THE MIDDLE YEARS DEVELOPMENT INSTRUMENT (MDI)

TECHNICAL GUIDE

Updated: April 2020
TABLE OF CONTENTS/ABOUT THE MDI TECHNICAL GUIDE

TABLE OF CONTENTS

About the MDI Technical Guide 2
Dimensions of the MDI 3
SOCIAL AND EMOTIONAL DEVELOPMENT 4
PHYSICAL HEALTH AND WELL-BEING 8
CONNECTEDNESS 11
USE OF AFTER-SCHOOL TIME 14
SCHOOL EXPERIENCES 18

The Well-being and Assets Indices 19
THE WELL-BEING INDEX 20
THE ASSETS INDEX 21
THE RELATIONSHIP BETWEEN ASSETS AND WELL-BEING 22

Appendix 24
BODY IMAGE/BODY WEIGHT 24

Related Research and References 25

ABOUT THE MDI TECHNICAL GUIDE
The Middle Years Development Instrument (MDI) Technical Guide is a companion guide to support interpretation of MDI reports. This guide offers a deep walkthrough of many of the measures on the MDI as well as the well-being and assets indices. Note that not every measure in the MDI reports is included in this guide. This guide provides:

- Scoring methodology for the measures, assets, and indices;
- A breakdown of the questions included in a measure when that measure is comprised of more than one question;
- Information on the importance of these measures for children’s healthy development during the middle years;

For more information on the sources of items and constructs as well as information on the validity and reliability of the MDI, please see “Development and validation of the Middle Years Development Instrument (MDI): Assessing children’s well-being and assets across multiple contexts” (Schonert-Reichl et al., 2012) available here: https://link.springer.com/article/10.1007/s11205-012-0149-y
DIMENSIONS OF THE MDI

The MDI uses a strengths-based approach to assess five areas of development that are strongly linked to children’s well-being, health and academic achievement. It focuses on highlighting the protective factors and assets that are known to support and optimize development in middle childhood. These areas are: Social and Emotional Development, Physical Health and Well-Being, Connectedness, Use of After-School Time and School Experiences. Each of these dimensions is made up of several measures and each measure is made up of one or more questions. The chart below illustrates the relationship between MDI dimensions and measures, and highlights which measures contribute to the Well-Being and Assets Indices.

5 DIMENSIONS OF THE MDI

SOCIAL & EMOTIONAL DEVELOPMENT

MEASURES
- Optimism
- Empathy
- Prosocial Behaviour
- Self-Esteem
- Happiness
- Absence of Sadness
- Absence of Worries
- Self-Regulation (Short- & Long-Term)
- Responsible Decision-Making
- Self-Awareness
- Perseverance
- Assertiveness
- Citizenship and Social Responsibility

PHYSICAL HEALTH & WELL-BEING

MEASURES
- General Health
- Eating Breakfast
- Meals with Adults in Your Family
- Junk food
- Frequency of Good Sleep
- Help-Seeking for Emotional Well-Being
- Transportation to and from School

CONNECTEDNESS

MEASURES
- Adults at School
- Adults in the Neighbourhood
- Adults at Home
- Peer Belonging
- Friendship Intimacy
- Important Adults

USE OF AFTER-SCHOOL TIME

MEASURES
- Organized Activities
  - Educational Lessons or Activities
  - Youth Organizations
  - Sports
  - Music or Arts
- How Children Spend Their Time
- After-School People and Places
- Children’s Wishes and Barriers

SCHOOL EXPERIENCES

MEASURES
- Academic Self-Concept
- School Climate
- School Belonging
- Motivation
- Future Goals
- Victimization and Bullying

WELL-BEING INDEX

- A measure in the Well-Being Index

ASSETS INDEX

- A measure in the Assets Index

* These questions are on the Grade 7 MDI only
Social and emotional development is critical for children’s successful development across the life span. When children are able to understand and manage their emotions they are better able to show empathy and maintain positive relationships. Social and emotional development is associated with greater motivation and success in school, as well as positive outcomes later in life: post-secondary education, employment, healthy lifestyles and psychological well-being.

The MDI asks children to respond to questions about their current social and emotional functioning in the following areas: optimism, empathy, prosocial behaviour, self-esteem, happiness, self-regulation and psychological well-being. In addition, the Grade 7 questionnaire asks about the following: responsible decision-making, self-awareness, perseverance and assertiveness.

**OPTIMISM.** Optimism refers to the mindset of having positive expectations for the future. Optimism predicts a range of long-term benefits including greater success in school and work, less likelihood of depression and anxiety, greater satisfaction in relationships, better physical health and longer life. It is also a strong predictor of resiliency for children facing adversity. Children are asked to rate the following statements:

- I have more good times than bad times.
- I believe more good things than bad things will happen to me.
- I start most days thinking I will have a good day.

**EMPATHY.** Empathy is the experience of feeling what another person feels. Research shows empathic children are better able to foresee the negative social consequences of their actions and are better able to problem-solve during challenging situations. Children are asked to rate the following statements:

- I am a person who cares about the feelings of others.
- I feel sorry for other kids who don’t have the things that I have.
- When I see someone being mean it bothers me.

**PROSOCIAL BEHAVIOUR.** Prosocial behaviour is behaving in socially appropriate and responsible ways. Not only are prosocial skills valued by teachers, they may also protect against bullying from peers. Prosocial children demonstrate greater empathic awareness than either bullies or children targeted by bullies. Children are asked to rate the following statements:

- I helped someone who was hurt.
- I helped someone who was being picked on.
- I cheered someone up who was feeling sad.
SELF-ESTEEM. Self-esteem refers to a person’s sense of self-worth. It is one of the most critical measures of middle childhood health and well-being. It is during the middle childhood years that children begin to form beliefs about themselves as either “competent” or “inferior” people. Children are asked to rate the following statements:

- A lot of things about me are good.
- In general, I like being the way I am.
- Overall, I have a lot to be proud of.

HAPPINESS. Happiness, or subjective well-being, refers to how content or satisfied children are with their lives. Happiness serves a greater advantage than just feeling good: children with a positive, friendly attitude are more likely to attract positive attention from peers and adults, thus broadening and strengthening their social resources. Experiencing happiness also strengthens children’s coping resources when negative experiences occur. Children are asked to rate the following statements:

- In most ways my life is close to the way I would want it to be.
- The things in my life are excellent.
- I am happy with my life.
- So far I have gotten the important things I want in life.
- If I could live my life over, I would have it the same way.

ABSENCE OF SADNESS. Depression is estimated to affect 1 in every 15 children in Canada. It has a later onset than anxiety, usually beginning around the time of puberty. Depression affects children’s ability to concentrate and also limits their ability to experience enjoyment or pleasure in things. Depressive symptoms during middle childhood may be able to predict later onset of depression. Children are asked to rate the following statements (because the MDI is a strengths-based tool, these questions are reverse scored):

- I feel unhappy a lot of the time.
- I feel upset about things.
- I feel that I do things wrong a lot.
ABSENCE OF WORRIES. Anxiety is the most prevalent mental health concern among both children and adults. It is estimated that anxiety affects 1 in every 8 children, with onset starting as early as 6 years old. Although it is one of the most prevalent mental health issues, studies have found that up to 80% of youths with anxiety do not use health services. Children are asked to rate the following statements (because the MDI is a strengths-based tool, these questions are reverse scored):

- I worry a lot that other people might not like me.
- I worry about what other kids might be saying about me.
- I worry about being teased.

SELF-REGULATION (SHORT-TERM). Self-regulation refers to a person's ability to adapt their behaviour, thoughts or emotions in the context of their environment to meet a particular goal. Short-term self-regulation specifically involves responding to situations “in the heat of the moment,” such as controlling an impulsive reaction, trying not to fidget in class, or focusing one's attention on an immediate project or activity. Children are asked to rate the following statements:

- When I am sad, I can usually start doing something that will make me feel better.
- After I’m interrupted or distracted, I can easily continue working where I left off.
- I can calm myself down when I’m excited or upset.

SELF-REGULATION (LONG-TERM). While short-term self-regulation is often reported in younger children, long-term self-regulation requires activation of the brain’s prefrontal cortex, which is still developing throughout adolescence. This type of self-regulation involves planning and adapting one’s behaviour in the present to achieve a goal several days, weeks or even months in the future. Examples include saving one’s allowance to buy a desired item, studying for a test, or adapting behaviour to maintain a positive friendship. Children are asked to rate the following statements:

- If something isn’t going according to my plans, I change my actions to try and reach my goal.
- When I have a serious disagreement with someone, I can talk calmly about it without losing control.
- I work carefully when I know something will be tricky.
The following questions are included only in the MDI Grade 7 questionnaire.

RESPONSIBLE DECISION-MAKING. Responsible decision-making involves the ability to make personal choices that benefit one’s own interests while also being respectful toward others. This includes being able make realistic appraisals about the consequences of one’s actions. Children are asked to rate the following statements:

- When I make a decision, I think about what might happen afterward.
- I take responsibility for my mistakes.
- I say “no” when someone wants me to do things that are wrong or dangerous.

SELF-AWARENESS. Self-awareness is the ability to accurately recognize the influence of personal emotions and thoughts on behaviour. It means being able to accurately assess one’s strengths and limitations, while possessing a well-grounded sense of confidence and optimism. Children are asked to rate the following statements:

- When I’m upset, I notice how I am feeling before I take action.
- I am aware of how my moods affect the way I treat other people.
- When difficult situations happen, I can pause without immediately acting.

PERSEVERANCE. Perseverance refers to the persistent effort to achieve one’s goals, even in the face of setbacks. For adolescents, it has been associated with higher motivation, particularly in the context of school achievement. Children are asked to rate the following statements:

- Once I make a plan to get something done, I stick to it.
- I keep at my schoolwork until I am done with it.
- I feel a sense of accomplishment from what I do.
- I am a hard worker.
- I finish whatever I begin.

ASSERTIVENESS. Assertiveness includes the ability or willingness to communicate one’s point of view; to stand up for oneself, while at the same time respecting the perspectives of others. During early adolescence, assertiveness has been found to be particularly important in the context of peer influence, such as in relation to risky behaviours or engaging in peer victimization. Children are asked to rate the following statements:

- If I have a reason, I will change my mind.
- If I disagree with a friend, I tell them.
- If I don’t understand something, I will ask for an explanation.
The MDI questionnaire asks children to evaluate their own physical well-being including their overall health (perceptions of their own health condition), nutrition and sleeping habits. Physical health outcomes are not uniquely controlled by genetics. They can be affected by different factors or determinants in one’s environment: family, relationships, lifestyle, economic and social conditions, as well as the neighbourhoods in which we live. Studies have shown that depression and anxiety also impact physical health and well-being. Attending to both physical and mental health is important for maintaining healthy outcomes across the life course.

**GENERAL HEALTH.** General health is described by The World Health Organization (WHO) as “not merely the absence of disease or infirmity.” It involves knowing and recognizing one’s own state of physical well-being. Children are asked the following question:

- In general, how would you describe your health?

**BODY IMAGE.** Removed in 2019/20. The MDI questionnaire from 2012/13 to 2018/19 asked children about body image. For information on these questions, including the reasons for removing them, response options and scoring, please see the Appendix on page 24.

**HELP-SEEKING FOR EMOTIONAL WELL-BEING.** Added to the MDI Questionnaire in 2019/20. Most mental health issues start in adolescence and early adulthood. In Canada, about 14% of children between the ages of 4 to 17 experience mental health disorders and about 70% of mood and anxiety disorders develop before the age of 15. These disorders can have a significant impact on children’s lives. Yet, only about 25% of children who need help will receive it. Understanding children’s help-seeking behaviours for emotional well-being can help schools and communities design interventions that create stronger networks of support for children and that build capacity in those people that children are turning to for help. Children are asked the following question:

**Who would you talk to if you were feeling sad, stressed or worried?** *(Children can select all of the options that apply)*

- An adult at school (for example, a teacher, school counselor, or another adult at school).
- A family member (for example, a parent, grandparent, aunt/uncle, older sibling or cousin, or another adult that lives with me).
- An adult in my community (for example, a coach, an elder, after-school program staff, or another adult in my community).
- A health professional (for example, a doctor, nurse, or a counselor).
- My friend(s).
- I would not know who to talk to.
- I would prefer to handle it on my own.
- I would talk to someone else (someone not on this list).
- **Who would you talk to?** *(Children can describe in their own words)*
BREATHFAST. Eating breakfast not only increases nutrient intake for building strong bodies, it also immediately improves cognitive, behavioural, and emotional functioning, including memory. Studies have found that skipping breakfast is more common among girls, children in lower socioeconomic families and among older children. Children are asked the following question:

- How often do you eat breakfast?

MEALS WITH ADULTS IN YOUR FAMILY. Children who frequently eat meals with family members are more likely to possess social resistance skills used to combat peer-pressure. These children are also more likely to have higher self-esteem, a sense of purpose and a positive view of the future. Eating meals together helps to build a sense of family connectedness that is known to support children's well-being during transitions, for example from childhood into early adolescence. Children are asked the following question:

- How often do your parents or adult family members eat meals with you?

JUNK FOOD. Children with increased intake of high fat, high sugar and processed foods are at risk for obesity, chronic illness, low self-esteem and depression. These children are also lacking the vitamins and nutrients their bodies need to perform in school and in extracurricular activities. Major benefits of healthy eating on the other hand, include improvements to cognitive and physical performance as well as psychological benefits. Children are asked the following question:

- How often do you eat food like pop, candy, potato chips or something else?

FREQUENCY OF GOOD SLEEP. School-age children need approximately ten hours of sleep a night. Proper sleep not only affects children's cognitive capacities, but also helps regulate mood. Children who are not getting enough sleep are at risk for developing behavioral problems that closely mimic symptoms associated with ADHD: hyperactivity, impulsivity and problems sitting still and/or paying attention. Short sleep duration is also associated with the development of obesity from childhood to adulthood. Children are asked the following questions:

- How often do you get a good night's sleep?
- What time do you usually go to bed during the weekdays?
TRANSPORTATION TO AND FROM SCHOOL. Added to the MDI Questionnaire in 2019/20. When children use active transportation methods (e.g., walking, cycling, skateboarding) to get to and from school, it can help promote increased physical activity and may result in improvements in physical health.

Children do not always have a choice about how they get to and from school; factors such as perceived safety, the built environment (e.g., sidewalks) and distance to school can affect whether children use active forms of transportation. Understanding the ways in which children get to and from school is important for identifying barriers and opportunities to increasing their active transport options. In addition to asking children how they get to and from school, the MDI questionnaire also asks children how they wish to get to and from school.

- How do you usually get TO school?
- How do you usually get home FROM school?
- If you could choose, how would you WISH to get TO and FROM school?

**Response Options**

- Car
- School Bus
- Public transportation (public bus, train or ferry)
- Walk
- Cycle, skateboard, scooter or rollerblade
- Something else (describe):________________
Belonging is a fundamental need for people of all ages. Feeling well-connected is one of the most important assets for a child’s well-being. Research shows that children who do not feel connected are more likely to drop out of school and to suffer from mental health problems. A single caring adult, be it a family member, a teacher in the school or a neighbour, can make a very powerful difference in a child’s life. Children who feel connected report greater empathy towards others, higher optimism, and higher self-esteem than children who feel less connected.

**ADULTS AT SCHOOL.** School adults, including teachers, principals and school staff, are in a unique position to form meaningful bonds with children. Research shows that the quality of relationships children have with the adults at their school predicts their levels of anxiety and conduct challenges. Children who perceive their teachers as caring report feeling more academically and prosocially motivated. Children are asked to rate the following statements:

*At my school there is an adult who:*

- really cares about me.
- believes I will be a success.
- listens to me when I have something to say.

**ADULTS IN THE NEIGHBOURHOOD/COMMUNITY.** Children who have an adult in their community to whom they look up to and spend time with report higher self-esteem and life satisfaction, feel more competent in school and are less likely to engage in risky behaviour. Supportive community adults can include coaches, religious leaders, friends’ parents and neighbours, as well as doctors or counsellors. Children are asked to rate the following statements:

*In my neighbourhood/community (not from your school or family), there is an adult who:*

- really cares about me.
- believes that I will be a success.
- listens to me when I have something to say.

**ADULTS AT HOME.** Attachment research suggests that the relationships children have with their primary caregiver(s) serve as a model for all future relationships. A healthy parent-child relationship enables children to form other healthy relationships that will serve them throughout their lives. Children are asked to rate the following statements:

*In my home there is a parent or another adult who:*

- believes I will be a success.
- listens to me when I have something to say.
- I can talk to about my problems.
NUMBER OF IMPORTANT ADULTS AT SCHOOL. Adults at school, including teachers, principals and school staff, are in a unique position to observe how children are doing day-to-day and to form meaningful bonds with them. Research shows that the quality of relationships children have with the adults at their school predicts their levels of anxiety and conduct challenges. Children who perceive their teachers as caring report feeling more academically and prosocially motivated. The MDI questionnaire asks children to list all of the adults from their school who are important to them. Children are asked the following question:

- Are there any adults who are IMPORTANT TO YOU at your school?

If the answer is ‘Yes’, the child is then asked to write the first or last initial of ALL of the adults who are important to them.

Why ask the question this way?

Past research has shown that when children are asked to identify the number of important adults in their lives, they tend to overestimate. Alternatively, when children are asked to identify each important individual by writing down their initials, they are more thoughtful and accurate in identifying the number of adults who are truly making an impact on their well-being.

The following question is included only in the MDI Grade 7 questionnaire.

What makes an adult important to you? (Children can select all of the options that apply)

- This person teaches me how to do things that I don’t know.
- I can share personal things and private feelings with this person.
- This person likes me the way I am.
- This person encourages me to pursue my goals and future plans.
- I get to do a lot of fun things with this person or because of this person.
- This person is like who I want to be when I am an adult.
- This person is always fair to me and others.
- This person stands up for me and others when we need it.
- This person lets me make decisions for myself.
Beginning in middle childhood, friendships and peer support begin to have a stronger influence on children’s school motivation, academic achievement and success. Children begin to place more importance on peer groups than on relationships to adults. During this phase of human development children need to feel they have friends they can count on.

**PEER BELONGING.** During the middle childhood years children begin to associate more with their peers. Children absorb information from peers about how to behave, who they are and where they fit. Feeling part of a group can boost self-esteem, confidence and personal well-being. Peer relationships provide opportunities for learning cooperation, gaining support, acquiring interpersonal skills and persisting through difficulties. Children are asked the following questions:

- **When I am with other kids my age, I feel I belong.**
- **I feel part of a group of friends that do things together.**
- **I feel that I usually fit in with other kids around me.**

**FRIENDSHIP INTIMACY.** During the middle years peer relationships grow in complexity. Children begin to seek friendships based on quality (having a friend who cares, talks to them and helps them with problems) rather than quantity. Close, mutual friendships provide validation for children’s developing sense of self and self-esteem. Same-age friends are also often in a better position than adults to empathize or provide comfort during stressful life events such as a transition to a new school, parent separation or difficulties with other peers. Children are asked the following questions:

- **I have a friend I can tell everything to.**
- **There is somebody my age who really understands me.**
- **I have a least one really good friend I can talk to when something is bothering me.**
We know that the environments in which children live and play are important, yet we know very little about how school-aged children actually spend their after-school hours. The data provided by the MDI attempts to fill gaps in the existing research on children’s participation in activities during after-school hours (from 3 pm to 6 pm). These are known as the “critical hours” because they are the hours in which children are most often left unsupervised.

Children’s involvement in activities outside of school hours exposes them to important social environments. After-school activities such as art and music classes, sports leagues, and community groups provide distinct and important experiences that help children to build relationship skills and gain competencies. Children who are more involved in extracurricular activities tend to experience better school success and are less likely to drop out.

**PARTICIPATION IN ORGANIZED AFTER-SCHOOL ACTIVITIES.** Participation in after-school activities has been shown to boost children’s competence, self-esteem, school engagement, personal satisfaction and academic achievement. After-school activities allow children to meet new friends, to strengthen existing friendships and to feel like they belong to a group of peers with shared interests. For some children, after-school programs can serve as an opportunity to bridge the gap between family and peers. The MDI questionnaire asks children how often they participate in organized activities (ones that are structured and supervised by a teacher, coach, instructor, volunteer or other adult). Children are asked the following questions:

**During the last week from after school to dinner time (about 3 pm to 6 pm) how many days did you participate in:**

- Educational lessons or activities (e.g. tutoring, math, language school).
- Music or art lessons (e.g. drawing, painting, playing a musical instrument).
- Youth organizations (e.g. Scouts, Girl Guides, Boys and Girls Clubs).
- Individual sports with a coach or instructor (e.g. swimming, dance, gymnastics, ice skating, tennis).
- Team sports with a coach or instructor (e.g. basketball, hockey, soccer, football).
DAILY TIME SPENT DOING UNSTRUCTURED ACTIVITIES. The MDI also explores children’s experiences in unstructured activities. Children are asked about the type of unstructured activities they are involved in and how often they are involved in these activities during after-school hours (3 pm to 6 pm). Completing homework assignments, watching television or videos (including Netflix and YouTube), and computer use are three unstructured activities that children report spending most of their time on during the after-school period. A balance of several activities both structured and unstructured, rather than spending a lot of time on any one particular interest or activity, is the most optimal for supporting children’s holistic development. Children are asked the following question:

During the last week from after school to dinner time (about 3 pm to 6 pm), how much time did you spend doing the following activities on a normal day?

- Video or Computer games (Play Station, XBox, Wii, On-line games).
- TV, Netflix, YouTube, streaming videos.
- Hang out with friends in person.
- Hang out with friends on the phone, tablet or computer.
- Homework.
- Read for fun.
- Do arts & crafts.
- Practice a musical instrument.
- Play sports and/or exercise for fun.
- Volunteer.
- Work at a job.

Options are included only in the Grade 7 questionnaire
WHAT CHILDREN WISH TO BE DOING AFTER SCHOOL. The MDI is the only population-level survey that asks children what they wish they could be doing. Children are given two choices to select from:

Think about what you want to do on school days from after school to dinner time (about 3 pm to 6 pm).

- I am already doing the activities I want to be doing.
- I wish I could do additional activities.

When a child selects both answers above a third answer is recorded: I am doing some of the activities I want, but I wish I could do more.

Those children who express that they wish they could be doing additional activities are asked to list one activity they wish they could do. Because of the open-ended (qualitative) style of this question, the responses are extremely varied and cannot be provided in detail within the MDI reports. Instead, responses are coded into the following categories:

- Physical and/or Outdoor Activities: Team sports, individual sports, being outside at a park or playground.
- Friends and Playing: Hanging out with friends, going to a friend’s house, having friends over, any activity specified with friends, games, talking with friends.
- Computer/Video Games/TV: Video games, Internet, social media, movies, TV, YouTube, coding, texting, tablets, cell phones.
- Time with Family/at Home: Being at home, spending time with parents, siblings, grandparents, activities with family members.
- Work Related Activities: Babysitting, working, paper route.
- Free Time/Relaxing: Time to myself, walk home alone, free time, sleeping, relaxing, reading.
- Other: Shopping, chores, travel, clubs. The “Other” category is also used for responses that are undecipherable, appear infrequently, or do not fit into a clear category.
PERCEIVED BARRIERS TO PARTICIPATING IN DESIRED ACTIVITIES. The MDI questionnaire asks children about the barriers that stop them from participating in after-school activities. Since the MDI measures children’s perceived barriers, the data from this question should not be considered a direct measure of the availability of, or access to, after-school programs or opportunities. Instead, the barriers that children are reporting should act as a starting point for discussions with parents, schools and community service providers.

Children are asked to select from the following list of barriers (Children can select all of the options that apply):

- I have no barriers.
- I have to go straight home after school.
- I am too busy.
- It costs too much.
- The schedule does not fit the times I can attend.
- My parents do not approve.
- I don’t know what’s available.
- I need to take care of siblings or do things at home.
- It is too difficult to get there.
- None of my friends are interested or want to go.
- The activity that I want is not offered.
- I have too much homework to do.
- I am afraid I will not be good enough in that activity.
- It is not safe for me to go.
- Other.
Children’s sense of safety and belonging at school has been shown to foster school success in many ways. When children’s needs in the school environment are met, they are more likely to feel attached to their school. In turn, children who feel more attached to their school have better attendance and higher academic performance. These children are also less likely to engage in high-risk behaviours.

The MDI questionnaire asks children about the following school experiences: academic self-concept, school climate, school belonging, and experiences with peer victimization. School success is optimized when children perceive that they are learning within a safe, caring and supportive environment.

### ACADEMIC SELF-CONCEPT

Academic self-concept refers to a child’s beliefs about their own academic ability, including their perceptions of themselves as students and how interested and confident they feel at school. Experiencing success and receiving consistent positive feedback from parents and teachers greatly influences how children view themselves as learners. Children are asked to rate the following statements:

- I am certain I can learn the skills taught in school this year.
- If I have enough time, I can do a good job on all my school work.
- Even if the work in school is hard, I can learn it.

### SCHOOL CLIMATE

School climate is the overall tone of the school environment, including the way teachers and students interact and how students treat each other. Children’s comfort in their learning environment affects their motivation, enjoyment of school, ability to pay attention in class and academic achievement. An optimal school environment is one that values student participation, provides time for self-reflection, encourages peer collaboration, and enables students to make decisions about classroom rules and activities. Children are asked to rate the following statements:

- Teachers and students treat each other with respect in this school.
- People care about each other in this school.
- Students in this school help each other, even if they are not friends.

### SCHOOL BELONGING

School belonging is the degree to which children feel connected and valued at their school. Children who feel a sense of belonging at school also report greater happiness and decreased anxiety. Children who experience belonging at school have been found to perceive others more favourably and consider the thoughts and feelings of others more often. Children are asked to rate the following statements:

- I feel like I belong in this school.
- I feel like I am important to this school.
VICTIMIZATION AND BULLYING AT SCHOOL. Bullying is a distinct form of aggressive behaviour in which one child or a group of children act intentionally and repeatedly to cause harm or embarrassment to another child or group of children who have less power. Being bullied has an enduring effect on a child’s self-esteem. Negative thoughts continue long after the bullying stops.

Despite recent media attention to the problem of cyber-bullying, it is particularly social bullying (manipulation, gossip and exclusion) that increases dramatically during the middle years. The MDI questionnaire asks children about four different types of bullying. Children are provided with definitions of each type. Children are asked the following question:

This school year, how often have you been bullied by other students in the following ways?

**Cyber:** For example, someone used the computer or text messages to exclude, threaten, embarrass you, or to hurt your feelings.

**Physical:** For example, someone hit, shoved, or kicked you, spat at you, beat you up, or damaged or took your things without permission.

**Social:** For example, someone left you out, excluded you, gossiped and spread rumours about you, or made you look foolish.

**Verbal:** For example, someone called you names, teased, embarrassed, threatened you, or made you do things you didn't want to do.
Combining select measures from the MDI helps us paint a fuller picture of children’s overall well-being and the assets that contribute to their healthy development. The results for key MDI measures are summarized into two indices:

- **The Well-Being Index** consists of measures relating to children’s physical health and social and emotional development that are of critical importance during the middle years: Optimism, Self-Esteem, Happiness, Absence of Sadness and General Health.

- **The Assets Index** consists of measures of key assets that help to promote children’s positive development and well-being. Assets are resources and influences present in children’s lives such as supportive relationships and enriching activities. The MDI measures five types of assets: Adult Relationships, Peer Relationships, Nutrition and Sleep, After-School Activities and School Experiences. The School Experiences asset is not reported as part of the Assets Index to prevent the ranking of individual schools or districts. Please refer to the ‘School Climate’ and ‘Bullying and Victimization’ measures for data related to this asset.

The chart below illustrates the relationship between MDI dimensions and measures, and highlights which measures contribute to the Well-Being and Assets Indices.
THE WELL-BEING AND ASSETS INDICES

THE WELL-BEING INDEX

The Well-Being Index combines MDI measures relating to children's physical health and social and emotional development that are of critical importance during the middle years. These are: Optimism, Happiness, Self-Esteem, Absence of Sadness and General Health.

Scores from these five measures are combined and reported by three categories of well-being, providing a holistic summary of children’s mental and physical health: ‘Thriving,’ ‘Medium to High’ well-being, or ‘Low’ well-being.

The Well-Being Index combines scores from the following 15 items:

**OPTIMISM**
- I have more good times than bad times.
- I believe more good things than bad things will happen to me.
- I start most days thinking I will have a good day.

**SELF-ESTEEM**
- In general, I like being the way I am.
- Overall, I have a lot to be proud of.
- A lot of things about me are good.

**HAPPINESS**
- In most ways my life is close to the way I would want it to be.
- The things in my life are excellent.
- I am happy with my life.
- So far I have gotten the important things I want in life.
- If I could live my life over, I would have it the same way.

**ABSENCE OF SADNESS** (reverse-scored)
- I feel unhappy a lot of the time.
- I feel upset about things.
- I feel that I do things wrong a lot.

**GENERAL HEALTH**
- In general, how would you describe your health?

Response Options
- Agree a lot
- Agree a little
- Don’t agree or disagree
- Disagree a little
- Disagree a lot

Scoring

High Well-Being (Thriving): Children who score in the high range on at least 4 of the 5 measures of well-being and have no low-range scores.

Medium Well-Being: Children who score in the high range on fewer than 4 of the 5 measures of well-being, and have no low-range scores.

Low Well-Being: Children who score in the low range on at least 1 of the 5 measures of well-being.
THE ASSETS INDEX

ADULT RELATIONSHIPS
(9 items; 3 measures)
Asset present = average response “a little true” or higher for each of the three measures of adult relationships (school, home and neighbourhood)

ADULTS AT SCHOOL
• At my school there is an adult who really cares about me.
• At my school there is an adult who believes I will be a success.
• At my school there is an adult who listens to me when I have something to say.

ADULTS AT HOME
• In my home there is a parent or another adult who believes I will be a success.
• In my home there is a parent or another adult who listens to me when I have something to say.
• In my home there is a parent or another adult who I can talk to about my problems.

ADULTS IN THE NEIGHBOURHOOD/COMMUNITY
• In my neighbourhood/community (not from your school or family), there is an adult who really cares about me.
• In my neighbourhood/community (not from your school or family), there is an adult who believes that I will be a success.
• In my neighbourhood/community (not from your school or family), there is an adult who listens to me when I have something to say.

PEER RELATIONSHIPS
(6 items; 2 measures)
Asset present = average response “don’t agree or disagree” or higher for each of the two measures of peer relationships (peer belonging and friendship intimacy)

PEER BELONGING
• When I am with other kids my age, I feel I belong.
• I feel part of a group of friends that do things together.
• I feel that I usually fit in with other kids around me.

FRIENDSHIP AND INTIMACY
• I have a friend I can tell everything to.
• There is somebody my age who really understands me.
• I have at least one really good friend I can talk to when something is bothering me.

PEER BELONGING
• How often do you eat breakfast?
• How often do you get a good night’s sleep?
• How often do your parents or other adult family members eat meals with you?

NUTRITION AND SLEEP
(3 items)
Asset present = 3 or more days per week

AFTER-SCHOOL ACTIVITIES
(5 items)
Asset present = Participates in at least one activity

Last week after school (3pm to 6pm), I participated in:
• Educational lessons or activities
• Art or music lessons
• Youth organizations
• Individual sports with an instructor
• Team sports with an instructor

THE WELL-BEING AND ASSETS INDICES

The Assets Index consists of measures of key developmental assets that help to promote children’s positive development and well-being. Assets are resources and influences present in children’s lives such as supportive relationships and enriching activities. The Assets Index combines scores from the following 23 items:
THE RELATIONSHIP BETWEEN ASSETS AND WELL-BEING

One of the key findings of the MDI, consistent across all participating school districts, is that children's self-reported well-being is related to the number of assets they perceive as being present in their lives. As the number of assets increase, children are more likely to report higher well-being, and each additional asset is associated with a further increase in well-being.

Number of Assets

<table>
<thead>
<tr>
<th>Number of Assets</th>
<th>Percent Experiencing Well-Being</th>
</tr>
</thead>
<tbody>
<tr>
<td>0-1</td>
<td>30%</td>
</tr>
<tr>
<td>2</td>
<td>46%</td>
</tr>
<tr>
<td>3</td>
<td>60%</td>
</tr>
<tr>
<td>4</td>
<td>75%</td>
</tr>
<tr>
<td>5</td>
<td>86%</td>
</tr>
</tbody>
</table>

Number of the following assets that children report having in their lives:
- Adult Relationships
- Peer Relationships
- After-School Activities
- Nutrition and Sleep
- Positive School Experiences

Percent Experiencing Well-Being

Children who have 'Medium to High Well-Being' or are 'Thriving' on the Well-Being Index
BODY IMAGE. In the 2018/19 school year, HELP received feedback from educators and parents regarding their concerns about the body image and weight questions on the MDI. More specifically, they noted that some of the questions that asked students to report on their body image and weight were outdated and did not accurately reflect recent science and practice with regards to assessments of body image and weight for children in the middle childhood years. They also noted that the questions could make students feel uncomfortable or self-conscious. Based on this feedback and after extensive consultation with parents and education and health experts, the questions from both the Grade 4 and Grade 7 MDI questionnaire that specifically asked students about body image and weight were removed in 2019/20. Questions asking children about their help-seeking behavior (see p. 8) and transportation (see p. 10) were then added to reflect important issues on child health and well-being.

In the MDI questionnaire (2018/19 and earlier) children are asked,

- **How often do you like the way you look?**

<table>
<thead>
<tr>
<th>Response Options</th>
</tr>
</thead>
<tbody>
<tr>
<td>Always</td>
</tr>
<tr>
<td>Often</td>
</tr>
<tr>
<td>Sometimes</td>
</tr>
<tr>
<td>Hardly ever</td>
</tr>
<tr>
<td>Never</td>
</tr>
</tbody>
</table>

- **How do you rate your body weight?**

<table>
<thead>
<tr>
<th>Response Options</th>
</tr>
</thead>
<tbody>
<tr>
<td>Very Underweight</td>
</tr>
<tr>
<td>Slightly Underweight</td>
</tr>
<tr>
<td>About the right weight</td>
</tr>
<tr>
<td>Slightly Overweight</td>
</tr>
<tr>
<td>Very Overweight</td>
</tr>
</tbody>
</table>
WHY THE MIDDLE YEARS MATTER


DEVELOPMENT AND VALIDITY OF THE MDI


CHILDREN’S VOICES


SOCIAL AND EMOTIONAL DEVELOPMENT


PHYSICAL HEALTH AND WELL-BEING

Nutrition and Family Meals


Sleep


Help-Seeking for Emotional Well-Being


Transportation To and From School


RELATED RESEARCH AND REFERENCES

CONNECTEDNESS


USE OF AFTER-SCHOOL TIME


SCHOOL EXPERIENCES


RELATED RESEARCH AND REFERENCES

BRITISH COLUMBIA
Personal and Social Responsibility Competency
https://curriculum.gov.bc.ca/competencies/personal-and-social
BC Mental Health Plan
https://www2.gov.bc.ca/gov/content/governments/about-the-bcgovernment/mental-health-and-addictions-strategy
ERASE Strategy
http://www.erasebullying.ca/
ACE BC
http://www.acebc.ca/
Safe, Caring and Orderly Schools
http://www.bced.gov.bc.ca/sco/resources.htm

CANADA
Social and Emotional Learning Resource Finder (UBC)
http://www.selresources.com/sel-resources/
Promoting Relationships and Eliminating Violence Network (PREVNet)
http://www.prevnet.ca
Dalai Lama Center – “Heart-Mind online”
http://www.heartmindonline.org/
Canadian Association for School Health
http://www.cash-aces.ca/

UNITED STATES
Collaborative for Academic, Social, and Emotional Learning (CASEL)
http://www.casel.org/
Edutopia (Lessons and videos on Social and Emotional Learning)
http://www.edutopia.org/
Greater Good Science Center
http://greatergood.berkeley.edu/
The Search Institute
http://www.search-institute.org/
SEL School (Great Teachers and Leaders)
http://www.gtlcenter.org/sel-school
Morningside Center for Teaching Social Responsibility,
http://www.morningsidecenter.org/

For research publications on the middle years including articles published using MDI data, please visit:
http://www.discovermdi.ca/mdi-references/