUBSTANCES; MGL C.71, S.2A = Prohibit Student Use of Tobacco on School Grounds

SUBSTANCES; MG. C.94C, S.32F=Prohibit Distribution of Controlled Substances to Persons Under Eighteen

SUBSTANCES; MGL C.272, S.40A = Prohibit Alcohol on School Premises, Imprisonment, Fines, Exemptions

DISEASE PREVENTION & CONTROL

SICK CHILDREN; MGL C.71, S.55 = Contagious Diseases; School Attendance Regulated

SICK CHILDREN; MGL C.71, S.55A, S.56 = Procedure for Handling Sick Children, Liability

TUBERCULOSIS; MGL C.71, S.55B; C.69, S.1C = Examinations for Staff

IMMUNIZATION; MGL C.76, S.15 = Vaccination and Immunization Requirements, Exemptions

CONFIDENTIALITY & TREATMENT

STUDENT SCHOOL RECORDS; MGL C.71, S.34D = Record Regulations (603 CMR 23.00)

STUDENT SCHOOL RECORDS; 603 CMR 23.07 = Access by Third Parties

PSYCHOLOGICAL CARE; MGL C.112, S.129A = Confidential Communication

HIV/AIDS TESTING; MGL C.111, S.70F = Confidentiality, Informed Consent

MEDICAL & DENTAL CARE; MGL C.112, S.12F = Minor Consent to Diagnosis or Treatment

MEDICAL & DENTAL CARE; MGL C.112, S.12E = Minor Consent to Care, Drug Dependency, Liability f/Payment

Appendix B: Law and Policy

Around Health and Health Education

Following is a summary of selected significant Massachusetts and federal laws and state policies that address health education, student health services, and health-related protection for students.

Instruction and Curriculum

■ **Health Education**

Health education is one of the subjects addressed under Massachusetts General Laws (MGL) Chapter 71, Section 1. In relevant part, this statute provides:

Instruction in health education shall include, but not be limited to: consumer health, ecology, community health, body structure and function, safety, nutrition, fitness and body dynamics, dental health, emotional development, and training in the administration of first aid, including cardiopulmonary resuscitation. In connection with physiology and hygiene, instruction as to the effects of alcoholic drinks and of stimulants, including tobacco, and narcotics on the human system, as to tuberculosis and its prevention, as to detection and prevention of breast and uterine cancer, and as to fire safety, including instruction in the flammable qualities of certain fabrics, and as to the prevention and treatment of burn injuries, shall be given to all pupils in all schools under public control, except school maintained solely for instruction in particular subject areas. ...No pupil shall be required to take or participate in instruction on disease, its symptoms, development and treatment, whose parent or guardian shall object thereto in writing on the grounds such instruction conflicts with his sincerely held religious beliefs, and no pupil so exempt shall be penalized by reason of such exemption. Such other subjects as the school committee considers expedient may be taught in the public schools.

■ **Physical Education**

MGL Chapter 71, Section 3 states:

Physical education shall be taught as a required subject in all grades for all students in the public schools for the purpose of promoting the physical well being of students. Instruction in physical education may include calisthenics, gymnastics and military drill; but no pupil shall be required to take part in any military exercise if his parent or guardian is of any religious denomination conscientiously opposed, and the school committee is so notified in writing; and no pupil shall be required to take part in physical education exercises if a licensed physician certifies in writing that in his opinion such physical education exercise would be injurious to the pupil.

■ **Academic Standards**

MGL Chapter 69, Section 1D directs the Board and Commissioner of Education to develop academic standards for the core subjects of mathematics, science and technology, history and social science, English, foreign languages and the arts. This statute includes the following provision:

The standards may provide for instruction in the issues of nutrition, physical education, AIDS education, violence prevention, and drug, alcohol and tobacco abuse prevention. The board may also include the teaching of family life skills, financial management and consumer skills, ...

■ **Grant Programs for Comprehensive Interdisciplinary Health Education and Human Services**

MGL Chapter 69, Section 1L authorizes the Board of Education to establish a comprehensive interdisciplinary health education and human service discretionary grant program, subject to appropriation. This statute describes in

detail the components of such programs.

■ Board of Education Policy on HIV/AIDS Education

In 1990, the Board of Education issued a policy statement on HIV/AIDS education.

In part, it states:

AIDS (acquired immune deficiency syndrome) and infection with HIV (human immunodeficiency virus), the virus that causes AIDS, are serious threats to the lives and health of young people in Massachusetts. Therefore, the Board of Education of the Commonwealth of Massachusetts urges local school districts to create programs which make instruction about AIDS/HIV available to every Massachusetts student at every grade level. These programs should be developed in a manner which respects local control over education and involves parents and representatives of the community. The Board believes that AIDS/HIV prevention education is most effective when integrated into a comprehensive health education and human services program.

Parental Involvement and Notification

■ Sexuality Education; Parental Notification

MGL Chapter 71, Section 32A, sometimes referred to as the Parental Notification Law, states:

Every city, town, regional school district or vocational school district implementing or maintaining curriculum which primarily involves human sexual education or human sexuality issues shall adopt a policy ensuring parental/guardian notification. Such policy shall afford parents or guardians the flexibility to exempt their children from any portion of said curriculum through written notification to the school principal. No child so exempted shall be penalized by reason of such exemption.

Said policy shall be in writing, formally adopted by the school committee as a school district policy and distributed by September first, nineteen hundred and ninety-seven, and each year thereafter to each principal in the district. A copy of each school district's policy must be sent to the department of education after adoption.

To the extent practicable, program instruction materials for said curricula shall be made reasonably accessible to parents, guardians, educators, school administrators, and others for review.

The department of education shall promulgate regulations for adjudicatory proceedings to resolve any and all disputes arising under this section.

■ Surveys

Federal law, known as the Protection of Pupil Rights Act, applies to programs funded through the U.S. Department of Education. The statute, 20 U.S.C. 1232h, includes the following provisions:

- (a) All instructional materials, including teacher's manuals, films, tapes, or other supplementary material which will be used in connection with any survey, analysis, or evaluation as part of any applicable program shall be available for inspection by the parents or guardians of the children.
- (b) No student shall be required, as part of any applicable program, to submit to a survey, analysis, or evaluation that reveals information concerning: (1) political affiliations; (2) mental and psychological problems potentially embarrassing to the student or his family; (3) sex behavior and attitudes; (4) illegal, anti-social, self-incriminating and demeaning behavior; (5) critical appraisals of other individuals with whom respondents have close family relationships; (6) legally recognized privileged or analogous relationships, such as those of lawyers, physicians and ministers; or (7) income (other than that required by law to determine eligibility for participation in a program or for receiving financial assistance under such program), without the prior consent of the student (if the student is

an adult or emancipated minor) or in the case of an unemancipated minor, without the prior written consent of the parent or guardian.

Services

■ Nutrition

MGL Chapter 69, Section 1C authorizes the Board of Education to establish minimum nutritional standards for school food services, and establishes the school lunch and school breakfast programs.

■ Health Services and Related Issues

State law provides for the assignment of physicians and nurses to the public schools (MGL Chapter 71, Sections 53, 53A, 53B). MGL Chapter 71, Sections 54 and 57 address physical examinations for students. MGL Chapter 71, Section 54A requires assignment of medical personnel to interscholastic football games. MGL Chapter 71, Section 54B authorizes the Department of Public Health to regulate administration of medication to students in school settings.

■ AIDS/HIV Prevention Education Policy Regarding Condom Availability In Schools

In 1990, the Board of Education issued the following policy statement:

Due to the rising rate of HIV infection and other sexually transmitted diseases among adolescents, the need to address infection prevention in all ways possible is critical at this time. In Massachusetts, decisions about AIDS/HIV prevention education and sexuality education, like all decisions about curriculum and educational policy, are made at the school district level. As school districts consider condom availability at the secondary level, the Board of Education makes the following recommendations as an addendum to the AIDS/HIV Prevention Education Policy: We recommend that every school committee, in consultation with superintendents, administrators, faculty, parents and students, consider making condoms available in their secondary schools.

Protection

■ Safety and Prevention of Injury and Violence

A number of state laws concern safety of students or of young people generally. For example, bicycle riders who are 12 years old or younger must wear a helmet while bicycling. MGL Chapter 85, Section 13A states:

Any person twelve years of age or younger operating a bicycle or being carried as a passenger on a bicycle on a public way, bike path or on any other public right-of-way must wear an approved helmet.
Note: children under one year old must not be transported on a bike.

MGL Chapter 90, Section 7B (15) addresses instruction in bus safety:

All pupils transported in a school bus shall receive classroom instruction in safe riding practices at least three times during the following periods of each school year: the first week of the school year, the period between the months of September and January and the period between the month of January and the end of the school year. During each school year all such pupils shall participate at least twice in on-bus emergency evacuation drills.

MGL Chapter 71, Section 55C mandates that teachers and students must wear industrial quality eye protection during processes that may cause danger to the eyes.

MGL Chapter 71, Section 37H requires school districts to publish their policies concerning the conduct of teachers and students. The statute lists the elements that must be included in the code of discipline and the student handbook, including procedures assuring due process, standards and procedures for suspension and expulsion of students, and

standards and procedures to assure school building security and safety of students and school personnel. MGL Chapter 71, Section 37H further authorizes the principal to expel “any student who is found on school premises or at school-sponsored or school-related events, including athletic games, in possession of a dangerous weapon, including but not limited to, a gun or knife; or a controlled substance as defined in chapter ninety-four C, including, but not limited to, marijuana, cocaine, and heroin,” and to expel “any student who assaults a principal, assistant principal, teacher, teacher's aide or other educational staff on school premises or at school-sponsored or school-related events, including athletic games.” MGL Chapter 71, Section 37H¹/₂ authorizes the principal to expel a student “upon being convicted of a felony or upon an adjudication or admission in court of guilt with respect to such a felony or felony delinquency,” provided that the principal “determines that the student’s continued presence in school would have a substantial detrimental effect on the general welfare of the school.”

MGL Chapter 71, Section 37L requires school personnel to take certain steps, including notifying police and the Department of Social Services, if a student possesses or uses a dangerous weapon on school grounds. MGL Chapter 269, Section 10 prohibits the carrying of loaded or unloaded firearms on school grounds without specific authorization. The Federal Gun-Free Schools Act requires school districts to expel from school for not less than one year any student who has brought a firearm to school.

MGL Chapter 269, Sections 17, 18 and 19 prohibit the crime of hazing and require schools to notify students and student groups of this prohibition.

■ **Child Abuse and Neglect**

MGL Chapter 119, Section 51A requires teachers, health personnel, counselors, and other “mandated reporters” to report to the Department of Social Services if, in their professional capacity, they have “reasonable cause to believe that a child under the age of eighteen years is suffering physical or emotional injury” resulting from abuse, including sexual abuse, or from neglect. MGL Chapter 71, Section 37L requires school districts to inform all professional staff of their reporting responsibilities under the child abuse reporting law.

■ **Domestic and Dating Violence**

Several laws may be implicated in teen dating violence situations. See generally: MGL Chapter 209A (restraining orders and abuse prevention); MGL Chapter 265 (crimes of assault; stalking; rape).

■ **Sex Offenders**

MGL Chapter 6, Sections 178C–178O created a sex offender registry and established community notification regarding the presence of sex offenders. It is aimed at protecting children and others from dangerous recidivist sex offenders. As a matter of tort law, school districts have an obligation to protect employees and students from known or reasonably foreseeable and preventable dangers, including sexual assault by known pedophiles.

■ **Discrimination and Harassment**

State and federal laws protect students against unlawful discrimination and harassment. See generally: MGL Chapter 76, Section 5 (prohibiting public schools from discriminating against students on the basis of race, color, sex, religion, national origin or sexual orientation); MGL Chapter 151C (fair educational practices); and the following Federal civil rights laws that protect students against discrimination in schools that receive federal funds: Title VI of the Civil Rights Act of 1964 (prohibiting discrimination against students based on race or national origin); Title IX of the Education Amendments of 1972 (prohibiting discrimination against students based on sex, including sexual harassment) and Section 504 of the Rehabilitation Act of 1973 and the Americans with Disabilities Act (prohibiting discrimination against students based on disability).

■ **Substances**

Several state laws address the possession or use of substances such as tobacco, alcohol, and drugs on school grounds. Two laws address tobacco use in schools. MGL Chapter 71, Section 37H states, in relevant part:

The superintendent of every school district shall publish the district's policies pertaining to the conduct of teachers and students. Said policies shall prohibit the use of any tobacco products within the school buildings, the school facilities or on the school grounds or on school buses by any individual, including school personnel. Copies of these policies shall be provided to any person upon request and without cost by the principal of every school within the district.

Further, MGL Chapter 71, Section 2A states:

It shall be unlawful for any student, enrolled in either primary or secondary public schools in the commonwealth, to use tobacco products of any type on school grounds during normal school hours.

Each school committee shall establish a policy dealing with students who violate this law. This policy may include, but not be limited to, mandatory education classes on the hazards of tobacco use.

With respect to controlled substances, MGL Chapter 71, Section 37H authorizes the principal of a public school to expel a student for use or possession of controlled substances, among other offenses. The statute states, in relevant part:

Any student who is found on school premises or at school-sponsored or school-related events, including athletic games, in possession of a dangerous weapon, including, but not limited to, a gun or a knife; or a controlled substance as defined in chapter ninety-four C, including, but not limited to, marijuana, cocaine, and heroin, may be subject to expulsion from the school or school district by the principal.

Additionally, MGL Chapter 94C, Section 32F (Unlawful manufacture, distribution, dispensing or possession with intent to manufacture, etc. of controlled substances in Classes A to C to minors) prohibits the distribution of controlled substances to a person under the age of eighteen.

With respect to alcohol on school premises, MGL Chapter 272, Section 40A states:

Whoever gives, sells, delivers or has in his possession any alcoholic beverage, except for medicinal purposes, in any public school building, or on any premises used for public school purposes and under the charge of a school committee or other public board or officer, shall be punished by imprisonment for not more than thirty days or by a fine of not more than one hundred dollars, or both; provided, however, that a school committee of a city, town or district may authorize a public or nonprofit organization using a public school building with its permission during non school hours to possess and sell alcoholic beverages therein provided such nonprofit organization is properly licensed under the provisions of section fourteen of chapter one hundred and thirty-eight.

Disease Prevention and Control

■ Sick Children

Several laws protect students from exposure to disease. MGL Chapter 71, Section 55 concerns contagious diseases and school attendance. MGL Chapter 71, Section 55A concerns procedures for handling students who are sick, and also provides civil immunity to certain school employees who provide emergency first aid or emergency transportation to students. MGL Chapter 71, Section 56 concerns notice to parents when their children are sick.

■ Tuberculosis

MGL Chapter 71, Section 55B addresses tuberculosis tests for school employees. (See also MGL Chapter 69, Section 1C concerning Hepatitis B immunization for certain school employees.)

■ Immunization

MGL Chapter 76, Sections 15 addresses immunization requirements for students. Unless exempted for religious

reasons, no child may be admitted to school without proof of successful immunization against diphtheria, pertussis, tetanus, measles and polio and other communicable diseases determined by the Department of Public Health. (See also MGL Chapter 76, Sections 15A and 15B concerning testing and screening students for sickle cell anemia.)

Confidentiality and Treatment

■ Student Records

The Board of Education's Student Records Regulations, 603 Code of Massachusetts Regulations 23.00, address confidentiality of student records that are maintained by Massachusetts public elementary and secondary schools and by state-approved special education day and residential schools. The regulations provide detailed rules to insure parents' and students' rights of confidentiality, inspection, amendment, and destruction of student records. The state regulations are consistent with the Federal Family Educational Rights and Privacy Act, 20 U.S.C. sec. 1232g, and the FERPA regulations found at 34 CFR Part 99.

With respect to third party access to student records for health-related reasons, 603 CMR 23.07 (4) contains two relevant subsections:

- (e) A school may disclose information regarding a student to appropriate parties in connection with a health or safety emergency if knowledge of the information is necessary to protect the health or safety of the student or other individuals. This includes, but is not limited to, disclosures to the local police department and the Department of Social Services under the provisions of M.G.L. c. 71, section 37L and M.G.L. c. 119, section 51A.
- (g) **School health personnel and local and state health department personnel shall have access to student health records, including but not limited to immunization records, when such access is required in the performance of official duties, without the consent of the eligible student or parent.**

■ Other Confidentiality Provisions

MGL Chapter 112, Section 129A provides for confidential communications between a licensed psychologist and the individuals with whom the psychologist engages in the practice of psychology. MGL Chapter 112, Section 135A provides for confidential communications between a licensed social worker and a client. Each of these statutes lists exceptions to the rule of confidential communications.

■ AIDS/HIV Testing

MGL Chapter 111, Section 70F provides:

No health care facility, as defined in section seventy E, and no physician or health care provider shall (1) test any person for the presence of the HTLV-III antibody or antigen without first obtaining his written informed consent; (2) disclose the results of such test to any person other than the subject thereof without first obtaining the subject's written informed consent; or (3) identify the subject of such tests to any person without first obtaining the subject's written informed consent. No employer shall require HTLV-III antibody or antigen tests as a condition for employment. Whoever violates the provisions of this section shall be deemed to have violated section two of chapter ninety-three A. For the purpose of this section "written informed consent" shall mean a written consent form for each requested release of the results of an individual's HTLV-III antibody or antigen test, or for the release of medical records containing such information. Such written consent form shall state the purpose for which the information is being requested and shall be distinguished from written consent for the release of any other medical information, and for the purpose of this section "HTLV-III test" shall mean a licensed screening antibody test for the human T-cell lymphotropic virus type III.

■ Medical and Dental Care

MGL Chapter 112, Section 12F allows a minor to receive treatment without parental consent in special

circumstances:

Any minor may give consent to his medical or dental care at the time such care is sought if (i) he is married, widowed, divorced; or (ii) he is the parent of a child, in which case he may also give consent to medical or dental care of the child; or (iii) he is a member of any of the armed forces; or (iv) she is pregnant or believes herself to be pregnant; or (v) he is living separate and apart from his parent or legal guardian, and is managing his own financial affairs; or (vi) he reasonably believes himself to be suffering from or to have come in contact with any disease defined as dangerous to the public health pursuant to section six of chapter one hundred and eleven; provided, however, that such minor may only consent to care which relates to the diagnosis or treatment of such disease. All information and records kept in connection with the medical or dental care of a minor who consents thereto in accordance with this section shall be confidential between the minor and the physician or dentist, and shall not be released except upon the written consent of the minor or a proper judicial order.

Another law addresses drug treatment. MGL Chapter 112, Section 12E states:

A minor twelve years of age or older who is found to be drug dependent by two or more physicians may give his consent to the furnishing of hospital and medical care related to the diagnosis or treatment of such drug dependency. Such consent shall not be subject to disaffirmance because of minority. The consent of the parent or legal guardian of such minor shall not be necessary to authorize hospital and medical care related to such drug dependency and, notwithstanding any provision of section fifty-four of chapter one hundred and twenty-three to the contrary, such parent or legal guardian shall not be liable for the payment of any care rendered pursuant to this section. Records shall be kept of such care. The provisions of this section shall not apply to methadone maintenance therapy.

Appendix C: Technology Literacy and Health Education

The Use of Instructional Technology and Health Education

Technology can enhance the teaching and learning of health concepts by connecting students with health professionals from outside the classroom and providing access to information and resources that students and teachers have found difficult to obtain. The advantages of today’s powerful computers, used alone or linked to the Internet and the World Wide Web can be used to better understand the *Core Concept of Health Literacy, Healthy Self-Management, and Health Promotion*.

Using technology enables students and teachers to:

- Communicate with other students around the country and around the world via email or video conferencing.
- Create web pages, videotapes (using a camcorder), or multimedia presentations to impart their own views of health or social concerns to other students.
- Observe health information through the use of software, CD-ROMs, videodisc or videotape. Simulation software allows students to experiment with new ideas and new identities without putting themselves at risk.
- Obtain information around health by using a variety of media and evaluating the quality of material they obtain. The Internet increases student and teacher access to a vast amount of health information because national health organizations and health resources are available from a connected classroom.
- Work independently and take ownership for their own learning. Students using technology are active in acquiring the skills and knowledge that will help them function effectively.

Instructional technology involves the use of computers and other new technologies as a tool for learning. Technology can include computer software, the Internet, audiotapes, compact discs, telecommunication equipment, videotapes, laser discs, CD-ROMs, slides, films, transparencies. The availability of instructional technology integrated throughout the K–12 curriculum can provide a more diverse and accessible learning environment enabling all students to become capable information seekers, problem solvers, and effective communicators.

The Technology Literacy Competencies are a guide for districts to plan a systematic approach to assure that all students receive technology skills appropriate to the educational needs of the 21st century. These competencies are based on the National Educational Technology Standards Project in consultation with the U.S. Department of Education. In response to Massachusetts Education Reform’s call for a statewide education technology plan, one of the initiatives is the inclusion here of Technology Literacy to guide districts in technology planning.

CATEGORY	COMPETENCIES BY GRADE 8	PERFORMANCE INDICATORS
Basic Skills and Operations	<p><i>Students can:</i></p> <p>Identify the major tools of technology that are used in a learning environment (computers, VCRs, audiotapes, and other technologies).</p> <p>Operate computers, VCRs, audiotapes, and other technologies using input devices (mouse, keyboard, remote control) and output devices (monitor, printer).</p> <p>Solve routine hardware and software problems that occur during everyday use.</p>	<p><i>Students can:</i></p> <p>Open and close an application, and save to a hard drive, with assistance.</p> <p>Access, create, and manipulate data in all strands of the health curriculum framework.</p> <p>Aid another student in choosing and utilizing the correct application for a class project.</p>

	<p>Select and utilize appropriate applications (e.g., word processing programs, database spreadsheet, multimedia, web browser) for a variety of classroom projects.</p> <p>Communicate about technology using appropriate and accurate terminology.</p>	
Social, Ethical, and Human Issues	<p>Work cooperatively and collaboratively with peers when using technology in the classroom.</p> <p>Identify ethical and legal conduct when using technology in the classroom and describe personal consequences of inappropriate use.</p> <p>Practice responsible use of technology systems and software.</p> <p>Analyze advantages and disadvantages of widespread use and reliance on technology in the workplace and in society as a whole.</p>	<p>Distinguish between personal ownership of ideas and cite other's ideas.</p> <p>Understand and abide by acceptable use guidelines (e.g., preserve the integrity of data and use resources for educational purposes).</p> <p>Create collaborative multimedia presentations; cite all sources; share technology with group to complete project.</p>
Technology Productivity Tools	<p>Use technology tools (e.g., word processing programs, multimedia authoring, presentation, Web tools, digital cameras, scanners) to increase productivity of individual and collaborative projects.</p> <p>Create appropriate multimedia projects individually or with support from teachers, family members, or student partners.</p> <p>Use assistive technologies to remediate skill deficits when necessary.</p> <p>Use technology tools and resources for managing and communicating personal information.</p>	<p>Write a report on a word processor summarizing how the class responded to a video on water pollution.</p> <p>Use digital cameras to capture local consequences of ecological hazards.</p> <p>Use a draw/paint program to design and illustrate a poster as part of a report on evaluating strategies for improving local environmental health.</p>
Communication Tools	<p>Use computer based technologies including telecommunications to access information.</p> <p>Use technology resources (word processing, e-mail, Web environments) to communicate ideas and thoughts.</p> <p>Design, develop, publish and disseminate products using technology resources.</p>	<p>Gather information online about violence prevention with support from teachers, family members or student partners.</p> <p>Research on and off line consumerism and e-mail an inquiry to an expert in the field.</p> <p>Research, design, and produce a class Webpage on consumer health.</p>
Research Tools	<p>Use online tools to locate, evaluate and collect information from a variety of sources.</p> <p>Select and apply technology tools for research.</p> <p>Evaluate the accuracy, relevance, appropriateness, and bias of electronic information sources concerning health-related problems.</p>	<p>Locate and evaluate for validity a health-related Webpage.</p> <p>Analyze medical advertising in print and on an internet site. Produce a video or multimedia presentation to share this analysis with the class.</p> <p>Research on line the work being done around the world on deforestation. Analyze the information and write a report or create a multimedia</p>

		presentation to share with the class.
Problem Solving and Decision Making Tools	Use technology resources for solving problems and making informed decisions.	<p>Use presentation software to communicate information on health related statistics.</p> <p>Use a database of epidemic diseases to solve a specific question.</p> <p>Design and setup a database on signs, symptoms, causes and treatments of diseases. Use the information to analyze the data.</p>

References and Sources

References

The references are listed in the order in which they are discussed in the document.

Introduction

The Links Between Health and School Performance

United States Department of Health and Human Services. *The Health Consequences of Smoking: Nicotine Addiction, A Report of the Surgeon General*. Centers for Disease Control, Center for Health Promotion and Education, Office of Smoking and Health. DHHS Publication No. (CDC) 888-8406, 1988.

Squire, L. R. *Memory and Brain*. New York: Oxford University Press, 1987.

Jaffe, J. H. Drug Addiction and Drug Abuse. In A. G. Gilman, L. S. Goodman, & A. Gilman (Eds.), *The Pharmacological Basis of Therapeutics* (6th ed.). New York: Macmillan, 1980.

Bempchat, J. et al. *Teenage Pregnancy and Drug Abuse*. ERIC Document 316 615, 1989.

Wehler, C., Scott, R., & Anderson, J. *The Community Childhood Hunger Identification Project*. Washington, DC: Food Research and Action Center, 1996.

Symons, C., Cinelli, B., James, T., and Groff, P. Bridging student health risks and academic achievement through comprehensive school health programs. *Journal of School Health*, 67, 220-227, 1997.

Pitway Charitable Foundation. *Success for Every Teen: Programs that Help Adolescents Avoid Pregnancy, Gangs, Drug Abuse, and School Drop-Out*. ERIC Document 341 892, 1992.

Mohai, C. *Peer Leaders in Drug Abuse Prevention*. ERIC Document 341 892, 1991.

Meyers, A. F., Sampson, A. E., Weitzman, M., Rogers, B., Kayne, H. School breakfast program and school performance. *American Journal of Diseases of Children*, 143, 1234-1239, 1989.

Murphy, M., Pagano, M., Nachmani, J., Sperling, P., Kane, S., Kleinman, R. The relationship of school breakfast to psychosocial and academic functioning. *Archives of Pediatric Adolescent Medicine*, 152, 899-907, 1998.

Report to the Chairman, Committee on Labor and Human Resources, U.S. Senate. *School-linked human services: A comprehensive strategy for aiding students at risk of school failure*. ERIC Document 372 818, 1993.

Kolbe, L.J., Green, L., Foreyt, J., Darnell, L., Goodrick, K., Williams, H., Ward, D., Korton, A.S., Karacan, I., Widmeyer, R., & Stainbrook, G. (1986). Appropriate Functions of Health Education in Schools: Improving Health and Cognitive Performance. In Krasnegor, N.A., Arasteh, J.D., & Cataldo, M.F., (Eds.), *Child Health Behavior: A Behavioral Pediatrics Perspective*. New York: John Wiley & Sons.

Zimmerman, B. Enhancing student academic and health functioning. *School Psychology Quarterly*, 11, 47-66, 1996.

Simun, P. *Project Support Evaluation*. ERIC Document 398 291, 1996.

Massachusetts Department of Public Health. *Health Risks and Preventive Behavior Among Massachusetts Adults, 1996: Results from the Behavioral Risk Factor Surveillance Survey*. Boston, MA: Author, December 1998.

Health Education and Family Involvement

Marx, E., & Wooley, S. (Eds.). *Health is Academic: A Guide to Coordinated School Health Programs*. New York: Teachers College Press, 1998.

New York State Department of Education. *Early Elementary Resource Guide to Integrated Learning*. Albany, NY: Author, 1996.

Resnick, M., Bearman, P., Blum, R., Bauman, K., Harris, K., Jones, J., Tabor, J., Beuhring, T., Sieving, R., Shew, M., Ireland,

M., Bearinger, L., Udry, J. Protecting adolescents from harm: Findings from the National Longitudinal Study on Adolescent Health. *Journal of the American Medical Association*, 278, 823-832, 1997.

Marx, E., & Northrop, D. *Educating for Health: A Guide to Implementing a Comprehensive Approach to School Health Education*. Newton, MA: Education Development Center, Inc., 1995.

United States Department of Education. *Strong Families, Strong Schools*. Washington, DC: Author, 1994.

Lickona, T. *Educating for Character*. New York: Bantam Books, 1991.

Akin, T. *Character Education in America's Schools*. Torrance, CA: Innerchoice Publishing, 1995.

Appendix A: National Standards:

American Cancer Society. *National Health Education Standards: Achieving Health Literacy*. Atlanta, GA: Author, 1995.

National Association for Sport and Physical Education. *Moving Into the Future: National Standards for Physical Education*. Boston, MA: WCB/McGraw-Hill, 1995.

National Association of State Administrators of Family and Consumer Sciences. *National Standards for Family and Consumer Sciences Education*. Decatur: GA, V-TECHS, Southern Association of Colleges and Schools, 1998.

Appendix B: Law and Policy:

Finnegan, S.J. *MGL 1997: Selected Massachusetts General Laws for School Committees and School Personnel*. Boston, MA: Massachusetts Association of School Committees, 1997.

Appendix C: Technology Literacy and Health Education:

International Society for Technology in Education. *National Educational Technology Standards for Students*. Eugene, OR: Author, 1998.

Sources

The following sources informed the writing of the Framework.

Alabama State Department of Education. *Alabama Course of Study: Health Education*. Montgomery, AL: Author, 1997.

California Department of Education. *Health Framework for California Public Schools Kindergarten Through Grade Twelve*. Sacramento, CA: Author, 1994.

Hawaii Department of Education. *Health Education Framework*. Honolulu, HI: Author, September, 1995.

Massachusetts Department of Education. *English Language Arts Curriculum Framework*. Malden, MA: Author, 1997.

Massachusetts Department of Education. *History and Social Science Curriculum Framework*. Malden, MA: Author, 1997.

Massachusetts Department of Education. *The Massachusetts Comprehensive Health Curriculum Framework: Building Resilience Through Comprehensive Health*. Malden, MA: Author, 1996.

Missouri Department of Elementary and Secondary Education. *Missouri's Framework for Curriculum Development in Health Education and Physical Education (Healthy, Active Living) K-12*. Jefferson City, MO: Author, 1996.

National Guidelines Taskforce. *Guidelines for Comprehensive Sexuality Education: Kindergarten-12th Grade*. New York: Sexuality Information and Education Council of the United States, 1991.

Selected Resources for Health Education

Publications

Public Policy

General Education

- Boyer, E. L. *Ready to Learn: A Mandate for the Nation*. Princeton, NJ: The Carnegie Foundation for the Advancement of Teaching, 1991.
- Carnegie Council on Adolescent Development, Task Force on Education of Young Adolescents. *Turning Points: Preparing American Youth for the 21st Century*. Waldorf, MD: Author, 1989.
- Dodge, D. T., Jablon, J. R., Bickart, T. S. *Constructing Curriculum for the Primary Grades*. Washington, DC: Teaching Strategies, Inc., 1995.
- Massachusetts Board of Education. *Massachusetts Common Core of Learning*. Malden, MA: Author, September, 1994.
- National Education Goals Panel. *The National Education Goals Report: Building a Nation of Learners*. Washington, DC: Author, 1991.
- Rose, L., Gallup, A. The 30th annual Phi Delta Kappa/Gallup Poll of the public's attitude toward the public schools. *Phi Delta Kappa, September*, 41-56, 1998.
- Wagner, T. *How Schools Change: Lessons from Three Communities*. Boston, MA: Beacon Press, 1994.

Health and Health Education

- Allensworth, D., Symons, C. W., Olds, R. S. *Healthy Students 2000 – An Agenda for Continuous Improvement in America's Schools*. Kent, OH: American School Health Association, 1994.
- American Association of School Administrators. *Healthy Kids for the Year 2000: An Action Plan for Schools*. Arlington, VA: Author, 1990.
- American Cancer Society. *The American Cancer Society's Approach to Youth Education*. Atlanta, GA: Author, 1995.
- American Cancer Society. *National Action Plan for Comprehensive School Health Education*. Atlanta, GA: Author, 1992.
- Council of Chief State School Officers. *Beyond the Health Room*. Washington DC: Resource Center on Educational Equity, 1991.
- Gallup Organization. *Values and Opinions of Comprehensive School Health Education in US Public Schools: Adolescents, Parents, and School District Administrators*. Atlanta, GA: American Cancer Society, 1994.
- Goodenow, C. *1996 Massachusetts School Health Education Profile Report*. Malden, MA: Massachusetts Department of Education, 1997.
- Goodenow, C. *1998 Massachusetts School Health Education Profile Report*. Malden, MA: Massachusetts Department of Education, 1999-in preparation.
- Institute of Medicine. D. Allensworth, E. Lawson, L. Nicholson, & J. Wyche (Eds.). *Schools and Health: Our Nation's Investment*. Washington, DC: National Academy Press, 1997.
- Joint Committee on National Health Education Standards. *Achieving Health Literacy: An Investment in the Future*. Atlanta, GA: American Cancer Society, 1995.
- Marx, E., Wooley, S. (Eds.). *Health is Academic: A Guide to Coordinated School Health Programs*. New York: Teachers College Press, 1998.

- National Conference of State Legislatures. *Adolescent Health Issues*. Denver, CO: Author, 1997.
- National Health & Education Consortium. *Putting Children First: State Level Collaboration Between Education and Health*. Washington, DC: Author, 1995.
- Newman, I. M., Farrell, K. A. *Thinking Ahead: Preparing for Controversy*. Kent, OH: American School Health Association, 1995.
- Policy Studies Associates, Inc., National Health/Education Consortium. *Creating Sound Minds and Bodies: Health and Education Working Together*. Washington, DC: Author, 1992.
- Saunders, R., Fee, R., Gottlieb, N. Higher education and the health of America's children. *Phi Delta Kappan*, January, 377-380, 1999.
- Symons, C., Cinelli, B., James, T., Groff, P. Bridging student health risks and academic achievement through comprehensive school health programs. *Journal of School Health*, 67, 220-227, 1997.
- Torabi, M., Crowe, J. National public opinion on school health education: Implications for the health care reform initiatives. *Journal of Health Education*, 26, 260-266, 1995.
- Zimmerman, B. Enhancing student academic and health functioning. *School Psychology Quarterly*, 11, 47-66, 1996.

Standards

- Joint Committee on National Health Education Standards. *National Health Education Standards*. Atlanta, GA: American Cancer Society, 1995.
- Massachusetts Family and Consumer Sciences Program Standards Revision Committee. *Standard Guidelines for Massachusetts Family and Consumer Sciences Programs*. Amherst, MA: University of Massachusetts, 1995.
- National Association for Sport and Physical Education. *Moving Into the Future: National Standards for Physical Education*. Boston, MA: WCB/McGraw-Hill, 1995.
- National Association of State Administrators of Family and Consumer Sciences. *National Standards for Family and Consumer Sciences Education*. Decatur, GA: V-TECHS, Southern Association of Colleges and Schools, 1998.

Comprehensive School Health Education Programs

Implementation

- Allensworth, D. Health education: State of the art. *Journal of School Health*, 63, 14-20, 1993.
- American Cancer Society. *Comprehensive School Health Education, It's Not Just for Rainy Days: Implementation Guide*. Atlanta, GA: Author, 1995.
- American School Health Association. *Coalition Compendium: A Guide to School Health Instructional Materials*. Kent, OH: Author, 1995.
- American School Health Association. *Guidelines for Comprehensive School Health Programs*. Kent, OH: Author, 1995.
- Goodman, I., Sheetz, A. (Eds.). *The Comprehensive School Health Manual*. Boston, MA: Massachusetts Department of Public Health, School Health Unit, 1995.
- Kane W. M. *Step By Step to Comprehensive School Health: The Program Planning Guide*. Santa Cruz, CA: ETR Associates, 1993.
- Lloyd-Kolkin, D., Hunter, L. *The Comprehensive School Health Sourcebook*. Menlo Park, CA: Health and Education Communication Consultants, 1990.
- Marx, E., Northrop, D. *Educating for Health: A Guide to Implementing a Comprehensive Approach to School Health Education*. Newton, MA: Education Development Center, Inc., 1995.
- National School Boards Association. *School Health: Steps to Implementation*. Alexandria, VA: Author, 1992.

- Report to the Chairman, Committee on Labor and Human Resources, U.S. Senate. *School-linked human services: A comprehensive strategy for aiding students at risk of school failure*. ERIC Document 372 818, 1993.
- Resnicow, K., Allensworth, D. Conducting a comprehensive school health program. *Journal of School Health*, 66, 59–63, 1996.
- Tyson, H. A load off the teachers' backs: Coordinated school health programs. *Phi Delta Kappan*, January, K1-K8, 1999.

Evaluation

- Adler, K. *The FIRST Grant: Findings from 30 middle schools on comprehensive health education*. Malden, MA: Massachusetts Department of Education, 1996.
- Council of Chief State School Officers. *Incorporating Health-Related Indicators in Education Accountability Systems*. Washington, DC: Author, 1998.
- Division of Adolescent and School Health. *Project Summaries for National Organizations: Cooperative Agreements for National Programs to Strengthen Comprehensive School Health Programs and Prevent Health Problems Among Youth*. Atlanta, GA: Centers for Disease Control, 1995.
- Goodenow, C. *The AIDS Program Intensive Evaluation: 1995-1996*. Malden, MA: Massachusetts Department of Education, 1997.
- Grunbaum, J., Kann, L., Williams, B., et al. Characteristics of health education among secondary schools—School Health Education Profiles, 1996. *Morbidity and Mortality Weekly Review*, 47, 1-31, 1998.
- Hausman, A., Pierce, G., Briggs, L. Evaluation of comprehensive violence prevention education: Effects on student behavior. *Journal of Adolescent Health*, 19, 104-110, 1996
- Israel, B. A., Cummings, K. M., Dignan, M. B., Heaney, C. A., Perales, D. P., Simons-Morton, B. G., Zimmerman, M. A. Evaluation of health education programs: Current assessment and future directions. *Health Education Quarterly*, 22, 364–389.
- Journal of School Health. School health policies and programs study: A summary report. *Journal of School Health*, 65, 291–353, 1995.
- Kessel, S. *Massachusetts School Health Education Profile 1996 Report*. Malden, MA: Massachusetts Department of Education, 1997.
- Massachusetts Department of Public Health. *Independent Evaluation of the Massachusetts Tobacco Control Program Fourth Annual Report January 1994 to June 1997*. Cambridge, MA: Abt Associates, Inc., 1998.
- McManis, D. *Year IV Evaluation of the Massachusetts Health Protection Fund*. Malden, MA: Massachusetts Department of Education, 1998.
- McManis, D. *Year V Evaluation of the Massachusetts Health Protection Fund*. Malden, MA: Massachusetts Department of Education, 1999-in preparation.
- National Campaign to Prevent Teen Pregnancy. *Evaluating Abstinence-Only Interventions*. Washington, DC: Author, 1998.
- Simun, P. *Project Support Evaluation*. ERIC Document 398 291, 1996.
- United States Public Health Service. *School health: Findings from evaluated programs* (2nd ed.). Washington, DC: U.S. Government Printing Office, 1998.

Support Services

- Adelman, H. S. *Restructuring support services: Toward a comprehensive approach*. Kent, OH: American School Health Association, 1996.
- Dryfoos, J. G. *Full-Service Schools: A Revolution in Health and Social Services for Children, Youth, and Families*. San Francisco: Jossey-Bass, 1994

Health Services

- Adler, K. *The Enhanced School Health Services Program Data Report*. Boston, MA: Massachusetts Department of Public Health, 1997.
- American Academy of Pediatrics. *Integrating Education, Health, and Human Services for Children, Youth, and Families: Systems That Are Community-Based and School-Linked*. Washington, DC: Author, 1994.
- Anglin, T.M., Naylor, K.E., Kaplan, D.W. Comprehensive, school-based health care: High school students' use of medical, mental health, and substance abuse services. *Pediatrics*, 97, 318-330, 1996.
- Lear, J.G. School-based services and adolescent health: Past, present, and future. L. Juszczak & H. Fisher (Eds.), *Adolescent Medicine: State of the Art Reviews*, 163-180. Philadelphia: Hanley and Belfus, Inc., 1996.
- Sheetz, A, Blum, M. Medication administration in schools: The Massachusetts experience. *Journal of School Health*, 68, 1998.

Guidance, Counseling, and Psychological Services

- Campbell, C., Dahir, C. *The National Standards for School Counseling Programs*. Alexandria, VA: American School Counselor Association, 1997.
- Henggeler, S. W. A consensus: Conclusions of the APA Task Force report on innovative models of mental health services for children, adolescents, and their families. *Journal of Clinical Child Psychology*, 23, 3-6, 1995.
- Lipkin, A. *Resources for Education and Counseling Faculty*. Boston, MA: Massachusetts Governor's Commission on Gay and Lesbian Youth, Project for the Integration of Gay and Lesbian Youth Issues on School Personnel Certification Programs, June 1996.
- Massachusetts Department of Education. *Gay/Straight Alliances: A Student Guide from the Safe Schools Program for Gay and Lesbian Students*. Malden, MA: Author, 1995.
- Massachusetts School Counselors Association. *Comprehensive Developmental School Counseling Curriculum Guide (2nd ed.)*. Rowley, MA: Defiance Graphics Corporations, 1998.
- Thomas, A., Grimes, J. (Eds.). *Best practices in school psychology-III*. Washington, DC: National Association of School Psychologists, 1995.

Food/Nutrition Services

- American Dietetic Association, Society for Nutrition Education, and American School Food Service Association. School-based nutrition programs and services. *Journal of the American Dietetic Association*, 95, 367-369, 1995.
- Murphy, M., Pagano, M., Nachmani, J., Sperling, P., Kane, S., Kleinman, R. The relationship of school breakfast to psychosocial and academic functioning. *Archives of Pediatric Adolescent Medicine*, 152, 899-907, 1998.
- Wehler, C., Scott, R., Anderson, J. *The Community Childhood Hunger Identification Project*. Washington, DC: Food Research and Action Center, 1996.

Special Populations

- Briggs, F. *Developing Personal Safety Skills in Children with Disabilities*. Baltimore, MD: Paul H. Brookes, 1995.
- Haring, N. G., Romer, L. T. (Eds.). *Welcoming Students Who Are Deaf-Blind into Typical Classrooms: Facilitating School Participation, Learning, and Friendships*. Baltimore, MD: Paul H. Brookes, 1995.
- Matiella, A, C. (Ed.). *The Multicultural Challenge in Health Education*. Santa Cruz, CA: ETR Associates, 1994.

Wellness

- Association for Supervision and Curriculum Development. *Healthy, Active Living*. Alexandria, VA: Author, 1993.
- Baranowski, T., Hearn, M.D., Baranowski, J.C. Teach well: The relation of teacher wellness to elementary student health and behavior outcomes. *Health Education and Behavior*, 26, (Suppl. 2), S61-S71, 1995.
- Simeonsson, R. J. (Ed.). *Risk, Resilience, and Prevention: Promoting the Well-Being of All Children*. Baltimore, MD: Paul H. Brookes, 1994.

Physical Health

Physical Activity

- Bauer, Susan, M. *A Body/Mind Approach to Movement Education for Adolescents*. Amherst, MA: Author, 1994.
- Miracle, A. W., Rees, R. *Lessons of the Locker Room: The Myth of School Sports*. New York, NY: Prometheus Books, 1995.
- National Association for Sport and Physical Education. *Appropriate Practices for Middle School Physical Education*. Reston, VA: Author, 1995.
- National Association for Sport and Physical Education. *Looking at Physical Education from a Developmental Perspective: A Guide to Teaching*. Reston, VA: Author, 1995.
- National Association for Sport and Physical Education. *Developmentally Appropriate Practice in Movement Programs for Young Children*. Reston, VA: Author, 1994.
- National Association for Sport and Physical Education. *Guidelines for Elementary School Physical Education*. Reston, VA: Author, 1994.
- National Association for Sport and Physical Education. *Sport and Physical Education: Advocacy Kit*. Reston, VA: Author, 1994.
- Satcher, D. Guidelines for school and community programs to promote lifelong physical activity among young people. *Morbidity and Mortality Weekly Report*, 46, 22, 1997.
- Sidentop, D. Curriculum innovation: Toward the 21st century. *International Council for Health, Physical Education, Recreation, Sport, and Dance Journal*, Vol Xxx, No. 2, Winter, 1994.
- United States Department of Health and Human Services. *Physical Activity and Health: A Report of the Surgeon General*. 1996.

Nutrition

- Celbuski, C, Farris, E., Carpenter, J. *Nutrition Education in Public Elementary and Secondary Schools*. NCES 96-852. Washington, DC: U.S. Department of Education, National Center for Education Statistics, 1996.
- Centers for Disease Control and Prevention. Guidelines for school health programs to promote lifelong healthy eating. *Journal of School Health*, 67, 9-26, 1997.
- Given, B. K. Food for thought. *Educational Leadership*, November, 68-71, 1998.
- National Center for Education in Maternal and Child Health. *Celebrating Diversity: Approaching Families Through Their Food*. Arlington, VA: Author, 1995.

Reproduction/Sexuality

- Berne, L. A., Huberman, B. K. Sexuality education: Sorting fact from fiction. *Phi Delta Kappan*, November, 1995.
- Cahn, S. K. *Coming On Strong: Gender and Sexuality in Twentieth-Century Women's Sport*. Cambridge, MA: Harvard University Press, 1995.
- Drolet, J. C., Clark, K. (Eds.). *The Sexuality Education Challenge: Promoting Healthy Sexuality in Young People*. Santa Cruz, CA: ETR Associates, 1994.
- Gay and Lesbian High School Curriculum and Staff Development Project. *A Staff Development Manual for Anti-Homophobia Education in the Secondary School*. Cambridge, MA: Harvard Graduate School of Education, 1993.
- Kirby, D. *No Easy Answers: Research Findings on Programs to Reduce Teen Pregnancy*. Washington, DC: The National

- Campaign to Prevent Teen Pregnancy, 1997.
- Lipkin, A. *Understanding Homosexuality, Changing School: A Text for Teachers, Counselors and Administrators*. Westview Press, 1999.
- Miner, K. R. *Educating About HIV/AIDS in the Comprehensive School Health Challenge*, Santa Cruz, CA: ETR Associates, 1, 428, 1994.
- National Association of State Boards of Education. *Policy Update: The Role of Education in Teen Pregnancy*. Alexandria, VA: Policy Information Clearinghouse, 1998.
- Ogletree, R. J., Fetro, J. V., Drolet, J. C., Rienzo, B. A. *Sexuality Education Curricula: The Consumer's Guide*. Santa Cruz, CA: ETR Associates, 1994.

Social and Emotional Health

- Akin, T. *Character Education in America's Schools*. Torrance, CA: Innerchoice Publishing, 1995.
- Douglas, S.J. *Where the Girls Are: Growing Up Female with the Mass Media*. New York, NY: Random House, 1995.
- Ewing, M. *Manage Your Conflicts: Lesson Plans to Accompany Children's' Literature K-5*. Slaterville, NY: Author, 1995.
- Fisher, S., Reason, J. *Handbook of Life Stress, Cognition, and Health*. Chichester, NY: John Wiley & Sons, Ltd., 1988.
- Lickona, T. *Educating for Character*. New York: Bantam Books, 1991.
- Resnick, M., Bearman, P., Blum, R., Bauman, K., Harris, K., Jones, J., Tabor, J., Beuhring, T., Sieving, R., Shew, M., Ireland, M., Bearinger, L., Udry, J. Protecting adolescents from harm: Findings from the National Longitudinal Study on Adolescent Health. *Journal of the American Medical Association*, 278, 823-832, 1997.
- Underwood, M., Dunne-Maxim, K. *Managing Sudden Traumatic Loss in the Schools*. Piscataway, NJ: University of Medicine and Dentistry of New Jersey, 1997.
- Zollo, P. *Wise Up to Teens: Insights Into Marketing and Advertising to Teenagers*. Ithaca, NY: New Strategist Publications, Inc. 1995.

Safety and Prevention

Safety and Injury Prevention and Violence Prevention

- Centers for Disease Control and Prevention. Rates of homicide, suicide, and firearm-related death among children—26 industrialized countries. *Morbidity and Mortality Weekly Report*, 46, 1997.
- Governor's Commission on Domestic Violence of the Commonwealth of Massachusetts. *The Children of Domestic Violence*. Boston, MA: Commonwealth of Massachusetts, April 1996.
- Kadel, S., Watkins, J., Follman, J., Hammond, C. *Reducing School Violence: Building a Framework for School Safety*. Greensboro, NC, Tallahassee, FL: The Regional Educational Laboratory at SERVE, 1999.
- Kaufman, P., Chen, X., Choy, K., et al. *Indicators of School Crime and Safety*. Washington, DC: United States Department of Education and Justice, 1998.
- Massachusetts Department of Public Health and Massachusetts Department of Education. *Teen Dating Violence Intervention & Prevention Resources for Schools*. Boston, MA: Author, 1998.
- Massachusetts Department of Public Health, Massachusetts Department of Education, Massachusetts Committee on Criminal Justice. *Words, Not Weapons: A Resource Manual for School Administrators, Advisors, and Peer Leaders*. Boston, MA: The Medical Foundation, March 1994.

- Scala, C.D., Gallagher, S.S., Schneps, S.E. Causes and outcomes of pediatric injuries occurring at school. *Journal of School Health*, 67, 384-89, 1997.
- Slaby, R. G., Roedell, W. C., Arezzo, D., Hendrix, K. *Early Violence Prevention: Tools for Teachers of Young Children*. Washington, DC: National Association for the Education of Young Children, 1995.
- United States Department of Education. *Creating Safe and Drug-Free Schools: An Action Guide*. Washington, DC: Author, 1996.
- United States Department of Education, United States Department of Justice. *Students' Reports of School Crime: 1989 and 1995*. Washington, DC: National Center for Education Statistics and Bureau of Justice Statistics, 1998.

Tobacco, Alcohol, and Other Substances Use/Abuse Prevention

- Bachman, J.G., Johnston, L.D., O'Malley, P.M. Explaining Recent Increases in Students' Marijuana Use: Impacts of Perceived Risks and Disapproval, 1976 through 1996. *American Journal of Public Health*, 88, 887-892, 1998.
- Begay, M., Glantz, S. Question 1: Tobacco education outlays from the 1994 fiscal year to the 1996 fiscal year: Comprehensive school health education programs. *Tobacco Control Archives*, USCF Library and Center for Knowledge Management, 1997.
- Berman, B.A., Gritz, E.R. Women and smoking: Current trends and issues for the 1990s. *Journal of Substance Abuse*, 3, 221-231, 1991.
- Biener, L., Aseltine, R., Cohen, B., et al. Reactions of adult and teenaged smokers to the Massachusetts tobacco tax. *American Journal of Public Health*, 88, 1389-91, 1998.
- Black, D., Tobler, N., Sciacca, J. Peer helping/involvement: An efficacious way to meet the challenge of reducing alcohol, tobacco, and other drug use among youth? *Journal of School Health*, 68, 87-93, 1998.
- Botvin, G.J., Epstein, J.A., Baker, E., et al. School-based drug abuse prevention with inner-city minority youth. *Journal of Child and Adolescent Substance Abuse*, 6, 5-19, 1997.
- Centers for Disease Control and Prevention. Guidelines for school health programs to prevent tobacco use and addiction. *Morbidity and Mortality Weekly Report*, 43, (RR-2), 1994.
- Donnermeyer, J., Davis, R. Cumulative effects of prevention education on substance use among 11th grade students in Ohio. *Journal of School Health*, 68, 151-158, 1998.
- Hilts, P. J. *Smokescreen: The Truth Behind the Tobacco Industry Cover-up*. Reading, MA: Addison-Wesley Publishing Co, Inc. 1996.
- King, C., Siegel, M., Celebucki, C., et al. Adolescent exposure to cigarette advertising in magazines. *Journal of the American Medical Association*, 279, 516-20, 1998.
- Massachusetts Department of Education. *Promising Practices of School Health Education Tobacco Control Programs*. Malden, MA: Author, 1997.
- Massachusetts Department of Education. *Comprehensive School Health Education Tobacco Control Programs Status Report*. Malden, MA: Author, 1997.
- Massachusetts Department of Public Health. *Preventing Adolescent Substance Use in Massachusetts: A Focus Group Study*. Boston, MA: Health and Addictions, Inc., 1998.
- Smith G. H., Coles, C. D., Poulsen, M. K., Cole, C. K. *Children, Families, and Substance Abuse: Challenges for Changing Educational and Social Outcomes*. Baltimore, MD: Paul H. Brookes, 1995.
- United States Department of Education. *Creating Safe and Drug-Free Schools: An Action Guide*. Washington, DC: Author, 1996.
- United States Department of Health and Human Services. *Tobacco Use Among U.S. Racial/Ethnic Groups: A Report of the Surgeon General*. Atlanta, GA: Author, 1998.
- United States Department of Health and Human Services. *The Health Consequences of Smoking: Nicotine Addiction, A Report to the Surgeon General*. Centers for Disease Control, Center for Health Promotion and Education, Office of Smoking and Health. DHHS Publication No. (CDC) 888-8406, 1988.

Community and Public Health

- Benard, B. et al. *Fostering Resiliency in Kids: Protective Factors in the Family, School, and Community*. Northwest Regional Educational Laboratory, pp. 5, 11–14, August 1991.
- Berryman, J. C., Breighner, K. W. *Modeling Healthy Behavior: Actions and Attitudes in Schools*. Santa Cruz, CA: ETR Associates, 1994.
- Cunningham, A.S. Breastfeeding: Adaptive behavior for child health and longevity. In P. Stuart-Macadam & K.A. Dettwyler (Eds.), *Breastfeeding: Biocultural Perspectives*, 243. New York, NY: Aldine de Gruyer, 1995.
- Etzioni, A. *The Spirit of Community: The Reinvention of American Society*. New York, NY: Touchstone, 1993.
- National Association of State Boards of Education. *Someone At School Has AIDS: A Complete Guide to Education Policies Concerning HIV Infection*. Alexandria, VA, Policy Information Clearinghouse, 1996.
- Northeast Regional Center for Drug-Free Schools and Communities. *Developing the Resilient Child: A Prevention Manual for Parents, Schools, Communities, and Individuals*. Sayville, NY: Author, 1992.
- Palfrey, J. S. *Community Child Health: An Action Plan for Today*. Westport, CT: Praeger, 1995.
- Sobel, David. Beyond ecophobia: Reclaiming the heart in nature education. *People and Nature, Orion, Autumn*, 11–17, 1995.
- Yang, C.P. et al. History of lactation and breast cancer risk. *American Journal of Epidemiology*, 138, 1050, 1993.

Assessment

- Council of Chief State School Officers. *Assessing Health Literacy: Assessment Framework*. Soquel, CA: ToucanEd Publications, 1998.
- Council of Chief State School Officers. *Assessing Health Literacy: A Guide to Portfolios*. Soquel, CA: ToucanEd Publications, 1997.
- Council of Chief State School Officers. *HealthHelp CD-ROM: Reference and Documentation Handbook for Health Education Assessment Project State Collaborative on Assessment and Student Standards, Version 2.0*. Washington, DC: Authors, 1997.
- Hart, D. *Authentic Assessment: A Handbook for Educators*. Menio Park, CA: Addison-Wesley Publishing Company, 1994.
- National Education Goals Panel. *Principles and Recommendations for Early Childhood Assessments*. Washington, DC: Author, 1998.

Behavior-Based Surveys/Needs Assessments

- Center for the Study of Social Policy. *Kids Count Data Book: State Profiles of Child Well-Being*. Greenwood, CT: The Annie E. Casey Foundation, 1999.
- Centers for Disease Control and Prevention. Youth risk behavior surveillance—United States, 1997. *Morbidity and Mortality Weekly Report*, 47, (SS-3), 1998.
- Goodenow, C. *Massachusetts 1997 Youth Risk Behavior Survey Results*. Malden, MA: Massachusetts Department of Education, August 1998.
- Johnston, L.D., Bachman, J.G., O'Malley, P.M. *Monitoring the Future Study, 1997*. Ann Arbor, MI: Institute for Survey

- Research, University of Michigan, 1997.
- Kaiser, Henry J. Foundation, Children Now. *Talking with Kids About Tough Issues: A National Survey of Parents and Kids*. Menlo Park, CA: Author, 1999.
- Kaiser, Henry J. Foundation, YM Magazine. *National Survey of Teens: Teens Talk about Dating, Intimacy, and their Sexual Experiences*. Menlo Park, CA: Author, 1998.
- National Center on Addiction and Substance Abuse at Columbia University. *Back to School 1998-The CASA National Survey of American Attitudes on Substance Abuse IV: Teens, Teachers and Principals*. New York, NY: Columbia University, 1998.
- Massachusetts Department of Public Health. *Adolescent Tobacco Use in Massachusetts: Trends Among Public School Students 1984–1996 Tobacco, Alcohol, Other Drugs*. Boston, MA: Health and Addictions, Inc., 1997.
- Massachusetts Department of Public Health. *Health Risks and Preventive Behavior Among Massachusetts Adults, 1996: Results from the Behavioral Risk Factor Surveillance Survey*. Boston, MA: Author, December 1998.
- United States Department of Health and Human Services. 1998 National Household Survey on Drug Abuse. Washington, DC: Office of Applied Studies, Substance Abuse and Mental Health Services Administration, USDHHS.

Health Related Organizations and Associations

- Advocates for Youth—www.advocatesforyouth.org
1025 Vermont Avenue, NW, Suite 200, Washington, DC 20005 (202) 347-5700
- American Academy of Pediatrics—www.aap.org
141 Northwest Point Blvd., Elk Grove, IL 60007 (847) 228-5005
- American Alliance for Health, Physical Education, Recreation and Dance—<http://www.aahperd.org/>
1900 Association Drive, Reston, VA 20191 (703) 476-3467
- American Association of Family and Consumer Sciences—www.aafcs.org
1555 King Street, Alexandria, VA 22314 (703) 706-4600 (800) 424-8080
- American Cancer Society National Office—www.cancer.org
1599 Clifton Rd., N.E., Atlanta, GA 30329 (800) ACS-2345
- American Dental Association—www.ada.org
211 E. Chicago Avenue, Chicago, IL 60611 (312) 440-2865
- American Health Foundation—www.AHF.org
675 Third Avenue, 11th Floor, New York, NY 10017 (212) 953-1900
- American Heart Association—www.americanheart.org
7272 Greenville Avenue, Dallas, TX 75231 (214) 706-1356
Massachusetts Affiliate: 20 Speen Street, Framingham, MA 01701 (508) 620-1700
- American Medical Association—www.ama-assn.org
515 North State Street, Chicago, IL 60610 (312) 464-4065
- American Public Health Association—www.apha.org
1015 15th Street, N.W. 3rd Floor, Washington, DC 20005 (202) 789-56000
- American Red Cross—www.redcross.org
8111 Gatehouse Road, Jefferson Park, Falls Church, VA 22042 (703) 206-7180
- American School Counselor Association—www.schoolcounselor.org
801 N. Fairfax St., Suite 310, Alexandria, VA 22314 (703) 683-2722
- American School Food Service Association—www.asfsa.org
1600 Duke Street, 7th Floor, Alexandria, VA 22314 (800) 877-8822
- American School Health Association—www.ashaweb.org
PO Box 708, Kent, OH 44240 (330) 678-1601

Association for the Advancement of Health Education—info@aahperd.org
1900 Association Drive, Reston, VA 20191 (703) 476-3437

CDC National AIDS Clearinghouse—www.cdcnpin.org
(800) 458-5231, (800) 342-AIDS (English Hotline), (800) 344-SIDA (Spanish Hotline), (800) 243-7012 (TTY/TDD),
(301) 217-0023 (International line)

Comprehensive Health Education Foundation—www.chef.org
22419 Pacific Highway South, Seattle, WA 98198 (206) 824-2907

Council of Chief State School Officers—www.ccsso.org
One Massachusetts Ave., N.W. Suite 700, Washington, DC 20001 (202) 336-7035

Data Analysis and Testing Associates, Inc.—data@data.mv.com
P.O. Box 395, Concord, MA 01742 (207) 748-1064

Education Development Center—www.edc.org
55 Chapel Street, Newton, MA 02160 (617) 969-7100

ETR Associates—www.etr.org
PO Box 1830, Santa Cruz, CA 95061 (408) 438-4060; (800) 321-4407

Home Economics Education Association—bowersj@cwu.edu
Central Washington University, Home Economics Department
400 East 8th Avenue, Ellensburg, Washington 98926 (508) 963-2766

Indoor Air Quality Information Clearinghouse—www.epa.gov/iaq
(800) 438-4318, (202) 484-1307

National Assembly on School-Based Health Care—www.nasbhc.org
1522 K Street, N.W. Suite 600, Washington, DC 20005 (888) 286-8727

National Association of Community Health Centers—www.nachc.org
1330 New Hampshire Avenue, N.W., Suite 122, Washington, DC 20036 (202) 659-8008

National Association of Elementary School Principals—www.naesp.org
1615 Duke Street, Alexandria, VA 22314 (703) 684-3345

National Association of Secondary School Principals—www.nassp.org
1904 Association Drive, Reston, VA 20191 (703) 860-0200

National Association of School Nurses—www.nasn.org
PO Box 1300, Scarborough, ME 04070 (207) 883-2117

National Association for Sport and Physical Education—naspe@aahperd.org
1900 Association Drive, Reston, VA 20191 (703) 476-3412

National Center for Health Education—nche@nche.org
72 Spring Street, Suite 208, New York, NY 10012 (212) 334-9470

National Center for Health Statistics—www.cdc.gov/nchswww
6525 Belcrest Road, Hyattsville, MD 20782 (301) 436-8500

National Clearinghouse on Child Abuse and Neglect Information—www.calib.com/nccanch
(800) FYI-3366, (703) 385-7565

National Clearinghouse on Family Support and Children's Mental Health, Portland State University—www.rtc.pdx.edu
(800) 628-1696, (503) 725-4040, (503) 725-4165 (TTD)

National Coalition for Parent Involvement in Education—www.ncpie.org
C/o IEL 1001 Connecticut Ave., N.W. Suite 310, Washington, DC 20036

National Coalition of Advocates for Students—<http://www.ncas1.org/>
100 Boylston Street, Suite 737, Boston, MA 02116 (617) 357-8507

National Education Association/Health Information Network—neahin1@aol.com
1201 16th Street NW, Suite 521, Washington, DC 20036 (202) 822-7570

National Fire Protection Association—www.nfpa.org
 Batterymarch Park, Quincy, MA 02269 (617) 770-3000

National Health Education Consortium—iel@iel.org
 Institute for Education Leadership, 1001 Connecticut Avenue, Suite 310, Washington DC 20036 (202) 822-8405

National Health Information Center—<http://nhic-nt.health.org/>
 (800) 336-4797, (301) 565-4167 Washington, DC

National Information Center for Children and Youth with Disabilities—www.nichcy.org
 (800) 695-0285, (202) 884-8200 Washington, DC

National Injury Information Clearinghouse—<http://www.cpsc.gov/about/clrnghse.html>
 (301) 504-0424 Washington, DC

National Men's Health Foundation—<http://www.nationalmenshealthweek.com/Default.htm>
 14 East Minor St., Emmaus, PA 18098-0099 (610) 967-8620

National Mental Health Association—www.nmha.org
 1021 Prince St., Alexandria, VA 22314 (703) 681-7722

National Oral Health Information Clearinghouse—www.nidr.nih.gov
 (301) 402-7364

National Peer Helpers Association—nphaorg@aol.com
 PO Box 2684, Greenville, NC 27834 (919) 522-3959

National PTA—www.pta.org
 330 N. Wabash Ave., Suite 2100, Chicago, IL 60611-3690 (312) 670-6782

National SAFE Kids Campaign—www.safekids.org
 111 Michigan Ave, NW, Washington, DC 20010 (202) 939-4993

National Safety Council—www.national-safety-council.ie
 1121 Sprink Lake Drive, Itasca, IL 60143-3201 (630) 285-1121

National Wellness Association—<http://www.wellnessnwi.org/nwa/>
 PO Box 827, Stevens Point, WI 54481-0827 (715) 342-2969

National Youth Sports Safety Foundation—www.nyssf.org
 333 Longwood Ave, Suite 202, Boston, MA 02115 (617) 277-1171

Office on Smoking and Health, Centers for Disease Control and Prevention—www.cdc.gov/tobacco
 (404) 488-5705, (800) CDC-1311

President's Council on Physical Fitness and Sports—<http://www.surgeongeneral.gov/ophs/pcpfs.htm>
 (202) 272-3430

Sexuality Information and Education Council of the United States-SIECUS—www.siecus.org
 130 West 42nd Street, Suite 350 New York, NY 10036-7802 (212) 819-9770

Society of State Directors of Health, Physical Education, and Recreation—bdatema@aahperd.org
 1900 Association Drive, Reston, VA 20191 (703) 476-3402

Stalker, John C. Institute of Food and Nutrition
 Framingham State College, 100 State Street, Framingham, MA 01701 (508) 626-4702

U.S. Consumer Product Safety Commission Hotline—www.cpsc.gov
 (800) 638-2772, (800) 638-8270 (TT), (301) 504-0580

University of California, Los Angeles, Department of Psychology—<http://smhp.psych.ucla.edu/>
 School Mental Health Project, Box 951563, Los Angeles, CA 90095 (310) 825-3634 smhp@ucla.edu

Local Organizations and Agencies

BCD Health Services, Men's Preventive Health Program—<http://www.bostonabcd.org/menshealth/index.htm>

105 Chauncy St., 4th Fl, Boston, MA 02111 (617) 357-6000, ext. 251

Adolescent Health Council □ Executive Office of Health and Human Resources
1 Ashburton Place, 11th Fl, Boston, MA 02108

American Cancer Society; Alliance for Comprehensive School Health Education
30 Speen St., Framingham, MA 01701 (508) 270-4600

Coalition Organized for Health Education in Schools (COHES)
1672 Beacon St., Woburn, MA 02468 (617) 332-4629

Department of Environmental Protection—<http://www.magnet.state.ma.us/dep/recycle/files/reaps.htm>
1 Winter St., Boston, MA 02108 (617) 574-6865

Department of Fire Services—<http://www.magnet.state.ma.us/dfs/>
Public Education Unit, P.O. Box 1025, State Rd., Stow, MA 01775 (978) 567-3380

Department of Public Health, Injury Prevention & Control Unit—<http://www.magnet.state.ma.us/dph/dop.htm>
250 Washington St., Boston, MA 02108 (617) 624-5920

GLSEN Boston (Gay, Lesbian, Straight Education Network)—<http://www.glsenboston.org/>
29 Stanhope St., Boston, MA 02116 (617) 536-9669

Governor's Commission on Domestic Violence
One Ashburton Place, 21st Floor Boston, MA 02108

Governor's Commission on Gay and Lesbian Youth
State House, Room 111, Boston, MA 02133 (617) 727-3600 Ext. 312

Massachusetts Association for Health, Physical Education, Recreation and Dance (MAHPERD)
mahperd@erols.com—<http://www.mtpc.org/mahperd/index.htm>
81B Seaver Street, Wellesley, MA 02481 (781) 431-9599

Massachusetts Alliance for Young Families
105 Chauncy St., 8th Fl., Boston, MA 02111 (617) 482-9122

Massachusetts Association of Family and Consumer Sciences
3 Allison Drive, Westford, MA 01886 (978) 692-7143 OR
6 Frost Lane, Hadley, MA 01035 (413) 549-0091

Massachusetts Dietetic Association 6 Abbot Road, Wellesley Hills, MA 02181 (781) 431-6421

Massachusetts Governor's Advisory Commission on Responsible Fatherhood & Family Support
State House, Boston, MA 02133 (617) 727-3600

Massachusetts Interscholastic Athletic Association—<http://www.mec.edu/miaa/>
83 Cedar Street, Milford, MA 01757 (508) 478-5641

Massachusetts Medical Society—<http://www.massmed.org/>
4440 Main St., Waltham, MA 02154-1649 (617) 893-4610

Massachusetts Occupational Education Directors
Federal Programs, New Bedford Public Schools, 455 County, New Bedford, MA 02740 (508) 997-4511

Massachusetts School Counselors Association—www.schoolcounselor.org/statessca/masca
23 Cottate St., Natick, MA 01760 (508) 653-0953 mcash0953@aol.com

Massachusetts School Nurse Organization—soulavengr@earthlink.net
47 Davidson Road, Framingham, MA 01701 (508) 626-9197

Massachusetts Teachers Association—www.massteacher.org
20 Ashburton Place, Boston, MA 02108, (617) 742-7950 or (800) 392-6175

Massachusetts Department of Public Health—www.magnet.state.ma.us/dph
250 Washington Street, Boston, MA 02108, (617) 624-6000. School Health Unit (617) 624-5070

Massachusetts Department of Education Comprehensive Health Education Resource Centers—<http://www.andornot.com/mpc/>

Massachusetts Prevention Center #1, 110 Maple St., Suite 301, Springfield, MA 01105-1857, (413) 732-2009—

<http://home.javanet.com/~mapclpv/>

Massachusetts Prevention Center #2, 10 Main St., Florence, MA 01062, (413) 584-3800 ext. 128 or (800) 850-3880 —
<http://home.javanet.com/~gwmpc/>

Massachusetts Prevention Center #3, 158 Union Ave., Framingham, MA 01702, (508) 875-5419—
<http://www.magnet.state.ma.us/dph/mpc/mww.htm>

Massachusetts Prevention Center #4, 531 Main St., Worcester, MA 01608, (508) or (800) 752-8083 ext. 25—
<http://www.mpccentral.org/>

Massachusetts Prevention Center #5, Merrimack Valley Area Health Education Center, Mail—101 Amesbury St., Suite 405
Lawrence, MA 01840, (978) 688-2323, (800) 323-2224—<http://www.ultranet.com/~massprev/home>

Massachusetts Prevention Center #6, 111 Middleton Rd., Danvers, MA 01923 (978) 777-2121, (800) 323-2224—
<http://www.cabhrs.org/>

Massachusetts Prevention Center #7, 95 Berkeley St., Boston, MA 02116, (617) 423-4337—<http://www.ultranet.com/~tmf/>

Massachusetts Prevention Center #8, 522 Massachusetts Ave., Suite 203, Cambridge, MA 02138, (617) 441-0555—
<http://www.preventioncenter.org/>

Massachusetts Prevention Center #9, 942 West Chestnut St., Brockton, MA 02401, (508) 583-2350—
<http://www.magnet.state.ma.us/dph/mpc/seureg.htm>

Massachusetts Prevention Center Special Needs, Concord-Assabet Adolescent Services, 872 Westford Rd., Carlisle, MA 01741,
(978) 371-0059—<http://www.cafas.org/>

Northeastern University, Mentors in Violence Prevention Project—<http://www.sportinsociety.org/mvp.html>
360 Huntington Ave., Boston, MA 02115 (617) 373-4025

U.S. Consumer Product Safety Commission Regional Office—www.cpsc.gov
10 Causeway St., Room 224, Boston, MA 02222

Periodicals

Health Education and Behavior (formerly Journal of Health Education) www.sph.umich.edu/hbhe
Sage Publications, Inc., 2455 Teller Rd., Thousand Oaks, CA 91320 (805) 499-0721

Journal of School Health—www.ashaweb.org
American School Health Association, 7263 State Route 43, P.O.Box 708, Kent, OH 44240 (330) 678-1601

Tobacco Control Update—www.tobacco.neu.edu
Tobacco, Law & Policy Project. Northeastern University. 360 Huntington Ave. 117 Cushing Hall Boston, MA 02115
(617) 373-8494

Selected Health Related Websites

About Face (media messages) www.about-face.org

ACCESS ERIC (Education Resources Information Center) www.accesseric.org

Action on Smoking and Health www.ash.org

Adolescence Directory On-Line (ADOL) www.education.indiana.edu/cas/adol/adol.html

Adolescent Health Links www.ama-assn.org/adolhlth/gapslink/gapslnk2.htm - ADOL

Adolescent Health On-Line www.amaassn.org/adolhlth/adolhlth.htm

Alcohol and Drug Clearinghouse www.health.org

American Social Health Association www.ashastd.org

American Academy of Child & Adolescent Psychiatry www.aacap.org/web/aacap

American Medical Association www.ama-assn.org

American School Counselor Association www.schoolcounselor.org

American Heart Association www.americanheart.org

American Cancer Society www.cancer.org/frames.html

Americans for Non-Smokers Rights <http://www.no-smoke.org/>

Association for Supervision & Curriculum Development www.ascd.org

BADvertising (tobacco and children) www.badvertising.org

Bureau of Alcohol, Tobacco and Firearms www.atf.treas.gov

Campaign for Tobacco-Free Kids www.tobaccofreekids.org

CDC Prevention Guidelines Database <http://wonder.cdc.gov/wonder/prevguid/prevguid.htm>

Center for AIDS Prevention Studies www.caps.ucsf.edu/capsweb/index.html

Center for Young Women's Health at Children's Hospital of Boston www.youngwomenshealth.org

Centers for Disease Control www.cdc.gov/nccdphp/osh/statehi/statehi.htm

Centers for Disease Control National Prevention Information Network www.cdcnpin.org

Center for Research on Evaluation, Standards, and Student Testing-CREST www.ccsso.org

Consumer Health and Human Services www.healthfinder.gov

Corp. for National Services www.cns.gov

CourtTV Law Center-Library of Tobacco Cases www.courtTV.com/library/business/tobacco/oldindex.html

Creative Partnerships for Prevention www.CPPPrev.org

Department of Health & Human Svcs. Youth Pg. <http://www.hhs.gov/kids/>

Department of Health and Human Services www.os.dhhs.gov

Developing Educational Standards <http://putwest.boces.org/standards.html>

Education World - Subjects: Physical Education <http://db.education-world.com/>

FDA Report on Children and Tobacco <http://www.fda.gov/opacom/campaigns/tobacco.html>

Florida Kids Campaign Against Tobacco <http://team.state.fl.us/>

Foundation for a Smokefree America, www.tobaccofree.com

The Future of Children www.futureofchildren.org

Girls, Incorporated www.girlsinc.org

Health Standards (MCREL) www.mcrel.org/standards-benchmarks/standardslib/health.html

Healthy People 2000 <http://odphp.osophs.dhhs.gov/pubs/hp2000>

International Tobacco-Control Network, The www.globalink.org/globedemo

Joe Chemo page <http://www.socialpsychology.org/joechemo.htm>

Kathy Schrock's Guide for Educators www.capecod.net/Wixon/health/fitness.htm

Kickbutt.org <http://kickbutt.org/>

Life Education Network www.lec.org

Massachusetts Department of Public Health www.state.ma.us/dph

Massachusetts Department of Education www.doe.mass.edu

Massachusetts Dept. of Education Health Mentor Program

Massachusetts General Laws www.magnet.state.ma.us/legis

Massachusetts Governor's Highway Safety Bureau <http://www.magnet.state.ma.us/ghsb/>

Massachusetts Prevention Center Resource Library Central Catalog www.andornot.com/mpc

Morbidity and Mortality Weekly Report www.cdc.gov/epo/mmwr/mmwr.html

Monitoring the Future Report <http://www.isr.umich.edu/src/mtf/>

National Associations of School Psychologists www.naspsweb.org

National Cancer Institute <http://cancernet.nci.nih.gov/>

National Clearinghouse for Alcohol & Drug Information <http://www.health.org/>

National Institute on Drug Abuse <http://165.112.78.61/>

National Service Learning Clearinghouse www.nicsl.coled.umn.edu

National Center on Addiction & Substance Abuse at Columbia University www.casacolumbia.org

National Clearinghouse on Families and Youth www.acf.dhhs.gov/programs/fysb

National Clearinghouse on Child Abuse and Neglect Information www.calib.com/nccanch

National Child Care Information Center <http://ericps.crc.uiuc.edu/nccic/nccichome.html>

National Center for Injury Prevention and Control <http://www.cdc.gov/ncipc/ncipchm.htm>

National Center for Education in Maternal and Child Health www.ncemch.org

National Institutes of Health www.nih.gov

National Longitudinal Study of Adolescent Health www.cpc.unc.edu/projects/addhealth/design.html

National Parent Information Network <http://ericps.ed.uiuc.edu/npin/npinhome.html>

National Campaign to Prevent Teen Pregnancy www.teenpregnancy.org

Nicotine Anonymous www.nicotine-anonymous.org

No Smoke Café, The www.clever.net/chrisco/nosmoke/stop.html

Office of National Drug Control Policy www.whitehouse.gov/WH/EOP/ondcp/html/ondcp.html

Kentucky Department of Education www.kde.state.ky.us

Partnerships Against Violence Network www.pavnet.org

PE Central <http://pe.central.vt.edu/>

Physical Education Standards (MCREL) www.mcrel.org/standards-benchmarks/standardslib/phyed.html

Physical Activity and Health: A Report of the Surgeon General www.cdc.gov/nccdphp/fall96cd.pdf

Prevention Yellow Pages www.tyc.state.tx.us/prevention

Program Archive on Sexuality Health & Adolescence (PASHA) Catalog www.socio.com/pashacat.htm
Quit Smoking Company, The www.quitsmoking.com
Resources for School Health Educators www.indiana.edu/~aphs/hlthk-12.html
Rocky Mountain Center for Health Promotion and Education www.rmc.org
Safe and Drug Free Schools www.ed.gov/offices/OESE/SDFS
Sexuality Information and Education Council of the United States www.siecus.org
Smokeout www.smokeout.com
Smoker's Solution, The <http://member.aol.com/freshairii>
State Collaborative on Assessment and Student Standards www.rrresearch.com/hhelp/assm.htm
Substance Abuse & Mental Health Services Admin. www.samhsa.gov
Tobacco Control tc.bmjournals.com/
Tobacco BBS www.tobacco.org
Tobacco Control Resource Center www.tobacco.neu.edu
U.S. Department of Health and Human Services Health Statistics <http://www.cdc.gov/nchs/>
U.S. Department of Agriculture www.usda.gov
U.S. Department of Education Programs www.ed.gov/programs.html
UCLA School Mental Health Project <http://smhp.psych.ucla.edu/>
United States Dept of Health and Human Services www.dhhs.gov
United States Supreme Court Rulings www.uscplus.com

Massachusetts Department of Education

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David P. Driscoll, Commissioner of Education

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