

Pre-Columbian Art, History and Culture for Our Youngest Students as They Learn Different Ways to Communicate through the Study of Mixtec Codices

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INTRODUCTION

Ever since I was a child, I have been interested in history. When looking back in time, I feel very lucky since I had very good history teachers in elementary, as well as, in secondary school. I think it is important to mention before I write any further that I was born and raised in Spain. I still remember how when I was in fifth or sixth grade we studied pre-Columbian history. I would rather say that we were briefly introduced to pre-Columbian cultures. Textbooks covered pre-Columbian history in a couple of units. I could not understand why textbooks made such a big deal about Christopher Columbus discovering America. The way textbooks used to talk about the discovery was as if we –the Spanish people – were doing a favor to the poor Indians who have lived there forever. Well, textbooks would say that there were advanced civilizations, such as Aztecs, Incas or Mayas, in America when Spaniards arrived there. We would learn about the solar calendar, about pyramids, about how the discoverers brought some Indians to amuse the queen and king, as well as some unknown foods, such as maize, cacao, potatoes, chilies... and gold, lots of gold to make such a long trip worthy. But I wondered if they were so advanced what was the point of the Spanish friars going so far away to indoctrinate these people. I guess it was at that point when I started considering whether every kid would study the same history. It did not make much sense that kids in America would learn history that way. It was most likely that the historical facts we were taught could not be relevant to American people. It was later when I learned that there are different perspectives in which we can tell history.

I sadly admit that was more or less my knowledge about pre-Columbian history, art and culture. However, we are a product of our circumstances, and I could not do anything to change mine at that time. I have always wanted to learn more about pre-Columbian civilizations, and I have tried to read as much on them as possible.

Some years later I had the great opportunity to come to Houston where I started working as a kindergarten teacher in a Dual Language Program. That was five years ago. This was a great but challenging experience in more ways than one. First, my previous teaching experience was as an English as a Second Language teacher. I used to teach teenagers and executives from different companies; however, in Houston I was to teach to five-year-olds how to read, write, and do math. I became a homeroom teacher while I was used to teaching for periods of an hour or an hour and a half to different groups. Secondly, the educational system in USA is rather different from the one I knew in Spain not only in terms of organization, but also in terms of the expectations we have for students. Living in Houston also gave me the opportunity of meeting many people from Latin American countries and, then, becoming good friends. They always tease me about my conqueror ancestors and ask for their gold back. Definitely there is another side of history other than the one I learned in Spain when I was in elementary school.

It was during my first year here in Houston that I encountered a bizarre situation when the Columbus Day celebration was getting closer and we would be talking about Christopher Columbus and his discovery of America. I knew that what I was taught in school was not going to

help me much. I could not approach Columbus' discovery in the same fashion as my old textbooks did. Columbus' discovery was most likely not relevant for my students. As a matter of fact, Columbus' story did not have a great effect on my kindergarten students. I still remember their faces as I was speaking about "Columbus' big discovery." As a teacher, I would like to reach the needs of my student, and I know it is most desirable to find a different approach to that celebration. Considering the origin of at least half of my students, they would get more involved in the learning of the history, art and culture of pre-Columbian people.

The HTI Seminar has offered me the great opportunity to learn more about pre-Columbian civilizations, and, therefore, I would like to use this to the advantage of my students. I must recognize that the HTI Open House was the first time I had ever heard of the Mixtec codices. The truth is that I did not even know about the Mixtec people; I used to think that the pre-Columbian people of Mexico were all Aztecs. The topic of the seminar was very appealing; however, how would I use those codices with my kindergarten students? When Professor Koontz presented the seminar, he made me realize that I could use the Mixtec codices for the benefit of my students. However, when I explained to people that I am a kindergarten teacher in a Dual Language Program, I can tell that they are wondering the same: "How are you going to use these Mixtec codices in your kindergarten class?" I positively know it is going to be a big challenge, but what life would be without challenges? After the seminar meetings I have become more confident in my knowledge of the pre-Columbian civilizations and I now consider myself ready to take the challenge of introducing my students to a new perspective of the pre-Columbian cultures.

I have always been willing to introduce my students to pre-Columbian culture, but, somehow, I did not feel able to do so due to my background. I would sometimes feel an outsider since I come from Spain and my ancestors were "responsible" for the spread of disease among the Indians, depriving these cultures of their traditions, stealing their gold and so on. When asked where I am from, I might get reactions like: "Oh, you come from the land of the 'conquistadores'..." The way this is said comes to confirm my outsider feelings. Somehow, I feel as if I am not the most suitable person to talk about pre-Columbian people. However, I now feel empowered to do so after this seminar. I really believe that all of my students would benefit from being exposed to the Mixtec codices. On the one hand, these Mixtec codices would show a different side of the Spanish-speaking students' heritage (most of my Spanish-speaking students come from Mexico) and I would like them to be proud of their history and their traditions. On the other hand, English-speaking students would be shown another aspect of the Latin American culture. It is amazing to observe the knowledge students have about Mexican culture. Despite being so close to Mexico, our students are usually exposed to the stereotypes of Mexican traditions. The reading of these codices would appeal to all of my students because of the colorful pictographs and because of all the other hands-on activities I am planning on integrating within this unit. The study of this unit will also help students obtain a deeper knowledge of pre-Columbian America and understand where some of Mexican traditions come from.

ACADEMIC BACKGROUND

This has been my fifth year teaching kindergarten in the Dual Language Program (Two-Way Bilingual Education) at Wharton Elementary School (HISD). For those who are not familiar with the program I would first like to introduce this program so you can better understand the needs of my students. Each year we receive around 50% of Spanish-speaking students and another 50% of English-speaking students. Our daily instruction in kindergarten is given 90% of the time in Spanish and 10% in English.

The distribution of languages for instruction varies across the grade levels in the 90:10 design. In the 90:10 model, at kindergarten and first grade, 90% of the instructional day is devoted to content instruction in the target language and 10% to English. Thus, all

content instruction occurs in the target language and English time is used to develop oral language proficiency. Reading instruction begins in the target language for both target-language-speaking and English-speaking students. At the second and third grade levels, students receive 80% of their day in the target language and 20% in English. Students begin formal English reading in third grade. By fourth and fifth grades (and sixth grade, if it is included at the elementary school site), the students' instructional time is balanced between English and the target language. (Lindholm and Molina 165)

Before we move forward it is important that we state the goals in the Two-way Bilingual program:

- 1) Students will develop high levels in their first language and in a *second* language,
- 2) Academic performance will be at or above grade level as measured in both languages,
- 3) Students will have high levels of psychosocial competence and positive cross-cultural attitudes. (Lindholm and Molina 164)

Lindholm and Molina further illustrate how “Two-way bilingual education is grounded in *language acquisition* research” (164).

All students in my kindergarten class will learn language arts, reading, writing, math, social studies and science in Spanish. I imagine you are already visualizing my kindergarten class at the very beginning of each school year. The truth is that establishing communication with English-speaking students at the beginning is hard and I need to use all sorts of elements to succeed in that process (picture cards, drawings, body language, the help of some valuable bilingual students that offer themselves as translators). I always tell my students that no matter the language each of us speak, we will find other ways to communicate. Therefore, when I saw the pictographs in the Mixtec codices, I immediately pictured the way I could use them with my students. Not only would the Mixtec codices help me show my students that there are different ways of communication other than words but also they would be helpful to introduce the heritage of some of my Spanish-speaking students.

This unit can also be integrated within the HISD CLEAR Curriculum for kindergarten, that my school district requires to teach, since it reaches several objectives in different subject areas: “sequence of events, acquiring information using a variety of oral/visual sources, generating ideas for writing by using prewriting techniques (drawing, key thoughts), identify similarities/differences among people, identify/compare customs/traditions of family and community, calendar, patterns, counting” (Kindergarten CLEAR 12-19). I will develop further when I unfold my lesson plans.

UNIT BACKGROUND

The intended length of this unit is a month. I will implement it mainly during my social studies time though it can also be extended to other times of the day since it applies different subject areas. Therefore, it will perfectly accommodate our school's interdisciplinary philosophy. I consider that mid September through mid October when the district celebrates the Hispanic Heritage Month will be the most suitable time to implement this unit. We can wrap up this unit talking about what happened to these civilizations after Christopher Columbus arrival.

Throughout this unit we will study the history, art and culture of the Indians who lived in Mexico when Spanish discoverers arrived there through the reading of the Zouche-Nuttall codex. It seems a pretty high-level objective for five-year-olds, but I think that they can acquire it through the reading of the Mixtec codices since these pictographs would make it more concrete for my students.

Learning about this topic is relevant to my students for many reasons. In my reading class, the one activity I always include is journal writing. After reading a story, my students have to draw and write about their favorite part, the characters, the setting, etc., of the story. I first model what I want them to do: I tell them about my favorite part of the story, explain why, draw about it, and then write briefly about what I drew. At the beginning of the school year, most students are trying to figure out the decoding and encoding process involved in reading and writing. We will focus on developing their decoding and encoding abilities in language arts. But still in the reading class we concentrate on developing different strategies to enhance their comprehension and find the meaning of the different texts. At the very beginning of the year I expect my students to be able to show me that they have understood the story we shared through their drawings. In spite of this, I keep in mind that there are “high-level thinking skills” involved in the reading process, and, therefore, there will be some students who need more help than others:

In fact, reading is often thought of as reasoning through print because it relies on “higher order” thinking skills that involve message interpretation, the association of print with past experience, and the construction of new meanings and relationships. (Pardo and Tinajero 44)

Despite all the modeling and the explaining of my expectations, still some of my students come to me saying that they cannot draw, much less write. My English-speaking students come stressed since they could not understand the story because they do not speak Spanish, and, therefore, they cannot draw or write about it. However, I always try to explain to them that even though they do not understand the words, they can look at the pictures and that will help them comprehend the story. At that point, I will show the illustrations of the story and allow them to tell me the story in their own words so that they feel more comfortable with the content of the story. After that they can draw something related to the story to show how much they have comprehended. How does this relate to the relevancy of the reading of the Mixtec codices by my students? Exposing my students to the Mixtec codices will give them the opportunity to understand that there are different ways of communication other than words, as well as, different stages in the writing process. As they can see with these codices, long time ago there were people who did not use written words but relied on pictures to record their history, genealogy, rituals and so on. On top of that, students would be developing other objectives such as generating ideas for writing using prewriting techniques. My students’ writing abilities will go through different stages; stages that can also be traced in the evolution of writing: “pictography (pictures as signs, logography (a sign stands for a word), syllabary (a sign stands for one or more syllables) and alphabet (a sign stands for one or more phonemes)” (Marcus 38) rephrasing Gelb.

The reading of the Mixtec codices will also enhance my students’ knowledge in other areas. Through the decoding of these codices, my students can develop different skills, such as mathematical skills as they learn about the Mesoamerican solar-lunar calendar, sequencing skills as they learn to organize the actions that take place in the codices, writing skills as they learn how to organize their thoughts to create our own codex, artistic skills as they model their own pots or design their own costumes, and social skills as they interact with their partners in the representation of a fragment of the codex. The deciphering of this codex will be an excellent learning experience for my students since it will give them the opportunity to explore pre-Columbian cultures.

Most definitely, this unit will cultivate my students’ personality. I truly believe that by exposing my students to these Mixtec codices, as well as, the Nahuatl idea of man and education, they will be better people since they will be developing other areas of their personality that we sometimes left unattended. While trying to have a better understanding of the Mixtec culture and traditions, I came across their image of man which I found very interesting. According to Miguel

León-Portilla, “‘Face and heart’, the Nahuatl image of the individual, appears to be equivalent of our own modern idea of personality” (León-Portilla 114).

It seems that the Nahuatl people believe man was born without a “face and heart” and he would acquire one through education. Miguel León-Portilla further explains that, “The Nahuatl idea of man, far from being narrow and limited, was open and broad. It made possible a system of education intended to give shape and meaning to the human face and to humanize the heart and will of man” (115).

I wish my students could grasp the importance of education in their own personal development. I would like to expose my students to the Nahuatl view of education. Miguel León-Portilla says, “From infancy, parental teaching at home revolved around the idea of strength and self-control” (135).

The next step in their education was sending their children to school. It is interesting to analyze the meaning of the two words Nahuas had for *education*: “the art of strengthening or bringing up men” and “the act of giving wisdom to the face” (León-Portilla 135).

OVERVIEW OF THE MIXTEC CODICES

At the time of the Spanish conquest, there were different groups inhabiting the Mesoamerican area. There were other cultures besides the Aztecs and the Mayas: “Zapotecs, Mixes, Mazatecs, Huaves, Chinantecs, Tlapanecs, Totonacs, Tarascans Otomis” (Spores 3). One of those groups was the Mixtecs:

Mixtec culture had spread over most of western Oaxaca from the valley of Oaxaca, the valley of Miahuatlán, and the Almoloyas-Sosola region on the east to beyond the Guerrero border on the west, the Pacific Ocean on the south, and to beyond the Puebla border on the north. The area of Mixtec culture has customarily been divided into three subregions: the Mixteca Baja in western and northwestern Oaxaca, the Mixteca Alta bordering the first-mentioned area to the east and south, and the Mixteca de la Costa comprising the southwestern coastal lowland of Oaxaca (Spores 4)

When Spanish people arrived, they found pictorial “manuscripts” recording “indigenous histories” (Boone 2). These manuscripts were of great value:

Indigenous leaders who commissioned and relied on these pictorial histories considered them just as valid and truthful after the conquest as before; and the Spanish authorities were quick to recognize the native histories as admissible evidence. (Boone 2)

There are some of these manuscripts or codices that survived: some were of genealogical-historical nature and others were ritual books.

The Mixtec codices we are about to study were pictographic books that “were employed by a multicultural royal class that dominated central and southern Mexico between 1200-1520. All of the codices prescribe the sacred feast and festivals that bound royal families together into systems of alliance and mutual obligation” (Pohl 1). “The books were made of animal hide covered with a gesso-like foundation upon which figures were painted” (Pohl 1). These codices would help Mixtec people record genealogical data. For a better understanding of the importance of these codices among the Indians the conquistadores found when they first arrived at America, we can read Miguel León-Portilla:

Immediately after the consolidation of the Aztec group through the victories of Itzcoatl (ruler of Mexico-Tenochtitlan 1427-40), it was ordered that the ancient codices containing historical accounts be burned. Itzcoatl wished to establish an official version of the history of the Aztecs, and the destruction of the books shows his sagacity. Realizing the importance of the historical records that assigned the Aztecs a secondary

role, he decided that they must be suppressed in order to lay the foundation for a new national pride. He then ordered that the Aztec version of the history be taught. And thus the wishes of the Mexican lords who had subdued Azcapotzalco were satisfied. (155)

There are several codices but we will concentrate on Codex Zouche-Nuttall. We know this codex as Zouche-Nuttall because this “manuscript was first brought to the attention of the scholars by Zelia Nuttall and the manuscript was owned by an Englishman known as Lord Zouche” (Miller vii). This codex tells us about the Mixtec ruler Lord 8 Deer “Jaguar Claw,” his genealogy, and his rise to power. I

I think it is important, at this point, to mention Lord 8 Deer’s biography since this will facilitate our reading of the codex later on:

Lord 8 Deer was born in the year 12 Reed, probably sometime after the middle of the eleventh century. Lord 8 Deer was the first son born of this father’s second marriage. Since the Mixtec practiced primogeniture, more importance would be given to the first son of the first marriage, Lord 12 Movement, who was eighteen years older than Lord 8 Deer.

At the age of seventeen, Lord 8 Deer began his political activities. Over a period of several years he held meetings, carried out rituals, and played the Mixtec ballgame (reportedly, against a supernatural). When he was twenty years old, he became the ruler of the coastal domain of Tututepec. He spent the next two years conquering a number of nearby sites to consolidate his position.

At thirty-four, he initiated the events that finally carried him to power. He opened negotiations with Lord 4 Jaguar, who had conquered the Coixtlahuaca area the previous year. Lord 4 Jaguar rebuffed these approaches, but Lord 8 Deer secured supernatural support, and the two men played the ballgame to decide the issue. Lord 8 Deer won and received from Lord 4 Jaguar the coveted ritual nose-perforation that raised his status to that of a great lord. The next year, the two men are said to have made a dangerous trip into the underworld realm of the solar supernatural to win predictions of their futures. Entering the underworld through a ballcourt, they crossed a raging river and battled against unnatural opponents.

The following year, Lord 12 Movement was murdered, and Lord 8 Deer held lavish funeral rites for him, Lord 8 Deer blamed this murder on the two sons of Lord 12 Movement’s sister. The next year, he captured them, but he waited another year before sacrificing them in bloody ceremonies. The next year, at age forty, he celebrated reaching the peak of his power. He then took as his official dynastic wife the sister of the two brothers he had sacrificed.

While Lord 8 Deer was concerned with these problems of dynastic succession, a young enemy was plotting against him. Lord 4 Wind was the half-brother of the two men sacrificed by Lord 8 Deer. He formed an alliance with Lord 8 Deer’s second wife. Lord 8 Deer was led into an ambush, and Lord 4 Wind looked on as he was killed (Troike 369).

These codices looked like books of “connected pages” that can “be stretched accordion-fashion to the shape of a long flat rectangle.” Each page “is divided into horizontal or vertical bands showing a series of figures accompanied by dates and symbols.” The pictures in the codices can be read “in a boustrophedon or back-and-forth pattern with red lines indicating the sequence” (Miller viii). So how do we read the codices? We start in the lower right hand corner, and we will keep reading in a serpent-like fashion with the help of red vertical lines.

IMPLEMENTATION

Before introducing the topic to my students, I will ask them what they know about Mexico, its traditions and its history. Since “learning only occurs when prior knowledge is accessed and linked to new information” (Bartolome 147), I will try to connect the reading of the Mixtec codices to my students’ prior knowledge:

Prior knowledge is stored in memory in the form of knowledge frameworks. New information is understood and stored by calling up the appropriate knowledge framework and integrating the new information. Acknowledging and utilizing existing student language and knowledge makes good pedagogical sense. (Bartolome 147)

After establishing my students’ prior knowledge, I will start presenting the Indians in place and time. We will first locate Mexico on the world map. Then we will work with a Mexican map where we can place the different Indians at the time of the Spanish invasion. Students can color Mexico on the world map, and after that they can mark down the Mixtec area in the Mexican map. I would also like my students to understand that these codices were produced a long time ago. I would use a timeline; however, time is a difficult concept for their age.

Reading the Nuttall Codex

Once we have situated the Mixtec people in place and time, I will present the codex to my students. Prior to the decoding of the codex I will observe how they react to it. It will surely set ground for an interesting discussion: if this is a book... where are the words?, do we need words to communicate a story?, where do we start reading?, how do we know the names of the characters?, how do we know what happens in the story?, what do you think that would be the advantages of having a book with no words?, and what were the codices used for?

After that, I will introduce the codices as if they were cartoons so that they will be more appealing to my students. Codices, as well as cartoons, narrate a story. Mixtec codices tell us about the history, culture and traditions of the Mixtec people who lived long ago. We will concentrate on the study of the *Codex Nuttall* that narrates Lord 8 Deer’s genealogy and his rise to power. So that my students get a clearer picture of his story, I will compare Lord 8 Deer to other heroes they might already be familiar with, such as Hercules, Spiderman or Tarzan. Once students have become comfortable with the pictures in the codex, I would like them to learn how to read it. Since these codices are pictographs (representational signs), all my students, no matter what their mother tongue, would be able to understand them. Since kids are very observant, I am quite confident in their ability to crack the code.

We will begin to read the codex on page 42. They need to start on the lower right hand corner. We would look for the red guiding lines to help us reading in a serpent-like fashion. Then student will look for the day signs. Starting to read from the right would surely shock most of my students since I keep telling them time over time that we always read from left to right. However, it might not be that shocking if there is any student coming from Arabic or Jewish background since they might be familiar with texts that are read and written from right to left.

The Mesoamerican Solar-Lunar Calendar

Before going any further in the reading of the codex, I will introduce my students to the Mesoamerican solar-lunar calendar so they can identify those signs that date the actions that take place in the codex. I do not expect my students to fully understand the Mixtec calendar, but I would like them to be able to spot the dates since it will help them better organize the actions. However, I would like to expose them to a calendar different from the one we use. We will learn about the length of the year (260 days), as well as, about “the combination of a series of thirteen numerical dots with a series of twenty day signs” (Pohl 6). Students need to recognize the day

signs easily since that will facilitate establishing when the actions occur, as well to identify the names of the different characters. The year sign is in an interlaced “A-O” sign. “Each year is then accompanied by one of the four year bearers” (Pohl 7). When counting the years, we also use the thirteen numerical dots. Years were bound into fifty-two year cycles. While we were in one of the seminar meetings, we discussed possible ways that would enable younger students to learn the calendar. We considered using paper plates and spinners. Calendar activities will be a good reinforcement of their counting abilities. We need to keep in mind that we are working with kindergarten students that might still not have their number concept well developed so we can work with one-to-one correspondence, matching the numerical dots with beans.

The Characters, Their Costumes, Their Actions and Places

Students will also need to identify the characters in the codices. The character or nature whether they are human or supernatural “was usually indicated through their physical features, costume or pose” (Boone 44). Students will be able to establish the person’s gender, rank, occupation, status, age, and ethnicity. Furthermore, most of the characters can be identified by their calendrical name. Mixtec people were usually given a name according to the day they were born “unless their birthday augury was so poor that the day keepers delayed their naming ceremony for a more auspicious day” (Boone 48). Students will have to decide whether the signs are day signs or character name signs that “appear as a date either attached to the individual by a line or unattached nearby” (Boone 48). It is, as well, interesting to observe the clothing of the characters in the codices since that will help us distinguish whether it is male or female:

Males usually wear their hair shoulder-length or shorter, usually with bangs. Men always wear loincloths, usually white, that are tied in the front and have panels hanging down.

Women wear their hair longer: down to the middle of the back when it hangs loose. Usually, however, women’s hair either is gathered in a low bun at the nape of the neck or is twisted or braided into two separate cords that are pulled from the nape of the neck around the sides of the head to the forehead where they are intertwined. Women always wear a long, ankle-length skirt, their bodices covered by a *huipil* (like a tunic, with closed sides under the arm or a *quechquemil* (like a poncho, open under the arms, sometimes with the points in the front and back).

Both males and females can wear earrings, necklaces, and nose ornaments, but only men wear lip plugs.

Both males and females can be shorn or barefoot, and both wear a vast array of headdresses. (Boone 44-45)

Their rank and the activity that character is carrying out...

Mixtec rulers are not usually distinguished from other lords, except that two Mixtec rulers, Lord 8 Deer and 4 Wind, went to great efforts to gain a Mexican symbol of office, the turquoise nose ornament that identified a lineage head, which they subsequently wore as a symbol of this rank.

Priests are identified in both Aztec and Mixtec codices by their costuming, accoutering, and body coloration. Specifically, priests wear a short fringed tunic, carry on their backs a distinctive gourd for holding tobacco, and usually have black skin (from applications of ashes); often they are marked as aged. A special type of priest, the sacrificer or *yahui*, appears in Mixtec codices configured as a fire serpent and turtle combination. (Boone 46)

People will appear in different poses illustrating different activities. Observing the poses of the characters will help students identify what they are. It is also important that students can comprehend the sequence of events.

We should also be able to set apart the places where the different actions occurred. We can spot whether the actions occur in a plain, a platform, a hill, a river, a temple, the cave or the ball court. Depending on the students' interests, we can do some research on the Mixtec houses to find out where these people lived. Rulers and lords lived in stone palaces while commoners lived in mud-brick huts.

Post-reading activities

After the reading of some fragments of the Nuttall codex, students will be engaged in a series of different activities.

We, as a class, will create our own codex, recreating the Mixtec style of folded books. We will tell our class history: how we met for the first time, what we did, or “funny” episodes of our daily life. Students, as well as teachers, will be identified by their calendrical names.

While researching about the Mixtec codices, I learned that the codices were also used as scripts for different celebrations:

They also served as scripts for the celebration and reenactment of historical events. A poet recited the text from the codex to musical accompaniment, while actors performed parts of the saga in costume. The setting for these literary and theatrical presentations was the royal feast. (Pohl 5)

Most students will find it entertaining to make a representation or role play. However, students will have to reach an agreement on whether they would like to make a short play of some fragments of their own codex or of the Nuttall codex.

While I was sharing my prospectus with my fellow partners, Mayra Muller-Schmidt suggested that it might be a good idea not only to perform a play but also to recreate one of the banquets in which the Mixtec royal people used to take part since that would give students an opportunity to learn about the Mixtec diet. The reenactment of one of the Mixtec banquets will be an excellent opportunity for students to learn about the kind of food they ate, their legends about the origin of maize, cacao, etc.

These royal feasts were usually accompanied by music. It would be interesting to investigate about the musical instruments they had and the kind of music they played since that way we would involve those students who are musically talented. It is most likely that Mixtec people played bone and clay flutes, conch shells, wooden whistles, deer or snake skin drums, rasps and rattles. Students can create their own instruments to accompany the representation.

No matter whether students decide on a play following the Nuttall codex or their own codex or we decide on a recreation of the Mixtec banquets, students will need costumes. Students will develop their artistic skills when designing their costumes in the Mixtec style (headdresses and capes painted with figures of different characters or patterns). Depending on the observation skills of our students, we can decide on whether to analyze the costumes as you read along the codex or not. At that point, we can ask our students if they have noticed any difference in the costumes of the characters. After that we can write down the information they give us on a matrix. When trying to find out more about their costumes, I came across some interesting material about weaving. Therefore, I decided that it will be interesting to include some weaving activity into our unit. I also found about the different ways in which they would use different kinds of feathers. It is also pretty amazing how they used the different dyes and pigments as coloring agents.

During those royal feasts where representations would take place, Mixtec people would eat and drink from polychrome pottery decorated with scenes from the codices. Students will probably enjoy modeling in clay some pottery and decorating it with drawings from the codex or some Mixtec-looking patterns, like the day signs.

As we read through the codex, we will find times when the different characters meet at a ball court. It will most likely catch students' interest; they might want to know what kind of ball game Mixtec played: how did they play it and why did they play it? Some students might be interested in playing the game. However, it might surprise them to learn that the ball game was not played as a form of entertainment but, instead, has religious meaning.

LESSON PLANS

Lesson One: The Solar Calendar

Understanding the solar calendar can play a big role in the deciphering of the Mixtec codices, that is why I believe it should be the focus of one lesson by itself. I want my students to understand that the calendar is “the combination of a series of thirteen numerical dots with a series of twenty day signs” (Pohl 6). The year sign is in an interlaced “A-O” sign. Each year is then accompanied by one of the four year bearers. When counting the years, we also use the thirteen numerical dots. Years were bound into fifty-two year cycles. Students need to become familiar with all these new signs so that when they are reading the codex, they will be able to identify each of the day signs. We can make a matching game in which students will be given two sets of the day signs, and they will color and cut and then mix the two sets together. Then they will be ready to play the matching game; they will have to look for the matching pairs developing visual discrimination skills. They can play the game individually or in pairs. By doing so, not only would they become familiar with the day signs but also they will be developing one-to-one correspondence, which is an important math objective for kindergarten students.

Now that they have become comfortable with the day signs, they need to understand the combination of the day sign with a series of thirteen numerical dots. I will first show them an example of a combination of a day sign, for example: day 4 Eagle. Then students would read other combinations. Depending on the counting abilities of students, they match up the dots with beans. (Some students might have not developed the number concept; having a concrete object to match with the dots might help them count.)

Once they have understood this combination, we will study how the calendar functioned. As I previously stated, when we were discussing this in one of the seminar meetings, we considered having students make two spinners on paper plates: one for the day signs and another for the numerical dots. But when trying to build those spinners, I started picturing my students early in the year cutting and pasting the day signs and the dots and making a mess, so I discarded this idea. However, that idea might work for students who have their cutting skills well-developed as is expected for kindergarten students by the end of the year.

I kept thinking of different ways in which my students could build a model that would help them understand the combination of day signs and numerical dots. Finally, I found a way that, I think, will work for my kindergarten students. Each student will have half a sentence strip with two sets of parallel slits to slide the numerical dots card and the day-signs cards that they had previously colored. Every day at calendar time, students will manipulate the model to get additional practice. They will move forward each of the cards in the parallel slits. This model will work like a digital clock. Students will have the opportunity to compare the Mesoamerican solar-lunar calendar to the one we currently use.

Lesson Two: Creation of Our Own Codex

When I was thinking on the writing of a codex, I faced the option of creating a class codex or having students in pairs or groups creating each a different codex. I had to consider the pros and cons of each of the options. Finally, I determined that a teacher-directed class codex will be the best choice for my kindergarten class. Having different groups creating different codices will

give us the chance to compare the perspectives each of the groups have about what happens in our class. That might be a good choice for upper grades.

First, I will introduce this activity to students by reconnecting with the comparison of Mixtec codices to cartoons. We will be creating our own class codex, our own cartoon. Students will have to agree on whether they want their codex to have captions as cartoons have or whether they would prefer the Mixtec style. Then students will be given time to think about things that happened in our class that they would like to narrate in the codex.

The creation of a class codex will give us the opportunity to use a series of pre-writing techniques that is one of the language arts objectives in HISD. Before we start working on the drawing of our codex, we will need to generate the ideas that will eventually appear in the codex. Students will be set in groups so that they discuss ideas and then they will be asked to share them with the teacher and the rest of students. Each group will choose a speaker to share their thoughts. As the students share the results of their discussion, the teacher will write down their ideas generating a list, simple webs or graphic organizers. Then we, as a class, will have to decide on the events and symbols we want to include in our codex.

Once we have agreed on the actions we will narrate in our codex, we will start working on the identification of the characters. Students will most likely remember that the characters in the Nuttall codex were given their name according to their birthday, and so will they. We will find which would have been their names if they had been born in Lord 8 Deer's time. That will be their name in the codex. Each student will be identified according to their day-sign name, and they can also design a headdress that will help to identify them easier.

Now it is time to start working on the codex. We will need chart paper. Each of the pieces of chart paper will be joined together once we finish the drawing and coloring of the pictures and then folded imitating the Mixtec codices. We will recreate the Mixtec style: we will start drawing at the bottom right of the paper and keep sequencing our designs in serpent-like style. At this point, I will start working with small groups in the design of the codex while the other students are working independently in centers.

The final product can be exposed outside the classroom. Students can also decide on sharing the final product with other classes. Therefore, teacher can arrange a visit to another class where students can explain their work: their names, the actions that were taking place... this will be my students another opportunity to develop oral language and feel more confident when speaking in public. For those students who are less confident, they can practice in their class before hand.

Lesson Three: Costume Design

This lesson will concentrate on developing the artistic side of our students. After having read the Nuttall codex and having created our own class codex, students have most likely captured the Mixtec style. However, since their kindergarteners we will revisit the codex and analyze the characters' costumes and hair, headdresses, necklaces, earrings, and nose ornaments. As we analyze their costumes, we will write down that information in a matrix. This, in kindergarten, will be a class activity. However, in higher grades, it can be a paired or group activity.

Due to time and availability of materials, we will concentrate on the design of headdresses, earrings, necklaces, and masks. Students will be asked to design some of these adornments that they will later use in a role play. They can either be inspired by their favorite character in the Nuttall codex or by their day-sign name in the class codex.

For the next part of this lesson, I will ask for the help of some parents since I would like to divide the class in smaller groups so that they can create their own "costumes." We will set different tables as stations with all the materials needed: paper plates, paper bags, construction

paper, feathers, glitter, tissue paper, yarn, and beads. Each table will as a workshop on how to do: headdresses, earrings, necklaces, and mask. Before students move to the different tables, I will show them some already-made products so they know what are my expectations. These products are not meant to be samples or ways to restrict their creativity. On the contrary, I would like my students to express their creativity through these designs.

CONCLUSION

As I was researching for the writing of curriculum unit, I came across very interesting aspects of the Mixtec culture that inspired me into different activities that I can use with my students. However, I am realistic about availability of time and resources. Therefore, I will concentrate on those activities that I have described on my lesson plans, and if I have any extra time, I will implement some other activities which I have mentioned throughout my unit. If I am able to develop any of those activities, I will choose according to the interests of most of my students.

The reading of the Mixtec codex was my starting point; this case study will lead my students to learn more about Mexican culture and traditions. I would like my Spanish-speaking students to feel proud of their traditions and my English-speakers to learn to value the richness of other cultures. My main goal with this curriculum unit is to promote the multicultural awareness and respect among my students.

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