



Interview with Suzette Venturelli, May 2009

SUZETE VENTURELLI: Would you please review for the Brazilian audience the path your career has taken? In what way did your childhood in Mexico influence and inspire your artistic work?

MIGUEL CHEVALIER: I spent my childhood in Mexico, where my father, an academic, was writing his thesis on Latin American history. During that time, my parents met people from all creative intellectual circles. The great muralist artists, such as David Alfaro Siqueiros and Diego Rivera, regularly came to the house in Tepoztlán. Luis Buñuel, who was a political refugee at the time, spoke to us of Surrealism. He projected for us his very famous film, *Un Chien Andalou*, and that had made a big impression on me.

I still remember the architect Luis Barragán, who had worked out an architectural manifesto on the basis of his own house, which our family had visited. His buildings and his violent use of color left a lasting mark on me. Octavio Paz, André Malraux, Fernand Braudel, and Paul Rivet, as well as numerous other personalities in the world of letters often were passing through Mexico. They certainly contributed to my artistic awakening. As a child, I was unaware of this cultural ferment; it was only later that I realized that all these relationships my parents had with these people played a major role in my own intellectual awakening and in my creative artistic process.

S.V.: When you entered Paris's School of Fine Arts in the late '70s, the curriculum was then based on the tradition of the visual arts. How did your interest in exploring the possibilities of digital technology arise within this context, and what difficulties did you encounter?

M.C.: When I entered Paris's School of Fine Arts in 1978, my father drew my attention to the fact that, in each era, artists have always used the means of their time. In the early 1980s, computing was becoming increasingly present in the media and people began to talk about *the information society*. It was this still-virgin territory, yet to be explored by contemporary creative artists, that I wanted to go deeper into. It was then that I raised the issue of access to computer tools that didn't exist at the School of Fine Arts, the school being oriented toward a more traditional curriculum, particularly in drawing, oil painting, and hand-carved sculpture. This curriculum was totally out of phase with the 1970s arts scene. Once I received my diploma, I decided to join the French National School of the Decorative Arts (E.N.S.A.D.), which had finally set up a silkscreen, photography, and video studio, though not yet a digital one. . . .

In 1980, only scientific laboratories and television networks had access to these computer tools. Determined to create purely digital works as part and parcel of my artistic approach, I succeeded, little by little, in gaining the confidence of engineers at the French National Center for Scientific Research (CNRS). Thanks to them, I gained access at the Optics Center, from midnight to six in the morning, to some big computers, and with these computers I was able to develop my first digital works around the theme of nature and artifice with botanical greenhouses.

S.V.: In France, in the 1980s, few artists took an interest in digital images and new technologies. Can you explain how your stay in New York was decisive for the pursuit of this path?

M.C.: After doing those first works at the CNRS and despite the difficulty I had gaining access to computer tools, I decided to pursue my artistic investigations in this area. It wasn't easy, for most artists were quite reticent and French art circles proved to be highly skeptical about these new technologies, whose importance had not yet been gauged.

That is why, in this not very stimulating climate, I quite logically headed to the United States, where I was offered facilities more in line with my ambitions in the visual arts.

In 1983, I thus was able, thanks to a Lavoisier grant from the French Ministry of Foreign Affairs, to pursue my investigations in New York at the Pratt Institute and at the School of Visual Arts, which had just created a digital department. I was finally able to gain free access to the first computer drawing software programs. It was at that time that I truly became aware that all modes of expression—painting, photography, and video—were going to be profoundly altered and overturned in the near future by these new technologies, whence my thirst to explore all their potentialities. I also understood that these tools were going to be, for me, the basis for a structurally original approach whose stakes had to be grasped right away. These software programs were a platform oriented toward three modes of artistic expression I had a desire to develop, namely: painting and digital technology; photography and digital technology; and video and digital technology.

These possibilities seemed unlimited and the transformations unending. They represented a fabulous dictionary of forms and colors, on whose basis I could work on the image, modify it, and regenerate it. These tools offered me what no other media could do—that is, create infinite variations and a meshing together of these different types of images. Upon my return from the United States in 1984, I was able, thanks to the appearance of microcomputing, to acquire my own equipment, which allowed me to create in full freedom, independent of schools and laboratories.

S.V.: How does your digital work fit into the history of nineteenth-century art, twentieth-century modern art, and twenty-first-century art?

M.C.: Contrary to what one might think, my digital works do not break with but, rather, continue along the lines of nineteenth- and twentieth-century art history. My art-history studies showed me how much artists like Georges Seurat, Paul Cézanne, and Claude Monet in the nineteenth century or Piet Mondrian, Henri Matisse, Andy Warhol, Lucio Fontana, and Nam June Paik in the twentieth century, as well as numerous other artists have been visionaries and innovators in the field of painting and beyond. Through their various pictorial investigations and their intellectual approaches, these artists, in a sense, prefigure for me Digital Art. The Pointillist movement, which arose from Seurat's investigations and which were inspired by the theories of Michel Eugène Chevreul on the diffraction of light, prefigured the cathode ray tube and the computer screen.

Likewise, Cézanne—for whom “everything in Nature is modeled after the sphere, the cone, and the cylinder”—was to open the way to Cubism and initiate the notion of fragmentation, which is to be found again, in particular, in my “Fractal Flowers” series.

Monet, with his variations on the cycle of the seasons and the change of light over time,

heralded a form of digital impressionism, the result of which may be seen in my virtual garden, *Ultra-Natures*. Mondrian also worked on variation by gradually reducing his palette of paints and his compositions toward a minimalist geometrization in his much-talked-about *Boogie-Woogie* paintings. There again, he prefigured the digital fabric of pixels. There is Matisse, who, with his cut-paper collages, heralded the multiple possibilities of layering colors, one over the other. There is Warhol, who, in using the silkscreen technique, initiated the problem of the image in the age of its mechanical reproducibility. There is Fontana, who, in slashing his canvases and in developing his "concetto spaziale," heralded the world of immateriality with Yves Klein. There is Nam June Paik, who, in using video as art, became the father of the electronic arts.

Lastly, in the twenty-first century, my investigations are not so far removed from those of different artists, such as Olafur Eliasson, who explores people's different perceptions of light using the color wheel, non-Euclidean geometry, and kaleidoscopes. In a very different form, the artist Orlan questions the relation between the transformation and the hybridization of cultures by the body; I, too, was able to broach this subject, in my "Anthropometry" series.

S.V.: The show we have the honor of hosting, which is entitled *Second Nature 2009*, offers two different interactive virtual gardens in perpetual motion. Can you give us an introduction to these two creative works? In what way are they different?

M.C.: Indeed, I am presenting, for the first time in a single show, both *Ultra-Natures* and *Fractal Flowers*, which are two very different virtual gardens.

Ultra-Natures, created in 2000, are virtual gardens made up of 18 different virtual seeds. These virtual seeds have been inspired by research work conducted by agronomy laboratories studying and simulating plant growth. They generate imaginary flowers whose sizes and numbers are configurable, and which are born randomly, blossom, and then die, following a dynamic that is repeated *ad infinitum*. These gardens react to the passage of visitors, depending on which direction they go, thanks to the use of detection sensors. The plants bend and wave from right to left, forming "Baroque" interlacings and unusual vegetal ballets.

A result of the *Ultra-Natures* experiments, *Fractal Flowers 2009* offers a new generation of virtual flowers from which one can also generate virtual gardens. Thanks to their stylized forms, which have been pushed to the extreme by their geometrization, these flowers are very different from the ones in *Ultra-Natures*. Their sizes and colors go to create a plant-like universe populated with crystal-flowers whose wiry structures are reminiscent of the facets of a diamond. They have a real mineral monumentality to them, and, at the same time, the evanescent aspect they have, when they die out, creates a strange and mysterious world, half-robotic, half-animal. Thanks to sensors, these *Fractal Flowers* bend down as if they were bowing and curtsying and welcoming the viewer into the virtuality of this intriguing garden. It is then that they display their most beautiful colors and their most incredible shapes, observe one another, and lean toward the viewer, as if to look more closely at his reality, finally disappearing beneath his fascinated and agitated gaze at this quite lively relation with a virtual object he will never see again.

In seeing these two installations, *Ultra-Natures* and *Fractal Flowers*, simultaneously and in the same place, *Brasileiros* will be able to see the connections, but also the great differences that go to make up the originality of these two works.

S.V.: In these works, you both work on and reflect upon the issue of nature and artifice. In your view, have we entered into an age when the existence of artificial life has become possible?

Would this be a post-natural or trans-natural age, where nature and artifice can coexist?

M.C.: Yes, we are indeed in an age when the existence of artificial life is possible. My virtual gardens offer a good example of this. These works, whose generativity stems from artificial-life processes, investigate this relation between nature and artifice. These gardens are really the reflection of our present-day world, where nature is increasingly being altered. A number of the foods we eat today, like vegetables, grow in greenhouses, which are totally artificial spaces. Likewise, some animals, like poultry or cattle, are factory farmed and altered for the production of their meat.

We are really in a post-natural or trans-natural age in which nature and artifice coexist and enhance one another. As proof of this, I currently have a project to create a perennial "Fractal Flowers" installation in late 2009 at La Défense's Four Seasons Center in Paris. This light garden will border a vegetal wall, designed by the landscape artist Patrick Blanc, that will be made up of real plants. In my view, contemporary art is really the reflection of this artificial world we live in every day, where the real and the virtual increasingly interpenetrate.

S.V.: Do you think that technology is part of the evolution of human beings, in the Darwinian sense of the term *evolution*?

M.C.: Yes, I do think that technology is a part of human beings' evolution. It has forever accompanied humanity and influenced it. It acts on humanity's evolutionary process—as is testified to, for example, by the birth of industrial society. Technological progress has not ceased to develop at an extraordinarily brisk pace. Human beings' living environment is constantly being transformed and adapted.

Today, communication technologies extend planet-wide some of our brain functions and nervous-system functions: the processes of acquisition, storage, transformation, and transmission of information. It is therefore also, in a sense, the very process of thought that is thus being extended and broadened. These information technologies, with nanotechnologies and biology, can better the human condition in a spectacular way by increasing the availability of food, energy, and water and by connecting people and information everywhere. I am also conscious of the dangers of these new technologies, and of the modernity they symbolize. The entire problem is in not having these forms of technological progress escape human control and in man not being enslaved by the machine. . . .

S.V.: Your works, exhibited in numerous countries, integrate interactivity. What relationships do you see between the public and your work?

M.C.: To the greatest extent possible, what I endeavor to do is to develop intuitive forms of interactivity that can easily be understood by the general public. I eliminate from my works all forms of interactivity whose results, as stemming from the viewer-actor's gestures, are not perceived by this viewer-actor and whose setup is not grasped by him. Such interactivity seeks to establish a spontaneous relation between the interactor and the computer. The interactor must have the impression that he is the master of his gesture and that he can follow its effects on the image or, in some cases, on the text and the sound. This intuitive relation does not mean, though, that the interactor wouldn't have to furnish some effort of his own in order to understand his gesture, wouldn't try out some limit-experiences, or wouldn't have demonstrated some intelligence, some sensitivity, in short, some talent of his own.

The kind of interactivity I am proposing is freed from the close connections the keyboard and the mouse afford with the screen and, instead, exclusively employs sensors that physically

involve one's body and its mobility in space. Interactivity lets the viewer feel the free play of spontaneous pleasure and the most intellectual sort of desire to explore the potentialities of the work so as to grasp its meaning and to place it back within the context of the field of art.

These works have a pedagogical as well as playful dimension to them. They are pedagogical, since they make the interactor discover his own corporeality opposite the image by placing him in unusual postures. They are playful, since this interactivity can be experienced on a personal level or shared with several people, the effects not being the same in the two cases and the results also always being surprising.

Understanding—and appreciation—of works of art always sets in motion, beyond one's personal emotions, some things that are taken for granted on a deeply seated cultural level, one's education. And just as the lover of painting learns to love painting better by going beyond his first impressions, the interactor has to become initiated into these new practices that are beginning to constitute an authentic cultural experience in their own right. I am becoming aware that the audience is getting more and more familiar with all these forms of interactivity, which have been considerably enhanced these past few years by the use, for example, of telephones and of video games for children.

S.V.: Have museums and collectors already acquired some of your generative digital works? Do you have some galleries that represent you? How does one conserve digital art?

M.C.: Yes, for five or six years now, some museums and galleries have been acquiring several of my generative and interactive digital artworks, like *Ultra-Natures* and *Fractal Flowers*. These works are presented on plasma screens, which are set on a wall like pictures. This screen is of course connected to a computer. For a larger space, these works/installations are projected on walls or on the ground. They are readapted for the space, with the help of one or several video projectors attached to the ceiling. I have several galleries that market my still or generative works, such as the Tarasiève Gallery in France, as well as abroad, particularly in Norway and in Korea. These galleries regularly show my creative works either in their own spaces or at art fairs like FIAC in Paris or Arts Brussels in Belgium. Acquisition of these types of immaterial works is a rather recent phenomenon. For, little by little, people's attitudes around the whole world are evolving, influenced by the intensive use of various information technologies, like the internet. Some major museums, like the Guggenheim in New York, FNAC in France, the Beyeler Foundation in Basel, and the Itau Social Foundation in Sao Paulo have acquired some works of this nature for their collections, which encourages private collectors to do the same.

As for the problems of conservation and maintenance, the software-work itself is completely independent of the medium used for its presentation. The software-work thus conserves its full content on its own, and I develop it further as new computers, screens, or video projectors come on the market. If the media for presenting a work becomes obsolete and cannot be repaired, the museum or the collectors can replace them with new equipment and the work can thus continue to be seen.