

Other animals, in a constant and mostly unmediated relation with their sensory surrounding, think with the whole of their bodies.

—David Abram



EMPOWERING EDUCATION

Mindfulness-Based Social & Emotional Learning

Mind and Matter: Body Map of Emotions

Level: Upper Elementary (3-5)

Timeframe: 20-30 minutes

Concepts:

- Coping Skills
- Emotional Literacy
- Mind-Body Connection



Big Ideas For This Lesson

We have all heard children describe their **emotions** in relation to a physical space in their body. When sad or lonely, a child might say, “My heart hurts;” when nervous or excited we often hear the phrase, “I have butterflies in my stomach;” or when overwhelmed with joy it may feel like, “My chest is exploding.” These **metaphors** have long existed in human language, but are there more to them than simple metaphors? Is it possible that there are universal, physical locations of emotions in the human body? A growing number of scientists seem to think so.

In a recent [Bodily Maps of Emotions](#)¹ study, over 700 participants were asked to paint where they felt certain emotions on a blank silhouette of a body. Researchers then compiled the results and found remarkable similarities in the location and expression of emotions in the human body. This, in combination with the increasingly large body of [Mind-Body Research](#)² gathered over the last decade, suggests that there is a distinct link between our mind and our body. Simply put - our thoughts and emotions have a clear physical effect on our body and our physical state has a clear effect on our emotions and thoughts.

So why is this important and how can you teach it to your students? Using mindfulness as a lens, we can help students to first recognize various **physical sensations** in their body and then to reflect on what particular emotion or event each physical sensation is related to. Awareness is the first step to change in any situation. If we want to help students regulate their emotions we must first help them be aware that they are having emotions. The human body happens to be a perfectly tuned early warning system to keep us in touch with our emotional state. Through increased awareness comes increased self-regulation. Helping young children through a difficult emotional experience starts by, “Where do you feel it in your body?”



Essential Vocabulary

Body Map
Body Scan
Emotions
Metaphor
Physical Sensations
Sticky Emotions

Materials

- Copies of [Body Maps](#) for every student.
- Crayons, colored pencils or markers.



Preparation

1. Draw a silhouette of a body on the board similar to the templates the students will be using.
2. Practice a [Body Scan](#) on your own.



Teaching Script

BUILDING BACKGROUND KNOWLEDGE & CONCEPT MODELING (I DO)

Teaching Note: This lesson is best taught through direct experience. While some introduction is necessary, try to limit explanation on the front end, allow plenty of time for practice and reflection, and then provide follow-up information after the lesson is complete.

Begin simply by asking students:

- a. *“Can we feel emotions in our body?”*
- b. *“What does it mean to feel emotions in your body?”*
- c. *“What is an example of feeling an emotion in your body?”*

Some students may need more coaching than others; though most students will eventually arrive at some of the metaphors like, *“butterflies in my tummy,”* or *“having a broken heart.”* Whatever answers students provide, encourage them to reflect on a particular experience of an emotion (e.g., joy, anger, fear, excitement, sadness). Then prompt them to remember where they felt it in their body.

You may need to coach students away from storytelling (e.g., *“One time I was mad at my brother...”*) with simple and direct questions like, *“What was the emotion you felt at that time?”* or *“Where in your body did you feel that emotion?”*

For students who are struggling to make the connection, provide them with cues such as, *“It sounds like you were angry. Where do you feel anger in your body? In your chest? In your hands? In your head?”*



GUIDED PRACTICE (WE DO)

Once the class has discussed a few concrete examples it is time to guide them through direct experience. This is the **Body Scan**. Have them find their mindful bodies and cue them through at least three mindful breaths.

Teaching Note: The script provided below is an abbreviated version of the body scan. The body scan is a highly effective method for increasing self-awareness and self-regulation. We encourage you to spend more time on this and even to incorporate it into your classroom routines. The basic premise of the body scan is to direct attention to different parts of the body in sequential order, typically beginning with the toes and moving to the head. There are many [scripts](#) and [audio guides](#) available online.

- a. *“Close your eyes and focus your attention on your breath. Clear your mind of all other thoughts. Allow your attention to wander throughout your body. Imagine that your brain is a super advanced scanner that can sense any tension or tightness inside your body. If you find any tight spots, release this tension with a deep breath.”*
- b. *“Now use your scanner to bring all of your attention to your toes and feet. Focus all of your attention on the sensations and feelings in your toes. Imagine that you can breath relaxation into your toes, then take a deep breath and allow your toes to relax.”*
- c. Repeat the script in part b. for various parts of the body, moving from toes to head. You can spend as much or as little time on this as needed by grouping the body into smaller or larger parts. A typical sequence might be: toes & feet → shins → thighs → hips → stomach/abdomen/lower back → Chest → arms & hands → shoulders & neck → face, jaw, & head.
- d. *“Now, remember a time this week when you felt a strong emotion. It might have been a happy emotion or it might have been a sad emotion. Remember what happened, but most importantly, remember **how it felt in your body**. Where did you feel it? Did anything feel tight or loose? Did it feel warm or cold? How was it different from how you normally feel?”*
- e. *“Once you remember where you felt the emotion in your body silently point to where you felt it.”*
- f. *“Wow! I see people felt emotions in lots of different places: some in their head, some in their chest, some in their belly. It looks like we feel emotions all over our body.”*
- g. *“Once you know where you felt your emotion, open your eyes and look at your Body Map. Try to imagine what that emotion felt like. Did it have a color? Did it have a shape? Was it big or small? Did it feel like something you have felt before?”*
- h. *“Now, we’re going to take some time to **draw our emotions on our Body Maps**.”*

Maybe you felt joy as a warm, red, fuzzy feeling in your belly.” Pause and draw this on the board on your Body Map.

Maybe you felt anger as a lightning bolt on your head.

Pause and draw this on the board on your Body Map.

Perhaps you experienced being nervous as a butterfly in your stomach.

Pause and draw this on the board on your Body Map.

i. *“Whatever you felt, try to draw it the best you can on your paper. I’m going to give you 10 minutes of silence to feel your emotions in your body, draw them, and name them on your paper. If you’re not sure what to draw, take time to close your eyes and practice feeling your emotions in your body again.*

Remember, this is just for you. No one else has to see this.

Allow at least 10 minutes of silent drawing and reflection. Remind students as needed to maintain silence out of respect for their peers.



REINFORCING LESSON CONCEPTS (YOU DO)

Teaching Note: Throughout the following discussion, incorporate some of these key points and tie them back to some key points from scientific research.

- Many scientists believe that our brain and our body are closely connected and that we actually feel certain emotions in specific places in our body.
- Scientists and psychologists have also noticed that when you take time to feel and name emotions in your body, it actually helps to release difficult, or “sticky,” emotions.

Facilitate a group discussion at the end of the guided practice. Questions for reflection could include:

- *What emotions did you notice?*
- *Where did you feel these in your body?*
- *What did they look like or feel like?*
- *Would anyone like to share what they drew?*
- *Did anyone have any really powerful emotions?*
- *Did anything change once you took time to notice where you felt your emotion in your body?*
- *How can you do this on your own? When would it be helpful?*

*Sometimes, you might feel like you have a really **sticky emotion** - an emotion that just won't go away. All you need to do to get **unstuck** is to simply **notice where this emotion is in your body**. That's it! If we take the time to notice our emotions they often take care of themselves.*

Once we start to notice where we feel certain emotions, we can recognize these signs early and calm ourselves down before having a tantrum or getting angry. For example, if I notice my fists clenching up, that can be my signal to take a break and cool down.

Keep your Body Map somewhere safe and check-in with yourself at least once a day. We will practice noticing our emotions as a class, but it helps to practice on your own too.

Remember that it is just as important to notice easy emotions (e.g., joy, excitement, or love) as it is to notice hard emotions (e.g., fear, anger, or sadness).



EVIDENCE OF CONCEPT ATTAINMENT

Reflect on it

- *What emotions did you notice?*
- *Where did you feel these in your body?*
- *What did they look like or feel like?*
- *Would anyone like to share what they drew?*
- *Did anyone have any really 'sticky' emotions? Were you able to get 'unstuck'?*
- *Did anything change once you took time to notice your emotion?*
- *How can you do this on your own?*
- *When would it be helpful?*

Journal it

- Practice a Body Scan every day this week with your students.
- After each session, prompt them to draw a new Body Map in their journal with the particular emotions they are feeling each day.
- At the end of the week, students will compare/contrast their daily maps and respond to the following prompts:
 - *"How did your emotions change, or stay the same, over the week?"*
 - *"How did noticing your emotions in your body affect how you feel?"*



EXTENSIONS

Classroom

- Keep copies of blank Body Maps in the cool down area for student use along with drawing materials and emotional vocabulary chart.
- Practice Body Scan and Body Maps daily this week and re-visit throughout the school year as needed.
- Promote empathy by encouraging students to share the pictures of their Body Maps.

School-wide

- Use questions, *"What emotion are you feeling?"* and *"Where do you feel that in your body?"* as de-escalation strategies.
- Link Body Maps to art projects, either in art class or homerooms.
- Combine this lesson with anatomy lessons where applicable.
- Link "feeling emotions in body" to Physical Education through noticing how different emotions and physical activities affect heart rate, pulse, etc.



REFERENCES

1. Nummenmaa, L., Glerean, E., & Hietanen, J. (2013, December 30). Bodily maps of emotions. Retrieved July 1, 2015, from <http://www.pnas.org/content/111/2/646.abstract>
2. Brewer, V. (2006). Mind-body research moves towards the mainstream. *EMBO Reports*, 7(4), 358–361. doi:10.1038/sj.embor.7400671

BODY MAPS OF EMOTIONS

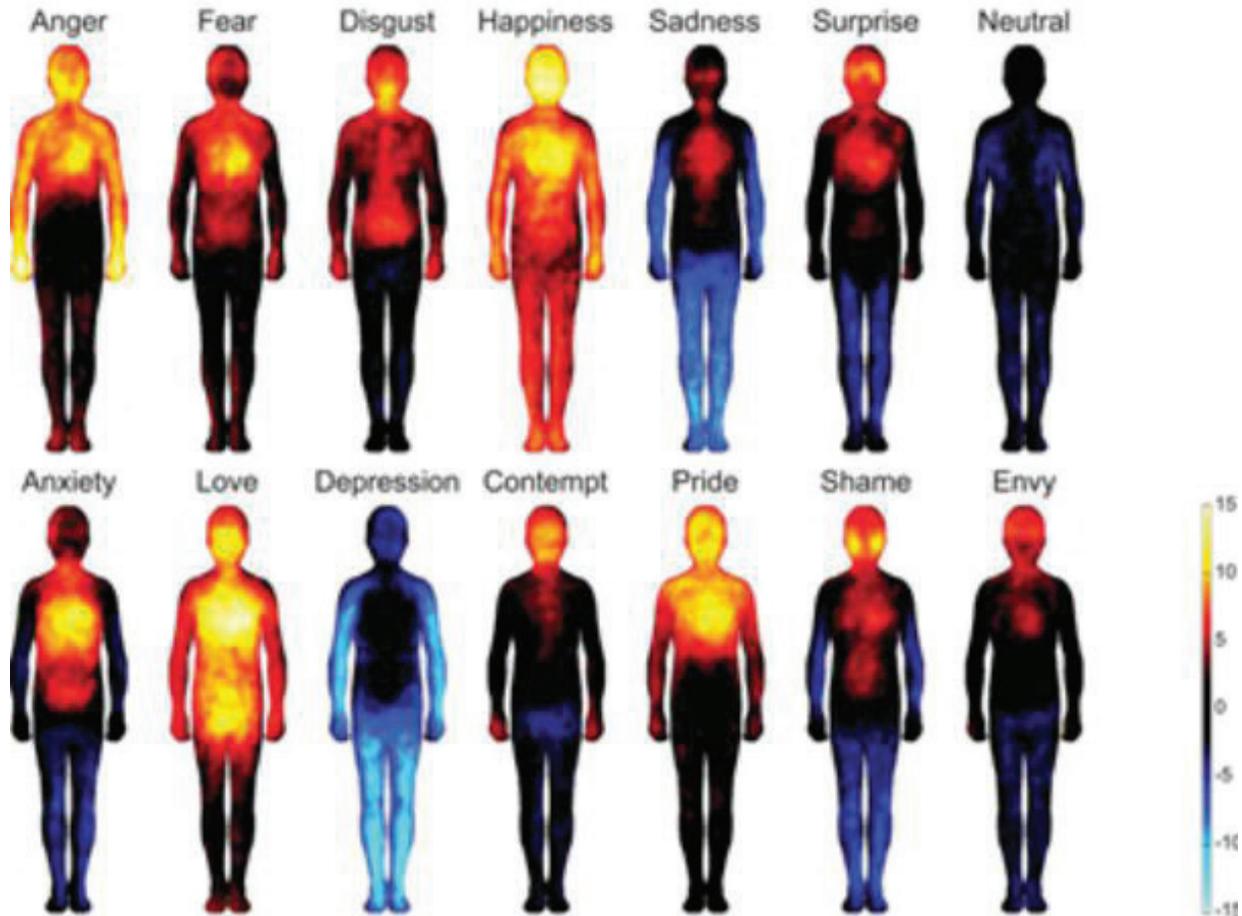
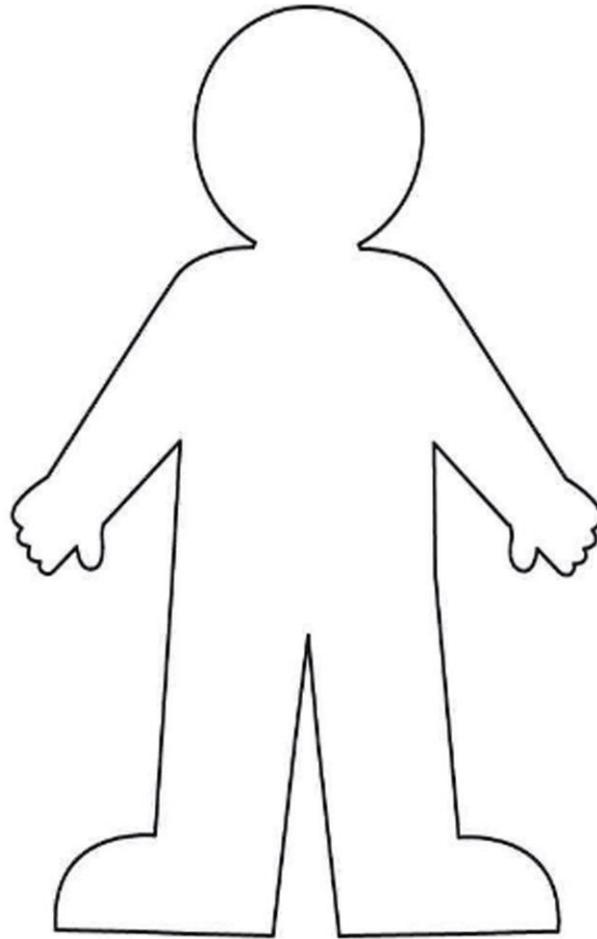


Figure 1:

“Bodily topography of basic (Upper) and nonbasic (lower) emotions associated with words. The Body Maps show regions whose activation increased (warm colors) or decreased (cool colors) when feeling each emotion. ($P < 0.05$ FDR corrected; $t > 1.94$). The color bar indicates the t-statistic range.”¹

Source: Nummenmaa, L., Glerean, E., & Hietanen, J.



1. Identify 3-5 different emotions you have had recently.
2. Close your eyes and use Body Scan to try to find the place in your body where you felt each emotion.
3. Using colors, symbols, or abstract art, draw where you felt each emotion on your Body Map.