Hispanic Artist Inspired Self-Portraits
Andrea Barrett, Art, High Tech Middle

High Tech Middle’s art class celebrated Hispanic Heritage Month by researching the lives and work of several Hispanic Artists. Students worked in groups of four to create biographical presentations on their chosen artist and individually created self-portraits inspired by the work of their artist. The artists represented a range of countries and artistic styles: Columbian artist Fernando Botero; Mexican artists, Rodolfo Morales, Frida Kahlo, and Diego Rivera; Chilean artist, Roberto Matta; Spanish artists, Pablo Picasso, Joan Miro, and Salvador Dali; and Puerto Rican artists, Francisco Oller, and Jose F. Rios. Students presented their biographies and paintings to the class on October 15 to commemorate the final day of Hispanic Heritage month.

Teacher Reflection
I have been doing this project in my art class for three years. It is one of my favorite projects because there are a variety of components—research, a self-portrait, and an oral presentation—and all students have the opportunity to succeed. I enjoy watching the students researching the lives and artwork of their chosen artist. I love to see the expressions on their faces when they see their first Salvador Dali painting or when they first read the biography of Frida Kahlo. They get so excited to share this new information with any one that will listen. I am also amazed every year at the quality of their self-portraits. They really get to know the style of their artist and do a wonderful job of making successful portraits inspired by their work. The real satisfaction comes at the end of the project. Students present their biographies, portraits, and artist statements with confidence and pride. I am currently looking for a gallery to show the final portraits and artist statements from this semester. I find myself more and more impressed by this project each year.

Artwork on the cover and corresponding Hispanic artist, clockwise from the top, provided by: Sianni Rosenstock & Quinn Butterfield (Rodolfo Morales), Anastasia Ovanessoff (Frida Kahlo), Luis Morales (Rodolfo Morales), & Lexus Jackson (Diego Rivera).

To learn more about this project and others visit the HTH Digital Commons and Andrea Barrett’s digital portfolio at http://www.hightechhigh.org/dc/ and http://staff.hightechhigh.org/~abarrett/
For this Un-Birthday project, each student spent one week studying an artist whose work has influenced contemporary art. Artists varied by gender, culture, time period, political views, artistic medium and content. Students then paid homage to their artist by creating an Un-Birthday present and accompanying gift box. The gifts were displayed at an Artist Happy Un-Birthday Party on exhibition night, complete with a birthday cake and decorations. The event was a cacophony of color, paint, and imagination that paid tribute both to Judy Chicago’s famous “Dinner Party” art piece and to Lewis Carroll's Mad Hatter’s Tea Party in *Alice in Wonderland*.

**Teacher Reflection**

Choosing the gift was perhaps the most important and difficult part of the project for the students, as they were asked to distill what they had learned about their artist into a single object. The students loved the idea of presenting their projects on exhibition night to a public audience. This added another layer of meaning to the work and encouraged even further reflection and refinement of the projects.

**Student Reflection**

I chose Edgar Degas because I am very fond of his art, and particularly the pastel drawings of ballet dancers. On the top of the box, I placed a cutout of his self-portrait. On the back of the cutout head is his name and a copy of his very first sketch of a ballet dancer. I then painted the sides of the box the color of his skin. On the body of the box I put a leotard and a tutu that I made to fit the box, which represented what he loved to draw and paint: ballerinas. On the four sides around the box, I re-created four of his paintings. Inside the box for the present, I placed something very valuable to me, and something that I knew Edgar Degas would enjoy drawing: my first pair of Pointe shoes. In the end, I learned a lot, not only about Edgar Degas, but also about what “creativity and imagination” looks like when it transforms from an idea to an art form.

—Amanda Snyder, 10th grade

To learn more about this project and others visit the HTH Digital Commons and Tara Giannini’s digital portfolio at [http://www.hightechhigh.org/dc/](http://www.hightechhigh.org/dc/) and [http://staff.hthcv.hightechhigh.org/~tgiannini/](http://staff.hthcv.hightechhigh.org/~tgiannini/)
In this project, students investigated biomimicry—the quest for solutions to human problems by mimicking processes in nature—through a scientific and cultural lens. They researched existing examples of biomimicry, such as scientists learning from spider webs how to create material strong enough for bulletproof vests, and using models of bats’ echolocation in darkness to develop a “smart” cane for the visually impaired. They also researched an indigenous culture and used concepts from biomimicry to design an innovation that addressed a need within that culture. Each student created an interactive display addressing the physics concepts involved in their innovation, as well as a fable that suggested solutions to cultural sustainability issues through the use of their innovation. The fables were shared at exhibition, published in a book, and sold to raise money for people from indigenous regions around the world.

Essential Questions
How can humans overcome problems through the use of innovations in biomimicry?
How can biomimicry enhance the sustainability of indigenous cultures?

Teacher Reflection
This project encouraged students to be innovative thinkers. They collaborated with adult researchers on ideas that could be used in the field of science and educated the public through television appearances and community exhibitions. The project challenged students to think from an interdisciplinary perspective and reminded us, as teachers, about the natural connections between our disciplines. The content we asked our students to master was difficult, and they rose to the occasion, developing innovations they were proud to present to the community.

—Jenny Pieratt

Student Reflection
Now that I look back on the exhibition of our work, I see many positive things that came out of it. We worked on it in both classes and our entire team was able to work side by side to put forth a great effort. I got to talk to and meet new people at the exhibition, while sharing my fable and innovation of a skate shoe that emulates a kangaroo’s jump. I feel proud of the work I accomplished, and the exhibition was a grand success.

—David Phillips, 9th grade

To learn more about this project and others visit the HTH Digital Commons and Matt Leader’s and Jenny Pieratt’s digital portfolios at
http://www.hightechhigh.org/dc/
http://staff.hthnc.hightechhigh.org/~mleader and http://staff.hthnc.hightechhigh.org/~jpieratt
The Creative Masters (Los Maestros Creativos) Project
Tom Gaines, Spanish, High Tech High North County

In The Creative Masters Project, students select a creative Spanish-speaker from any walk of life. They research the cultural and historical forces that shaped the Master and his/her work. Then they re-create or re-express the work in their own way—creative writing, spoken word, digital presentation, sculpture, etc. A written reflection accompanies the project as well, all in the target language: Español.

Teacher Reflection
The Creative Masters project exceeded my expectations. The students’ passion for the work, diversity of products, and heartfelt reflections truly shined. This project reminded me why I teach. When students are given the opportunity to express themselves uniquely, they can fly—and these kids soared.

Student Reflections
John Singer Sargent is a great artist. He gives his work feeling and liveliness. He thought that the dancer was not his best work and the world never saw it until 1985, when it was found 55 years after his death. But the dancer has a certain feel to her. She wasn’t meant to be beautiful and her dance wasn’t meant to be elegant. Her dress flows with her every move, her arms move separately from her body, she’s not smiling nor is she frowning. I chose to re-express “The Spanish Dancer” by re-creating the painting in Prismacolor colored pencils.

-James Zvetina, 9th Grade

This was a creatively complex project. I wanted to choose a sculptor from the very beginning because I had some clay at home that I hadn’t managed to use. I had never created a sculpture before, so I thought that it would be a fun new experience. I also created a PowerPoint for my presentation, a poem, and made a collage in PhotoShop.

This was one of my favorite projects so far in Spanish. I liked that I could present what I felt in many forms of art, with people understanding and feeling what I was trying to portray to them. I also felt that this project taught me about the Spanish culture while I still enjoyed doing something that I liked.

—Angelica Orlova, 9th grade

To learn more about this project and others visit the HTH Digital Commons and Tom Gaines’s digital portfolio at http://www.hightechhigh.org/dc/ and http://staff.hthnc.hightechhigh.org/~tgaines/
Students analyzed numerous short stories with attention to tone, mood, structure and other literary elements. Each student chose one author whose work they examined closely. They then wrote a short story emulating at least three specific literary elements characteristic of their author. They also created an original art piece inspired by a particular fictional work of that author. Students exhibited their artwork, along with nameplates that explained the connection of their visual to the work of fiction on which it was based. Their stories were professionally published in a student-edited class anthology.

Teacher Reflection
This is one of my favorite projects because it provides students with the opportunity to express themselves creatively and allows for student choice, which I find motivates students to do their best. Past students often tell me that they really enjoyed the project and that they now look at literature with a different perspective. They tell me they notice particular authors’ characteristics and recognize “bad” writing. This project teaches them how to be thoughtful critics and good writers, but also how to enjoy literature at a deeper level.

Student Reflections
Doing this project made me realize how different styles of writing are, and that each author has a unique style. I chose to emulate Bryce Courtenay’s style of writing in *The Power of One* and this helped me understand why someone would write a dialogue-based story. Like Courtenay, I used a lot of dialogue and inspiring lines, but I added my own touch to it. That’s how I learned to make my own writing distinctive and unique.

—Faith Bentley, 10th grade

My artwork was inspired by the short story “Who’s Irish?” by Gish Jen. In the story, a grandmother from China comes to visit her daughter in America and discovers that some things are done differently in America. I tried to capture the underlining theme of unity despite difference in Jen’s story by unifying 130 smaller pictures into an overall picture using a program called AndreaMosaic. Seen from a distance, my piece has the appearance of two hands shaking in agreement and wearing the Chinese and American flags. The multiple smaller pictures represent specific aspects of Chinese or American culture that set the cultures apart from each other and make them each unique.

—Katie Ho, 10th grade

To learn more about this project and others visit the HTH Digital Commons and Jen Peterson’s digital portfolio at http://www.hightechhigh.org/dc/ and http://hthidps.hightechhigh.org/~jpeterson/
Calculicious
Jeff Robin, Art, High Tech High
Andrew Gloag, Math, High Tech High

Calculicious was a cross-curricular project between art teacher Jeff Robin and math teacher Andrew Gloag. The students designed art pieces that reflected various calculus concepts that they learned in class. Their paintings, along with their critiques of each other’s work, were published in a full-color book available at http://www.blurb.com/bookstore/detail/675796.

Student Reflection
The Marquardt Decagon Mask is a facial map based on the Golden Ratio [1.618 (phi) to 1]. The ratio has been found to determine human attractiveness based on the placement and proportion of facial characteristics. Initially, the mask alone was the sole element of my acrylic painting design. However, after a meeting with Jeff and some edits, the direct application of the mask to a human face seemed to be a better exercise of the mathematical concept itself. After finding a nice portrait of a profoundly handsome actor named Marty Feldman, I decided to apply the mask to his face in my painting.

Outlining and painting small spaces carefully proved to be difficult but important because those fine details composed parts of Marty’s face as a whole. I had to remain very aware of lines and borders to keep the face legible. Next, I created the actual Decagon Mask with red yarn to show both consistencies and inconsistencies.

—Ana Vargas, 12th grade

Student Critiques
Your painting was really different from the majority of peoples’ in that you drew a distinct person as opposed to shapes, and you used string to display your math as opposed to painting it on. You might want to explain how you made these decisions. Just out of my own curiosity and to show contrast, you could mention someone whose face does fit the decagon mask.

—Emily Burns, 12th grade

I agree that Marty Feldman is profoundly attractive. I don’t think you do him justice…I offer the same advice that you offered me: What did you struggle with? I know the math gave you a hard time, and I think you should explain that in your text. Everything seems effortless, and I think people might like it more if they heard about your struggles.

—Kristen Colley, 12th grade

To learn more about this project and others visit the HTH Digital Commons and Jeff Robin’s digital portfolio at http://www.hightechhigh.org/dc/ and http://staff.hightechhigh.org/~jrobin/
Students worked individually on an integrated project exploring the essential question, *How does the character of an individual or a society change following a time of conflict?* Inspired by 20th century art and political movements, students explored aspects of their own experiences by writing poetry and developing an original manifesto in the form of a chapbook—a pocket-sized booklet popular from the 16th through the 19th century. In chemistry they used stoichiometric calculations to make the raw materials for various paints, which they then used to create paintings that became the covers for their manifestos.

**Teacher Reflections**

Students learned to apply stoichiometric calculations, but the artistic component was equally important for kids to feel comfortable expressing themselves. Since mathematics and science are collective as well as individual endeavors, students worked on problems together, presenting multiple solutions and justifying individual solutions. They learned to make mistakes in front of their peers, yet also respectfully point out mistakes to others.

—Anne Duffy

It was memorable to watch students inscribe their chapbooks to family and friends after the public reading. They sat silently for minutes before putting pen to paper, thinking of the perfect words to write, showing they had taken ownership of their work. The revision process was critical to the project. We encouraged students to settle for nothing less than their best work.

—Manuel Paul Lopez

**Student Reflection**

The project was an eye-opening experience and helped me discover new things about myself. Before, I was not one who would generally write poems—now I do. I learned that poetry is a helpful way to express oneself. I had a difficult year, and the challenges and obstacles I have faced went beyond what I should wear and how I should look. Family issues made me re-evaluate my situation. This challenge is one I no longer have to face alone. Through writing poetry I learned to open myself up to others. Reading our peers’ poems, and how they expressed their truths, brought us closer as a team. I am proud of my work and of my peers.

—Alyee Camacho, 10th grade

To learn more about this project and others visit the HTH Digital Commons and Anne Duffy’s and Paul Lopez’s digital portfolios at

http://www.hightechhigh.org/dc/

http://staff.hightechhigh.org/~aduffy and http://staff.hightechhigh.org/~plopez
What is urban ecology? How can humans create sustainable and efficient modern urban ecosystems? Students explored how humans interact with nature in urban ecosystems, applying concepts of sustainability and efficiency to design improved modern cities. They researched green building techniques, transportation options and alternative energies. In both their science and Humanities classes, they wrote articles and created original illustrations to explain their chosen topics. After a series of peer critiques, the articles were published in an Urban Ecology magazine that we sold at our school’s annual Exhibition Night. We sold over 70 issues that evening, and orders are still coming in.

Teacher Reflections

What struck me from the outset was that the subject matter was very adult. Initially it was difficult to get 6th graders to care about “green” design. Once we got underway, the best part was seeing the students getting excited, creating their artwork and laboring to make their articles perfect for the magazine. Towards the end, our classroom literally turned into a magazine workroom. Bobby and I were editing, and the students were scurrying around scanning artwork, helping each other edit, working in Adobe Indesign, creating models of their topics and perfecting their layouts. It was an incredible vision of controlled chaos.

—Nicole Costa

I was amazed at how 6th graders grasped high-level concepts about ecologically sustainable building technologies. Not only did they become experts on their topics, but they convincingly debated the pros and cons with adult guests on Exhibition Night when we premiered the magazine. The repeated comment that I heard from adults was, “I can’t believe this was created by kids!” I think the authentic, purposeful nature of the project helped students step up to the challenge of learning about advanced topics such as hydrogen fuel cells and solar thermal technology. My favorite part was teaching the students about page layout and design for the magazine, where I could bring my skills as a graphic designer into the classroom. We used real-world models (a collection of science magazines) to help our students generate expectations and high standards for their graphics, illustrations and writing. Multiple peer critiques helped us create a polished product and facilitated student-centered learning throughout the project.

—Bobby Shaddox

To learn more about this project and others visit the HTH Digital Commons and Bobby Shaddox’s and Nicole Costa’s digital portfolios at http://www.hightechhigh.org/dc/ http://staff.hightechhigh.org/~ncosta and http://staff.hightechhigh.org/~bshaddox
The Graphic Novel Project
Patrick Yurick, Multimedia, High Tech High Chula Vista

The HTH Graphic Novel Project, based at High Tech High Chula Vista, aims to instruct high school students in professional standards of graphic novel/comic book design and execution while simultaneously researching local causes and topics, telling their stories, and using comic sales to benefit the selected cause.

The project is an after school program and participation is completely reliant on its volunteer members. Since the inception of the HTH Graphic Novel Project, 19 students have worked together to create a completed comic book entitled “La Sombra De America” (The Shadow of America) that showcased student research on the escalating violence in Tijuana, Mexico. The project is continuing in the 2009-2010 school year with a new service learning topic centered on teenage dropout rates in California.

Teacher Reflection
It has been my pleasure to discover a group of talented and like-minded comic enthusiasts who were desperately searching for a venue to express themselves. Being a part of the HTH Graphic Novel Project has influenced every part of my teaching and has heightened my senses as an instructor. There are no grades in the project, so students are driven solely by self-motivation and discovery. To inspire student ownership and self-motivation, I have had to develop clear and attainable objectives, design work and challenges that could be completely owned by the students, and force myself to trust the creative instincts of students even when I did not fully understand them. There is no question that magic occurs in this project, but there is a constant question of how that magic works and how it can be replicated.

Student Reflection
At the start of the program, our group of about 15 students sat in a circle and decided on which jobs we would each like to pursue. The group needed a leader, and I was considered for the part. Up until that point, I had never been chosen to be a candidate for a leader because I was usually quiet. As the production manager, I assumed a great deal of responsibility over the course of the program, which gave me a chance to break out of my shell and show my true skin.

—Evan Berg, 10th grade

To learn more about this project and others visit the HTH Digital Commons and Patrick Yurick's digital portfolio at http://www.hightechhigh.org/ and http://staff.hthcv.hightechhigh.org/~pyurick/