

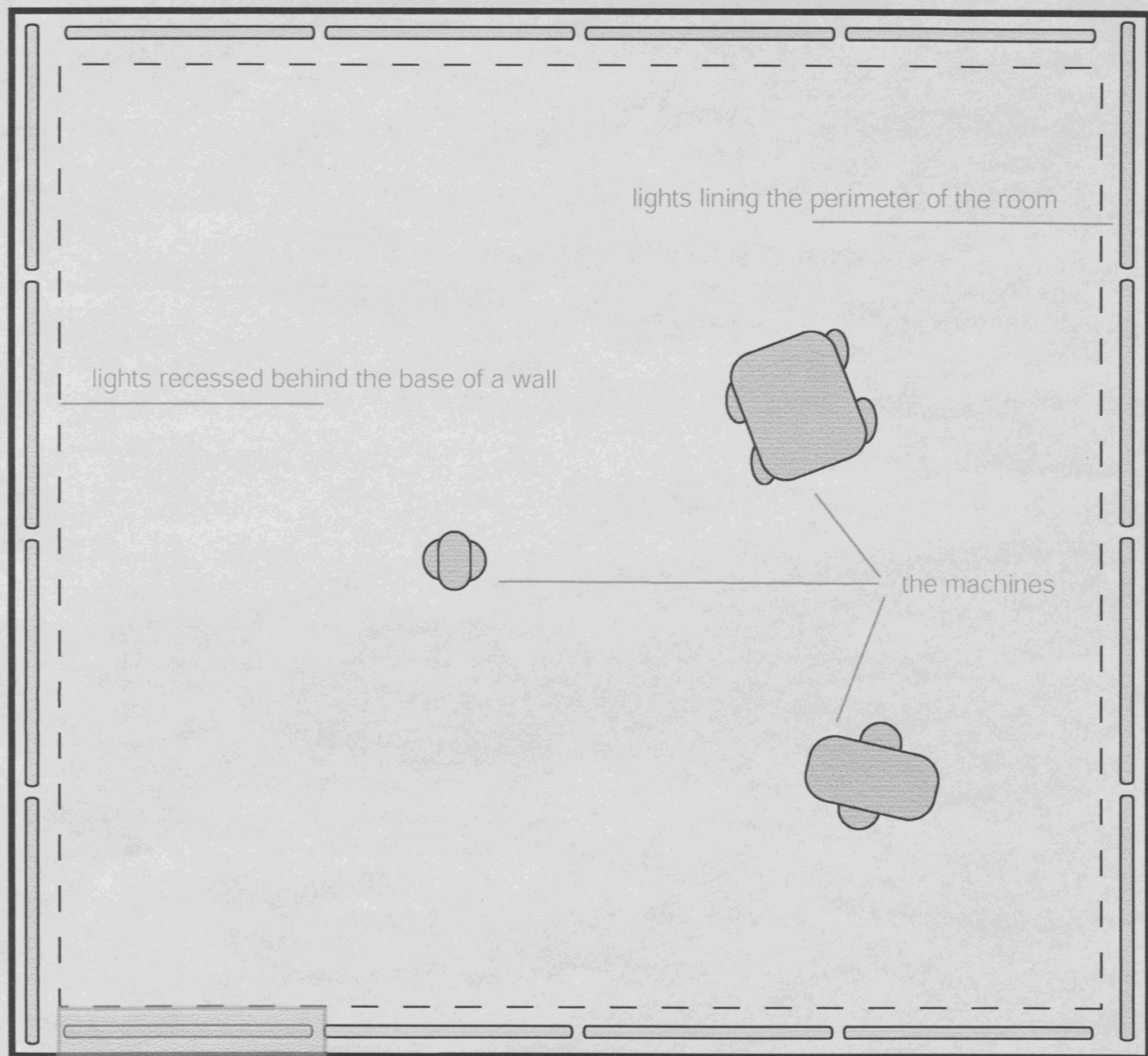
RANIA HO

Title	<i>Mu Gu Gai Pan Over Rice Special #8</i>
Genre	Interactive Installation
Applicant's Role in Production	Creator / Fabricator / Programmer
Production Format	Research / Installation

Brief Project Description (do not exceed space given below)

Mu Gu Gai Pan Over Rice Special #8 consists of seven to ten different Chinese folk toys collected from rural areas of China that are mechanically enhanced and then instructed to chase visitors around an exhibition space. Inspired by China's rapid industrialization and urbanization and effect of this change on rural culture, *Mu Gu* will respectfully "update" traditional handmade toys with new "features" and "capabilities." Outfitted with electronics and light sensors, the mechanized folk toys are part of an interactive installation that combines high and low technology to create pieces that interact with one another and with the viewer.

An installation that invites participation, each of the folk toy machines in *Mu Gu Gai Pan Over Rice Special #8* will be programmed to seek darkness and shun light. The perimeter of the exhibition space will be lined with lights and as visitors enter the exhibition space, their bodies will block areas of light and create shadows that will attract the machines. Each of the toys will be custom designed and outfitted with mechanics that highlight its unique characteristics.



Mu Gu Gai Pan Over Rice Special #8: FLOOR PLAN

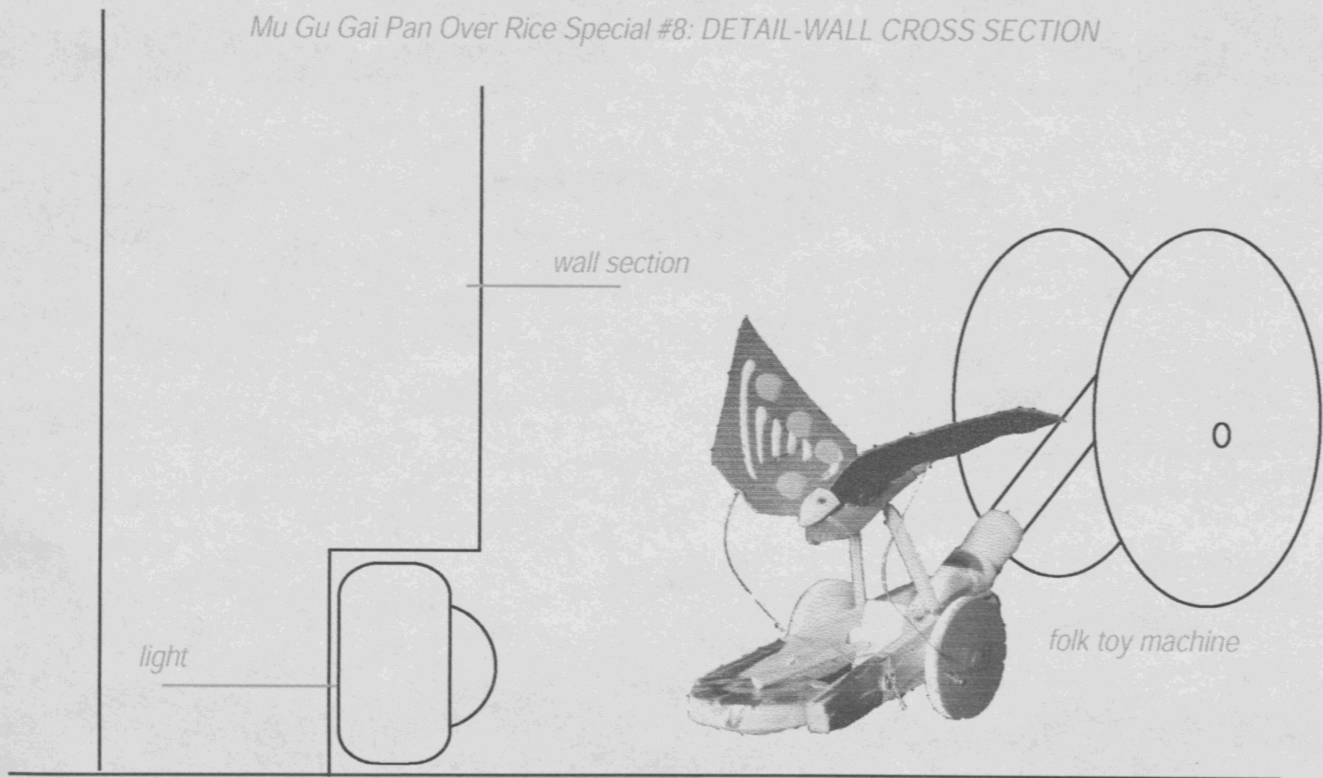
entrance
ramp

Most of the lighting for the installation will be coming from the recessed lights on the floor. Recessing the lights has a dual purpose: The lights are protected from machines or humans hitting them, and the wall of the recessed area helps to narrow the beam of light so it is limited to a horizontal beam across the floor.

The entrance will be a ramp up to the edge of the room and then a small step to enter the space. This allows for a continuous row of lights along the perimeter.

The top part of the room will be lit dimly, to draw attention to the floor where the folk toys will be moving around.

Mu Gu Gai Pan Over Rice Special #8: DETAIL-WALL CROSS SECTION

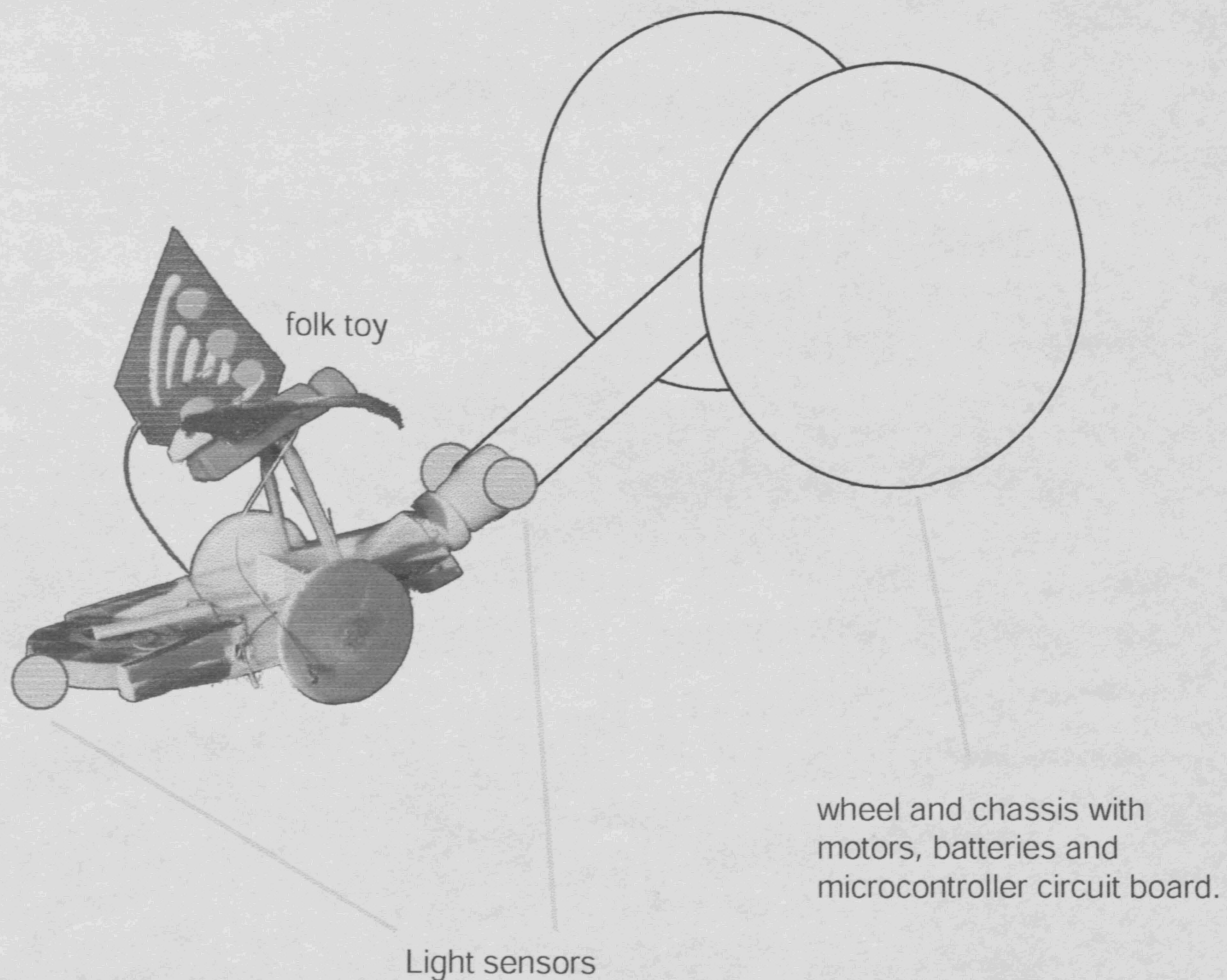


The lights are protected from kicking and excessively vivacious folk toy machines.

Mu Gu Gai Pan Over Rice Special #8: DETAIL - CROSS SECTION ENTRYWAY RAMP



Sample Machine Mockup



This is a sample diagram for the basic machinery that would be built around the folk toy. Additional enhancements would be built upon this chassis. The elements consist of the toy, wheels, motors, batteries, circuit board and sensors.

This particular toy makes a clacking sound on a small drum as it's pushed forward. Also, the wings move up and down as the wheels turn.

RANIA HO

If you are sending more than one sample, please copy this page. Sample(s) must be cued: indicate how long each sample should be viewed for a COMBINED viewing time of no more than 15 minutes. If slides are included in this application, please list the title and year of the work on this form.

Title *Untitled (Demo Reel)*

Year 1999-2004

Technical

Original Format

☒ Software

☒ Web

☒ Installation

☐ Other _____

Other _____

Format Submitted for Viewing

☐ Software

☐ Web

☐ VHS

☒ Other **DVD- NTSC Format**

Preferred OS

☐ Windows

☐ Mac

☐ Unix

Web Information (answer only if sample work is in Web format)

☐ URL _____ (if more than one please list them below)

☐ Browser requirement(s)

☐ Plug-in requirement(s)

☐ This sample requires broadband connection (fast Internet connection)

☐ A local copy of the sample work has been included with the application

Special Information For Viewing:

This is a NTSC formatted DVD that will work in any DVD player.

Running time: 11 minutes 40 seconds

Description of Work (use an additional sheet if necessary)

1. ***Free Range Appliances in a Light Dill Sauce*** is a fleet of light sensitive robotic kitchen appliances that are retrofitted with motors, sensors and programmable microcontrollers and designed to seek heat and light. Audience members are given flashlights that are used to lead the autonomous kitchen appliances around the installation site. The fake fireplace had a light inside that would turn on at intervals. When the light was on, the appliances would flock; when the light turned off they went off in various directions seeking warmth elsewhere. The piece was presented at ISEA 2000 in Paris, France; the Doors of Perception conference in Amsterdam, Netherlands and won Honorable Mentions at both ArtFuture 2000 in Taipei, Taiwan and at the Prix Ars Electronica 2000 in Linz, Austria. My role in this work spans from the initial conceptualization to fabrication to refinement and currently to maintenance.

2. In a performance variation of *Free Range Appliances*, called ***Free Range Appliances in a Light Dill Sauce, Swans Added*** the appliances were outfitted with infrared communication

capabilities and choreographed to dance to a section of Tchaikovsky's *Swan Lake*. During the performance, as the appliances lurched and jerked to the music, footage from the Bolshoi Ballet's *Swan Lake* was projected on an adjacent wall. For this piece I modified the *Free Range Appliances* with infrared sensors; designed and built the transmitter beacon and wrote the communications protocol for transmitting each of the choreography elements to the appliances. I also created the choreography for the dance.

3. The interactive video installation, ***Modem***, strings together video clips of people doing impressions of their dial-up modems. Triggered by a normal household phone, each time the telephone handset is lifted, a new dial-up sequence plays. The clips are randomly drawn from a database of video clips and the sound can only be heard through the telephone handset. Future versions of *Modem* will allow visitors to leave their own modem impressions and messages in the video database. This piece was presented at the Digital Art Conference at Brown University; NewFangle, the GenArts annual exhibition of new media art in San Francisco, and at an exhibition called Sound II in Beijing, China. I was responsible for each part of the building of this piece from concept to design to implementation.
4. ***PuttFarm* and *PuttFarm II: MiniGolf*** are site-specific projects that were set up along the Gowanus Canal in Brooklyn and Houhai Lake in Beijing. Built of Astroturf, scrap lumber and in the latter piece Styrofoam, both pieces were highly interactive. The exhibitions in Brooklyn and Beijing were part of community events promoting environmental awareness and both iterations of the project saw a crowd of participants lining up to take a swing. Although not highlighted in the DVD documentation, *PuttFarm II: MiniGolf* had an added element of a radio-controlled boat that formed the base of the red-flagged "hole". From the shore, visitors could use the radio control unit to drive the hole all around the lake. Occasionally participants would "double-team" having one person drive the golf ball and another person driving the hole in an attempt to catch the ball and complete the par 1 course. My involvement with this piece was all encompassing from initial conception to design to fabrication.

5. Consisting of motors, handmade flipbooks, an old cigarette machine and abandoned candy, ***Flip*** was part of a series of machines that played with toys for you. I was inspired to meld handheld flipbooks with the concept of digital video loops. There are basically three parts to the installation: the spinning carousel with the image of me eating; the cigarette machine and a series of small handmade flipbooks made from archival video footage. The small flipbooks were arranged according to abstract titles with clips of bowling instruction filed under 'Industry'; Civil Rights marches under 'Unrest' and clips from the movie *Fu Manchu* in 'Exotic'. The books were sold for \$3 out of the vending machine and the machine only accepted change. I conceived and fabricated all the elements of this piece and made a whooping \$6 off the vending machine. This piece was exhibited at an exhibition called *Melt* in San Francisco, California and *Close Calls* at the Headlands Center for the Arts in Sausalito, California.
6. Actually the first work in a series of machines that plays with folk toys for you, ***Stop Bugging Me, I'm Gonna Tell...*** was inspired by a handmade folk toy I bought on a street corner in Beijing and forms the basis for the work I am proposing for the fellowship. Although not pictured, I attempted to mirror the irregular and handmade aspects of the two wrestling figures in the gear mechanism and used a bent coat hanger to create the gear teeth. The clacking sound of the two figures jumping and flailing around on the wooden plank is not adequately represented on the demo reel, but it really adds to the overall humor of the mechanics. I was responsible for the concept and execution of this piece.
7. ***Knit Magic Mad***, is a machine based around a plastic knitting toy from the 1970s. Over the course of the exhibition the machine laboriously knitted a continuous tube of yarn in various colors and excreted this tube of yarn into a fantastic landscape of Astroturf and plastic domesticated animals. At the conclusion of the exhibition the tube was over 100 feet long. I was responsible for the concept and execution of this piece.

8. ***The Femme Fish Chart*** is an early work that addresses the changing physiological characteristics of a close social group. The menstrual cycles of a community of women are charted and the data represented as a virtual fish tank. This piece addresses issues that I continue to explore today: interaction among social groups and reactive objects. I wrote the software for this piece as well as designed the interface and the look and feel of the fish.

Rania Ho :: 2005 New Media Fellowship Application :: Artist's Statement

I am exhilarated by small moments of confusion. With self-spinning flipbooks, autonomous kitchen appliances, and folk toys that play by themselves with a push of a button, I aim to forge relationships between seemingly incongruous objects in my work to create new meaning and inspire momentary shifts in perspective on the world. Embodying a clash of forms, my work uses familiar consumer objects in humorous ways to create unfamiliar and amusing scenarios that rejoice in fleeting and funny spaces in time.

Recycling discarded everyday materials into comically poignant installations forms the basis of my current work. Coupling new and old with high and low technology, the work is a metaphorical “birth” of (questionably) intelligent life out of broken and outmoded objects. These cast-off items are integrated into pieces that respond to environmental stimulus and celebrate the “inappropriate” reuse of consumer goods in our highly materialistic society.

Using computational media is an integral part of my working process. Although the work does not always rely on computers (*PuttFarm* and *MiniGolf* for example), I am dedicated to electronic media's potential as an expressive tool for artists. My work tends towards strange pairings of low and high technology to draw attention to our reliance on machines and the way we have so effortlessly accepted their ubiquity. I am fascinated by our relationship with the tools that we have created and how these tools affect how we view and interface with the world.

The installations I build use familiar forms of interaction. Picking up a household phone in *Modem*, is a common act that in this installation yields surprising results. The deliberate eliciting of mundane physical actions taps into a collective physical memory. The work is

designed to be intuitive for audience members with seamless navigation. Even as the results are unexpected, the methods of engagement are recognizable by most.

Although inspiration is tricky to regulate, once an idea is formulated I am methodical about seeing a project from beginning to end. All of my pieces to date are created single-handedly, from the initial design to software programming to final implementation and installation. The work evolves in an organic way during the development process, and changes are often made to accommodate site-specific requirements. Each step of the process is a delicate balance between problem solving and preserving the initial artistic vision. *Free Range Appliances* is a project similar in ambition to my proposed project *Mu Gu Gai Pan Over Rice Special* =8. *Free Range Appliances* took a year to research and develop, taking time to explore tangential possibilities like the choreographed dance performance of the kitchen appliances in *Free Range Appliances in a Light Dill Sauce, Swans Added*. Since then, I have finished a number of other projects that have deepened my understanding of the mechanics and software needed to complete a project of this scale, including designing and building several robotic puppets for the independent feature film, *Robot Stories* by Greg Pak.

My work reexamines our established norms of socialization to rethink our accepted, yet (often) bizarre ways of behaving and interacting in the world. The manners and techniques that we use to negotiate our personal and emotional lives is often quite absurd. I see my artistic process as a celebration of this absurdity, forging new meaning out of seemingly disparate parts.

Background

Mu Gu Gai Pan Over Rice Special #8 (A.K.A *Mu Gu*) continues a body of work that I have been developing over several years, combining high and low technology to create pieces that interact with the environment, one another and the viewer.

Project Description

Upon entering the exhibition space of *Mu Gu*, the viewer is met by a fleet of robotically enhanced Chinese folk toys that move from different parts of the room to flock around the viewer's feet. Outfitted with motors, tiny computer chips and sensors, the mechanized toys will knock and twirl around each other while clipping at the heels of visitors who move about the space.

Inspired by China's rapid industrialization and urbanization and effect of this change on rural culture, *Mu Gu* will respectfully "update" traditional handmade toys with new "features" and "capabilities." Creating handmade folk toys is a dying art. In today's China (as elsewhere in the world) children are more likely to be given pre-fabricated playthings and battery-operated toys. Artisans who produce traditional toys are dwindling in number and such lore may soon be lost. The biggest irony is that China itself is the producer of 80% of the world's machine-made toys, driving their own traditional craftsmen into extinction.

The concept behind this project is to mechanize traditional toys in creative and humorous ways to bring out their amusing, playful qualities while commenting on the notion that "newer" and "machine-made" equals "better." The process of creating this work will include learning from local artisans to understand their traditional processes. These techniques will then be used to refurbish the folk toys into a modern object that bridges the gap between pre- and post-industrialization. This intersection of technology, concept and culture births an installation, which is not only to be played with, but also plays with you.

The Installation

Mu Gu will consist of seven to ten different folk toys collected from rural areas of China, which are then mechanized and outfitted with electronics and sensors. Each toy will be custom-designed and fitted with mechanical devices that will evolve as the toys are located and wired.

One example is a well-known toy called “Tiger Eating Kids,” a paddle with papier-mâché figures on one side of a tiger and two kneeling humans. Using a small swinging weight attached to the figures' heads, the heads sway from side to side when the weight is moved. In the *Mu Gu* mechanized version, the entire toy may ambulate around the exhibition space in a pattern that replicates the sway of the figures' heads.

The perimeter of the exhibition space will be lined with fluorescent lights. The mechanized toys will be programmed to seek darkness by shunning light. As visitors enter the exhibition space, their bodies will block areas of light and create shadows. The folk machines will sense the darkness and move toward the viewers. The machines will also sense one another, and move toward each other, creating a flocking effect. The larger shadows cast by viewers will take precedence, so when people are in the space, the machines will chase visitors rather than one another. Thus, just by their presence in the exhibit, the audience interacts with the machines and continually affects the installation.

Context of the Work

Interactivity with the audience is vital. The participatory nature of this piece is typical of much of my work: I seek to engage viewers as active participants and co-creators of the final piece, using methods that are intuitive to the audience.

Mu Gu builds upon my previous installation *Free Range Appliances in a Light Dill Sauce*, which took discarded kitchen appliances and similarly “enhanced” them with electromechanical movement and light sensors. Audience members mingled with the appliances and led them around the exhibition space using flashlights.

My latest work *Knit Magic Mad*, a mechanical enhancement of a 1970s plastic toy, is also a building block towards the *Mu Gu*. Motors and wheels were used in service to automate a hand-cranked knitting toy, which over the course of the exhibition laboriously knitted a continuous tube of yarn over one hundred feet long.

The three microprocessor enabled objects created for my 2003 work, *Bullhorn*, were also predecessors to this project. This installation experimented with lining a space with fluorescent lights to create shadows that the objects could sense.

Feasibility

I am confident that with my experience, local knowledge of China and interest in continuing this type of work that within 18 months I can locate, design, modify, test and install *Mu Gu*. Within the city limits of Beijing and its surrounding areas, there are a number of artisan toy makers and millions of electronics piece parts, so raw materials will be easy to locate.

Use of Fellowship Support

If selected, I plan to use the fellowship support to rent studio space, purchase equipment, acquire toys, and begin designing and tinkering for maximum interactive effect. The fellowship will also go towards materials, labor fees, fees for the toy makers, artist's fees, and helping to support myself for the duration of the project. Estimated total budget for this project is \$60,400.

Use Of Work

It is important for me that the work is first exhibited in its country of origin to ensure that *Mu Gu* is seen in the context of the culture that created it. A number of experimental galleries like the 25000 Cultural Transmission Center in Beijing which focuses on the intersection of traditional and contemporary arts in China have expressed interest in exhibiting this piece. Following the Beijing exhibition, there are plans to exhibit the work North America and in other countries.

Rania Ho
2005 New Media Fellowship Application
Budget Breakdown
Mu Gu Gai Pan Over Rice Special #8

item	price per unit	quantity	cost
Motors	\$ 40.00	25	\$ 1,000.00
Electronic components per robot	\$ 400.00	10	\$ 4,000.00
Microcontroller programming hardware/software	\$ 700.00	1	\$ 700.00
Microcontrollers	\$ 20.00	40	\$ 800.00
Miscellaneous tools (drills, saws, etc.)	\$ 2,000.00	1	\$ 2,000.00
Monthly internet connection for design resources	\$ 40.00	18	\$ 720.00
Miscellaneous hardware (nuts, bolts, screws, etc.)	\$ 600.00	1	\$ 600.00
Custom parts (formed sheet metal, diecut gears)	\$ 1,500.00	1	\$ 1,500.00
Folk toys	\$ 100.00	20	\$ 2,000.00
Rechargeable batteries	\$ 80.00	16	\$ 1,280.00
Battery charging equipment	\$ 150.00	5	\$ 750.00
Studio rental (monthly)	\$ 450.00	18	\$ 8,100.00
International travel to China	\$ 1,600.00	1	\$ 1,600.00
Local travel (within China)	\$ 1,300.00	1	\$ 1,300.00
Accommodation in China	\$ 1,400.00	1	\$ 1,400.00
Food in China	\$ 1,000.00	1	\$ 1,000.00
Local translation services	\$ 750.00	1	\$ 750.00
Fees for local artisans	\$ 1,000.00	1	\$ 1,000.00
Fabrication assistance	\$ 1,000.00	1	\$ 1,000.00
Programming assistance	\$ 1,000.00	1	\$ 1,000.00
Artist fees	\$ 2,500.00	1	\$ 2,500.00
TOTAL			\$ 35,000.00

Selected Exhibitions / Performance

2004	Water Theater The Location You @ Now	Shanghai Biennale, Shanghai, China 25000 Cultural Transmission Center, Beijing, China Duolun Museum of Modern Art, Shanghai, China
2003	Water 0.03% Post-Sensibiliy: Inside Story Illuminate the Great Wall	Beijing China Beijing, China Beijing, China
2002	Close Calls Art That Moves Melt	Headlands Center for the Arts, Sausalito, California Cellspace, San Francisco, California The Art Explosion, San Francisco, California
2001	Site Exhibitions NewFangle Digital Arts Conference (DAC) Interactive Telecommunications Program <i>Frenz4eva</i> Performance	ArtMuseum.net GenArts, San Francisco, CA Brown University, Providence, RI NYU, New York, NY Bard College, Annadale-on-Hudson, NY
2000	SIGGRAPH 2000 Prix Ars Electronica Doors of Perception ArtFuture 2000 ISEA 2000 Canalogy Interactive Telecommunications Program	New Orleans, LA Linz, Austria Amsterdam, Netherlands Taipei, Taiwan Paris, France Brooklyn, NY New York University, New York, NY
1999	Life Culture Rising Tide Summit	Beijing, China New York, New York

Curating

2004	The Location You @ Now	25000 Cultural Transmission Center, Beijing, China Duolun Museum of Modern Art, Shanghai, China
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Awards

2000	Prix Ars Electronica 2000 ArtFuture 2000	Honorable Mention Honorable Mention
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Fellowships

1999	Research Fellow	Interval Research Corporation Interactive Telecommunications Program, New York University
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Selected Bibliography

Cyberarts 2000 by Hannes Leopoldseder, Christine Schopf, Hane Leopoldseder, p.92
 CIRCA 94, Winter 2000 C94 Review: Ars Electronica By Paul O'Brien
 Rauschen Magazine "Elektronisch.Kunst" by Sebastian Ziegaus, www.rauschen.de/artikel/archiv/arselectronica.htm
 New York Times, Circuits, May 20, 1999 by Lisa Guernsey

Education

New York University Tisch School of the Arts New York, New York 1997-1999 Masters: Interactive Media	San Francisco Art Institute San Francisco, California 1995 Filmmaking	Central Academy of Fine Arts Beijing, P.R. China 1992-1993 Advanced Studies Certificate Oil Painting	University of California, Los Angeles Los Angeles, California 1986-1990 Bachelor of Arts, Theater Arts
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Lectures

2004	Artist Talk	25000 Cultural Transmission Center, Beijing, China Duolun Museum of Modern Art, Shanghai, China
2002	Lunches Tender: Frenz4eva and Live Video Manipulation	ISEA2002, Nagoya, Japan
2001	The Feeling Machine: Intro to Physical Computing	The Loft Gallery, Multimedia Space, Beijing, China
2000	Anthropomorphism and Toaster Ovens	SIGGRAPH Invisible Computing Conference, New York, NY

Selected Projects

Bullhorn

Three light sensitive robots were equipped with motors, wheels and a whining bullhorn. Part of a site-specific performance / exhibition *Post Sensibility : Inside Story* at the Seven-Color Light Theater in Beijing, China.

The Femme Fish Chart

A Virtual fish tank that aims to display the general stress level in a community by charting menstrual cycles.

Flip

Part of a series of machines that plays with toys for you. The installation consists of a mechanized flipbook loop, handmade flipbooks made from archival video footage and a vending machine to dispense the books.

Free Range Appliances in a Light Dill Sauce

An exploration of anthropomorphic qualities inherent in household gadgets and an irreverent look at the meaning of 'smart' appliances. Kitchen appliances are liberated from their mundane existences and taught motor skills; enabling them to fully realize their suppressed ambulatory desires.

Frenz4eva and LonelyFrenz

An art-tech collective that engages in the manipulation of digital and analog media in live audio/video mix performances. *LonelyFrenz* is the solo arm of this collective.

Knit Magic Mad

Part of a series of machines that plays with toys for you. Project based around the mechanization of forgotten toys from the 1970s

MiniGolf

A par-1 miniature golf course made of astroturf and styrofoam, the piece consisting of three floating islands: the sandtrap, the green and a radio-controlled hole that could be driven around Houhai Lake in Beijing.

Modem

An interactive video project that grazes on the leftovers of high speed telephony. When picked up, this household telephone triggers video clips of people doing imitations of their modems.

PuttFarm

A site specific project along the Gowanus Canal. PuttFarm is a 3-hole miniature golf course installed for the exhibition, *Canalogy*, in Brooklyn, New York. Built of astroturf and scrap lumber, PuttFarm addressed the need for suburban diversions in a post-industrial setting.

Streaming Karaoke

A stage performance of a fevered pitch for a fictional product during the height of the internet bubble. Written and performed in collaboration with Tarikh Korula.

Stop Bugging Me, I'm Gonna Tell...

Part of a series of machines that play with toys for you. Built around a Chinese folk toy, the machine was designed to tug on the string making the two figures appear to wrestle.