"The UDL Guidelines provide a practical, scientifically based method that will improve your daily teaching and curriculum design. Keep them posted on your desk as a reminder of how you want to teach every day! If you want your students to become knowledgeable, goal-directed, motivated learners, plan your lessons using the Guidelines. In each lesson you design, use as many of the checkpoints as you can. The more checkpoints you use, the more likely you will be to influence student effort and students' opportunity to learn, which are two key ingredients in the learning mix." (Novak, 2016).

Below, outlines some barriers to consider for each of the three domains of Universal Design for Learning, as well as states the Guidelines. The right column translates the vocabulary used in the Guidelines into language that may be more accessible.

### **Barriers to Engagement**

#### **Affective Obstacles**

Students don't understand the purpose of the lesson.

Assignment is too easy or too difficult.

Assignment has no value in students' lives.

Student's lack of coping strategies or other self-regulation functions.

Subject matter is deemed boring or irrelevant.

Students are embarrassed.

## **Engagement Clarified**

The left column has the Guidelines as they are written. In the right column, vocabulary is clarified in language that may be more accessible.

Provide Multiple Means of Engagement	Translations
Provide options for self-regulation	Offer students tips on how to stay motivated and
Promote expectations and beliefs that optimize motivation	provide resources to prevent frustration; allow students to work in groups, use mentors or coaches, or just provide tips on how to persist and work with a text
<ul> <li>Facilitate personal coping skills and strategies</li> </ul>	
Develop self-assessment and reflection	<ul> <li>Prevent students from getting upset or quitting by giving them scaffolds, positive reinforcement, break time and so on</li> </ul>
	Encourage students to assess their own learning by using checklists and rubrics

# Provide options for sustaining effort and persistence

- Heighten salience of goals and objectives
- Vary demands and resources to optimize challenge
- Foster collaboration and communication
- Increase mastery-oriented feedback

- Ask students to restate a lesson's standard or objective and remind them of it often throughout the lesson
- Provide varying levels of challenge so students can pick assignments that are not boring or too difficult for them
- Allow students to work together
- Give feedback often throughout each lesson using various methods like self-regulation, peer review, and teacher feedback. Don't just give them feedback on final assessments.

#### **Provide options for recruiting interest**

- Optimize individual choice and autonomy
- Optimize relevance, value, and authenticity
- Minimize threats and distractions

- Allow students to make choices so they are more likely to be engaged in the curriculum
- Tell students at the beginning of a lesson why it will be relevant to them. Make the connections explicit
- Create a classroom environment where students feel safe and can express knowledge in ways that are best and most engaging to them

#### **Presentational Barriers**

Barriers in the Lecture Format	Barriers in Reading Text
Hearing impairment	Poor vision
Attention issues	Inability to decode text
Poor memory	Poor reading comprehension skills
Lack of background knowledge	They read slowly and they don't have enough time to get all the information
They don't understand the vocabulary or subject-matter jargon you use	They don't understand the vocabulary (either because it is too difficult or they do not know how to read)
Your language is not their first language	

## **Representation Clarified**

The left column has the Guidelines as they are written. In the right column, vocabulary is clarified in language that may be more accessible.

Provide Multiple Means of Penrocentation	Translations
Provide Multiple Means of Representation	าาสาเราสนิบกร
<ul> <li>Offer ways of customizing the display of information</li> <li>Offer alternatives for auditory information</li> <li>Offer alternatives for visual information</li> </ul>	<ul> <li>Provide digital copies of all class materials so students can access and personalize them</li> <li>Don't just lecture to students. Provide visuals and hard copies so all students can access at least one of the mediums</li> <li>Don't just have students read. Also provide audio, visuals, and things for them to manipulate if they choose</li> </ul>
Provide options for language, mathematical expressions, and symbols	Pre-teach vocabulary and math symbols in student- friendly language
<ul><li>Clarify vocabulary and symbols</li><li>Clarify syntax and structure</li></ul>	<ul> <li>Point out text structures (Like compare/contrast), sentence structure, or math formulas if they are important for learning</li> </ul>
Support decoding of text, mathematical notation, and symbols	If you provide reading, provide scaffolding to bring student attention to most important content
<ul><li>Promote understanding across languages</li><li>Illustrate through multiple media</li></ul>	<ul> <li>If English is a second language for students, offer instructions in their home language(s) or provide visuals to support comprehension</li> </ul>
	<ul> <li>Simplify complicated instructions to make student friendly and/or use visuals to increase understanding</li> </ul>
	<ul> <li>Always offer visuals like charts, pictures, movies, audio clips, and things for students to touch and manipulate</li> </ul>
Provide options for comprehension  • Activate or supply background knowledge	Remind students what they already know about the content. If nothing, teach the necessary information
<ul> <li>Highlight patterns, critical features, big ideas, and relationships</li> <li>Guide information processing, visualization, and</li> </ul>	<ul> <li>Make it clear what the most important information is by modeling comprehension strategies such as monitoring, highlighting, asking questions, and note-taking</li> </ul>
Maximize generalization and transfer	Provide exemplars, explicit directions, and scaffolds so students can persist through the lesson
	Help students see how they can use the new

# **Barriers to Action and Expression**

Barriers to Written Responses	Barriers to Objective Tests
Lack of a writing utensil or electronic device to keyboard response	Test anxiety
Poor handwriting or keyboarding skills	Lack of a writing utensil
Poor motor skills	Questions are skipped/answers are tracked incorrectly
They don't know proper format	Misunderstood or misread directions
Poor at spelling and/or grammar	Lack of strong test-taking techniques
Don't communicate well in writing	Poor recall/memory

# **Action and Expression Clarified**

The left column has the Guidelines as they are written. In the right column, vocabulary is clarified in language that may be more accessible.

Provide Multiple Means of Action and Expression	Translations
Vary the methods of response and navigation     Optimize access to tools and assistive technologies	<ul> <li>Give students the option of composing with different media (writing, typing, physically manipulating objects, and so on) when completing assignments</li> <li>Allow students to use technology to express knowledge like using speech recognition software, typing, and so on</li> </ul>
Provide options for expression and communication     Use multiple media for communication     Use multiple tools for construction and	Give students choices about how they will respond. Instead of just writing a response, they could perform a skit, make a poster, create a presentation, and so on
<ul><li>composition</li><li>Build fluencies with graduated levels of support</li></ul>	Allow students to complete assignments using different tools. Some students may complete assignments on paper, others may use a 1:1

for practice and performance	device, while others may record audio. Provide students with the multiple tools to complete assignments: dictionaries, IPads, voice recognition software, calculators, handouts with necessary formulas, and exemplars  • Build scaffolding into every assignment and
	provide feedback while students are working
Provide options for executive functions	Begin all assignments with an objective and rationale and provide work exemplars, scaffolds and checklists for every assignment
Guide appropriate goal-setting	
Support planning and strategic development	<ul> <li>At the beginning of each assignment, give student tips and checklists to help them work</li> </ul>
Facilitate managing information and resources	through the assignment or ask them to create their own strategy for completing the task
<ul> <li>Enhance capacity for monitoring progress</li> </ul>	
	<ul> <li>Give students a lot of tips on how to stay organized while they are completing each assignment and make necessary resources like highlighters, graphic organizers, and calculators accessible. Some students don't know how to organize things on their own</li> </ul>
	<ul> <li>Have students reflect on their learning by asking questions, and always provide many opportunities for students to get feedback before completing final drafts</li> </ul>

Katie Novak, 2016, UDL Now: A Teacher's Guide to Applying Universal Design for Learning in Today's Classrooms