Pestalozzi

Training Resources

PESTALOZZI CORE KNOWLEDGE, SKILLS AND ATTITUDES FOR ALL TEACHERS (PCORE)

„The concept of multiple intelligences in learning“

by

Author: Tanja Sijakovic – Serbia
Editor: Rasa Askinyte-Degesiene

The Pestalozzi Programme
Council of Europe Training Programme for education professionals

PESTALOZZI CORE KNOWLEDGE, SKILLS AND ATTITUDES FOR ALL TEACHERS (PCORE)

„The concept of multiple intelligences in learning“

by

Author: Tanja Sijakovic – Serbia
Editor: Rasa Askinyte-Degesiene

Last edition: **December 2012**

The opinions expressed in this work are the responsibility of the authors and do not necessarily reflect the official policy of the Council of Europe.

Theme: Multiple intelligences aproach in learning

Expected outcome

- ➔ To introduce the participants with the concept of multiple intelligences and *multiperspectivity* in teaching.
- ➔ To introduce the participants with H. Gardner's 9 different intelligences.
- ➔ To understand the meaning of each specific intelligence.
- ➔ To understand what impact this theory may have on their teaching process.
- ➔ To understand the benefits of using the multiple intelligences approach.

Target group

Type of training	School level / age	Subject area
Initial and in-service training	Elementary and High schools	Teachers from different subject ereas

Brief description of the unit

The unit is divided into three activities. Each activity is lasting for 45 or 50 minutes.
The first activity deals with H. Gardner's theory of multiple intelligences. It provides information about 9 different intelligences, and tries to help participants to become aware of their own point of view on intelligence. The second and third activities are dedicated to understand the impact the MI approach could have on teaching processes.

Methods/techniques used

- ➢ Individual work
- ➢ Group work

- Plenary work
- Work in pairs
- Discussion
- Brainstorming

Time 3 hours

Preparatory reading	▶ 10 minutes
Activity 1	▶ 50 minutes
Activity 2	▶ 50 minutes
Activity 3	▶ 70 minutes

Resources

Hand-out: H.Gardner. Multiple intelligences (table)	Appendix 1
Hand-out: H.Gardner. Multiple intelligences (text)	Appendix 2
Hand-out: Benefits from MI	Appendix 3
Hand-out: Traditional and Multiple intelligences theory	Appendix 4

Preparatory reading

The H. Gardner's multiple intelligences are still *tabula rasa* for many teachers, and that issue has a large impact on how they teach, how they perceive pupils, what they think is their job in the classroom. Usually they look for the verbal/linguistic and logical/mathematical intelligence, and consequently they ignore all other aspects of intelligence, even though they are not aware of it.

According to H. Gardner, by inviting multiple intelligences into the classrooms, teachers honour the personal and cultural diversity that makes our society rich. In that case they acknowledge the many skills and achievements required to make the world going round. They create an environment in the classroom that brings curiosity alive.

Activity 1 Multiple Intelligences – Why do we need to know about it?

50 minutes

	Notes
▶ **General aim:** ➢ To introduce the participants with Gardner's theory of multiple intelligences (MI) and help them to understand it. ▶ **Specific aims:** ➢ To discover what participants already know and think about the intelligence phenomenon. ➢ To find out what are the first associations on the word intelligence. ➢ To help the participants to become aware of their own point of view on intelligence. ➢ To understand the meaning of each specific intelligence. ➢ To become aware of the differences among ourselves and among children.	
▶ **Methods /techniques used:** ➢ Brainstorming technique ➢ Individual work ➢ Work in small groups ➢ Group discussions	
▶ **Resources:** ➢ Flip chart, ➢ A4 white papers, ➢ Different coloured markers, ➢ Appendix 1: Hand-out: H. Gardner. Multiple intelligences (table) ➢ Appendix 2: Hand-out: H. Gardner. Multiple intelligences (text)	

▶ **Practical arrangements:** ➢ Prepare a few flipcharts, papers and markers.	
▶ **Instructions/procedure:** ➢ The participants are asked to make free associations on the term "Intelligences". The trainer writes down their answers onto the flip chart. ➢ The trainer may help the participants, asking questions - when you hear the word intelligence, what is the first word you are thinking of? What do you consider by intelligence? What is intelligence for you? ➢ Then the participants and trainer try to find common and different things that participants said about intelligence (10 min). ➢ The trainer makes a short input and say that there is no accepted definition of intelligence (different scientists offer different definitions), and will offer some of the ones which are most commonly used. (For example: Spearman's, Sternberg, and Gardner…) ➢ The trainer could ask the participants if, according to their opinion, intelligence is one certain ability, or if there are several different abilities? • For this part you should use Appendix 1. Cut the table into 27 separate pieces. Prepare as many sets of material, as the number of groups you plan to form. • Also prepare a full copy of Appendix 1 for each participant. ➢ The participants are asked if any of them have ever heard about H. Gardner and his theory on multiple intelligences. If any, ask him/her to share what he/she already knows about it. ➢ The participants are asked to form groups of 3-4 people. ➢ The trainer introduces the general idea of H. Gardner multiple intelligence theory. He explains that, according to H. Gardner, there are 9 multiple intelligences. ➢ He gives to each group a set of 27 pieces of material. The participants are asked to fill in the table with **three columns**: • 1. type of intelligence, • 2. short description of each intelligence, • 3. typical professions for those who have this type of intelligence) (20 min.).	

➢ After all of the groups make their own tables, the trainer gives a copy of Appendix 2. The participants are asked to work in the same groups and make sure they set the 27 pieces on all tables correctly (5 min).	

▶ **Debriefing/reflecting:** ➢ Do you think each of us have our own, specific set of intelligences? ➢ What kind of benefits we can have if we know what kind of intelligences we possess? ➢ How do you understand H. Gardner's idea "the point is not how many intelligences there are, but how we use this concept of human diversity for teaching and learning. Learning environments that only address a limited range of intelligences are "half-brained"" (2001, p. 2)? (15 min.)	

Activity 2 Multiple Intelligences in the classroom

50 minutes

	Notes
▶ **General aim:** ➢ To introduce the participants with the use of Gardner's theory of multiple intelligences in their own classroom. ▶ **Specific aims:** ➢ To make teachers aware of the differences among children. ➢ To discover the benefits of using the MI approach.	
▶ **Methods /techniques used:** ➢ Group discussions ➢ Individual work ➢ Work in small groups	
▶ **Resources:** ➢ Appendix 3: Hand-out. Benefits from MI.	
▶ **Instructions/procedure:** ➢ The trainer gives a short introduction: „One of the most remarkable features of the theory of multiple intelligences is how it provides nine different potential pathways of learning. If a teacher is having difficulty reaching a student in the more traditional linguistic or logical ways of instruction, the theory of multiple intelligences suggests several other ways in which the material might be presented to facilitate effective learning. Whether you are a kindergarten teacher, a graduate school instructor, or an adult learner seeking better ways of pursuing self-study on any subject of interest, the same basic guidelines apply. You don't have to teach or learn something in all nine ways, just see what the possibilities are, and then decide which	

particular pathways interest you the most, or seem to be the most effective teaching or learning tools. The theory of multiple intelligences is so intriguing because it expands our horizon of available teaching/learning tools beyond the conventional linguistic and logical methods used in most schools (e.g. lecture, textbooks, writing assignments, formulas, etc.)". ➢ The participants are asked to form 9 groups. ➢ Each group picks one intelligence. The task is to think about an educational activity (or a few activities) that support this way of thinking (that participants can use in their teaching practice) (10 min.). ➢ Each group shortly presents an activity and explains how this activity helps someone with a certain type of intelligence to learn (15 min). ➢ The participants are asked to work in groups. They are asked to read the text in Appendix 3, and to write 3 benefits students can get having the opportunity to learn according to their own intelligence. The participants may quote the text, or may write their own opinion (15 min).	

▶ Debriefing/reflecting: ➢ Ask the groups to shortly present their work done in step 3. Ask the participants not to repeat the same benefits which are already said in the other groups' presentations. ➢ For final debriefing, ask the participants, whether they agree with H. Gardner's idea, that „we succeed at learning complex ideas and processes only when we experience them through different intelligences"? Explain why or why not (15 min).	

Activity 3 MI and the traditional classroom approach

70 minutes

	Notes
▶ **General aim:** ➢ To increase the participants' knowledge about MI and its impact on a teaching process. ▶ **Specific aims:** ➢ To understand the differences between MI theory and traditional approach to intelligence. ➢ To understand what are the impacts of MI approach on the teaching process.	
▶ **Methods /techniques used:** ➢ Work in pair ➢ Working in small groups ➢ Group presentations	
▶ **Resources:** ➢ Flip chart papers, ➢ different colored markers, ➢ Appendix 4: Hand-out: "Traditional and Multiple intelligences theory"	
▶ **Instructions/procedure:** ➢ The trainer gives a short introduction: "Gardner's multiple intelligences theory challenged the traditional beliefs in the fields of education and cognitive science. According to a traditional definition, intelligence is a uniform of cognitive capacity people are born with. This capacity can be easily measured by short-answer tests. But, according to Howard Gardner, intelligence is: (trainer can write down this on a flip chart paper and put in at some place in the working room, so that everyone can see it during the rest of the time) • "The ability to create an effective product or offer a service that is valued in a culture; • A set of skills that make it possible for a person to solve problems in life;	

• The potential for finding or creating solutions for problems, which involves gathering new knowledge". ➢ The participants make comments, observations, or ask questions about what was said (10 min). ➢ Ask the participants to work in small groups. ➢ The trainer gives each participant a hand-out „Traditional view of Intelligence and Multiple Intelligences Theory" (Appendix 4). The participants are asked to read it carefully by themselves. After reading they are asked to work in groups and find an answer to the following questions (they have to find common solutions): • Do you agree with each statement on the table or not? • Why do you agree and why not with certain statement? • Which statements talk about traditional ways of learning, and which about learning, using multiple identities? Choose the most important statement for your group! ➢ Each group is asked to write (shortly, in 1-2 sentences) their answers on a flipchart, paste it on a wall, and make agreement, on who will present the group work (25 min). ➢ Ask the groups to split into two other groups. One part of each group will stay close to the poster, and will answer the questions that members from other groups will ask them. The other part will go to see what other groups have done and ask them questions. After finishing the first circle, group members change their positions, so that those who were standing and answering the questions will go to look at other's posters, and those who were walking around the posters will stand beside their own one, and answer the questions (25 min).	

▶ **Tips to trainers/anticipated difficulties:** ➢ It could happen that teachers ask why they have to choose between two different scientific opinions. If this happens, it is important to make time for discussion and to make it clear that what we do believe is at the same time what and how we will teach.	
▶ **Debriefing/reflecting:** ➢ Was it difficult to find common solutions in your own small groups? ➢ Are the posters that you have made, significantly different? ➢ What are the differences, and the similarities between the posters? How would you explain those? ➢ What do you think about this activity? Is it necessary for teachers to have an opinion on each educational issue? Why? (10 min)	

References

- Campbell L. How teachers interpret MI theory. Educational Leadership. 1997; 55(1):15-9.
- Lazear D. Multiple Intelligence Approaches to Assessment. Tucson: Zephyr Press; 1999.
- Gardner H, Hatch T. Multiple intelligences go to school: Educational implications of the theory of multiple intelligences. Educational Researcher. 1989; 18(8):4-9.
- Gardner H. Multiple Intelligences: The Theory in Practice. New York: Basic Books; 1993.
- Gardner H. Intelligence Reframed. Multiple Intelligences for the 21st Century. New York: Basic Books; 1999.
- Christison MA, Kennedy D. Multiple intelligences: theory and practice in Adult ESL. ERIC Digest. Retrieved Dec 20, 2009 from http://www.cal.org/caela/esl_resources/digests/MI.html.
- Kornhaber ML, Gardner H, Palmer JA, editors. Fifty Modern Thinkers on Education. From Piaget to the Present. London: Routledge; 2001.
- Christison MA. Teaching and learning language through multiple intelligences. TESOL Journal. 1996; 6(1):10-4.
- Lazear D. Eight Ways of Teaching: The Artistry of Eight Ways of Teaching with Multiple Intelligences. Manitoba: Skylight Training & Publishing Inc.; 1999.

Appendix 1: Hand-out: H.Gardner. Multiple intelligences

	Type of intelligence	Specific Skills	POSSIBLE CAREER INTEREST
Visual/Spatial Intelligence	*Ability to perceive the visual*. These learners tend to think in pictures and need to create vivid mental images to retain information. They enjoy looking at maps, charts, pictures, videos, and movies.	puzzle building reading, writing understanding charts and graphs good sense of direction, sketching painting, creating visual metaphors and analogies (perhaps through the visual arts) manipulating images constructing, fixing designing practical objects interpreting visual images	• navigators • sculptors • visual artists • inventors • architects • interior designers • mechanics • engineers
Verbal/Linguistic Intelligence	*Ability to use words and language.* These learners have highly developed auditory skills and are generally elegant speakers. They think in words rather than in pictures.	listening, speaking, writing storytelling, explaining teaching, using humor understanding the syntax and meaning of words remembering information convincing someone of their point of view analyzing language use	• Poet • Journalist • Writer • Teacher • Lawyer • Politician • Translator

Logical/Mathematical Intelligence	*Ability to use reason, logic and numbers.* These learners think conceptually in logical and numerical patterns making connections between pieces of information. Always curious about the world around them, these learners ask lots of questions and like to do experiments.	problem solving, classifying and categorizing information, working with abstract concepts to figure out the relationship of each to the other, handling long chains of reason to make local progressions, doing controlled experiments, questioning and wondering about natural events, performing complex mathematical calculations, working with geometric shapes	• Scientists, • engineers, • computer programmers, • researchers, • accountants, • mathematicians
Bodily/Kinesthetic Intelligence	*Ability to control body movements and handle objects skillfully.* These learners express themselves through movement. They have a good sense of balance and eye-hand co-ordination. (E.g. ball play, balancing beams). Through interacting with the space around them, they are able to remember and process information.	dancing, physical co-ordination, sports, hands on experimentation, using body language, crafts, acting, miming, using their hands to create or build, expressing emotions through the body	• athletes, • physical education teachers, • dancers, • actors, • firefighters, • artisans

Musical/Rhythmic Intelligence	*Ability to produce and appreciate music.* These musically inclined learners think in sounds, rhythms and patterns. They immediately respond to music either appreciating or criticizing what they hear. Many of these learners are extremely sensitive to environmental sounds (e.g. crickets, bells, dripping taps).	singing, whistling, playing musical instruments, recognizing tonal patterns, composing music, remembering melodies, understanding the structure and rhythm of music	• musician, • disc jockey, • singer, • composer
Interpersonal Intelligence	*Ability to relate and understand others*. These learners try to see things from other people's point of view in order to understand how they think and feel. They often have an uncanny ability to sense feelings, intentions and motivations. They are great organizers, although they sometimes resort to manipulation. Generally they try to maintain peace in group settings and encourage co-operation. They use both verbal (e.g. speaking) and non-verbal language (e.g. eye contact, body language) to open communication channels with others.	seeing things from other perspectives (dual-perspective), listening, using empathy, understanding other people's moods and feelings, counseling, co-operating with groups, noticing people's moods, motivations and intentions, communicating both verbally and non-verbally, building trust, peaceful conflict resolution, establishing positive relations with other people	• Counselor, • salesperson, • politician, • business person

Intrapersonal Intelligence	*Ability to self-reflect and be aware of one's inner state of being.* These learners try to understand their inner feelings, dreams, relationships with others, and strengths and weaknesses.	recognising their own strengths and weaknesses, reflecting and analyzing themselves, awareness of their inner feelings, desires and dreams, evaluating their thinking patterns, reasoning with themselves, understanding their role in relationship to others	• researchers, • theorists, • philosophers
Naturalistic Intelligence	Naturalist intelligence deals with sensing patterns in and making connections to elements in nature.	As children, these people often like to collect, classify, or read about things from nature - rocks, fossils, butterflies, feathers, shells, and the like. Children possessing this type of intelligence may have a strong affinity to the outside world or to animals, and this interest often begins at an early age. They may enjoy subjects, shows and stories that deal with animals or natural phenomena. Or they may show unusual interest in subjects like biology, zoology, botany, geology, meteorology, paleontology, or astronomy. People possessing nature smarts are keenly aware of their surroundings and changes in their environment, even if these changes are at minute or subtle levels...	• biologists, • veterinarians, • animal trainers, • botanists, • ecologists, • scientists

Appendix 2: Hand-out: H. Gardner. Multiple Intelligences

- **Visual/Spatial Intelligence**

Ability to perceive the visual. These learners tend to think in pictures and need to create vivid mental images to retain information. They enjoy looking at maps, charts, pictures, videos, and movies.
Their skills include:
puzzle building, reading, writing, understanding charts and graphs, a good sense of direction, sketching, painting, creating visual metaphors and analogies (perhaps through the visual arts), manipulating images, constructing, fixing, designing practical objects, interpreting visual images.
Possible career interests: navigators, sculptors, visual artists, inventors, architects, interior designers, mechanics, engineers

- **Verbal/Linguistic Intelligence**

Ability to use words and language. These learners have highly developed auditory skills and are generally elegant speakers. They think in words rather than pictures.
Their skills include:
listening, speaking, writing, storytelling, explaining, teaching, using humor, understanding the syntax and meaning of words, remembering information, convincing someone of their point of view, analyzing language usage.
Possible career interests: Poet, journalist, writer, teacher, lawyer, politician, translator

- **Logical/Mathematical Intelligence**

Ability to use reason, logic and numbers. These learners think conceptually in logical and numerical patterns making connections between pieces of information. Always curious about the world around them, these learners ask lots of questions and like to do experiments.
Their skills include:
problem solving, classifying and categorizing information, working with abstract concepts to figure out the relationship of each to the other, handling long chains of reason to make local progressions, doing controlled experiments, questioning and wondering about natural events, performing complex mathematical calculations, working with geometric shapes.
Possible career paths: Scientists, engineers, computer programmers, researchers, accountants, mathematicians

- **Bodily/Kinesthetic Intelligence**

Ability to control body movements and handle objects skillfully. These learners express themselves through movement. They have a good sense of balance and eye-hand co-ordination. (E.g. ball play, balancing beams). Through interacting with the space around them, they are able to remember and process information.
Their skills include: dancing, physical co-ordination, sports, hands on experimentation, using body language, crafts, acting, miming, using their hands to create or build, expressing emotions through the body.
Possible career paths: Athletes, physical education teachers, dancers, actors, firefighters, artisans

- **Musical/Rhythmic Intelligence**

Ability to produce and appreciate music. These musically inclined learners think in sounds, rhythms and patterns. They immediately respond to music either appreciating or criticizing what they hear. Many of these learners are extremely sensitive to environmental sounds (e.g. crickets, bells, dripping taps).
Their skills include: singing, whistling, playing musical instruments, recognizing tonal patterns, composing music, remembering melodies, understanding the structure and rhythm of music.
Possible career paths: musician, disc jockey, singer, composer

- **Interpersonal Intelligence**

Ability to relate and understand others. These learners try to see things from other people's point of view in order to understand how they think and feel. They often have an uncanny ability to sense feelings, intentions and motivations. They are great organizers, although they sometimes resort to manipulation. Generally they try to maintain peace in group settings and encourage co-operation. They use both verbal (e.g. speaking) and non-verbal language (e.g. eye contact, body language) to open communication channels with others.
Their skills include: seeing things from other perspectives (dual-perspective), listening, using empathy, understanding other people's moods and feelings, counseling, co-operating with groups, noticing people's moods, motivations and intentions, communicating both verbally and non-verbally, building trust, peaceful conflict resolution, establishing positive relations with other people.
Possible Career Paths: Counselor, salesperson, politician, business person

- **Intrapersonal Intelligence**

Ability to self-reflect and be aware of one's inner state of being. These learners try to understand their inner feelings, dreams, relationships with others, and strengths and weaknesses.
Their Skills include: Recognizing their own strengths and weaknesses, reflecting and analyzing themselves, awareness of their inner feelings, desires and dreams, evaluating their thinking patterns, reasoning with themselves, understanding their role in relationship to others.
Possible Career Paths: Researchers, theorists, philosophers

- **Naturalistic**

Naturalist intelligence deals with sensing patterns in and making connections to elements in nature.
As children these people often like to collect, classify, or read about things from nature -- rocks, fossils, butterflies, feathers, shells, and the like. Children possessing this type of intelligence may have a strong affinity to the outside world or to animals, and this interest often begins at an early age. They may enjoy subjects, shows and stories that deal with animals or natural phenomena. Or they may show unusual interest in subjects like biology, zoology, botany, geology, meteorology, paleontology, or astronomy.
People possessing nature smarts are keenly aware of their surroundings and changes in their environment, even if these changes are at minute or subtle levels...
Frequently, they may notice things others might not be aware of something.
Possible Career Paths: biologists, veterinarians, animal trainers, botanists, ecologists, scientists

- **Metaphysical or existential intelligence**

Gardner is considering a ninth intelligence - metaphysical or existential intelligence. The metaphysical intelligence is strong in shamans, philosophers, religious leaders, scientists, and 5-year-old children.
These are the people asking the big questions -who are we? Where do we come from? Where are we going?
Possible Career Paths: philosophers, religious leaders, scientists.

Appendix 3: Hand-out. Benefits from MI

What are the benefits of using the multiple intelligences approach in my school?

1Benefit

You may come to regard intellectual ability more broadly. Drawing a picture, composing, or listening to music, watching a performance -- these activities can be a vital door to learning -- as important as writing and mathematics. Studies show that many students who perform poorly on traditional tests are turned on to learning when classroom experiences incorporate artistic, athletic, and musical activities.

Take music, for example. As educator, David Thornburg of the Thornburg Institute notes:

"The mood of a piece of music might communicate, clearer than words, the feeling of an era being studied in history. The exploration of rhythm can help some students understand fractions. The exploration of the sounds of an organ can lead to an understanding of vibrational modes in physics. What caused the great scientist Kepler to think of the motions of planets in musical terms? Astronomy students could program a synthesizer to play Kepler's 'music of the spheres' and explore history, science, math and music all at once."

2Benefit

You will provide opportunities for authentic learning based on your students' needs, interests and talents. The multiple intelligence classroom acts like the "real" world: the author and the illustrator of a book are equally valuable creators. Students become more active, involved learners.

3Benefit

The parents and community involvement in your school may increase. This happens as students demonstrate work before panels and audiences. Activities involving apprenticeship learning bring members of the community into the learning process.

4Benefit

Students will be able to demonstrate and share their strengths. Building strengths gives a student the motivation to be a "specialist." This can in turn lead to increased self-esteem.

5Benefit

When you "teach for understanding," your students accumulate positive educational experiences and the capability for creating solutions to problems in life.

How can applying M.I. theory help students learn better?

Students begin to understand how they are intelligent. In Gardner's view, learning is both a social and psychological process. When students understand the balance of their own multiple intelligences they begin

- To manage their own learning
- To value their individual strengths.

Teachers understand how students are intelligent as well as how intelligent they are. Knowing which students have the potential for strong interpersonal intelligence, for example, will help you create opportunities where the strength can be fostered in others. However, multiple intelligence theory is not intended to provide teachers with new IQ-like labels for their students.

Students approach understanding from different angles. The problem, "What is sand?" has scientific, poetic, artistic, musical, and geographic points of entry.

Students that exhibit comprehension through rubrics, portfolios, or demonstrations come to have an authentic understanding of achievement. The accomplishment of the lawyer is in winning his/her case through research and persuasive argument, more than in having passed the bar exam.

Students become balanced individuals who can function as members of their culture. Classroom activities that teach to the intelligences foster deep understanding about the essential questions of life, such as: Where do we come from? What's the world made of? What have humans achieved? What can we achieve? How does one lead a good life?

Appendix 4: Hand-out: "Traditional and Multiple intelligences theory"

- Intelligence can be measured by short-answer tests:
  Stanford-Binet Intelligence Quotient
  Wechsler Intelligence Scale for Children (WISCIV)
  Woodcock Johnson test of Cognitive Ability
  Scholastic Aptitude Test
- Assessment of an individual's multiple intelligences can foster learning and problem-solving styles. Short answer tests are not used because they do not measure disciplinary mastery or deep understanding. They only measure rote memorization skills and one's ability to do well on short answer tests.
- People are born with a fixed amount of intelligence.
- Human beings have all of the intelligences, but each person has a unique combination, or profile.
- Intelligence level does not change over a lifetime.
- We can all improve each of the intelligences, though some people will improve more readily in one intelligence area than in others.
- Intelligence consists of ability in logic and language.
- There are many more types of intelligence which reflect different ways of interacting with the world
- In traditional practice, teachers teach the same material to everyone.
- M.I. pedagogy implies that teachers teach and assess differently based on individual intellectual strengths and weaknesses.
- Teachers teach a topic or "subject."
- Teachers structure learning activities around an issue or question and connect subjects. Teachers develop strategies that allow students to demonstrate multiple ways of understanding and value their uniqueness.