EFFECTIVELY *Designed* INSTRUCTION
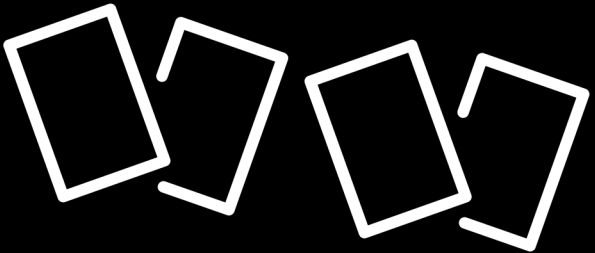
STRATEGY CARDS

About Edvative Learning

Edvative Learning is a dynamic non-profit organization with a mission to empower educators across the nation. As a 501(c)(3) organization, we are dedicated to enhancing the learning experience for students and providing cost-effective solutions for schools.

At the heart of our work is a commitment to help schools personalize education and make the best use of *intentional* instructional design and Open Educational Resources (OER).

We are proud to have formed partnerships with schools and educators across the United States, and are honored to count some of the nation's leading school districts among our partners. Join us in our mission to transform education and help prepare students for our rapidly changing world.

SCAN ME

STUDENT TO STUDENT FEEDBACK	TEACHER TO STUDENT FEEDBACK	STUDENT TO TEACHER FEEDBACK	ASYNCHRONOUS OPPORTUNITIES
SYNCHRONOUS OPPORTUNITIES	COLLABORATIVE LEARNING	CLASSROOM ENVIRONMENT	PERSONALIZED RESOURCES
AUTHENTIC LEARNING	PROJECT-BASED LEARNING	FORMATIVE ASSESSMENTS	SUMMATIVE ASSESSMENTS
DIGITAL PAGE LAYOUT	CURATING VS DUMPING	COURSE NAVIGATION	PARENT TOOLKIT
PHYSICAL ROOM LAYOUT	INSTRUCTIONAL VIDEOS	ACCESSIBLE MATERIALS	LEARNER VARIABILITY
MEANS OF ENGAGEMENT	MEANS OF ACTION & EXPRESSION	MEANS OF REPRESENTATION	ACCOMODATIONS & MODIFCATIONS

- **BUILDING INTERACTIONS**
- **PRESENTING CONTENT**
- **DESIGNING EXPERIENCES**
- **ACCESSIBILITY & INCLUSION**

About EDI

The EDI professional learning framework is not intended to be all-encompassing, and it is certainly not the panacea for all the complexities that go into educating students. This professional learning structure is designed to provide a strong foundation for what good teaching and *intentional* instructional design should look like in classrooms today.

The EDI cards were inspired by our work with Global Online Academy, who helped reinforce our belief that **Good Teaching is Good Teaching**, no matter the learning modality.

We use the EDI Cards to guide this work and help teachers reflect on their own practice. The expectation is not that you will use all of the cards every day, but rather that you can mix and match them, and fold them into your instruction to allow students different opportunities to interact inside and outside your classroom.

Building Interactions

STUDENT TO STUDENT FEEDBACK

TEACHER TO STUDENT FEEDBACK

STUDENT TO TEACHER FEEDBACK

ASYNCHRONOUS OPPORTUNITIES

SYNCHRONOUS OPPORTUNITIES

COLLABORATIVE LEARNING

About Building Interactions

Building Interactions is the first theme of EDI because we strongly believe that when students are interacting in class, opportunities are created to build relationships, increase engagement, and keep students active in the learning process.

Students learn and retain more when they are actively involved in the learning process. But getting (and keeping) students engaged for an entire unit, lesson, or activity can be problematic in today's classroom.

In this theme, you will have opportunities to learn more about how to effectively engage students through the use of feedback, by leveraging asynchronous and synchronous learning, and providing for collaborative learning experiences within your classroom.

Student to Student Feedback

WHY IT'S IMPORTANT

Providing students with clear directions and opportunities to deliver timely and meaningful feedback can create a culture where all members of the learning community feel valued.

When providing feedback, students are often able to share their thoughts in a more relatable way to their peers than teachers. These interactions build rapport and trust with one another and eliminates the idea that the teacher is the only expert in the room.

TRY

20 Minute Peer Feedback Activity

Students pair up and engage in a five-step process. Each step takes two minutes. After the process is completed for one student (10 mins), the students switch roles.

Elevator Pitch (2 mins)
Partner A explains the process, product or idea in two minutes. Partner B takes notes on what they are hearing.

Clarifying Questions (2 mins)
Partner B asks clarifying questions without giving any feedback.

Feedback (2 mins)
Partner B gives feedback to Partner A by offering feedback in the form of two things that worked well and one idea for an improvement.

Paraphrase (2 mins)
Partner A paraphrases what he or she has heard from Partner B. Partner B listens to see if the paraphrase is correct.

Next Steps (2 mins)
Partner A makes a list of future revisions for Partner B to check.

Student to Teacher Feedback

WHY IT'S IMPORTANT

The feedback students provide teachers on end-of-unit surveys or end-of-year/semester course evaluations can be valuable in helping teachers improve and refine their teaching.

Soliciting student feedback often has the additional benefit of allowing teachers to hear their students' concerns while there is still time to make appropriate changes and/or provide additional supports.

Having students provide feedback to their teacher also gives students a voice in their learning.

TRY

3, 2, 1 Exit Tickets

An exit ticket is a question or prompt that students respond to either on a piece of paper, a flashcard, or in a digital discussion forum (e.g., LMS discussion, social media post, or Google Form). There are many ways to create an exit ticket, one of the easiest to use with any grade level is the 3, 2, 1 Exit Ticket.

3 Things I like best about the unit, lesson, or project.

2 Things I found to be challenging.

1 Suggestion to make the unit better.

Teacher to Student Feedback

WHY IT'S IMPORTANT

Feedforward is the process of providing forward-oriented perspectives that students can use to build on or improve their learning.

Often feedback is summative and focuses on the past. In contrast, feedforward looks ahead and focuses on what can be done differently or better in the future.

It concentrates on developing skills, knowledge, and strategies that will positively impact performance going forward.

TRY

Feedback to Feed Forward

Encourage Self-Reflection
Prompt individuals to reflect on their own performance and identify areas for improvement.

Follow-up & Support
Offer ongoing support and follow-up after providing feedforward. Check in on progress, provide additional resources or guidance, and celebrate achievements and milestones along the way.

Supportive & Encouraging Tone
Feedforward should be delivered in a supportive and constructive manner, focusing on strengths and potential growth areas.

Focus on a Growth Mindset
Encourage students to embrace challenges, view mistakes as learning experiences, and persist in their efforts to improve.

Proactive Nature
Feedforward is given prior to the completion of a task or activity, allowing students to consider and integrate the suggestions or guidance into their performance.

Actionable & Specific Suggestions
Feedforward should be specific, clear, & related to the task or at hand, enabling students to understand what steps to take for enhanced performance.

Asynchronous Opportunities

WHY IT'S IMPORTANT

Access to technology expands the tools teachers can use to intentionally craft activities to meet students' needs.

Traditional classroom delivery can sometimes be challenging for some students and it is not necessarily the best setting for the exposition of rich or difficult material.

Providing asynchronous learning opportunities can ensure all student voices are heard and make student learning and thinking more visible.

TRY

Reflective Journals and Learning Logs

Reflective journals or learning logs can help boost students' critical thinking skills and encourage students to think about their own thinking.

Ideas for Creating Reflective Journals and Learning Logs

Reflect, think about
What are your reactions?
What are your feelings?
What you have learned?

Analyze, explain, gain insight
What was really going on?
What sense can you make of the situation?
Can you make a personal connection?

Conclusions
What can be concluded in a general and specific sense from this experience?

Personal action plan
What are you going to do differently in this type of situation next time?
What steps are you going to take on the basis of what you have learned?

Synchronous Opportunities

WHY IT'S IMPORTANT

Synchronous learning provides unparalleled opportunities to build classroom community and opens the door to powerful peer learning experiences.

When students engage with the learning material at the same time and in the same place (whether that place is a classroom or a Zoom room), organic conversations unfold in real time.

Students can also gain immediate feedback from instructors when meeting in real time and can ask teachers to elaborate or clarify in the moment.

TRY — Whole Group Discussions

1 Planning for Classroom Discussion

Goals & Expectations

Establish Guidelines

Discussion Questions

2 Engaging in Classroom Discussion

What is your role as the teacher? Make your role in the discussion explicit . How will you facilitate discussion? What will your presence be in the discussion spaces?

What is the role of the students? Discussion starter / original poster or student monitor. If students are expected to respond to their peer's questions, be sure to guide them how to do so.

3 Give Students Time to Think Before, During, & After the Discussion

4 Wrapping up Classroom Discussion

Give students an opportunity to reflect on and share what they have learned.

How will you know the discussion has met the learning objectives of the course or class session? How will you ensure students make connections between broader course concepts and the discussion?

Collaborative Learning

WHY IT'S IMPORTANT

Research shows that educational experiences that are active, social, contextual, engaging, and student-owned lead to deeper learning. The benefits of collaborative learning include:

- Development of higher-level thinking, oral communication, self-management, and leadership skills.

- Increase in student retention, self-esteem, and responsibility.

- Exposure to and an increase in understanding of diverse perspectives.

- Preparation for real life social and employment situations.

TRY

Student Escape Room

Setting up a classroom escape room is a great way to increase student engagement. They can be used to introduce a new topic or to review information students have already learned.

Choose your locks and boxes. Locks come in a variety of styles and unique options will make the experience more fun for students.

Set the purpose and create a story. What is it you want students to accomplish and learn?

Create puzzles and clues. Give students a passage for close reading with questions to answer. Highlighted letters from those answers could be the solution to the first clue. Try math problems for number combination locks, or have students solve a riddle or make an inference.

Organize, prepare, and rehearse. If possible, recruit fellow teachers or a group of friends to try out the escape room first.

Celebrate and reflect. Take time to reflect on the experience while it's fresh in everyone's minds. What was learned or reviewed? How did this experience enhance learning?

Review and Reflect

"We do not learn from experience... we learn from reflecting on experience." - John Dewey

Review and Reflection is a crucial step in professional learning, giving adult learners the time and space to deeply understand and consider new practices. Be sure to use the questions on the back on this card to reflect on your teaching practices.

 If you have partnered with an Edvative Learning Instructional Design Coach for this work, be sure to schedule a coaching session to add to your learning on Building Interactions.

After reviewing the resources in this theme, our hope is that you see the importance of creating interactions among your students and between your students and yourself. These interactions will cultivate a community of learners who will be more engaged and feel more comfortable throughout the learning process.

To help guide your thinking in this area, take a few moments to reflect on the questions below.

- What are possible student benefits from student to student feedback?

- How can you use feedback to be reflective in your practice?

- How can you design communications to deepen student thinking and act on their thoughts/opinions?

- How does collaboration empower your students in an online experience?

- How will synchronous discussions increase your students' learning?

- When would it benefit your students to use asynchronous discussions?

Designing Experiences

CLASSROOM ENVIRONMENT

PERSONALIZED RESOURCES

AUTHENTIC LEARNING

PROJECT-BASED LEARNING

FORMATIVE ASSESSMENTS

SUMMATIVE ASSESSMENTS

About Designing Experiences

We probably do not have to think too hard to remember the classrooms of our youth where we listened to lectures from bell-to-bell, completed endless worksheets, or repeatedly practiced letters or math facts. This approach to education does not offer today's students the agency and creativity that their future careers will require. Providing students with access to quality and varied activities provides them a rich learning experiences.

One way to accomplish this, as modeled in the companion EDI course, is the benefit of leveraging different forms of media. Using videos, online articles, interactive tools, reflection activities, and more, can offer students a variety of ways to enhance the learning experience. While subsequent themes will address important elements like accessibility and ease of course navigation, this theme really focuses on creating experiential learning opportunities.

Classroom Environment

WHY IT'S IMPORTANT

All learners must be able to communicate and collaborate effectively within the classroom. Options should be provided in how learners build and utilize these important skills.

- Create cooperative learning groups with clear goals, roles, and responsibilities.
- Provide prompts that guide learners in when and how to ask peers and/or teachers for help.
- Encourage and support opportunities for peer interactions and supports (e.g., peer-tutors and peer feedback).
- Create expectations for group work (e.g., rubrics, norms, etc.).

TRY

Tips For Building Student Collaboration

The ability to work in teams is one of the most important skills we can teach students. As such, the emphasis on collaborative learning has resurfaced as a critical component in our classrooms. Here are a few tips for creating collaborative learning groups in your classroom:

- ▶ **Deliberately select student groups**

- ▶ **Size the groups for maximum effectiveness**

- ▶ **Teach your students how to listen to one another**

- ▶ **Set the rules of language and collaboration**

- ▶ **Make goals and expectations clear**

- ▶ **Assign roles to the members of each group**

- ▶ **Play a game to get students warmed up**

- ▶ **Evaluate each group on its own merit**

Personalized Resources

WHY IT'S IMPORTANT

Leveraging Open Educational Resources (OER) gives teachers the ability to truly personalize the learning experience for students by providing resources that celebrate the histories, experiences, and everyday life of the students they serve.

The notion that classroom curriculum should serve as "windows, mirrors, and sliding glass doors" for students was first coined by educator Emily Styles in 1988.

Approaching OER through the lens of windows, mirrors, and sliding glass doors, prioritizes diversity, honors many cultures, and promotes empathy.

TRY

The 3 C's of the OER Process

The OER process can be done by individual teachers, but the power of OER comes when colleagues work together to complete the following phases of the OER process.

1 **COLLECT:** Gather the existing resources teachers currently use, determine their status related to appropriate use and content relevance. Complete an inventory.

2 **CURATE:** Find and vet resources that fit the learning objectives identified in the curriculum documents.

3 **CREATE:** Make new resources to fill gaps in the resource inventory.

FREE

Authentic Learning

WHY IT'S IMPORTANT

Authentic learning is an instructional approach that allows students to explore, discuss, and meaningfully construct concepts and relationships in contexts that involve real-world problems and projects that are relevant to the learner.

Students will become adults in a world more complex than our own and will have to solve real world problems creatively and collaboratively. Exposing students to authentic learning experiences at an early age will start them on a path for success.

United Nations Sustainable Goals Project

To launch an authentic learning experience, teachers can invite students to consider how a unit of study or text may relate to one of the seventeen UN Global Goals for Sustainable Development and then work toward change.

Make Content Connections

Students reflect on their content learning and make connections to the UN Goals for Sustainable Development.

Design a Vision Board

Students identify their *values* (what they care about) and consider their *vision* (the world they want to live in).

Take Action

Students outline steps that they can take toward actionable change. Ideas can include spreading a message with infographics or artwork, fundraising for a cause, or organizing a group service project.

Impact Showcase

Students share their work with peers, families, or community members to celebrate both their individual and collective impact.

Project-Based Learning

WHY IT'S IMPORTANT

The differences between Project-Based Learning (PBL) and traditional projects lie in the process of implementation and the application of standards. A PBL Unit gives students a clear "why" from the start, whereas traditional units give their "why" at the end with a culminating assignment.

In PBL, an authentic purpose drives student learning. Students then apply their learning throughout the PBL Unit. In a traditional teaching unit, learning takes place but application is not determined until the end.

TRY

Mystery Skype

Mystery Skype is an educational game, invented by teachers, played by two classrooms on Skype. The aim of the game is to build cultural awareness, critical thinking skills, and geography skills by guessing the location of the other classroom through a series of yes/no questions.

Teachers can add Mystery Skype to any PBL project that includes the topic of geography, culture, interconnectedness, or current events.

However, Mystery Skype can also be folded into PBL projects to reinforce critical thinking, collaboration, and/or deductive reasoning.

Variations on Mystery Skype
As well as guessing each other's locations, other popular examples include::
- Mystery number
- Mystery animal
- Mystery biome
- Mystery food

Formative Assessments

WHY IT'S IMPORTANT

Formative assessments help teachers understand where their students are in their learning. By providing regular feedback on students' progress, teachers can identify gaps in their knowledge and adjust their instruction accordingly. This can help ensure that all students are on track to master the material, and prevent students from falling behind.

Formative assessments also provide students with immediate feedback on their performance. This can be a powerful motivator for students, as it allows them to see how well they are doing which can lead to better academic performance.

Formative Assessment Strategies

1 Think-Pair-Share

- Ask a question to your class
- Have each student write down or think of their answer
- Ask students to partner up with a classmate and discuss their thinking
- After pairs have discussed together, have them share with a larger group or the entire class

2 The Exit Ticket

- Pose a question to all students prior to class ending
- Students write their answer on a card, sticky note, Padlet, Jamboard, Google Form, etc. and hand it in or post it somewhere in the room as they exit

3 Fist to Five

Students signal their level of understanding using their fingers and fist. For example:

- fist = I don't understand at all.
- 1 = I need help.
- 2 = I could use more practice.
- 3 = I understand pretty well.
- 4 = I completely understand.
- 5 = I can help someone else.

Summative Assessments

WHY IT'S IMPORTANT

Summative assessments provide a snapshot of students' knowledge and skills at a specific point in time. This can be useful for teachers, as it allows them to measure how well their students have mastered the material and identify any areas where students may need additional support. This information can be used to inform future instruction and help ensure that all students are on track to succeed.

They can also give students a sense of accomplishment as they can see the progress they have made over the course of a unit or semester.

TRY Summative Assessment Strategies

Summative assessments take place at the end of a unit or course of study. They assess students' level of knowledge, skill acquisition, and/or content understanding.

The best practices for writing effective summative assessments include five important elements:

➤ **Authenticity**: The assessment reflects a range of real-world skills that are authentic outside of a classroom context.

➤ **Reliability**: The assessment provides similar results across classroom settings, groups of students, and daily conditions.

➤ **Volume**: Assessment has not been too regular in the past. Students who have test fatigue will not provide accurate results on any assessment.

➤ **Validity**: The assessment accurately reflects what students have been taught in the instruction period.

➤ **Variety:** The assessment prompts students to exhibit skills and demonstrate knowledge in more than one way.

Review and Reflect

"I never instruct my students; I only strive to create an environment where they can thrive and learn. Reflection guides me on that journey." - Albert Einstein

Review and Reflection is a crucial step in professional learning, giving adult learners the time and space to deeply understand and consider new practices. Be sure to use the questions on the back on this card to reflect on your teaching practices.

If you have partnered with an Edvative Learning Instructional Design Coach for this work, be sure to schedule a coaching session to add to your learning on Designing Experiences.

After reviewing the resources in this theme, the hope is that you have a better understanding that lesson planning is more than just delivering content to the students. Teachers should aim to create balanced lessons with a level of creativity that will interest and excite their students. Teachers should also incorporate opportunities for reflection and checks for understanding so students (and the teacher) can ensure growth and learning.

To help guide your thinking in this area, take a few moments to reflect on the questions below.

- How will your created content connect with your students?

- What are the most important materials students will need to understand this content?

- How might you foster a welcoming environment through goal sharing?

- How might you include student agency in your assessments?

- How could varying experiences diversify a student's perspective?

Presenting Content

DIGITAL PAGE LAYOUT

CURATING VS. DUMPING

COURSE NAVIGATION

PARENT/CAREGIVER TOOLKIT

PHYSICAL ROOM DESIGN

INSTRUCTIONAL VIDEOS

About Presenting Content

In this theme you will learn more about the importance of course navigation, the benefits of providing clear instructions, and the critical nature of how you design and layout your class in your school's learning management system (LMS).

In this theme, we will also ask you to think about how you present content in your LMS by taking into account the student perspective. Because as you learned in a previous theme, everyone is an asynchronous teacher today, not just those assigned to teach online. So as a result, we must spend the same amount of time setting up classes in our LMS as we would our physical classrooms.

By viewing your LMS course through the eyes of your students, it will force you to clarify your objectives, make better, more concise instructional videos, and perhaps, think about visual imagery a bit differently than you have in the past.

Digital Page Layout

WHY IT'S IMPORTANT

Digital page design is a critical component to learning today. It enables students (and parents) to quickly find and access content, and aids teachers in preparing, managing, and tracking assignments.

Consider the frustration experienced as a result of inferior digital design. Furthermore, the digital page (i.e., LMS) is usually the user's first impression of the class and can show how organized and creative the teacher is.

Teachers can enhance their digital page layouts by including welcome screens, menus, icons, and many other elements. But teachers should be aware that too many elements on one page can be confusing for students.

TRY: Digital Page Design Tips

Subsequent cards will focus on course navigation and accessibility but we start this theme with Page Design because it focuses on user experience.

Simplicity

Unnecessary elements will only make it more difficult for students to find and access materials.

Color can boost students' engagement. Stick with just two or three colors. Never sacrifice legibility for aesthetic design. Be aware that different cultures affix different meanings to colors.

Fonts Size should be legible and consistent. Be sure to use predefined header structures when available.

**Graphics** should only be used to help convey a message or to help students complete a task.

Consistency

The overall look and feel of pages (backgrounds, colors, fonts, etc) should be consistent throughout the LMS.

Conventionality

Students have grown accustom to certain digital conventions such as navigation at the top or on the left side, having links or buttons of different colors, and embedding vs. linking when possible.

Curating vs. Dumping
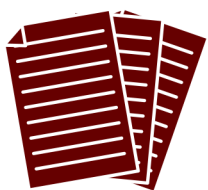
WHY IT'S IMPORTANT

Teachers have always been curators by bringing together the most worthwhile materials to help their students learn.

However, curating resources is becoming more complex as the volume of information online continues to increase.

Today's teachers are tasked with finding, verifying, organizing, annotating, remixing, creating, collating, and sharing resources that will excite their students, pique their imagination, fuel their student's creativity, and drive their student's passion for learning.

TRY

Tips to Become a Better Curator

Jennifer Gonzalez speaks to becoming a better curator of content in her podcast **Are You a Curator or a Dumper**? A summary of the key information contained in Jennifer's post is below.

1 Keep the Best, Lose the Rest
Less is almost always more, so once you get to the point where you're sharing multiple resources on the same topic, keep only the very best.

2 Chunk It
Give each section a title to help users find what they are interested in more quickly.

3 Add Your Own Introductions
Give your audience some context to help them know what the resource is and what they will learn from it.

4 Use Images as Anchors
Adding an image before each item, like we've done on each EDI card can help readers visually distinguish one item from another.

5 Polish your Hyperlinks
When sharing links, provide the link within the text. Giving the raw "http" link will work, but the links will look cluttered and complicated. A more appealing way to provide links is to include it within the text you are describing the link.

Course Navigation

WHY IT'S IMPORTANT

Posting learning materials in an LMS has become a vital part of school today. Consequently, how teachers organize resources in their school's LMS impacts students' overall satisfaction and achievement.

Well organized course structures make it easier for students (and parents) to find and access course materials.

We encourage teachers to be intentional and consistent in how they structure their course pages and use consistent naming conventions across courses.

TRY

Considerations for LMS Set Up & Navigation

The following are examples of items that teachers should consider when setting up their LMS.

Course Structure & Communication

➤ Course policies (netiquette, communication practices, expectations, email response time, late assignments, proper writing techniques, self-introduction, etc.) are clearly defined and outlined.

➤ Course grading policies are clearly stated. Example: teachers should provide clear instructions to students on how to submit work online, provide rubrics on how they will be graded.

Engagement & Learning Objectives

➤ Course provides activities and assignments that foster student interaction. Course offers students some control over time, place, path, and/or pace.

Accessibility & Usability

➤ Course provides guides, prompts, checklists, and templates as needed.

➤ Course demonstrates sensitivity to readability issues.

➤ Course uses clear and consistent nomenclature and folder structure.

Parent/Caregiver Toolkit

WHY IT'S IMPORTANT

When parents know what their child(ren) are learning in school, they are more likely to offer support.

Research shows students are more likely to have higher grades and test scores, attend school regularly, have better social skills, show improved behavior, and adapt well to school.

We also know that returning from the pandemic, parents/caregivers want to play a bigger role in their child's learning but do not always have the background knowledge or training on how to do that effectively.

LMS Parent Empathy Map

TRY

As the expectations for using an LMS have increased for students, so too have they for parents. Consequently, we must understand AND proactively address the challenges some parents may face when accessing information in the LMS.

The LMS Empathy Map will help you think about how you communicate, create, and organize student and parent resources in your LMS.

Tasks
What are the top 2-3 things parents are trying to access when logging into the LMS?

Pain Points
What pain points might parents experience when trying to log into the LMS?

Communication
What types of communications can we have with parents regarding parent access, use, and LMS parent expectations?

Bonus Points
What are some other items that we can add to our LMS that will make the parent experience a better one?

Physical Room Design

WHY IT'S IMPORTANT

The way that a classroom is arranged can have a significant impact on students' ability to learn and succeed. When classrooms are organized and uncluttered, students are better able to focus on their work and engage with the material.

A well-designed classroom can foster a sense of community and collaboration among students. When the classroom is arranged in a way that encourages interaction and communication, students are more likely to work together and support each other in their learning.

TRY
Tips for Classroom Setup

Seating Arrangements

Teachers should structure the class for independent work, pairs, groups and whole class in a thoughtful and deliberate way.
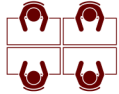
Anchor Charts and Materials

It's important in any classroom design that there is easy access of physical materials for students to use. In addition to physical materials, visual supports such as co-created anchor charts or reference posters displayed in spaces where all students can see keeps learning accessible to students when working independently.

Spaces for Collaboration

As 21st century educators, we know how important it is for students to communicate well and work together to solve problems. Our classrooms need to reflect that by creating more collaborative spaces like desk clusters, large carpet areas, tables and clearing off counters or bookshelves.

Vertical Non-Permanent Surfaces (VNPs)

One specific space for creation and collaboration can be VNPs or "writable spaces" around the classroom. Free-standing dry-erase boards, whiteboard tables or blank chart paper are materials that can present tasks in new ways and promote deeper student thinking.

Instructional Videos

WHY IT'S IMPORTANT

Including video in classroom instruction offers numerous benefits for both educators and students. These include time saved introducing new concepts as well as the ability for teachers to build authentic relationships with students and parents.

Video is also proving to have solid results when it comes to learning outcomes—from higher test scores to increased engagement with learning materials to increased comprehension. Adding video is one the best ways to get and keep students' engagement.

Tips for Creating Instructional Videos

Create a Script

Scripts are your best friend when it comes to recording videos of any length. With a script, you'll know exactly what to say and when to say it. You won't have to worry about forgetting important points, rambling, or keeping pace with your video.

Find a quiet place to record

Pick a room where you can be alone, without any pets or people disturbing you. Carpeted rooms are best for reducing echoes.

Get the best audio possible

Invest in a good microphone so your voice is clear in your videos.

Find a tool you like

There are many free and paid tools teachers can use to create their videos. Some enable you to add scripts, images, shapes, music, school branding, and much more.

Keep them short

Ultimately, the ideal length of a given video is determined by the content and the target audience, however, you should try to keep all videos under 3 minutes in length, if possible.

Review and Reflect

"The mind is not a vessel to be filled, but a fire to be kindled." - Margaret Fuller

Review and Reflection is a crucial step in professional learning, giving adult learners the time and space to deeply understand and consider new practices. Be sure to use the questions on the back on this card to reflect on your teaching practices.

If you have partnered with an Edvative Learning Instructional Design Coach for this work, be sure to schedule a coaching session to add to your learning on Presenting Content.

After reviewing the resources in this theme, the hope is that you see that well-designed lessons will unfortunately fall flat if directions are not clear and materials are not accessible. The resources included in this theme provided tips for organizing lessons and content-related media in a way that is convenient and logical to students, colleagues, and parents.

To help guide your thinking in this area, take a few moments to reflect on the questions below.

- How might you use course navigation to personalize student learning?

- Are the expectations clear based on the instructions given?

- How does your page layout support the success of your students?

- When designing pages, consider the questions, "Is it easy to read and to follow?"

Accessibility & Inclusion

- ACCESSIBLE MATERIALS

- LEARNER VARIABILITY

- MEANS OF REPRESENTATION

- MEANS OF ENGAGEMENT

- MEANS OF ACTION & EXPRESSION

- ACCOMODATION & MODIFICATION

About Accessibility & Inclusion

Accessibility is a simple concept in theory, but it can be complicated in practice. What is accessible to someone with a visual disability is not necessarily accessible to someone with a learning disability.

The National Center on Accessible Educational Materials (AEM) takes the approach of asking some additional questions beyond, "Is it accessible?"

- To whom is it accessible?
- Under what conditions?
- For which tasks?

This recognizes that accessibility is shaped by what we need to do, our interactions with the environment, and our personal preferences.

But accessibility isn't just about special education students. For what is needed for some to be successful in school is generally good for all students. Being mindful of accessibility while designing learning materials for students will benefit all students, not just those with an IEP or 504.

Accessible Materials

WHY IT'S IMPORTANT

The POUR principles are a great place to start to ensure the materials you create are accessible to all your learners.

Perceivable content will make it possible for all your learners to see and hear the information.

Operable content will help all your learners navigate the information independently using their preferred tools.

Understandable content will support your learners' understanding through a consistent and predictable design.

Robust content will work for your learners on a range of current and future technologies, including assistive technologies.

TRY

POUR Principles

Ensure the materials you create are accessible to ALL your students by making them:

Perceivable
To make your content perceivable:
-- Add text descriptions to your images.
-- Include closed captions and transcripts.
-- Provide sufficient color contrast.
-- Do not use color alone.
-- Make your text readable and legible.

Operable
To make your content operable:
Provide a clear structure with headings --
Create descriptive links --
Check for keyboard accessibility --
Provide sufficient time --
Avoid content that flashes --

Understandable
To make your content understandable:
-- Provide clear directions.
-- Aim for consistency.
-- Use plain language.
-- Identify the language.

Robust
To make your content robust:
Provide descriptive metadata --
Perform an accessibility check --
Test for accessibility with people --

Learner Variability

WHY IT'S IMPORTANT

Learner Variability is the recognition that all students enter our classrooms with unique abilities, experiences, and skill sets. It is also recognizes that these characteristics can and do change among subjects and situations.

We must, then, anticipate learner variability and proactively design our instruction to personalize the learning experience for every student.

TRY

Proactive Design Tips

1 Start with a clear goal

Ensure the goals are crafted using language that is easy for students to understand. Each student should know exactly what they are working to achieve — whether it is independent, remote, or collaborative team work.

2 Encourage flexible means to achieve the goal

Provide choice so there are different ways learners can perform tasks, engage with the material, make meaning of it, and show what they know.

3 Ensure all learners can access the materials and learning environment

Being intentional in design choices and anticipating possible barriers to access ensures that all students can fully participate and benefit from the learning experience.

4 Make learning personally relevant

When goals are relevant and matter to students, they are more likely to engage in the task and put forth maximum effort — even when it learning gets challenging.

5 Promote expert learning

Effective teachers ensure every student feels empowered to reach their full learning potential. Empowered students are strategic and goal-directed. They know how to set their own learning goals and use resources to make progress.

Means of Representation

WHY IT'S IMPORTANT

The research behind Universal Design for Learning (UDL) shows students differ in the ways that they perceive and comprehend information that is presented to them.

Others may simply grasp information quicker or more efficiently through visual or auditory means rather than printed text. Also, learning and transfer of learning occurs when multiple representations are used, because they allow students to make connections within, as well as between, concepts.

In short, there is not one means of representation that will be optimal for all learners; providing options for representation is essential.

TRY

Multiple Means of Perception

Learning is impossible if information is imperceptible to the learner, and difficult when information is presented in formats that require extraordinary effort or assistance. To reduce barriers to learning, it is important to ensure that key information is equally perceptible to all learners by:

- Providing the same information through different modalities (e.g., through vision, hearing, or touch).

- Providing descriptions (text or spoken) for all images, graphics, video, or animations.

- Providing written transcripts for videos or auditory clips

- Providing access to text-to-speech software

- Providing information in a format that will allow for adjustability by the user (e.g., text that can be enlarged, sounds that can be amplified).

Such multiple representations not only ensure that information is accessible to learners with particular sensory and perceptual disabilities, but also easier to access and comprehend for many others.

Means of Engagement

WHY IT'S IMPORTANT

The research behind Universal Design for Learning (UDL) shows students differ in the ways in which they can be engaged or are motivated to learn.

Some learners are highly engaged by spontaneity and novelty while others are disengaged, even frightened, by those aspects, preferring strict routine. Some learners might like to work alone, while others prefer to work with their peers.

In reality, there is not one means of engagement that will be optimal for all learners in all contexts; providing multiple options for engagement is essential.

TRY

Multiple Means of Engagement

Being clear about learning goals helps to recruit interest and helps students sustain effort and persistence when things get challenging.

Provide Options for Recruiting Interest

➤ Optimize individual choice and autonomy
➤ Optimize relevance, value, and authenticity
➤ Create an accepting and supportive classroom climate

Provide Options Sustaining Effort & Persistence

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

Provide Options Self Regulation

➤ Promote expectations and beliefs that optimize motivation
➤ Facilitate personal coping skills and strategies
➤ Develop self-assessment and reflection

Means of Action & Expression

WHY IT'S IMPORTANT

The research behind Universal Design for Learning (UDL) shows students differ in the ways that they can navigate a learning environment and express what they know.

Some may be able to express themselves well in written text but not speech, and vice versa. It should also be recognized that action and expression require a great deal of strategy, practice, and organization, and this is another area in which learners can differ.

 In reality, there is not one means of action and expression that will be optimal for all learners; providing options for action and expression is essential.

TRY

Multiple Means of Expression

Multiple means of action or expression refers to offering students diverse ways of expressing what they have learned.

Teachers can provide more than one way to assess students' learning by offering choice in summative assessments (e.g., assignment formats, due dates, and/or topics).

Some assignment options can include:
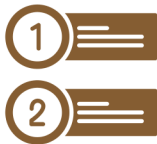
Podcast   *Research Paper*   *Website*

Video   *Presentation*   *Infographic*

Accommodation & Modification

WHY IT'S IMPORTANT

Adaptations, accommodations, and modifications need to be individualized for students, based upon their needs and their personal learning styles and interests.

However, it is not always obvious what adaptations, accommodations, or modifications would be beneficial for a particular student, or how changes to the curriculum, its presentation, the classroom setting, or student evaluation might be made. Sometimes a student may need to have changes made in class work or routines because of his or her disability.

TRY

Accommodations and Modifications

There are many different ways students can be supported with specific accommodations based on their unique needs. Below are some examples that may benefit students.

Testing Accommodations

- Extended Time
- Use of Technology
- Clarified Directions
- Separate Space
- Alternate Version
- Use of Text-to-Speech
- Use of Speech-to-Text
- Test Question Reader
- Use of a Scribe
- Braille or Large Print
- Oral Response

Classroom Accommodations

- Copies of Presentation
- Note-Taker
- Enlarged Print
- Recording of Lectures
- Flexible Seating
- Smart Devices
- Captioning
- Preview Vocabulary
- Graphic Organizers
- Graph Paper
- Manipulatives

Modifications

- Complete different homework problems
- Answer different test questions
- Create alternate projects or assignments
- Learn different material
- Get graded using different standards
- Be excused from particular projects

Review and Reflect

"Educating the mind without educating the heart is no education at all." - Maria Montessori, Italian educator and physician

Review and Reflection is a crucial step in professional learning, giving adult learners the time and space to deeply understand and consider new practices. Be sure to use the questions on the back on this card to reflect on your teaching practices.

If you have partnered with an Edvative Learning Instructional Design Coach for this work, be sure to schedule a coaching session to add to your learning on Accessibility & Inclusion.

After reviewing the resources in this theme, the hope is that you see that as teachers plan learning experiences for their students, they must ensure the content and the activities meet students at the level appropriate to their learning needs. Teachers must strike a balance between providing rigor but avoiding hurdles like frustration.

To help guide your thinking in this area, take a few moments to reflect on the questions below.

- How are you designing experiences that allow students with a disability opportunities to learn in any format?

- How can you offer ways of customizing the display of information?

- How can you construct meaning from words, symbols, and numbers using different representations?

- How might you build connections to prior understandings and experiences?

- How might you provide prompts and scaffolds to estimate effort, resources, and difficulty?

Teacher Toolkit

Ideas for Building Student Agency

WHY IT'S IMPORTANT

"Although many teachers recognize the importance of making students active agents in the classroom, it is easy to overlook student agency when we plan our lessons. However, the ability to make key decisions about their learning is a powerful motivator for students. If they are invited to tailor the learning to their interests, decide how to approach a problem, or determine what they will create, it makes them feel valued as individual learners. It also has the advantage of getting more students to lean into the learning happening in the classroom."

-Catlin Tucker

TECH MAKEOVER

Challenge students to "redesign" one of your lessons using technology: video, visualization, presentation, etc.

SHERLOCK

Get students on the case: give them an authentic or real-world mystery to solve. Have them research, collaborate, and conduct their analysis using online tools.

BULLETIN BOARD

Make all feedback transparent by publishing it in an online space. What is the impact on you and your students when all feedback is visible?

COACH

Assign students to choose a problem, an idea, or a concept they see peers struggling with. Have them craft an online lesson that will help their classmates.

ACT IT OUT

Check comprehension by asking students to produce a newscast, interview, or role play of events. Aggregate these productions online and ask students to draw connections among them.

HEY TEAM!

Assign a collaborative project where students have to recruit team members from outside of class: family members, friends, experts. Online spaces allow members to be from anywhere.

WISH YOU WERE HERE

Ask students to capture their learning in one photo. Create a digital gallery of photos.

VJ

Have students use video to set goals at the beginning of a new unit, then have them video journal about their learning throughout the unit.

BREAKING NEWS

Send student reporters out to identify places where learning topics show up in the real world. Have them share a short video or conversation filmed at the scene.

FREEZE!

Ask students to pause throughout the learning process and capture their progress with a photo, video, or text. Collect these in an online space.

PEN PALS

Using digital tools, connect students with peers from outside the school who can share perspectives, give input, and broaden understanding.

KNOW THY AUDIENCE

Pitch YOUR project. Test several project ideas with students and let them use online tools to discuss and vote on them.

STUDENT TEACHERS

Ask students to design an online or blended learning experience for their peers from drafting lesson goals to curating content to designing assessments.

HOW DID WE DO?

Test your learning goals by using them as a post-experience "checklist" for students. Have students self-assess using an online format (survey, spreadsheet, etc.)

LAB

Use your school community as a lab to test ideas. Have students interview, survey, and explore resources just outside your classroom, aggregate and analyze their findings.

PITCH PERFECT

On your next class project, leverage the versatility of technology by allowing students to pitch their own topics and formats.

ON LOCATION

Use a mobile device to create video prompts in places that matter to you. Choose locations that add context and/or highlight the importance of content.

TIMESHEET

Make all of your class discussions asynchronous for one week.

YOU-BRIC

Rubrics are easy to create and use online. Try crowdsourcing them: increase buy-in and encourage self-assessment by collaborating with students to create course evaluation tools.

JUST ONE QUESTION

Use online polls and quizzes to gauge quickly and instantly how students are responding to course content.

RETHINK DEBATE

Stage an asynchronous video debate where students have time to research, practice, and compose arguments and responses.

WALK THE WALK

Build empathy by completing your blended experience alongside your students. Publish your work alongside theirs.

EMOTICLASS

Design an introduction to an online learning experience that does not use a single word of text. You'll need to get crafty with the visuals and digital resources you choose.

CLASSBOOK

Learn which social media tools your students use most and brainstorm what a class community space might look like online.

TEXTBOOK BOYCOTT

Find three online resources that illustrate a course concept in meaningful and relevant ways: one from academia, one from popular culture, and one from news media.

GET TO KNOW YOU

Break the ice online by asking students to respond to a prompt via social media, discussion forum, or image/video sharing.

MAPMAKING

Look up "Gantt Charts" online and map an entire learning experience using this approach borrowed from project management.

UPVOTE

Democratize conversations and feedback through using online polls, surveys, and social media voting.

TONE TEST

Record three versions of the same video greeting. Try various tones, locations, and organizational structures. Ask you students for feedback.

THE OUTSIDERS

Identify three people and/or organizations outside your school who can help your students learn. Think broadly: tools like video chat and social media can connect you to global resources.

MUSEUM OF FINE WORK

Create an online space for students to publish work they have created and curated. Have them leave short statements about the work, as an artist might do in a gallery.

NO RED PENS

Harness the power of the one-on-one conference by delivering feedback via video.

DON'T INSTRUCT. INSPIRE

Enliven your instructions for an assignment by integrating at least one image, one video, and one hyperlink.

REALITY TV

Ask students to apply course content "in the field" by working with people and resources in their communities. Use the online learning environment to document and archive this work.

CONFERENCE CALL

Stage a blended conference: have students prepare, present, and discuss their work online with another class, school, or organization. Leverage asynchronous and synchronous connections.

JOURNEY JOURNAL

Visualize learning: Use learning goals to structure an online space where students can document learning and reflect in a variety of formats.

Research-Based Strategies

Note Taking

Cognitive Writing

WHY IT'S IMPORTANT

The activity of note taking can be considered an important component of writing across the curriculum. It crosses all disciplines and has the two main outcomes: note taking helps students learn, and note taking helps students learn to write.

When done correctly, note-taking can help students fulfill two major needs: to record information that can be used at a later date and/or to aid reflection. The following research-based strategies are designed to help successfully develop these two essential functions with your students.

Retrieval Note-Taking

Based on the research by Dr. Pooja Agarwal, have students dip their toes into retrieval note-taking by:

- Encourage students to read a book, watch a video, or listen to a lesson without taking notes (yet!).

- Close the book, video, or pause during a lesson so students can write down what they remember (two things, everything, anything!).

- Open the book, watch a video, and continue with the lesson.

Instead of taking notes with a book open, simply take notes (while retrieving) with the book closed. This approach supports students in their existing note-taking strategies, while encouraging a small modification to take notes with the book closed vs. the book open.

Agarwal, P. K., & Bain, P. M. (2019). *Powerful teaching: Unleash the science of learning*. John Wiley & Sons.

Sketchnoting
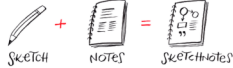
Sketchnoting is based on the idea of dual coding, meaning: the brain retains information better if it is taken in both visually and verbally. Here are some ways to introduce visual note-taking to your students:

Play with Text. Have students to play with spacing, vary text sizes, and add symbols anywhere on the page to create a hierarchy of information that might be harder to capture in linear text.

Start by Scribbling. Not all students will like the idea of sketchnoting at first, so encourage them to start off just by scribbling notes on paper.

Things to Remember. Have students identify 5 to 10 key words or concepts from the current lesson and begin developing a visual library of shorthand (e.g., icons or characters) to represent them.

Keep It Fun. The process isn't about ensuring that the sketches and drawings look good, but that students find a way to tease out the relationships between topics and concepts.

Clark, J. M. & Paivio, A. (1991). Dual coding theory and education. *Educational Psychology Review, 3*(3), 149-170.

Graphic Organizers

Graphic organizers are helpful learning tools for students of all ages to organize, clarify, or simplify complex information. They can also help students construct understanding through an exploration of the relationships between concepts.

LET LEARNING GOALS DRIVE DESIGN
Well-designed graphic organizers should guide students to categorize key concepts, surface the interconnection of ideas, or help students construct knowledge. There are many ways to create graphic organizers but, in general, they should guide students to:

1 **Observe**. Have students identify and note important details on the topic.

2 **Reflect**. Encourage students to critically think and reflect on the information.

3 **Question**. Have students ask questions to lead to more observations and reflections.

Egan, M. (1999). Reflections on effective use of graphic organizers. *Journal of Adolescent & Adult Literacy, 42*(8), 641-645.

Sentence Starter Strategies

Planning & Goal Setting

- My purpose is...
- My top priority is...
- To accomplish my goal, I plan to...

Asking Questions

- I wonder why...
- What if...
- How come...
- Predicting
- I'll bet that...
- I think...
- If, then...

Reflecting and Relating

- So, the big idea is...
- A conclusion I'm drawing is...
- This is relevant to my life because...

Making Connections

- This reminds me of...
- I experienced this once when...
- I can relate to this because...

Forming Interpretations

- What this means to me is...
- I think this represents...
- The idea I'm getting is...

Evaluating

- I like/don't like because...
- This could be more effective if...
- The most important message is...

Olson, C.B. and Land, R. (2007). A Cognitive Strategies Approach to Reading and Writing Instruction for English Language Learners in Secondary School. *Research in the Teaching of English*, *41*(3).

Cornell Notes

Cornell note-taking is a popular note-taking method for taking, organizing, and summarizing notes. This method typically results in better overall comprehension.

Main Ideas	Key Words and Ideas
	Important Dates, People, Places
Key Questions	Repeated/Stressed Info
After notes are completed	Ideas Written on the Board or Presented
	Info from Textbook
	Diagram or Pictures
	Formulas

The bottom section is a reflection or summary of students' notes in their own words, in order to help retain the material.

Donohoo, J. (2010). Learning how to learn: Cornell notes as an example. *Journal of Adolescent & Adult Literacy, 54*(3), 224-227.