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Electronic Rhapsody: Theremin and Matryomin

by

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Abstract

Electronic Rhapsody: Theremin and Matryomin is a short length documentary film, which explores two magical musical instruments: the Theremin and the Matryomin. Both instruments represent innovations in the history of electronic music since they are played without physical touch. Players wave their hand or fingers in the air and, as a result, a characteristic sound is produced. The unusual, haunting sounds produced by the Theremin and the Matryomin attracted players and audiences, gradually creating a musical community around the world. The film depicts the world of these unique musical instruments, their inventors and performers who make up this community.

The Theremin was first invented in St. Petersburg, Russia, in 1920, by a Russian physicist, Lev Sergeyevich Teremin (1896-1993), known as Leon Theremin in the West. The Matryomin, a relatively new electronic musical instrument, was made in 2003 in Hamamatsu, Shizuoka, in Japan, by a Japanese Theremin player, Masami Takeuchi (1967-). The Matryomin is, as it were, a kind of developed Theremin. The Theremin system is mounted in a Russian “Matryoshka” doll and as with the Theremin, players move their hands or fingers in front of the Matryoshka-shaped instrument, and sound is produced.

The film focuses on the two musical instruments and their inventors as well as on the enthusiastic players of the Theremin or the Matryomin in Japan, Russia and the United States. As Takeuchi says in the film, "The Theremin is at the dawn in music history." Without doubt, the Theremin players are making a history in electronic music. The film explores why the players are captivated by the Theremin and how they are building communities. A number of important Theremin players are featured in the film: Masami Takeuchi, Dorit Chrysler, Rob Schwimmer, Natalia Theremin and Peter Theremin. The film also shows a Matryomin ensemble on a visit to

Russia, to meet Leon Theremin's family in Moscow. The incredible and unique musical instruments are connecting people all over the world beyond borders.

Project Description

Leon Theremin (1896-1993) and Masami Takeuchi (1967-) invented unique instruments, which people can play without physically touching them. As if by magic, players wave their hand or fingers in the air in the space between the antenna of the electronic instrument and themselves and a characteristic sound is produced. The sound quality can be varied by changing the distance between the player and the instrument. Some people create a clear sound while others produce a warm sound. The Theremin and the Matryomin reflect the people who play. These great and unusual musical instruments are building new global communities through the power of sound. The film *Theremin and Matryomin* focuses on the inventors as well as the performers.

The film opens with a scene showing many Matryoshka—Russian traditional dolls—accompanied by the song, "Amazing Grace", played by Masami Takeuchi with the Matryomin. The Matryomin, invented by Takeuchi, is a Theremin system mounted in a Matryoshka. Takeuchi was attracted to the Theremin and studied it in Russia. Now, he is the top Theremin player in Japan and gives numerous recitals throughout Japan as well as abroad; however, his path to success was not easy. When he decided to study the Theremin, people said that it would be meaningless. "What will you do after learning the instrument?" people asked. In Japan, nobody knew about the Theremin.

Leon Theremin (Lev Sergeyvich Termen), inventor of the Theremin, was born in Saint

Petersburg, Russia, in 1896. His life was mysterious and much about it remains unknown today. As a physicist, he invented several products such as a burglar alarm, an electronic television, a Rhythmicon and the Great Seal Bug, in addition to the Theremin. It is believed that he was an industrial Soviet spy as well as a scientist. Some of his creations were intended for spying.

Invented in 1920, the Theremin is one of the oldest electronic musical instruments and synthesizers. The monophonic instrument consists of two antennas: pitch and amplitude (volume). One vertical antenna is located in the right side of a rectangular box for pitch control. If the hands are closer to the antenna, the tone will be higher. Another horizontal loop antenna is on the left side to control volume. If the hands are close to it, the sound decreases.



Leon Theremin plays the Theremin
Theremin World.com

Pianists play on black and white keys with their fingers when playing the piano while violinists play on four strings with a bow. However, Theremin players move or wave their hands and float fingers in the air to play; there is no visual pitch guideline to play; no visible keys,

strings or frets. The musical pitch exists in the air between the vertical antenna and the player. In 1931 in New York, an advertising pamphlet introduced the Theremin by saying "anyone can make exquisitely beautiful music with nothing but his own two hands."

There are not many Theremin players in the world due to its peculiarity. It can be said that the Theremin world is very small. In the film, five Theremin players make an appearance: Peter Theremin, Leon Theremin's great grandson; Natalia Theremin, Leon Theremin's daughter in Russia; Dorit Chrysler of Austria; Rob Schwimmer of the United States; and Masami Takeuchi of Japan. They are the Theremin virtuosos of the world and they know each other despite belonging to different countries. In the documentary, they talk about why they were attracted to the Theremin, the untouchable instrument.

Masami Takeuchi studied the Theremin with Lydia Kavina of Russia, a relative of Leon Theremin. Takeuchi started his career as a Theremin player after coming back to Japan; however, he had to face hard times because people in Japan did not understand the Theremin music at all. He created an instrument designed in the shape of a cat named Tango. When Takeuchi attached a controller and played in the air, the cat appeared to be playing the Theremin. He played the cat Theremin at concerts but it was not successful since people thought it was just ridiculous.

Gradually, the Theremin was publicized by the media. People started to recognize the Theremin sound as that used in sound effects in ghost or science fiction, but Takeuchi's thoughts were different. He was attracted to the Theremin as stunningly performed by Clara Rockmore. Takeuchi was surprised that an electronic musical instrument could be played as Rockmore had played it. Clara Rockmore was the Theremin virtuoso of the era. She studied the violin with Leopold Auer, who taught many outstanding students, such as Jascha Heifetz and Nathan

Milstein. She abandoned the study of the violin because of bone problems, but as a Theremin player, she helped develop the instrument further and played impressive sounds.

Takeuchi thought that he should create a pop culture to spread the Theremin in the world. And one day, he got the inspiration to put the Theremin into a Matryoshka. He created the Matryomin in Hamamatsu, Shizuoka, in 2003. The name “Matryomin” is coined from “Matryoshka” and “Theremin”. Takeuchi says in the interview, “I wanted to create pop culture by making the Matryomin. I believed that the Matryomin could expand the Theremin world since the outer figure is a Matryoshka doll.” He invented the Matryomin, taught others how to play it, and organized Matryomin ensembles. On July 20, 2013, in Hamamatsu, Japan, 272 members of the Matryomin ensemble challenged the Guinness World Record as the Largest Theremin group performance. They played "Amazing Grace" together on the Matryomin, wearing black formal dress, and successfully created a Guinness World Record.



Matryomin
Photo by Kayoko Nakamura

The sound produced by the unique and new musical instrument, the Matryomin, tugs at people's hearts. In the film, the Matryomin ensemble members are not professional musicians; most members are female. One of the Matryomin players is an elementary school girl who likes the Matryomin sound and imagines it as the sound of the wings of angels. Another player is interested in the House of Romanov, which was the second Russian dynasty. A male player recites poetry; he is a retired scientist. With great seriousness, he practices with the little Russian doll musical instrument every day. A blind woman enjoys the warm sound of the Matryomin, and plays it only by listening to its sound. Each player's life is enriched by the Matryomin.

Their repertoire includes: the Christian hymn, "Amazing Grace"; the famous classical music piece, "Symphony No.9 in D minor, Op. 125 'Choral'" by Beethoven; music from an early film in the 007 series, "From Russia with Love"; and a Japanese classic song, "Cherry blossom." Their performances are on You Tube and have been viewed hundreds of thousands of times.

The Matryomin's function is simple. It has a single antenna—in this, it differs from the Theremin, which has two antennas. The single antenna is a pitch controller, and has a five-octave range. The Matryomin cannot control volume when players are performing. However, like the Theremin, it is played without physical touching.

In Japan, the Matryomin is becoming popular. Many people play the Matryomin as a Matryomin ensemble. Takeuchi's concept was eventually accepted by people, and the Matryomin community is growing in Japan.

On the other side of the world, in New York, Dorit Chrysler, Rob Schwimmer and Charles Hobbs, give the Theremin master workshop at the Pioneer Works. In a huge art studio, they teach the Theremin to children and adults. Dorit Chrysler is from Austria and gives recitals as a Theremin player around the world. She is also a co-founder of the New York Theremin

Society. Chrysler visited Japan last year and played the Matryomin with Takeuchi and his Matryomin ensembles. She says, “We played Edelweiss together. It was fun.” Dorit teaches the Theremin class for children. They are so excited to play the Theremin at the workshop. Here, in New York, the Theremin community has been created. Dorit also helps Peter Theremin, who is teaching the Theremin in Russia.

Once Dorit had a chance to play the Theremin in front of Natalia Theremin, daughter of Leon Theremin. Dorit was nervous to play before Natalia because her method was not the traditional one. Natalia told Dorit that she does not need to worry about it. The Theremin should be played by soul.

The Matryoshka figures of the Matryomin are made in Semyonov in Russia. Semyonov is near Nizhny Novgorod city of Nizhegorod oblast (province) in western Russia. The town has the biggest Matryoshka factory and many craftsmen and craftswomen work there. Step by step, Matryoshkas are created from lime trees; they are cut, planed and filed to make doll figures. On the machine, the lime material is modified into a doll shape, with a screaming noise, and the figure is created in the shape of a little, fat, bowling pin. Wooden Matryoshka figures in varying sizes, from tiny to large, are seen throughout the big factory.

The next step is drawing lines on the dolls. Outlines of face, scarf, apron, arms, hands and fingers are drawn with black paint. Then they are colored according to the craftswoman’s choice. Each Matryoshka has the same color scheme but details such as number of flowers on the apron, black circles on the head, the places or sizes of flowers on the scarf can be different. The Semyonov style Matryoshka is used for the original Matryomin. The distinctively styled Matryoshkas are decorated with flower bouquets in red, yellow and green colour. The

Matryoshka used for the Matryomin is not a nesting doll; it works as a container for the musical instrument. Some of the Matryomin owners enjoy customizing their Matryomin, which can be painted as a panda, a cat or as a contemporary doll.

In September 2015, Takeuchi and the Matryomin ensemble visited Russia to perform with the Theremin and the Matryomin in Saint Petersburg and Moscow. Their tour title was “Matryomin goes back to her country”. Twenty-six members participated in the tour to play the Matryomin. They held concerts at the Matryoshka factory, at a university auditorium, on a TV show, at a Multimedia Art Center, and at Gorky Park. They met Leon Theremin’s family, including his granddaughter, and great grandson, Peter Theremin, who is a young Theremin player and instructor. Peter Theremin played the Matryomin with the Matryomin ensemble at the university where Leon Theremin studied. Members visited Leon Theremin’s grave and, one by one, they paid their tribute to the late Leon Theremin.

The Theremin is not an easy musical instrument to play. As a result, there are very few professional Theremin performers in the world. Leon Theremin had two daughters who were twins. One of them, Natalia Theremin, still works as a Theremin player in Russia and sometimes she gives a recital with her grandson, Peter. Natalia’s performance has been included in the film *Theremin and Matryomin*, and she also talks about her grandson Peter. Another Theremin player, Lydia Kavina, who was also Takeuchi’s Theremin teacher, is well known in the world. She is Leon Theremin’s cousin’s granddaughter. Lydia Kavina does not appear in the film but she has had an influence on Takeuchi and impinges on Takeuchi’s way of thinking about the Theremin.

Takeuchi’s pupils, who are members of the Matryomin ensembles, also participate in the

film and talk about how they were attracted to the Matryomin.

Takeuchi says about his invention and his performance activities, “This is my journey to see or look for an unseen friend.”

His journey continues.

The main character in the film, Masami Takeuchi, the Matryomin inventor, was born and raised in Saitama, Japan, in 1967. He got interested in music in middle school, and later enrolled at the Osaka University of Arts to study musicology. After studying there, he worked as a sound technician at the Music Hall, where he experienced world-famous musicians’ concerts from behind the scenes every night. He became interested in the Theremin when he was a University student, and decided to study the Theremin in Russia. He learned to play the Theremin under the guidance of Lydia Kavina in 1994. Takeuchi has played more than 150 concerts and appeared in over 100 TV programs. He has also published books about Leon Theremin and the musical instrument, Theremin.

Takeuchi returned to Japan from Russia, and started performing and teaching the Theremin. In Japan, he recorded several Theremin CDs and gave numerous concerts. He had a unique idea to promote the Theremin. The Theremin is hard to play but Takeuchi wanted more people to be familiar with the instrument. His idea was to put a Theremin system into a Russian Doll, the Matryoshka. He believed that the Matryomin would be a cultural icon as a musical instrument. Currently, he organizes the Matryomin ensemble and manages their performances throughout the world.

My relationship to Thesis Subject

The Theremin inspired me greatly when I heard about it for the first time. In 2007, a Japanese magazine, “Science Projects for Adults,” published by Gakken, featured the “Theremin Special” in September, Vol. 17. The magazine introduced the history of the Theremin as an instrument and also carried an interview with Leon Theremin's family. The magazine usually came with a supplement, a scientific assembling kit such as an old-style twin-lens reflex camera or a mini electric guitar with built-in amplifier and speaker. In this issue of the magazine, the supplement of the scientific assembling kit was a small red Theremin. I assembled the toy-like small Theremin, following the instructions. It took a few hours to finish it, though it was not so hard. After completing the project, I tried to play the Theremin. It produced sounds without physically touching the instrument, as advertised in the magazine. When I floated my right hand in the air, the instrument sang like a human voice. To be honest, I could not understand the scientific theory or the functioning of the Theremin; however, the sound was enough to capture me. It was an astonishing moment for me to produce sound by waving my right hand and fingers in the air. Since then, I have been fascinated by this magical musical instrument.

My background originates in music. I started learning the piano when I was three. Besides the piano, I enjoyed playing keyboard instruments such as the electronic organ, the synthesizer and the pipe organ. The traditional Japanese string instrument, the Koto, was also my instrument. I taught music and worked as a musician for a long time. Moreover, I composed music and performed as a musician. I have a perfect pitch in my mind. Usually, the pitch is prepared on musical instruments, especially on keyboards. For instance, on the piano, the eighty-eight black and white keys are well prepared before playing. The tone C is C, regardless of who plays it. Even on string instruments such as the violin and the cello, the pitch could be created on

the strings by visible equal intervals on the instrument. Therefore, the open string A is A, no matter who plays it with a bow. Compared to these examples, the Theremin gives players freedom. There are no indexes to decide the pitch in a visible way. This means that the player has freedom to make a decision to create the right pitch. The pitch and its route are in the air. The player has to take all the responsibilities for this freedom. Thus, the pitch-creating method, using hand movements without touch, attracted me. As a musician, I find sound produced in this subtle fashion to be more than incredible.

There were two trends during the Theremin popularity in the recent past in Japan. The first was inspired by the documentary film, *Theremin: An Electronic Odyssey* (1993), directed by Steven M. Martin, which was released in Japan in 2001, and another was, as mentioned above, when the magazine featured the Theremin in 2007. Through these two events, people in Japan came in "touch" with the Theremin.

Last year, I was searching for "Symphony No.9" by Beethoven on You Tube and noticed that images of a Russian doll, the Matryoshka, appeared in several video clips. The performers wore black dresses and each was holding a Matryoshka on her lap. I clicked the Matryoshka video out of curiosity, and found that the video was not about a Russian doll, but about a musical instrument, the Matryomin, that could be played. I was highly inspired by the Matryomin. I could not believe that so many people by floating their fingers in the air could play Beethoven's Symphony No.9 on Matryomins. One video led to another. I kept watching and listening to the Matryomin ensemble's performances and started researching about it. On learning that the Matryomin was a kind of a developed version of the Theremin, I decided to make a film about

the Theremin and the Matryomin. Instantly, I contacted the inventor of the Matryomin, Masami Takeuchi, and he agreed to participate in the film *Theremin and Matryomin*.

At the Integrated Media Arts program of Hunter College, I created a few sound-related works in Prof. Michael Gitlin's courses: Microcultural Incidents and Sound Environments. The projects which I created made experimental use of sounds for themes relating to Glenn Gould and the Northern Lights.

In addition to the sound projects, I made two Russian and music-related documentary films; they were "Tokarev's Wife" in a Documentary Editing course of Prof. Kelly Anderson and "A Man Who Opened the Iron Curtain ~Willi Tokarev~" in a Sociology course of Prof. Stuart Ewen. Both were related to the legendary Russian singer-songwriter, Willi Tokarev. The story is as follows: "During the Soviet Union era, Willi Tokarev made anti-government songs, and sometimes, his music could not be broadcasted. He decided to move to the United States but the government took away his musical instrument, music sheets and money. When he came to the United States, he had only five dollars. He worked as a taxi driver, dishwasher and messenger boy to fulfill his dreams. Finally, he hired musicians and recorded his music. He sang about America. People in Russia could know about the West through his songs. However, Willi could not go back to Russia for fifteen years. His mother in Russia had no means to know whether Willi was alive or not. Willi continued making new songs in New York. At last, the new liberal President, Mikhail Sergeyevich Gorbachev, let him return to Russia. He gave a concert in Moscow and millions of people rushed to the concert."

My experience and study on the projects at the Integrated Media Arts Program contributed to my thesis project *Theremin and Matryomin* in all aspects: story making, cinematography and sound creation. Consequently, the film is both an artistic sound project,

featuring original music, and an historic documentary.

Research Analysis

The research for the thesis project has three aspects: reading, watching and listening. I explored the following in my research: the musical instrument Theremin, its inventor—Leon Theremin, Matryoshka dolls, Russian and Japanese cultures, Western and Eastern music, and history in Russia and Japan. By reading books and articles, watching films and videos, and listening to the Theremin sounds and music, I was inspired to explore the subject in greater detail. Sometimes, during my research, I had new ideas for my project.

I began by watching a feature documentary film, *Theremin: An Electronic Odyssey* (1993), directed by Steven M. Martin. The film won the Documentary Filmmaker's Trophy at the 1994 Sundance Film Festival and was nominated for an International Emmy Award. It was screened around the world, including in Russia and Japan. In Japan, the film was released in 2001 where it created a "Theremin trend". The roadshow was a big success and the Japanese audience learned about the Theremin through this film. According to Masami Takeuchi, the inventor of the Matryomin, a distribution company consulted with Takeuchi about the film *Theremin: An Electronic Odyssey*, and following Takeuchi's advice, they decided to distribute the film in Japan.

The film shows Leon Theremin's life through his invention, the Theremin. After the invention of the Theremin, Leon Theremin moved to New York and continued his study. He also gave Theremin concerts in the United States. However, in 1938, he was "kidnapped" by Russian agents and taken back to the Soviet Union. Other sources claim that Leon Theremin "returned" voluntarily. His whereabouts in later years were unknown for a long time. In the film, in one of

the last scenes, old Leon Theremin is invited to visit Stanford University and given an award. He also meets Clara Rockmore, a virtuoso of the Theremin, in New York. The suspenseful narrative of the film, like that of a detective story, holds the audience.

In *The New York Times*, on October 1st, 1994, a film critic described the film as "The Strangest Instrument and Its Even Stranger Inventor". The writer says, "the Theremin is the weirdest of all musical instruments", and "it is surpassingly strange." It may seem especially strange since performers can play the Theremin without physically touching it. However, considering the inner theory of the Theremin, no musical instrument offers more freedom than the Theremin. The Theremin releases players from musical temperament and intervals. In a sense, the Theremin is a liberated musical instrument.

While the Theremin is not widely played, the evocative timbre of its sounds are well known in many films, such as in *Bride of Frankenstein* (1935) directed by James Whale; in *Spellbound* (1945) by Alfred Hitchcock; in *The Spiral Staircase* (1945) by Robert Siodmak; in *The Day the Earth Stood Still* (1951) by Robert Wise; in *Lost Weekend* (1945) by Billy Wilder; in *The Thing from Another World* (1951) by Christian Nyby; in *It Came from Outer Space* (1953) by Jack Arnold; in *Hobson's Choice* (1954) by David Lean; in *The Machinist* (2004) by Brad Anderson; in *The Holy Girl* (2004) by Lucrecia Martel; and in *Alien Trespass* (2009) by R.W. Goodwin. Most of the films in which the Theremin was used for sound effects or music, were categorized as science fiction, thriller or horror.

In addition to film music, the Theremin has featured in popular music recordings; by Samuel J. Hoffman who is a Thereminist, in his albums in the 1940's; in "Whole Lotta Love" and "No Quarter" by Led Zeppelin; "Between the Buttons", "Their Satanic Majesties Request",

"Please Go Home", and "2000 Light Years from Home" by The Rolling Stones, and in "Good Vibrations" by the Beach Boys—the most famous piece featuring the Theremin.

As mentioned before, the Matryomin is a kind of Theremin in which the Theremin system is mounted in a Russian doll, Matryoshka. The doll was introduced by artists S.V Malyutin and V.P. Zvyozdochkin at the end of the 19th century. The Matryoshka doll is a symbolic Russian icon as well as a famous Russian nesting doll. Each doll in a set of Matryoshka is not completely identical; costumes are the same, however, the color or the fabric pattern is different. Or each doll in a set holds different things such as flowers, kitchen tools, toys, vegetables, fruits or butterflies.



Matryoshka dolls

http://www.musobl.divo.ru/Econst_matreshka.html

It is believed that the traditional Russian Matryoshka was modeled after a Japanese nesting doll. In some Russian sources, it is mentioned that the Matryoshkas were modeled after an old Japanese nesting doll “Fukuruma”. However, we don’t have the word “Fukuruma” in Japanese. As some researchers pointed out, the “Fukuruma” is a shortened form of two Japanese

words combined: “Fukurokuju” and “Daruma” or “Fukudaruma”. Certainly, the old Japanese nesting doll exists and the doll had been created in Hakone, Japan. The “Fukurokuju” who has a long bold head, is one of Seven Lucky Gods in Japanese mythology and he is the God of wisdom, longevity, and happiness.



Fukurokuju doll

<https://russian-crafts.com/crafts-history/nesting-dolls-history.html>

As for the musical instrument Matryomin, the outer figure of the Matryomin is produced in Semyonov in western Russia. I visited the Golden Khokhloma Factory, which is the Matryoshka factory in Semyonov. Semyonov is a town in Nizhny Novgorod Oblast province, about 50 miles north of Nizhny Novgorod city. The population here is 3,310,597 according to a 2010 census. The small town of Semyonov lies at the confluence of the rivers, Volga and Oka. It is located 260 miles (420 km) east of Moscow.



Nizhny Novgorod Oblast in Russia
Wikipedia

Semyonov is well known for traditional handcrafts. The Matryoshka dolls and Khokhloma wood painting, which is a traditional Russian folk art, are created in this town. The Semyonov style of Matryoshkas is well known for containing many pieces, sometimes from fifteen to twenty dolls nesting in the "mother" Matryoshka. Each work is hand made by artisans and then hand painted.



Matryoshka dolls
Photo by Kayoko Nakamura

The Semyonov style of Matryoshka dolls are made at the Golden Khokhloma Factory. Most Matryoshka dolls are made from lime trees. The Semyonov traditional style Matryoshka has flowers on the front apron of the doll, and the artists use aniline dyes to paint them. The colors red, yellow, green and blue are used on the scarf on the head, and on the sarafan, which is a Russian dress and apron. In the traditional way, the flowers or bouquet are painted asymmetrically.

The outer figure of Matryomin, the Matryoshka container, is made at this factory in Semyonov and exported to Japan. The inner substrate and the antenna are made in Japan. After getting both the Matryoshka and the inner circuit, the Matryomin inventor, Takeuchi, installs the parts inside the Matryoshka, thus completing the creation of the Matryomin.

Thesis Production Process

Both the Theremin and the Matryomin are very unique musical instruments. In music history, nobody created a musical instrument which could be played without touching. They are obviously remarkable musical instruments, however, it is true that they are less well known than other musical instruments. The film will therefore include informative scenes to tell viewers what these instruments are. Considering that the Theremin was invented in 1920 and the Matryomin in 2003, their history has just begun. Nowadays, people can learn about them and listen to their performances through You Tube. People who have a more serious interest can access the videos. My target audience is not only musicians but also people who have not heard about the Theremin and the Matryomin. Various aesthetic approaches have been used in the film to enable viewers to understand the background of the Theremin and the Matryomin.

First, archival footage is used to describe Leon Theremin's invention and his life. This includes his performances and interviews. In addition, images and text will be used to explain how the Theremin works as a musical instrument. The functioning of the Theremin is simple to understand for scientists, but graphical images with text will help ordinary people to understand it better.

Second, computer graphics and animation will be used to explain about the Matryomin, in which the Theremin system is mounted in a Russian doll, Matryoshka. In one scene, the method of Stop Motion animation is used, which is a primitive animation technique, captured one frame at time, with dolls or physical objects moved between frames. By playing back the sequence of images rapidly, the illusion of movement can be created. The method is like a primitive flipbook. This method is used to depict the Russian doll, Matryoshka, and the Matryomin. In the animation, the nesting Matryoshka dolls pop out one after another from the mother doll and dance together. The musical instrument Matryomin joins the dance and her head part opens. Inside the Matryomin, people can see the Theremin parts.

As for music, the film will feature several brief performances by Theremin players and by Matryomin players, including Leon Theremin, Clara Rockmore, Peter Theremin, Masami Takeuchi and the Matryomin ensemble. In addition to their performances, *Rhapsody on a Theme of Paganini, Op. 43* by Russian composer Sergei Rachmaninov, is used throughout the film. A "rhapsody" in music is an episodic musical instrumental work with free structure. It consists of colorful tonality and moods. Rachmaninov borrowed a theme from Nicolo Paganini and composed it as a set of 24 variations. I tried to create my *Rhapsody* through film by weaving colorful episodes together with Rachmaninov's music, which Leon Theremin and his daughter loved. I also love his music. *Symphony No.9, Op.95, From the New World* by Antonin Dvořák is

also used in the film. Dvořák, a Czech composer, created this work when he was in New York. “The New World” meant America for Dvořák; however, it might have a different meaning when played by the Theremin and Matryomin players, because they are exploring a “New World” through new musical instruments.

Audience and Distribution Strategies

The main target audience of the film *Theremin and Matryomin* is in the educational field. People who are interested in electronic music, science or the Theremin would be a natural audience; people who are interested in Russian or Japanese cultures, and Matryoshka maniacs, are a secondary target audience. Geographically, it will have potential screenings or events in the United States, Japan and Russia.

First, the film will be submitted to major film festivals around the world. Considering the film’s theme, music film festivals such as TriBeCa Film Festival Music Film Challenge, Reel Music Film Festival or World Music Independent Film Festival will be targeted. Next, because of the geographical aspects, the many film festivals in New York, Russia and Japan will also be considered. These include: the New York Film Festival, DOC NY film festival, NYC Independent Film Festival, Brooklyn Film Festival, Russian Documentary Film Festival in NY, Moscow International Film Festival, Russian Open Documentary Film Festival ArtDoc, FLAHERTIANA International Documentary Film Festival in Russia, Yamagata International Documentary Film Festival in Japan, Tokyo International Film Festival, Kansai International Film Festival and Yubari International Film Festival. Besides these film festivals, Asian or Asian American film festivals in the United States should provide additional opportunities for screening my film.

Second, I am planning to produce independent film screenings in Manhattan area. I will rent a screening location and promote the screening by using social networks and local media. The rental fee will be covered through ticket sales.

Third, I will promote my film using a self-distribution system through a website in Japan. The film's website will include a film trailer, synopsis, updated news regarding the film screenings, and information such as the history of the Theremin instrument and its inventor Leon Theremin, and that of the Matryomin. People who are interested in the film and are willing to hold a screening event can sign in to access the film DVD for a fee through the website. The following is the self-distribution system: I will lend the film DVD for a small fee to institutions or individuals who plan a screening event. They can charge a film ticket fee to their audience. If the ticket-selling income is more than their expenses, they can earn a profit. The small fee for borrowing the film will be based on the number and size of audiences. In Japan, this system is becoming popular among independent filmmakers. I would like to use this method for the film's self-distribution.

Besides the film's website, social networking sites such as Facebook, blogging, and Twitter will be used as distribution tools. I believe that most viewers of the film are familiar with social networking websites. Posting information on the social networking sites will help in word-of-mouth advertisement of the film *Theremin and Matryomin*. It will begin with the people who are involved in the film, and spread further through the network.

In addition to these distribution strategies, I would like to promote the film through communities. I have worked with Matryomin ensemble groups and schools in Japan. The members are from all over Japan. Some people come to a Matryomin lesson by airplane or bullet train-Shinkansen. Some of them have their own Matryomin communities in their hometown.

Such participants can support the film distribution in their communities. Regardless of the distribution method of the film, when they give their concerts or events, the film *Theremin and Matryomin* would be included as part of the program or with the music concert.

The history of the Matryomin has just begun. An inspired human being invented a unique musical instrument. Musical instruments need performers. Both the inventor of a new instrument and its performers are pioneers. As the Theremin before it, the Matryomin also follows the track of the future. This invention is like a seed in the ground; its popularity is growing slowly through the people who are attracted to it. And the sound of this new music will continue to inspire people throughout the world.

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