Generating STEAM: Art and technology combine in ArtsWestchester exhibit

BY DEBRA BANERJEE

Bring your curiosity with you to the ArtWestchester "STEAM" exhibit at Arts Exchange Gallery in White Plains. You'll need it — and time to understand, absorb and engage with the installations.

The title "STEAM" is derived from the acronym STEM, meaning an educational core curriculum of science, technology, engineering and math, with an "A" added for arts. Through 45 thought-provoking works, the 31 artists of varied and distinguished backgrounds explore how the disciplines intersect.

Since the development of the personal computer, the role of technology in our lives has grown exponentially. It's hard to even fathom what the future holds. The thought processes behind the works in the installation may be outside the box, but the artists who tinker with STEAM concepts have the imagination to dream the possibilities and explore notions that for many of us seem beyond the realm of art.

Westchester Community College Center for the Digital Arts in Peekskill, which is celebrating 20 years and is committed to providing access to art technology education, partnered with ArtWestchester to mount the exhibit. Four of the artists teach at WCC. Lead sponsor is Reprogen Pharmaceuticals, a biopharmaceutical company in Tarrytown.

In the catalog curator Patricia Miranda described the artists: "Presenting imaginative possibilities that are poetic and pragmatic, aesthetic and forward-thinking, each artist brings a reflective and often transformative perspective to our complex world through questioning language of art."

Miranda herself is a member of the Maker's Movement, described as a subculture of independent inventors, designers and engineers interested in learning in a hands-on way.

The exhibit is presented thematically in categories defined as scientific, technological, environmental and poetic. The artists in the first category take science out of the lab and bring it into the gallery. Evan Read, a geneticist who works for the Metropolitan Museum of Art in the conservation department, translates images of the subatomic into colorful digital abstractions in his series of Ultrachrome inkjet prints on paper.

Rebecca Kamen, who also uses art and creativity to enhance the understanding of science, created a sculptural installation of mylar and fiber glass rods in a piece titled "Divining Nature: An Elemental Garden." The piece is inspired by the geometry and atomic number of 83 naturally occurring elements in the periodic table, interpreting patterns observed at the atomic level. The design was inspired by a Buddhist mandala as well as the Fibonacci Spiral. The artist hopes physical manifestation of the symbolic scientific image will engage the viewer.

Artists Kristen Anderson and Kathy High use human tissue and blood in their "bio art." Anderson's "Vividication/Excise," made of glass, acrylic resin, a metal rod and DNA, puts predisposition to certain behaviors on display. The artist asks viewers to think about how we become who we are and whether genes are to blame for everything. Anderson's "God," comprised of a glass slide, acrylic and DNA, exhibits DNA for the part of the brain linked to spiritual experiences.

High's "Blood Wars" using video, wood and Plexiglass and glass globes in a visually interesting display looks at the biological reaction of competing white blood cells. According to the installation description, the piece is designed as a series of World Club tournament playoffs; the cellular "winner" of each round goes on to fight another participant. The artist calls into question whether there is superiority in a blood line. In the technological arena, the artists question perceptions of reality in the face of new technologies.

Clara Jacquey's "Mixing Realities," a mixed media interactive installation of wood, acrylic mirrors, screen, computer and camera, is like going through funhouse mirrors. The installation creates a sense of immersion by creating images with the body and movement, real and virtual environments and asks, what's real, what's new and what's our role?

The installation calls to mind, on some levels, the Metropolitan Museum's current Rodin Garden commission by Dan Graham with Günther Vogt. The stars to the upper gallery at the Arts Exchange were transformed by Chris Kaczmarek's interactive mixed media "Stairs," where each step on the 11 treads of the stairs is rigged to a microprocessor generating computer piano sounds. The artist blurs the line between the inventor and the viewer.

In the environmental category, Deborah Krieman's interactive "Headlights" uses digital media to create an "immersive" environment of a deer in the headlights scenario, manipulating sensory experiences and eliciting an emotional response in the viewer.

In the poetic realm, the artists reference the human element in relation to technology. Debra Pearlman's "Mill Kitchen" with images of brass printed on silk, is a commentary on the mechanization of the birth process and how technology is changing how tradition is changing.

Rebecca Minniwake's interactive "Story Quilt" uses sound to create a digital quilt design program. An old-fashioned sewing machine is used to pick up voices that project images that form the quilt on the wall.

Michalis Mitsakos' "Petri Series: Benzene" requires the viewer to pollinate a bill, which powers LED lights on beautiful petri dish images of cancer seen from under a microscope. The steel sculptures that form the dishes are in the form of benzene molecules that look like a garden of flowers. The artist combines the sciences to create a collision of the beautiful and the harmful.

The "STEAM" exhibit highlights awareness that technology is fast moving. It's better to join the conversation than be left behind.

The exhibit is on at 31 Manurenock Ave, White Plains, through Aug. 16. For more information, http://arts.org/steam.

"Divining Nature," mylar, fiberglass rods, 2008, Rebecca Kamen

"CR1 No. 1" (Space is the Place) Ultrachrome inkjet print on paper, mounted on Dr. Bond, 2010, Evan Read

Design/tech program for teens at PGT

The Play Group Theatre in White Plains is launching a new summer program for kids ages 14 and up who are interested in experiencing the backstage world of theater. The Design Tech Track program offers hands-on study of scenic, costume, lighting and audio design. For three of six six this summer, participants will study the art of technical theater with The Play Group Theatre’s professionals. The program will culminate with a MainStage production in PGT’s 225-seat state-of-the-art theater complex.

Students will be introduced to the basics of set design and construction, costume, prop making and technical theater, including sound and lighting. Students will work with PGT’s professional designers and technicians, moving through the design phase and into the execution of some of the production work for PGT’s MainStage summer show.

Working alongside the cast of a PGT MainStage show during tech week and performances, members of the Design Tech program will have the opportunity to serve in key roles such as light board operator, sound effects operator, dresser, running crew or stage manager.

The program begins Monday, July 7 and culminates with the performance on Friday, Aug. 15. Participants meet at 9 a.m. Monday-Friday from 8:30 a.m. to 4 p.m. and participate in all classes. Tuition includes trips and special events. Under the mentorship of PGT designers, students will design and build at least one hour each day to an independent project such as creating a set model and lighting plot for a play of their choosing.

Design tech offers a unique opportunity to kids. "So many kids want to learn the technical skills involved with stage production, and be part of the magic that happens backstage. This program will introduce them to a variety of disciplines and allow them to immerse themselves in their chosen field. Taking classes in an important component of the program — customers understand how to design costumes for the actor when they know how the actor moves, set designers understand how to structure the space on a stage when they understand what motivates a scene.”

The Play Group Theatre offers a range of summer arts programs for kids and teens. Other programs include the six-week MainStage performing program, which runs the two six-week Teen Conservatory sessions (ages 14-17), three-week Young Actors Ensemble sessions (ages 11-13), three-week PGT Kids (ages 7-10) or Little Theatre sessions (ages 4-7), all from July 7-Aug. 13. For more information, call 946-4433.

The Play Group Theatre is a nonprofit, educational theater organization dedicated to providing process-oriented theater training and opportunities.