Learning Styles

	Gregorc	4MAT
	**Concrete Random** •divergent •experiential •inventive	**Type 4 Dynamic** •creating and acting •usefulness and application of learning
	**Concrete Sequential** •task oriented •efficient •detailed	**Type 3 Common Sense** •think and do •active, practical •making things work
	**Abstract Sequential** •intellectual •analytical •theoretical	**Type 2 Analytical** •reflect and think •observers who appreciate lecture methods
	**Abstract Random** •imaginative •emotional •holistic	**Type 1 Imaginative** •feel and reflect •create and reflect on an experience

Gregorc Learning Styles Test

To check your personal thinking style:

1. Read each set of words and mark the two within each set that best describe you.

1	a. Imaginative	**9**	a. Reader
	b. Investigative		b. People person
	c. Realistic		c. Problem Solver
	d. Analytical		d. Planner
2	a. Organized	**10**	a. Memorize
	b. Adaptable		b. Associate
	c. Critical		c. Think-through
	d. Inquisitive		d. Originate
3	a. Debating	**11**	a. Changer
	b. Getting to the point		b. Judger
	c. Creating		c. Spontaneous
	d. Relating		d. Wants direction
4	a. Personal	**12**	a. Communicating
	b. Practical		b. Discovering
	c. Academic		c. Cautious
	d. Adventurous		d. Reasoning
5	a. Precise	**13**	a. Challenging
	b. Flexible		b. Practicing
	c. Systematic		c. Caring
	d. Inventive		d. Examining
6	a. Sharing	**14**	a. Completing work
	b. Orderly		b. Seeing possibilities
	c. Sensible		c. Gaining ideas
	d. Independent		d. Interpreting
7	a. Competitive	**15**	a. Doing
	b. Perfectionist		b. Feeling

8	a. Intellectual
	b. Sensitive
	c. Hardworking
	d. Risk-taking

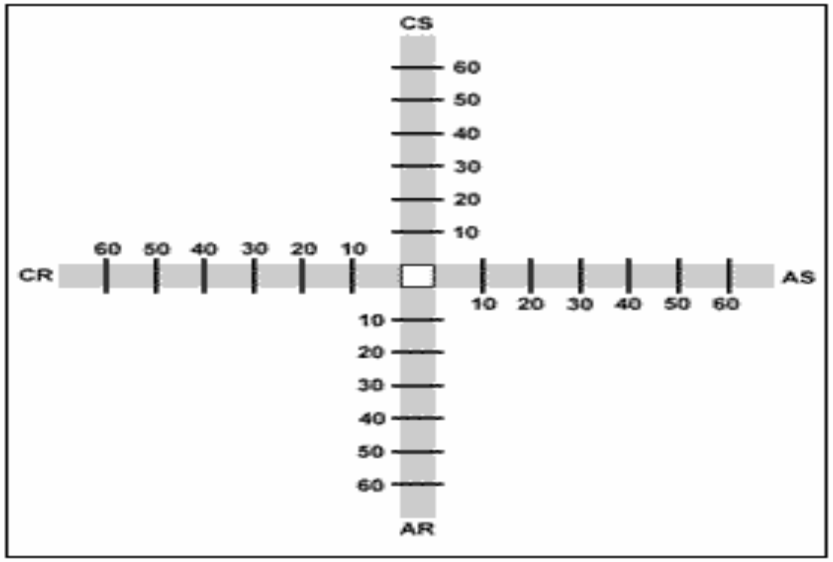
2. In the columns below, circle the letters of the words you chose for each number. Add your totals for columns I, II, III, and IV. Multiply the total of each column by 4. The box with the highest number describes how you most often process information

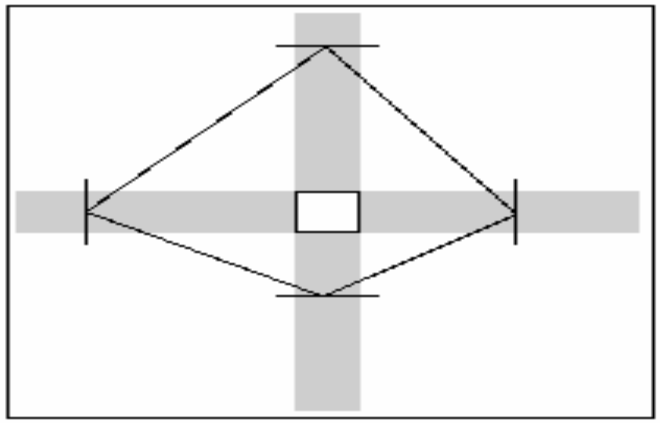
	I	II	III	IV
1.	C	D	A	B
2.	A	C	B	D
3.	B	A	D	C
4.	B	C	A	D
5.	A	C	B	D
6.	B	C	A	D
7.	B	D	C	A
8.	C	A	B	D
9.	D	A	B	C
10.	A	C	B	D
11.	D	B	C	A
12.	C	D	A	B
13.	B	D	C	A
14.	A	C	D	B
15.	A	C	B	D
Total	____	____	____	____

I ___ x 4 =		Concrete Sequential (CS)
II ___ x 4 =		Abstract Sequential (AS)
III ___ x 4 =		Abstract Random (AR)
IV ___ x 4 =		Concrete Random (CR)

3. Graph your results.

To graph your preferred thinking style, just place a dot on the number that corresponds to your score in each of the classifications and link the dots shown in the miniature diagram.





This test is based on the research of Professor Anthony Gregorc.

Gregoric Learning Styles

Abstract vs. Concrete

Abstract perception is the quality that allows an individual to visualize and conceive of ideas that cannot actually be seen. An abstract thinker tends to be intuitive and imaginative when dealing with ideas. By contrast, concrete perception is the quality for straight forward, direct learning. The concrete thinker prefers to deal with facts, truth, and reality.

Gregoric Learning Styles

Sequential vs. Random

A sequential person deals with data in an linear, organized manner. They tend to plan things out step-by-step. A random person prefers to deal with information in chunks, skipping steps whenever possible. They can work from the middle or begin at the end and still achieve desired results.

Gregoric Learning Styles

Concrete Random

Concrete Random students are creative, adventurous, and naturally curious about the world around them. They are quick, innovative thinkers. They use their instincts and intuition when making decisions.

Gregoric Learning Styles

Concrete Random Learners

Concrete random learners are experimenters. Like concrete sequential learners, they're based in reality, but are willing to take more of a trial-and-error approach. Because of this, they often make the intuitive leaps necessary for true creative thought. They have a strong need to find alternatives and do things in their own way. For your CR learners, take advantage of their divergent thinking ability. They believe that it's good to see things from more than one viewpoint. Allow them to solve problems. But give them deadlines. Accept their need for change. They need to work with others who value divergent thinking.

Gregoric Learning Styles

Concrete Sequential

Concrete Random students are organized, dependable, hard-working students. They follow the teacher's directions and ask questions for clarification. Their work is usually accurate, factual, and consistent. They prefer conventional instructional activities.

Gregoric Learning Styles

Concrete Sequential Learners

To them, reality consists of what they can detect through their physical sense of sight, touch, sound, taste and smell. They notice and recall details easily and remember facts, specific information, formulas, and rules with ease. 'Hands on' is a good way for these students to learn. For your CS Learners—build on their organizational strengths. Provide them with details. Break their projects down into specific steps. Set up quiet work environments.

Gregoric Learning Styles

Abstract Sequential

Abstract Sequential students are logical and deliberate. They learn best in a structured environment. They are knowledgeable, analytic thinkers with a clear sense of objectivity. They prefer systematic processes and are thorough in their work.

Gregoric Learning Styles

Abstract Sequential Learners

It's easy for abstract sequential learners to zoom in on what's important, such as key points and significant details. Their thinking processes are logical, rational and intellectual. A favorite activity for abstract sequential learners is reading, and when a project needs to be researched they are very thorough. Generally they prefer to work alone rather than in groups. For your AS learners, give them exercises in logic. Feed their intellect. Steer them toward highly structured situations.

Gregoric Learning Styles

Abstract Random

Abstract Random students are imaginative and idealistic. They are sensitive, compassionate students who are prone to be sentimental. They prefer flexibility and tend to be spontaneous. They are very perceptive students.

Gregoric Learning Styles

Abstract Random Learners

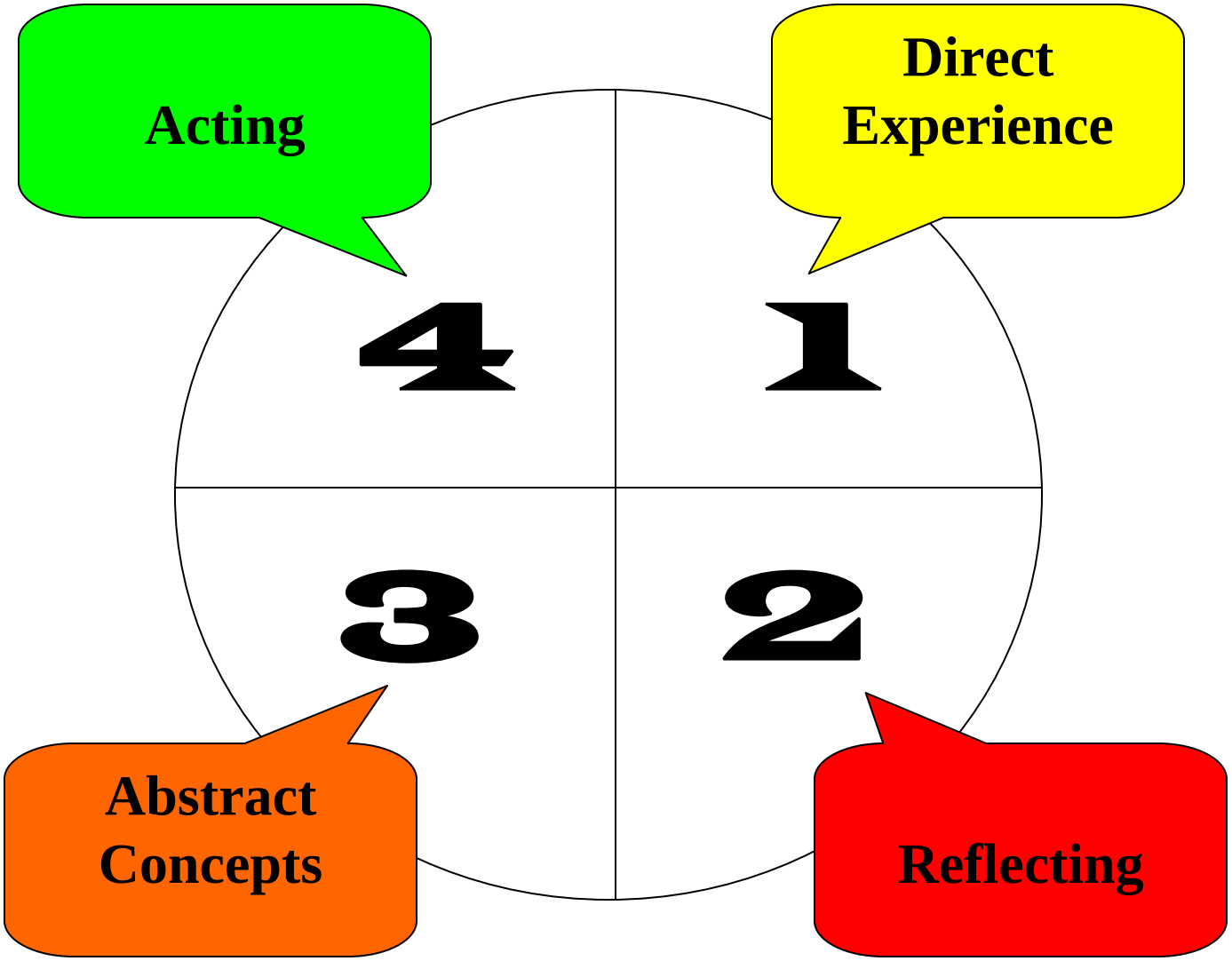
Abstract random learners organize information through reflection, and thrive in unstructured, people-oriented environments. The 'real' world for abstract random learners is the world of feelings and emotions. The AR learner's mind absorbs ideas, information, and impressions. They remember best if information is personalized. They feel constricted when they're subjected to a very structured environment. For your AR learners, use their natural ability to work with others. Recognize how strongly emotions influence their concentration. Build on their strength of learning by association. They prefer to look at the big picture first. Be careful to allow them enough time to finish their work. Teach them using plenty of visual clues. Use color in visuals whenever possible.

Dryden G., and Vos J. (1993). *The learning revolution: A lifelong learning program for the world's finest computer: Your amazing brain*. Auckland: Profile Books.

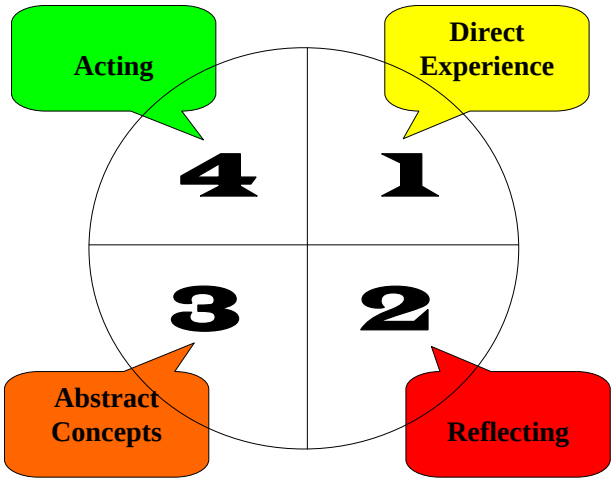
Teaching Around the 4MAT Cycle

McCarthy, B. and McCarthy, D. (2006). ***Teaching Around the 4MAT Cycle: Designing Instruction for Diverse Learners with Diverse Learning Styles.*** **Corwin Press.**

The Cycle of Learning

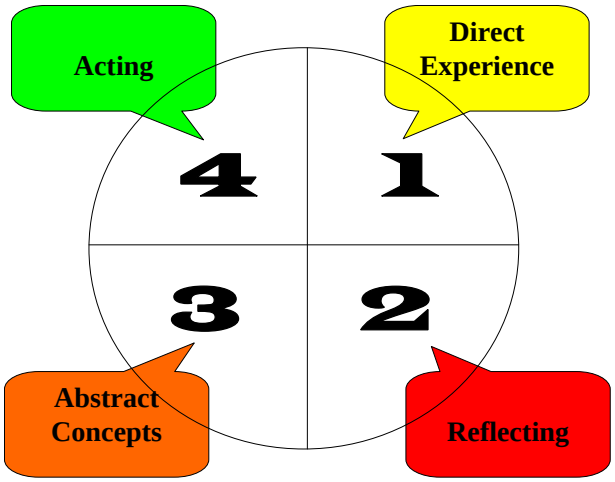


The Cycle of Learning



1. Learning begins with direct experience.
2. Then, learners move toward the analysis of abstract concepts by reflecting on their direct experience.
3. After reflective processing has occurred, learners become more active by applying the new learning (abstract concepts).
4. Finally, learners “act” on their learning by transferring it to a new situation.

The 4MAT Cycle of Learning



All students have favorite places on the 4MAT Learning Cycle, where they tend to linger during the learning process, resulting in learner differences.

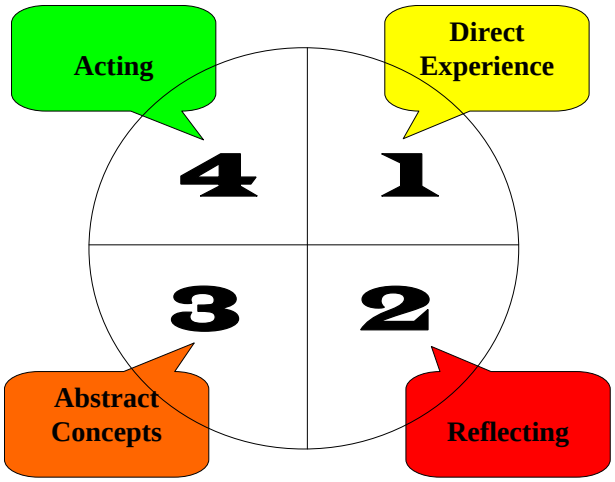
<u>Type 1 Learners</u> – Need to be involved in direct experiences during which they can use their imagination.

<u>Type 2 Learners</u> – Need to reflect and think about their learning. They are analytical by nature.

<u>Type 3 Learners</u> – Need a common sense approach to learning. They prefer to think and do. They are practical thinkers. They like to make things work.

<u>Type 4 Learners</u> – Need to apply and use their learning. They tend to be creative thinkers.

Teaching Around the 4MAT Cycle

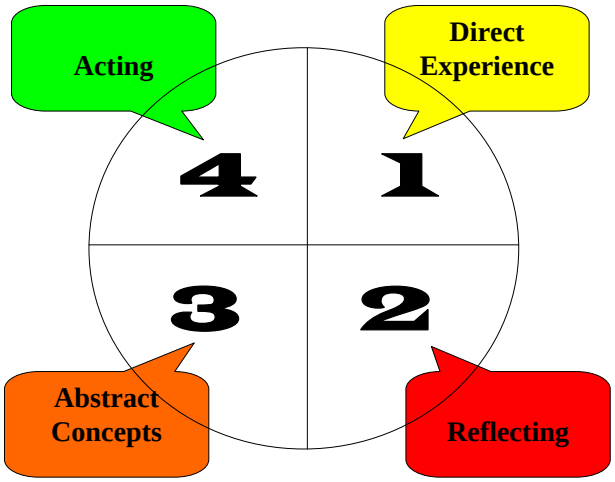


Quadrant 1: Students' Favorite Question: "Why?"

<u>What Students Experience</u>:

- **Connecting to prior learning**
- **Seeing new material in the context of a bigger idea or picture**
- **Engaging in dialogue – initial discussion about the meaning of the new content/skill**
- **Creating interest in the content/skill to be learned**
- **Creating a sense of "I know something about this, and I want to know more."**
- **Focusing on present and past understandings**

Teaching Around the 4MAT Cycle



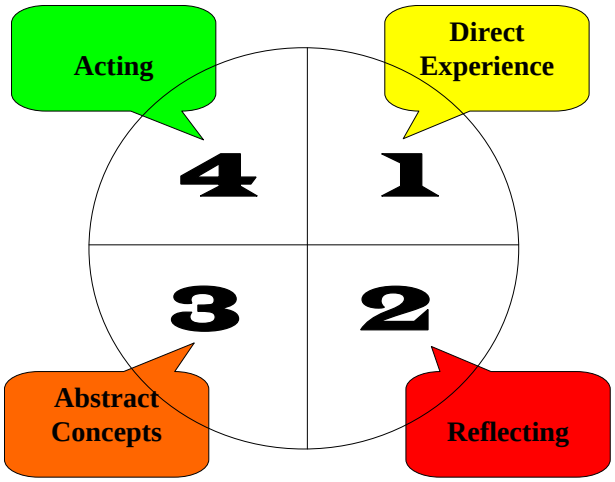
Quadrant 2: Students' Favorite

Question: "What?"

<u>What Students Experience</u>:

- Comprehending the learning
- Receiving expert knowledge
- Examining pertinent information
- Seeing both the big picture and the supporting details
- Connecting to other similar ideas
- Engaging in interactive questioning
- Clarifying purpose
- Classifying
- Comparing
- Organizing
- Creating knowledge that will lead to further understanding

Teaching Around the 4MAT Cycle



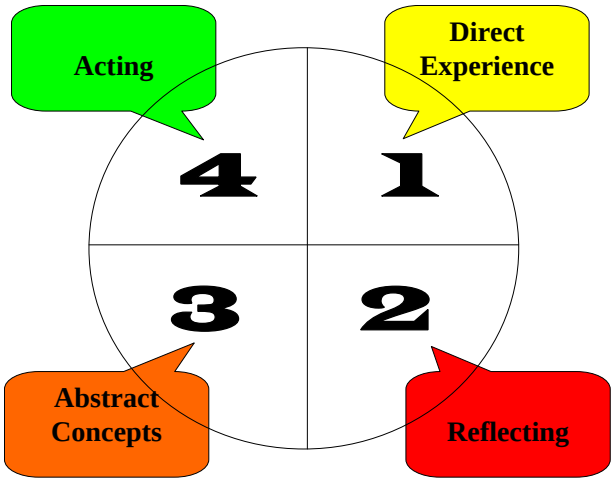
Quadrant 3: Students' Favorite

Question: "How?"

<u>What Students Experience</u>:

- **Learning important skills**
- **Practicing**
- **Experimenting**
- **Applying expert knowledge to a task**
- **Seeing how things work**
- **Doing**
- **Comparing results**
- **Researching conclusions**
- **Mastering skills**
- **Extending the learning into usefulness in real life**
- **Questioning**
- **Resolving discrepancies**

Teaching Around the 4MAT Cycle



Quadrant 4: Students' Favorite

Question: "What if?"

<u>What Students Experience</u>:

- **Adapting the learning**
- **Synthesizing**
- **Performing**
- **Confirming conclusions**
- **Taking a position**
- **Evaluating**
- **Exhibiting: publishing**
- **Creating new questions**
- **Refocusing**
- **Verifying usefulness**
- **Modifying**
- **Establishing future use**
- **Making new connections**