

Making Connections

Language, Literacy, Learning



Albuquerque Public Schools

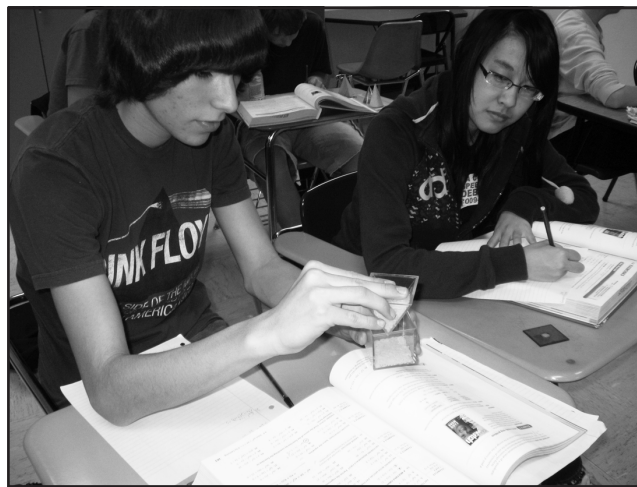
Language and Cultural Equity **LCE**

Sheltering Geometry Instruction, Deepening Understanding

by Gregg Nunley, La Cueva High School

As teachers, we always try different instructional methods in our classrooms in an effort to increase student success. To me, increasing student success means that a greater number of my students have a more in-depth understanding of classroom content. One way for me to do this is to weave key components of sheltered instruction into my daily lessons. How do I know this works to increase student success? I have proof. Part of my proof is completely objective: test scores. When I use components of sheltered instruction in my lessons, the students score better on their geometry quizzes and tests. The other part of my proof is subjective—

sheltered instruction creates more confident students who are more willing to participate in classroom activities. This helps to develop students who have a greater understanding of classroom content.



Students determine the volume of a prism from the volume of a pyramid which is filled with rice.

In February, my Honors Geometry class at La Cueva High School began a unit on solids (pyramids, cylinders, prisms, spheres). The content objectives of the sheltered lesson were as follows:

1. Students would be able to identify and classify basic solids including prisms, pyramids, cylinders, and cones; and
2. Students would be able to calculate the surface area and volume of each of those solids.

THE LESSON

As students entered the room, they noticed that the words “Homework Buddies” were displayed on the Smartboard. Students know this means that they ask the other students at their tables (a table consists of four students) any questions they have about the previous night’s homework assignment. After three to five minutes, each table of students knows they may ask for one problem to be worked out on the Smartboard. I write down the problem numbers that tables request to be worked out. Students earn extra credit by volunteering to work out these problems for the class.

—continued on page 10—

Also in this issue...

- ❖ **Traveling Through the Civil Rights Movement**
- ❖ **Estrategias efectivas que incrementan el lenguaje académico...**
- ❖ **Extending Marzano's Instructional Strategies**
- ❖ **Putting on a Native American Fashion Show: Learning by Doing**
- ❖ **Sharing Classroom Management**
- ❖ **Making More Connections!**

Traveling Through the Civil Rights Movement

by Joycelyn Pegues Jackson, Multicultural Education Coordinator/Black Student Union Director

Thirty students from Albuquerque High and Highland High began their "Travels Through the Civil Rights Movement" on Sunday, March 14, 2010 at 6:00 a.m. They were accompanied by the Black Student Union sponsors from Albuquerque High, Jackie Cole and co-sponsors Tristan Baker and Calesia Cole, Stacy Washington from Highland High and the Director, Joycelyn Jackson. Their travels included the following destinations:

1. The Oklahoma City Bombing Site – Oklahoma, City;
2. Central High School and a conversation with Minnie Lee of the "Little Rock Nine" and Julian Bond in Little Rock, Arkansas;
3. The Lorraine Motel and Civil Rights Museum in Memphis, Tennessee;
4. 16th Street Baptist Church and Kelly Ingram Park in Birmingham, Alabama;
5. Historically Black Colleges Spellman College and Morehouse College and the Dr. Martin Luther King Jr. Museum, House and Burial Site and Ebenezer Baptist Church, Atlanta, Georgia;
6. Tuskegee Airman Museum in Tuskegee, Alabama, the Rosa Parks Museum in Montgomery, Alabama, and the Selma Bridge in Selma, Alabama; and
7. Vicksburg National Military Park in Vicksburg, Mississippi.

Traveling through the Civil Rights Movement was one of the most heartfelt and educational experiences in my life. Experiencing the different sites with thirty young people, watching their



The Tuskegee Airmen

faces and listening to their thoughts as they tried to understand and internalize what they were hearing and seeing, was phenomenal. Each of the students kept a journal and took pictures to go along with the thoughts they wrote about. Here is one student's reflection.

"This year's 2010 Black Student Union College and Civil Rights Tour brought out a lot of different feelings from me. I have always heard how hard and how long it took African-Americans to get the same rights, and to be treated as human beings. I thought I knew a lot about it until I went on this trip. I stood on the same place that the National Guard did, when they turned the Little Rock Nine away from entering Central High School. This made me think about how many students I see every day trying to sneak past the security guards just to get out of having to go to school. Being at Central High School, in Little Rock, Arkansas, made me think about how much we take our education for granted. These nine young people had to fight and put their lives' on the line for something that we don't even appreciate any more. This trip has also helped me see how much they really do leave out of the history books. Seeing all these places and talking with people that went through it shows that we as African-Americans have made it a long way, but we still have a long ways to go."

*Mariah Lyons, President,
Albuquerque High School Black Student Union*

On Tuesday, April 27, the BSU students invited the community to their celebration of learning about "Travels Through the Civil Rights Movement." They presented their photographs and personal reflections in the AHS Commons. This presentation will hopefully become an

–continued on page 5–



Students from the Black Student Unions of AHS and HHS visit the Central High School Museum and Visitors' Center in Little Rock, Arkansas.

Estrategias efectivas que incrementan el lenguaje académico en la clase de ciencias de la escuela secundaria

por Elia María Romero

El lenguaje académico está influenciado por la lectura, la escritura, el discurso oral, y por las oportunidades académicas en las que está inmerso el estudiante. Este lenguaje tiene características de tipo pragmático que requieren de una audición y una práctica intensivas en un contexto significativo. Cuando el estudiante carece de un lenguaje académico apropiado a su nivel, su aprendizaje se ve afectado y esto incide negativamente en su éxito académico, ya sea en su primera lengua o en su segunda.

Según Cummings (2002), se distinguen dos tipos de destrezas necesarias para adquirir el lenguaje académico. Las del primer tipo se denominan *destrezas comunicativas interpersonales básicas (DCIB)*. Las segundas se relacionan con el *desarrollo cognitivo del lenguaje académico (DCLA)*. Este investigador afirma que las primeras (DCIB) tienen que ver fundamentalmente con la adquisición del lenguaje y son directamente observables a corto plazo. Las destrezas del segundo tipo (DCLA) requieren de la aplicación consciente de estrategias relacionadas con el ambiente escolar. Los logros de estas últimas sólo son observables a largo plazo si el alumno ha estado expuesto a una práctica académica intensiva.

En la enseñanza de las ciencias a nivel de secundaria, el énfasis debe recaer mayormente en el desarrollo cognitivo del lenguaje académico. Esto sentará las bases del discurso académico del alumno en los años posteriores en la escuela preparatoria. A continuación se presentan cinco estrategias pedagógicas que pueden ayudar a los alumnos de secundaria a adquirir y mejorar el uso y la comprensión de su lenguaje académico.

- **DE UNA PALABRA DE A OTRA:** El maestro escribe una palabra corta y sencilla relacionada con el tema.

Seguidamente, cada alumno añade prefijos y sufijos a dicha palabra o bien crea palabras compuestas según el caso. De esta manera, el alumno logra adquirir estrategias fonológicas, pragmáticas, y sintácticas a la vez que incorpora dichas palabras a su vocabulario académico.

foto > fotografía > fotográfico > fotogénico > fotosíntesis > fotosintético > fotosensible...

- **EL ROMPEPALABRAS:** Con esta estrategia el maestro logrará que los estudiantes desarrollen nuevas palabras a partir de una palabra científica dada.

BIODIVERSIDAD

vida diverso edad odisea
verso dedos divisor rosa verdad

- **EL CÍRCULO CIENTÍFICO:** La finalidad de esta estrategia es la formación de imágenes mentales y la organización del pensamiento científico abstracto. Esto facilitará a los estudiantes la consolidación de los conceptos y/o procesos científicos estudiados en clase.



—continúa en la página 9—

Extending Marzano's Instructional Strategies

by Kathy Waldman

Marzano's nine strategies (*Classroom Instruction that Works*, 2001) tie classroom instruction to research in a way that has spoken to many teachers and caused them to examine their methods of instructing students. Good teachers have used many of the strategies he delineates for years, and his list has affirmed what they already were doing. Such is the case with G.L.A.D. (Guided Language Acquisition Design). Further, these strategies are crucial for the success of English language learners. G.L.A.D. provides ways for ELL's to access grade level academic language and standards. All of the strategies outlined by Marzano are a part of G.L.A.D. instructional practices. Like many teachers, G.L.A.D. teachers feel validated and reassured that what they know to be best practice is affirmed by research.

The chart below shows how Marzano's strategies can be linked to key G.L.A.D. practices. In *Building Background Knowledge for Academic Achievement* and *Building Academic Vocabulary*, Marzano has added new research-based ideas to his first nine strategies. Therefore, the chart also contains references to these important aspects of instruction. For G.L.A.D. trained teachers, this chart will validate their knowledge of key strategies and help them explain the links to colleagues. For others, who have been exposed to a few G.L.A.D. strategies in addition to Marzano's work, it will reinforce the importance of using varied instructional methods.

Marzano has called nonlinguistic representation "the most underused instructional strategy of all," yet "one of the most powerful". He says that engaging students in creating nonlinguistic representations stimulates and increases activity in the brain (2001, p. 73). As you can see, nonlinguistic representation plays a part in almost all of these key G.L.A.D. strategies. "This is especially important for ELL's because they cannot rely solely on linguistic ability to learn and retain knowledge in a new language. Nonlinguistic methods of learning are essential for them," (*Classroom Instruction that Works for English Language Learners*, Hill and Flynn, 2006).

From the first moment of instruction with Observation Charts (collections of pictures or real objects related to the unit of study), G.L.A.D. students engage with high-level content in nonlinguistic, as well as linguistic ways. Pictures help them tap into their prior knowledge, even when students don't know the words in English. For all students, the metacognition involved in making connections from the known to a new unit of study is engaging and valuable. Color-coded picture-lectures make new information more memorable. Pictures and gestures help students deepen their understanding of unit-related poetry and chants. And the spiraling of G.L.A.D. curriculum is a nonlinguistic support in itself. G.L.A.D. and Marzano's strategies seem to be a near-perfect fit.

Marzano's Strategies and G.L.A.D.

by May Kassiech, Instructional Coach, Title I

Marzano's Strategies	G.L.A.D.—Guided Language Acquisition Design	
1. Identifying similarities and differences	Comparative Input Expert Groups Process Grid	Cooperative Strip Paragraph Mind Map
2. Summarizing and note-taking	Inquiry Chart Cognitive Content Dictionary (CCD) Cooperative Strip Paragraph Mind Map Process Grid	Expert Groups Home/School Connection Exploration Report Pictorial Input Narrative Input

—continued on page 5—

–continued from page 4–

Marzano’s Strategies, cont.		G.L.A.D. — Guided Language Acquisition Design, cont.	
3.	Reinforcing effort and providing recognition	3 Standards Team Points and Awards Exploration Report Team Task Key/Team Points Chart Process Grid	Home/School Connection Expert Groups Cooperative Strip Paragraph Mind Map
4.	Nonlinguistic representations	Team Points and Awards Pictorial Input Narrative Input Exploration Report Home/School Connection	Expert Groups Comparative Input Cooperative Strip Paragraph Mind Map Process Grid
5.	Setting objectives and providing feedback	3 Standards Cognitive Content Dictionary (CCD) Inquiry Chart	Team Task Key/Team Points Chart Home/School Connection Expert Groups
6.	Cues, questions, and advance organizers	Inquiry Chart Cognitive Content Dictionary (CCD) Pictorial Input Exploration Report Home/School Connection Sentence Patterning and Flip Chart	Expert Groups Comparative Input Mind Map Cooperative Strip Paragraph Process Grid
7.	Homework and practice	Home/School Connection	
8.	Cooperative learning	Team Points and Awards Cognitive Content Dictionary (CCD) Exploration Report Team Task Key/Team Points Chart	Cooperative Strip Paragraph Mind Map Process Grid
9.	Generating and testing hypotheses	Inquiry Chart Pictorial Input Exploration Report Home/School Connection	Expert Groups Cooperative Strip Paragraph Mind Map Process Grid
	Marzano’s <i>Building Background Knowledge</i> and <i>Building Academic Vocabulary</i>	Inquiry Chart Cognitive Content Dictionary (CCD) Pictorial Input Narrative Input Comparative Input	Sentence Patterning and Flip Chart Cooperative Strip Paragraph Mind Map Process Grid

–continued from page 2–

annual event, given the success of this year’s trip and the positive reactions from the students and the community.

I would like to acknowledge some of the people who helped to make our “Travels Through the Civil Rights Movement” possible. They include the following: Tim McCorkle, Albuquerque High, Principal; Nikki Dennis, Highland High, Principal; Albuquerque Public Schools Educational Foundation; General Lloyd W. Newton, Chapter, TAI; Stephon Scott; and students, parents, teachers, and various community members.



Dr. Martin Luther King, Jr., was born in this house in Atlanta, Georgia, on January 15, 1929.

Putting on a Native American Fashion Show: Learning by Doing

by John Williams, Highland High School

On April 1st, 2010 the Highland High School Native American club held their third Annual Native American Fashion Show. Although this event was primarily for Albuquerque Public Schools students, there was something in it for everybody as well. The fashion show was organized by Native students from Highland High School along with Native American Club members from other APS high schools. They worked in collaboration with a number of well known Native American fashion designers. Also, there were many other Native American students and models from as far away as Window Rock and Dine College in Tsaile, Arizona, who were part of this wonderful event. So a question that was going around in the Native community about the fashion show was, "Hmmm!... A Native American Fashion Show, what is that all about?"

The Native American Fashion Show is a unique opportunity for Native Americans students to promote cultural pride in their Native American heritage. Also, cultural events such as these bring communities together and for student organizers, it was a chance to apply their public speaking and performing arts skills to test in a public setting.

Each year, the Native American fashion show has featured the creative talents of some well known and a few amateur Native American fashion designers. Some well known fashion Native American designers like Virginia Ballenger and Penny Singer have been featured in magazines, museums, and fashion shows around the country. Others, like Glacsy Designs, cater more to contemporary tastes by offering some exciting styles in the modern/contemporary designs. Shirley Pino of RedWing designs also does a wonderful job of blending Pueblo designs into modern fashions. Also, for Rose Saunders, this was her first time ever participating and showing her unique ribbon shirts in a fashion show. Finally, several

students also put together some of their own designs and outfits which reflected their own unique personal styles.

This year there were models from Highland, Albuquerque, Sandia, La Cueva, Del Norte, West Mesa and Bernalillo high schools. In addition, there were younger students from La Mesa Elementary, Cubero Elementary, La Petite Academy, Jimmy Carter Middle School, and Wilson Middle School. There were even aspiring models from the University of New Mexico, Southwestern Indian Polytechnic Institute, Apollo College, and the Institute of American Indian Arts. There are a variety of reasons for participating in a fashion show, but for many of these students, a major reason was to overcome the fear of performing before a large audience.

It was amazing to see and watch these Native American students transform from appearing to be a person with a shy demeanor to one of being a proud person. Some students commented on how they noticed their peers changing their posture while they walked across the catwalk from a slouched walk to a more dignified walk. While there were those models that strutted the classic model 'walk', other students just simply walked with pride and elegance in their own way. And so, it was wonderful to see how this fashion show allowed many students to build confidence and pride in their unique Native American cultural heritage.

In addition to the brave models who walked the catwalk, there was also an extensive cast of students working in the background. There were student accountants, script writers, technical writers, lighting and sound technicians, photographers, stage managers, ushers, security, hospitality specialists, and even a group of public speakers or masters of ceremonies. By giving students a decision in selecting their own type of activity to

—continued on page 7—

—continued from page 6—

participate in, students were able to excel in what they were good at and what they wanted to learn. However, in upcoming events and even in next year's show, students will most likely move into a new position of their choice. Therefore, students are given a wide range of choices to enhance their expertise and to learn different skills from different occupations or careers.

In addition, there was also a student from Colorado who attended the event on a scholarship from his school. By attending the event last year, his teacher was able to allow him to attend because of the educational value of the event. Finally, the event provided an internship possibility for the Career Enrichment Center cosmetology program.

As part of the activity evaluation process, the Student Leadership Council gathers feedback from the participants and the community. For the fashion show, some of the most common remarks were, "It gets better every year" and "I can't wait for next year's show." Students also reviewed video footage and discussed the aspects that went well and things that could be changed to make it better. A formal plus/delta evaluation is conducted by the Council and turned in to the Director of Indian Education.

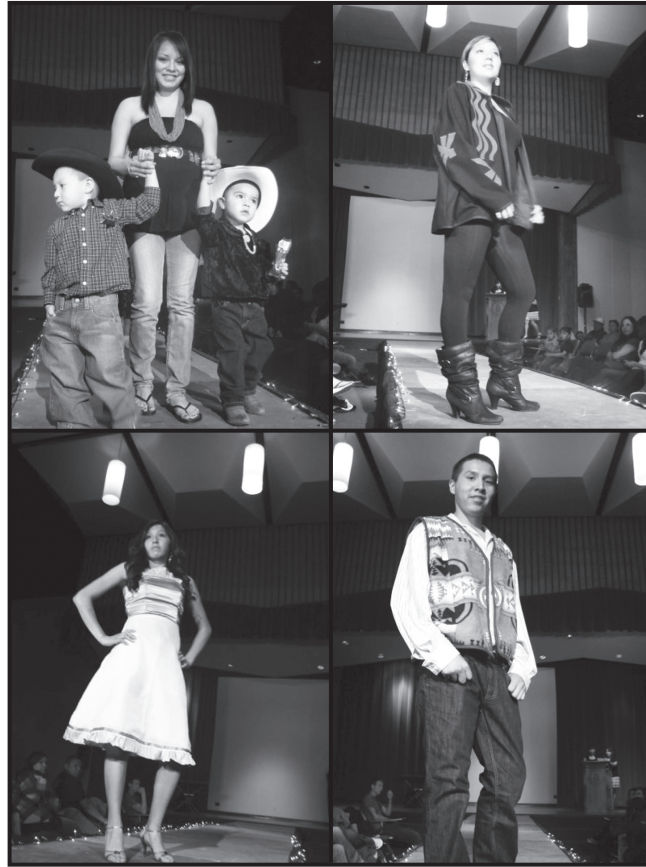
However, the major focus of the evaluation is to determine growth and success on an individual basis in terms of the virtues

or guiding principles that are part of the Indigenous rubric, such as Generosity, Belonging, Interdependence, and Mastery. For example, in terms of Growth and Generosity,

students did very well in welcoming the community and participants to the show. Also, they are showing their increased understanding of these concepts when they work together to plan, rehearse, and participate in the fashion show.

Finally, as mentioned before, as students engaged in activities or learning of their choice they were able to follow through with excellence in their specialized areas during the program. All in all, this fashion show, like all of the other events put on by the Native American students from Highland, is a great community-

based event that highlights parent/community, and student involvement, experiential service learning opportunities, and it is here to stay. People can look forward to it every year.



Students and community members proudly model a variety of traditional and contemporary Native American fashions on the runway at Highland High School.

For further information about Indian Education in Albuquerque Public Schools, including public events such as the Native American Fashion Show, please go to www.apsied.com.

Sharing Classroom Management

by Cheryl Hansen, Mountain View Elementary School

Have you ever felt your job has more to do with getting students to behave than with teaching? Getting a group of students to settle down, stay on task, and build community isn't always easy. Here is a classroom management tool that has proven to be effective and relatively simple. Best of all, it can free you up to do what you were meant to do: teach!

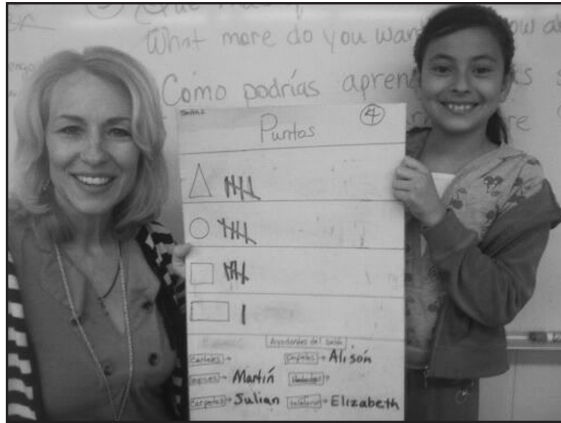
Reaping the benefits of this tool begins with a slight shift in thinking, which many seasoned teachers know already: catch students being good. Traditionally, it is the inappropriate behavior that gets noticed. This behavior receives negative attention from the teacher and positive attention from the students, who may laugh or see it as entertaining. "Catch them being good" focuses on the good behaviors, eliminating the opportunities for the negative behavior to receive reinforcement. Appropriate behaviors elicit the most attention and the students who display these behaviors receive the rewards.

How It Works

With students in groups of three to five, groups are given points for positive behaviors throughout the day or instructional period. Individual negative behavior is addressed by giving points to the other groups for not displaying that behavior. At the end of the week, the winning group gets a prize and is allowed to have special classroom roles.

- Keep the students in the same group for a fairly long period of time—9 weeks seems to work well.
- Allow the groups to name themselves, but give them criteria. If they cannot do this quickly, you can name the group. You can also eliminate this step and simply name the groups.
- Recognize behavior of a single group member or the group as a whole. Rather than explaining what

all the positive behaviors are, you can jump in and assign points as you see good behaviors. Students will quickly get the gist of it. If one member of the group compliments another, you might say: "A point for the Triangles for being supportive," or, "A point for the Chivas because everyone turned in homework."



Teacher Cheryl Hansen and student Ana Martínez Hurtado display points for positive behavior in a Spanish class.

- Award points to the groups not showing a negative behavior. If a student in the Triangles throws an eraser, you can say "A point for the Rectangles, Circles, and Squares for not throwing erasers."

- At the end of the week, add up points. The winning group gets an inexpensive prize.

- Give lots of points the first week or two—more than you normally would—to show how the system works.

- Keep the groups close in points right up until the end –

that way they don't feel like it is hopeless and give up trying. Never take points away.

- Keep the system going even after behavior improves.
- On days like Halloween or before vacation, when everyone is excited, assign more points than usual (e.g., giving five where you would usually give one).

BENEFITS FOR THE STUDENTS:

- Reframes language from negative to positive and shaming to affirming
- Peer-directed rather than teacher-directed
- Uses group formats, encourages collaboration
- Increases self-motivation
- Establishes trust and fairness as the norm in the classroom community
- Sends a message to the students that teacher assumes that students already have good behavior inside them, as a part of who they are.

BENEFITS FOR THE TEACHER:

- Redirects behavior with minimal interruption.
- Teacher becomes a coach rather than an enforcer
- Greatly reduces power struggles between teacher and students
- Peers model behavior for each other
- Increases student participation and time on task

—continued on page 9—

—continued from page 8—

THE REWARDS

What's in this system for your students? On Fridays, the points are tallied and each member of the winning group gets an inexpensive prize and the choice of classroom jobs. These jobs can be as elaborate as class president or as simple as phone greeter. Give additional privileges to the winning group as you see fit (first to line up, etc.).

What's in it for the teacher? Generally, one team member may slack off. Instead of you correcting the student's behavior, it will be a responsible group member who does this. It is important to let students know that the group receives the point, not the individual. This serves two purposes: you don't have to be everywhere at once, and the student who cares more about what his/her peers think than what you think will make a closer approximation to the desired behavior. This frees you up to do more teaching!

TROUBLESHOOTING

If the rest of the group is doing fine, but one student is keeping them from winning, you may get requests to move that member. Unless there is a serious problem, I help the group find ways to get along, since community building is an important part of this system. Frequently, the misbehaving student will start interacting better with the group—reward generously for this.





What if the whole class manages themselves appropriately? Give each group a point. Rarely do they mind that no one group gets ahead this way. An alternative is to have a separate reward for whole-class positive behavior—for example, a jar that you fill with marbles for each instance of whole-class good behavior. A full jar results in a small class treat, such as popcorn for all.

READY, SET, GO!

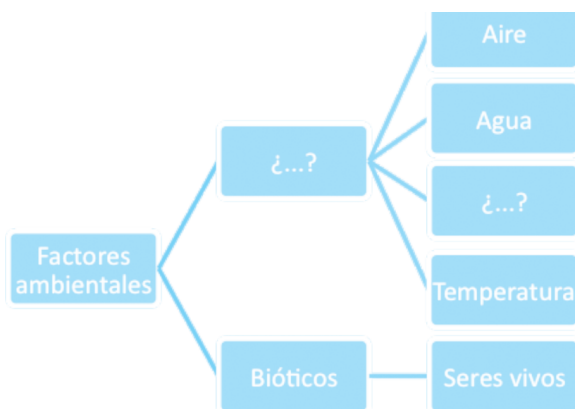
This plan can transform your class into a group of learners who feel more rewarded, responsible, and prideful of their accomplishments. You'll see happier, more interactive learners and a teacher who can, with minimal management, interruptions, or concerns, lead the class in learning adventures. Isn't that what we all signed up for?

—continuación de la página 3—

- **EL DICCIONARIO DE VOCABULARIO CIENTÍFICO:** Con este diccionario los estudiantes amplían su vocabulario científico y aprenden a predecir y definir conceptos para luego aplicarlos en su comprensión lectora.

	Palabra de entrada: Geológico
	Predicción: Relacionado con la Tierra
	Definición: Es lo relacionado con la constitución, composición, estructura, evolución e historia de la Tierra.
	Palabras relacionadas: Geología, terráqueo, perfil del suelo...

- **LA PALABRA CIENTÍFICA PERDIDA:** Con esta estrategia se le presenta a los estudiantes un esquema que sintetiza la unidad estudiada y al cual le faltan una o más palabras clave. Los estudiantes deberán identificar dichas palabras para completar el esquema.



Estas sencillas estrategias son aplicables no solamente en la clase de ciencias sino en cualquier otra materia que conlleve la adquisición de un vocabulario especializado para tener éxito académico.



–continued from page 1–

After “Homework Buddies,” students completed a table quiz over the information from the lesson about identifying parts of prisms. Each table submits one paper for grading. Students are allowed to talk to their tablemates, but may not share information with others at different tables. Students then grade another table’s quiz and coach the other table to correct answers. The teacher does not provide an answer key for grading. Questions or discrepancies that arise will allow for whole class discussion about important content. Students record any clarification about the concepts in their class notes.

As an introduction to the new information for the day, students use images displayed on the Smartboard to develop lists of similarities and differences between prisms and cylinders. These lists are compared from table to table and the class develops one list of similarities and one list of differences. A class volunteer writes these lists on the Smartboard and they are added to each student’s class notes.

Each table then makes a triangular paper prism with a height of approximately 2.5 inches and a base that is an equilateral triangle with side lengths of 3 inches. This prism will only have one base so students can later fill it with rice. Students use their prior knowledge about triangles to make a pyramid with base lengths and height that are the same as the prism. The pyramid will have only lateral sides so that it can also be filled with rice.

Students then fill the pyramid with rice to determine its volume in relation to the volume of the prism. The students at each table should develop a ratio of the volume of the pyramid to the volume of the prism that is 1:3. Whole class

discussion will create a list of possible causes for students that came up with ratios different from 1:3.

Once students are done measuring with rice, the students will have “Table Talk” to write formal definitions and formulas for the volume of prisms and pyramids. “Table Talk” is an opportunity for students to brainstorm with the other students at their tables. No idea is seen as

unacceptable as long as it remains on topic. Each table records their brainstorming session. Each table will use “Table Talk” to brainstorm their ideas about volume of pyramids and prisms, surface area of these solids, and how cones and cylinders fit with their ideas about pyramids and prisms. A class volunteer records the results of the “Table Talk” and whole class discussion



Using a ruler and a pencil, LCHS geometry students measure and record the height of a cone in the process of determining its volume.

narrows the brainstorming ideas down to ones that can be used to find the volume and surface area of solids. These important ideas are recorded in each student’s class notes.

To end the lesson, students complete a table quiz to answer five questions about volume and surface area of prisms, pyramids, cylinders, and cones. Students grade another table’s quiz and coach the other table to reach correct answers. Questions and discrepancies are addressed in whole class discussion and students amend their notes for the day.

COMPONENTS OF SHELTERING

What makes this lesson a sheltered lesson? The use of components of sheltered instruction transform this lesson into a sheltered lesson. A description of the components of sheltered instruction which were integrated into this lesson follows.

–continued on page 11–

–continued from page 10–

ACTIVATE AND BUILD ON PRIOR KNOWLEDGE

During “Table Talk” and whole class discussion about solids, the teacher will interject with questions like “What do we know about pyramids?” and “How do we know what we know about pyramids?” These questions will help students who may not know a lot of math content about pyramids to bring their background knowledge to class. Maybe all a student knows about pyramids is that ancient Egyptians built some as tombs for pharaohs. These types of questions will give those students a chance to participate more in the activities.



In order to measure the volume of a pyramid, students work together to fill the model with rice.

SUPPORT MEANING WITH REALIA

Realia can be concrete objects that students can see or touch instead of abstract ideas that are presented to them. When students are making their own pyramids and prisms, the teacher will distribute miniature prisms and pyramids made from wood and plastic. These realia will help some students to make connections between the words we are using and the concepts we are learning. Students will also be exposed to realia through the use of the Smartboard images that are displayed.

MAKE TEXT ACCESSIBLE

The class notes that students develop and write by using the Smartboard will be modified and illustrated by the teacher during content summary. The Smartboard and software make it easy to use file clip art, photos, and teacher illustrations within class notes. Additionally, the teacher will print out the class notes (including illustrations) that are developed by the students. These can be distributed to students who require additional help in note-taking.

PEER INTERACTION AND COLLABORATION

This was the “meat” of the day’s lesson. Almost all activities were designed for peer interaction. Students collaborated during “Homework Buddies”, while answering questions on table quizzes, while coaching other tables to reach

correct answers, while constructing prisms and pyramids, and while developing and presenting class notes through “Table Talk.”

The sheltered strategies used in this lesson were very effective in my classroom. My classes scored an average of 88% on a formal quiz used to assess student learning on these math concepts. The class average on this quiz is several percentage points higher than my overall class average. These results tell me that most students learned these concepts, and minimal whole-class reteaching is required.

These results are encouraging, but I think the effectiveness of these strategies is really measured by the change in me as a teacher as opposed to just the scores my students earned on a quiz. Since using components of sheltered instruction in my daily lessons, I have been forced to think of ways to make sure that every student in my classroom is successful. Student interaction, emphasis on language, using prior knowledge and background knowledge, using different means of assessment, and using realia have all been strategies that have helped me to become a better teacher and in turn have helped my students be more effective learners of math.

Making more connections!

Coming Events

❖ **ANNUAL DUAL U SUMMER INSTITUTE (DUSI)**—Illinois Resource Center: June 14-18, 2010, in Santa Fe. DUSI is for all stakeholders who are developing and implementing dual language, two-way immersion programs. For information, visit www.thecenterweb.org/irc, or contact Karen Beeman at kbeeman@cntrmail.org or 224.366.8548.

❖ **LA COSECHA 2010, 15TH ANNUAL DUAL LANGUAGE CONFERENCE**—November 17-20, 2010, at the Sweeney Convention Center and La Fonda Hotel, Santa Fe, NM. La Cosecha brings together educators, parents, researchers, and the community in support of dual language enrichment education. For more information or to register on-line, visit the conference website, lacosecha.dlenm.org.

Programas para niños de 5 y 6 años de edad en el Museo "Explora", del 2 al 6 de agosto:



9 a.m. a 12 p.m.— *Pintado con la luz:*

Descubre cómo se comporta la luz con los líquidos, los prismas y los espejos y usa filtros para hacer luces de colores. También crea una pieza de arte similar a la del vitral mexicano.

1 p.m. a 4 p.m.— *iCreadores de músicas!*

Investiga cómo producen sus sonidos las diferentes familias de instrumentos. Compara esos sonidos y construye tus propios instrumentos para llevar a casa. Para inscribirse y obtener información, llame al 224-8323.

Cross Cultural Resource Library



Monday through Friday: 8:00-5:00
Closed daily for lunch: 1:00-1:30

LIBRARY SPECIALIST: Karen Hedstrom

Please call 880.8249, ext. 154, before making the trip to be sure the library is open.

FYI...

This final issue marks the end of 12 years of Language and Cultural Equity's quarterly publication, *Making Connections*. A very special thanks to Lynne Rosen for her guidance and commitment to *Making Connections*. Thanks also to the many outstanding educator/authors from Albuquerque Public Schools for their contributions over the years, to the readers who found professional community in *Making Connections*, to APS administrators for their encouragement, and of course, to APS GP & DS for their unflagging support and expert help.

We have been privileged to highlight some of the wonderful programs and practices in our schools. We hope that *Making Connections* has been a useful source of information for you—we have worked hard to provide a pertinent, professional, quality product. Issues of *Making Connections* will continue to be available in the archives at lcequity.com.

It's been a great run!

Department of Language and Cultural Equity
City Centre, 6400 Uptown NE, Suite 601 West, Albuquerque, NM 87110
Phone—505.881.9429; Fax—505.872.8859; Website—lcequity.com

Director: Lynne Rosen

ALS Instructional Managers:
Nana Almers, Luella Buchanan, Carmen Graham
and Sandra Rodríguez

Multicultural Education Coordinator:
Joycelyn Jackson

Translation and Interpretation Services Coordinators:
Tomás Butchart and Jason Yuen

Making Connections is a publication of the Department of Language and Cultural Equity, Albuquerque Public Schools; it is distributed to the Board of Education, district administrators and departments, and all schools. Please direct questions and comments to the editors:

Nancy Lawrence and Dee McMann, 881.9429.

Making Connections is printed by APS GP & DS. Special thanks for their expert help!