

# SeedBroadcast



## agri-Culture Journal

*Cultivating Diverse Varieties of Resilience #9*



## 9<sup>th</sup> Edition SeedBroadcast Journal

We would like to thank all who generously contributed to our 9<sup>th</sup> edition of the bi-annual **SeedBroadcast agri-Culture Journal**. We are building from the soil up and invite all who read this to consider contributing to the 10<sup>th</sup> edition that will be published in the Spring of 2018. This contribution could be a drawing, photograph, story, recipe, poem, or an essay, with relevance to the essence of seeds, seed saving practices and food sovereignty. We are looking forward to hearing from you. Each of you holds a wisdom and it is this wisdom we hope to share.

Please include a short bio, images should be at least 300 DPI 4" x 6", and send us your mailing address as we will mail you a stack of printed copies to distribute in your own locale.

## THE DEADLINE FOR SUBMISSIONS IS FEBRUARY 15<sup>TH</sup>, 2018

Send submissions to [seedbroadcast@gmail.com](mailto:seedbroadcast@gmail.com)

You can keep up with our actions and encounters with other seed lovers at on our website [www.seedbroadcast.org](http://www.seedbroadcast.org) and follow our blog at [seedbroadcast.blogspot.com/](http://seedbroadcast.blogspot.com/)

We want to thank our fiscal sponsor LittleGlobe, the McCune Charitable Foundation, Robert Rauschenberg Foundation Climate Change Solutions Fund, Native Seeds/SEARCH, to our SeedBroadcasting cohorts especially the farmers that have allowed us into their fields and lives, Aaron Lowden and the Southwest Conservation Corps Ancestral Lands in Acoma Pueblo, [www.sccorps.org/join/ancestral-lands/](http://www.sccorps.org/join/ancestral-lands/), Dr. Larry Emerson and Jennifer Nevarez of Tse Daa K' aan Lifelong Learning Community in Hogback, New Mexico, Beata Tsosie-Peña of Santa Clara Pueblo and the Española Food Oasis [www.facebook.com/Espanola-Healing-Foods-Oasis-1697727540506515/?hc\\_location=ufi](http://www.facebook.com/Espanola-Healing-Foods-Oasis-1697727540506515/?hc_location=ufi), Ron Boyd of Mer-Girl Gardens, in La Villita, New Mexico [www.facebook.com/Mer-Girl-Gardens-295388580481343/](http://www.facebook.com/Mer-Girl-Gardens-295388580481343/). Also Rowen White, Sierra Seed Coop, [sierraseeds.org](http://sierraseeds.org), Marilyn McHugh at the Hummingbird project, [www.hummingbirdproject.org](http://www.hummingbirdproject.org), Native Seeds/SEARCH, [www.nativeseeds.org](http://www.nativeseeds.org), Rulan Tangen and Dancing Earth [www.dancingearth.org](http://www.dancingearth.org), Cristobal Wells, [allspeciesprojects.com](http://allspeciesprojects.com) Ana Ruiz Díaz and Toña Osher for building our relationship to community actions and seed activists from Meso-America and to the many individuals for their continued support, Lacey Adams for graphic design, Natalie Keys for transcribing and Cirelda Byran for distribution, and to the amazing anonymous donors that continue to support our work. We extend a huge welcome to all of our local and national partners and to our seeds that continue to inspire and give us hope.

For a list of our partners go to: [SeedBroadcast.org/SeedBroadcast/SeedBroadcast\\_Roots.html](http://SeedBroadcast.org/SeedBroadcast/SeedBroadcast_Roots.html)

# SEED=FOOD=LIFE

SEEDBROADCAST IS A COLLABORATIVE PROJECT INITIATED BY CHRISSIE ORR AND JEANETTE HART-MANN. WE CAME TOGETHER THROUGH OUR LOVE OF SEEDS, OUR PASSION FOR GROWING OUR OWN FOOD AND OUR ARTISTIC PRACTICE. WE STARTED A CONVERSATION, WHICH HAS EXPANDED AND SPROUTED INTO THE SEEDBROADCAST COLLECTIVE AND NOW INCLUDES RUBÉN OLQUÍN.

As we all know these times in which we are living can feel like the upside down times. Our world is spinning faster and faster so it is hard to keep up with all that comes our way. What we have known, or feel we know well, is constantly shifting and changing, sometimes for the better and often for the not so good of this planet. All can be over whelming and out of balance. However there are meaningful ways to ground ourselves back into this world, these ways might be different for all of us but we at SeedBroadcast have been following the way of the seed and are dedicated to what they teach us and in return offer our support to keep their nurturing stories alive and in good health.

**We too are seeds...**

**SEEDBROADCAST** holds the belief that it is a human right to be able save our seeds and share their potential, to be able to grow our own food and share this abundance, and to cultivate grassroots wisdom and share in its creativity. We seek to reveal the culture that has been lost in agriculture and believe that seeds are witnesses to our past. They have their own story to tell and it is up to us to listen.

**SEEDBROADCAST** encourages communities to keep local food and culture alive and vibrant through working together in creative and inspiring ways. We spend time with people on their farms, in their gardens, at seed exchanges and at community gatherings to dig deeper into the often unheard stories of local agriculture. Our traditional farmers, avid gardeners and local organic food growers are inspired by the seeds they sow and save, they take notice of what grows and what does not, they learn from the seasonal shifts, experiment with when to plant the first pea and when to harvest the seed for next year. This vital knowledge base of plant and human connection is what we seek to cultivate, disperse and nurture.

At the 1st annual Seed Exchange in Anton Chico, New Mexico a local farmer, who's family has been growing concha corn for many generations stood with his hand clasped around a corn kernel and spoke loud and clear "If we loose our seeds we will lose our culture."

Our ancient seeds and their diverse stories are in danger of disappearing. They are our lifeline to our past, present and future. Without these ancient, creative, and resilient seeds, we would lose our familial connection to the earth and its biota. So we invite you to hold a seed and listen to what stories it has to tell you, plant a seed and share its wealth. Then share this seed story with your neighbor and become an inspiration for others to join this radical seed sovereignty movement.

Here in New Mexico (the home-base of SeedBroadcast) our seeds are held in reverence as they hold nourishment not only for our bodies but our spirits. They store the stories that guide us through these vast fast-paced modern times and bring us back to our earth-based wisdom. With the rapid shift in our climate nothing is the same, our planting times are different every year, the pollination of the corn cannot be predicted, the monsoons perhaps will come or perhaps not, and with these changes we are losing some of our crop diversity and are wondering how we will continue to feed our families and communities. So we have to make sure that our seeds and our ways of growing food can have time to adapt to these changes. Our arid land farmers are aware of this and have been for generations, we have a lot to learn from them.

We continue to gather and disperse this wisdom, making sure that there is a connectivity between farmers, urban gardeners, schools, and the community at large to open up the conversation about our locally sourced food production, food security and climate change.

This year we are honored to be able to join with such dedicated communities, especially our Meso-American neighbors in the continued action of resilience to save our seeds.

You too can be part of this action:

We ask you to find some seeds, it could be from a walk where you gather wild grass seeds, or from your garden or the local urban farm, hold them in your hand and feel what stories they are holding. Seeds hold a wisdom that we need to listen to and if we do they will guide our way. Then scatter those seeds and tend them well.

**It is time. We are the seeds!**

FOR MORE INFORMATION AND TO GET INVOLVED PLEASE CONTACT [SEEDBROADCAST@GMAIL.COM](mailto:SEEDBROADCAST@GMAIL.COM)

TO FOLLOW OUR SEED PILGRIMAGES GO TO [SEEDBROADCAST.BLOGSPOT.COM](http://SEEDBROADCAST.BLOGSPOT.COM)

[WWW.FACEBOOK.COM/SEEDSHARE](http://WWW.FACEBOOK.COM/SEEDSHARE)

**PLEASE HELP US GROW!**  
Support SeedBroadcast with a tax-deductible donation!

**TO MAKE A TAX DEDUCTIBLE DONATION TO SEEDBROADCAST GO TO:**

**Online donation:**

seedbroadcast.org/SeedBroadcast/SeedBroadcast\_Donate.html

**Or contact our fiscal sponsor Littlelobe for other payment options:**

Phone: 505.980.6218

Email: info@littlelobe.org

Your donation will help us to keep activating local food and seed resiliency through community partnerships.

It will help keep the agri-Culture Journal free and distributed from hand to hand.

It will help sprout SeedBroadcast projects, such as expanding our relationship with seed activists in Meso-America and allow us to deepen our community-based responses to seeds and climate resiliency.

It will support the creation of installations of localized documentary images and text with community engaged actions in Acoma and Española, leading up to a Seed and Climate Resilience exhibition and community engagement in partnership with the Albuquerque Museum, Native Seeds/SEARCH and farmers in the Summer of 2019.

SeedBroadcast has been and continues to be funded by in-kind donations of time, labor, and money from collective SeedBroadcasters. Additionally, from 2012 – 2017 SeedBroadcast received generous grants from the Kindle Project Fund of the Common Counsel Foundation, McCune Charitable Foundation, the Robert Rauschenberg Foundation and anonymous donors that support our continued projects. We are also grateful to the individuals and institutions that have sponsored our participation in their public events helping to offset travel expenses. All of these funds are essential for the successful operation of SeedBroadcast.

With the increasing demands for SEED Action now, we need help to ensure that the SeedBroadcast agri-Culture Journal, our ever expanding actions and that our partnership with Native Seeds/SEARCH and community activist organizations will deepen the focus on food and seed sovereignty in times of rapid climate and environmental changes that are causing devastation to our mother earth. Your donation will help us to build the capacity to dig deep, sprout tall, and shout out for more action to plant the seeds of our ancestors across the land.

SeedBroadcast thanks you for your support and BELIEF in the power of Seeds, Stories, and agri-Culture!

“Though the ancestral parent tree has been killed, there are still a few seeds of the old violated tree around. As long as a few of us continue to keep them safe, well fed and viable the day will come when they can once again will come back to life, their faces returned to the day, and from that ancient seed Hole retrieve the modern world from Death’s Amnesia, bursting into the flowered fruit of life well married to the earth.”

Martin Prechtel, Long Life Honey in the heart.

This issue is dedicated to Ali Sharif who worked tirelessly for the betterment of this planet. Ali was the one who would work in the fields all day with all the workers. He was born Iranian royalty but after a British education he opted to become a wandering irascible magic maker. Eventually in 1988 he began to animate Permaculture courses throughout Ecuador, Peru, Meso-America, Brazil, which led to establishing a Permaculture college in the Amazon. His last act was to plant a hectare of garden for HIV children in Mozambique. Ali your presence will be sorely missed but the seeds you planted will continue to sprout and nourish us all.

# SeedBroadcast

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## BLUE CORN DREAM BOAT

IREN SCHIO

Clockwise from top:

### "8 YUCCA PODS IN A BOX "

Mixed media

5" wide by 10" tall by 1 1/2" thick

### BLUE CORN DREAM BOAT

Mixed Media

13" long x 15 " high x 6" wide

### "PURPLE THISTLE, SUN DRIED"

Photograph



IREN SCHIO WAS BORN AND RAISED IN ZURICH, SWITZERLAND. SINCE 1995 SHE HAS LIVED IN ABIQUIU, NEW MEXICO. SHE WAS A LONG TIME ARTIST IN RESIDENCE AT LITTLE EARTH SCHOOL IN SANTA FE, AND IS CURRENTLY WORKING WITH CHILDREN AND YOUTH IN ABIQUIU.

SHE LOVES TO GARDEN AND HIKE, " I HAVE BEEN CREATING MIXED MEDIA WORK ALL MY LIFE. I LIKE TO CALL IT VISUAL POETRY".



## SONG OF THE BERRY

CO-WRITTEN BY LAURA DVORAK AND LEZLIE AMARA PIPER,  
2014

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LAURA DVORAK IS A HOLISTIC EDUCATOR LIVING ON HAWAII ISLAND. SHE HAS BEEN WRITING POETRY FOR OVER THIRTY YEARS. HER FAVORITE NATIVE SEEDS ARE FROM THE WILI'WILI TREE OF THE DRYLAND FOREST. THEY ARE A BRILLIANT RED. OTHERWISE, CALENDULA SEEDS FASCINATE HER.

LEZLIE AMARA PIPER IS A SELF-PROCLAIMED HICK FROM EASTERN IDAHO WHO MANAGED TO MAKE IT THROUGH CHILDHOOD BY WANDERING GOLDEN, SAGE-COVERED FOOTHILLS, VISITING WILD FLOWERS, BURYING HER NOSE IN LITERATURE, AND CAPTURING WORDS IN NOTEBOOKS. SHE CO-OWNS A FARM 30 MINUTES OUTSIDE OF PORTLAND, WHERE SHE COMMUNES WITH TALL TREES, SCRAGGLY WEEDS, OBSTINATE ELK, A VARIETY OF 2, 4 AND MANY LEGGEDS AND DANCES WITH THE MUSE.

PHOTO CREDIT: SEEDBROADCAST

Who was the first  
of earth's children  
to fracture  
the tender sweetness  
of this fruit?

I imagine her surrender  
to its perfect floral gift,  
broken open in the mouth  
not a moment too soon.

Somewhere in the pachamama storybody  
temple,  
a single seed stirred  
In a slumber of bear scat and dark loam  
Bearing a code  
whose expression  
Would carry  
the survival of nations.

In many lifetimes to come,  
we would also gather in eager praise  
and tip toe on bare feet  
through the tangle of morning glory  
And a bright blaze of golden petals

to pluck the heavy offerings  
of a season's fading hymns-  
small indigo spheres  
rolled over fingers  
into palms and baskets and skirts,

Soon to be  
Aged as honey wine  
simmered into jam  
or lifted to the mouth  
as a solitary treasure.

Each berry a collection

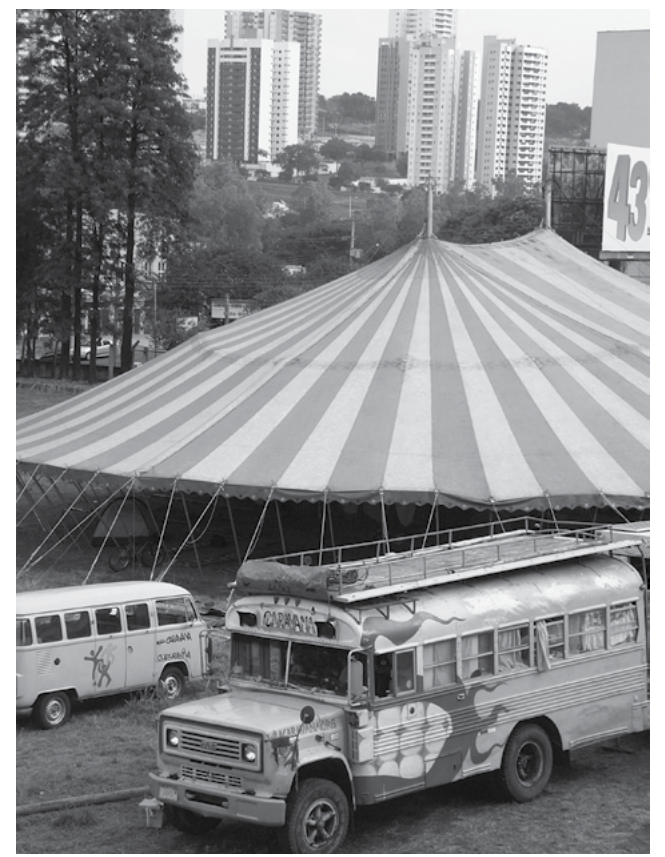
of moments and sun and soil  
and the work and hopes of  
generations of genetics  
combining their secrets  
to perfect berry bounty.

imagine how the light

lifts as do her eyes  
(this first earth child)  
as the poetry of taste  
opens her tome upon  
her tongue

stars and sisters  
fathers and families  
lovers and laughter  
as azure sweetness  
paints and  
escapes the boundaries  
of flesh.

Imagine how from this  
simple fruit  
bursts forth a blue-blooded  
royal song of summer.  
and with it comes the joy of  
a lovers stained hands  
and the scent of a sister's  
hair as she plucks  
the ripe fruit



## MAZORCA ALBERTO RUZ

MAZORCA, was the leading vehicle from the Rainbow Peace Caravan in its 13 years journey, across 17 countries, from Wisconsin all the way to Tierra del Fuego, and from there to Belem de Para, northeastern corner of Brazil, from 1996 until 2009.

I chose its name in New Mexico in 1995, when I left the Rainbow Gathering and I saw a small motor home from the 50's, with the shape of a corn cob, and decided that I will find one and commit to cross the continent spreading "seeds of hope and tools for change" wherever we went.

The Mazorca first, and then a half dozen of other vehicles that joined the Caravan, generated a living legend, inspiring, forming and strengthening, several hundreds of people that travelled with us, many of whom are now leading the ecovillage, bioregional, transition, eco neighborhood, and green villages networks and movements from South America. C.A.S.A. Latina, the South American branch of the Global Ecovillage Network is one of its examples.

When Mazorca returned to Mexico, back to its departing port in our Huehucoyotl ecovillage, she took part in different projects such as setting a Peace Village at the Cumbre Tajin in Veracruz; another at the World Social Forum, downtown Mexico City, and the Ecobarrios program in Coyoacan; and in four Vision Councils of Earth Guardians held in Nierika ecovillage, State of Mexico.

She is now waiting in Huehucoyotl, for some very much needed support from all sources, to get on the road again, after some necessary repairs, repainting, brakes, new tires and wheels.



ALBERTO RUZ BUENFIL IS A PIONEER, VETERAN AND HISTORIAN OF THE INTENTIONAL COMMUNITIES, ECOVILLAGE AND BIOREGIONAL MOVEMENTS. CO-FOUNDER OF HUEHUCÓYOTL ECOVILLAGE IN MEXICO FOUNDER AND COORDINATOR OF THE "CARAVANA ARCORIS POR LA PAZ" OF THE FIRST INTERNATIONAL FORUM FOR THE RIGHTS OF MOTHER EARTH, IN MEXICO IN 2016, AND MAIN SPEAKER FOR THE RIGHTS OF NATURE IN SEVERAL INTERNATIONAL FORUMS ON THE PACHAMAMA TOUR 2016 - 2017.

CARAVANAARCOIRIS.BLOGSPOT.COM



## GIFT POT NEVA SCHUELKE

I reached out for spiritual growth in the late 1990s after a great loss. Funny how a death of someone close to us can bring a surge of life seeking energy.

At that time, I was also part of an organization that was doing environmental education for school aged kids, the Environmental Volunteers in Palo Alto, CA. There I met someone who introduced me to an improvisational dance and storytelling form called Interplay based in Oakland, CA.

I participated in Interplay for several years before moving to southern Arizona for retirement. I met many people of all ages, backgrounds, and gender orientations and identities. Some were seminary students in Berkeley.

A year or so after my move, two of the seminary students called and asked to spend the night with us on their way home to Texas. We invited them over and had a lovely visit. When they packed up to leave the next day, one of them pulled this pot out of his suitcase and handed it to me. I was so touched. I asked why he would offer me such a valuable gift.

"Because of your kindness, and you are a gardener."

The pot was not signed, and I have lost their names in time. I still cherish it as a symbol of new growth, which comes again after every dark season.



## MEDITATION SORTING SEEDS

NEVA SCHUELKE

Letting go stems, chaff

A harvest basket glimmers

All that work for this

And, still, the culling

The fungal mark, insect hole

Toss them, chicken feed

The final handful

Polished jewels in a jar

Stores for food, planting

Farmers know to cull

Means survival one more year

Don't shrink from the purge

Gardeners love all

They see soup in every

Stunted plant and seed

To grow a big heart

Demands attention to what's

Good for all of us.

August 2017

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NEVA SCHUELKE IS A WRITER, POET, GARDENER, READER, DOG MOM, LIVING A BUSY RETIREMENT IN SOUTHERN ARIZONA. "I COLLECT, AND SCATTER WILDFLOWER SEEDS REGULARLY. EPAZOTE AND SPEARMINT ARE BOTH WEEDS/VOLUNTEERS IN MY RAISED BEDS."

PHOTO CREDIT: SEEDBROADCAST

TOÑA LUISA OSHER BECAME INVOLVED IN SOCIAL CHANGE WORKING IN ECONOMICALLY DISADVANTAGED SECTORS OF THE U.S. HER TRAVELS BROUGHT HER TO FILM IN THREE WAR ZONES, TO EXPRESS THE 'VOICE OF THE PEOPLE', WHICH BECAME THE HALLMARK FOR MANY OF HER DIVERSE RECORDINGS. SHE FORMED A WOMEN'S MEDIA COLLECTIVE, CO-FOUNDED HUEHUECOYOTL ECOVILLAGE IN MEXICO CO-FOUNDED DELAMILPAATUMESA, A FARMERS' ORGANIZATION AND DEDICATES HER DIVERSE ARTWORK TO HONORING SMALL-SCALE FARMING AND THE DEFENSE OF NATIVE SEEDS IN MEXICO.

## EL ACABADO A JOYFUL CORN RITUAL IN MEXICO

TOÑA OSHER

The work of the acabado is the third and last chore in the cornfields. It is also an ancient community ritual during the homestretch of the labor-intensive planting season. If windstorms and floods haven't already toppled the delicate plants, this collective effort assures a successful harvest.

When several years ago I filmed the Santa Cruz Barrio's acabado I was deeply impressed by the mood of community cooperation, love and celebration. The process began that night in the church's courtyard of the Santa Cruz neighborhood or barrio of Tepoztlán, Morelos, with dozens of local men, women and children—helping to prepare an enormous quantity of flattened-out corn dough, spread out on long tables. A seasoned bean layer was spread on top of the bed of dough, rolled into sausage-like forms, then cut and folded into corn husks and steamed in huge pots set on open fires to produce hundreds of delicious tamales for the following morning. There was an atmosphere of openness and good cheer late into the wee hours of darkness. "One has to be happy when preparing tamales or they won't come out well," commented one of the many cooks. That night, in an easy-going manner, the men assumed tasks considered by some people to be 'women's work,' and elders and young people 'rolled up their sleeves' for this special communal effort. "We do this to be in the good graces of..." another cook told me gesturing skyward with her eyes and head.

Most of the neighbors remained in the church courtyard that night as other delicacies such as sea food soup and ponche de leche con piquete were prepared and loaded onto trucks, together with ceramic bowls, coffee cups and utensils for breakfast in the fields. Around 4 am more people gathered in front of the church to caravan to the communally planted fields about 8 kilometers away. They carry hoes, firecrackers and cookware for this communal work. Some toted large wicker baskets for harvesting fresh, leafy edibles and medicine plants. In the old days, farmers walked to the fields beneath a black velvet sky replete with stars. Today, like marching ants, a slow train of vehicles rumbles to the fields on pitted dirt roads.

Arriving at the appointed destination, even women in their nineties can be seen with hoes, passionately and expertly gathering earth around



the base of each corn stalk. Fires are lit to warm the food and children gaily pass through the towering rows of corn, offering spiked sweet milk ponche to workers who have spread out methodically in all directions. Laughter emanated from the rows as clusters of men playfully gab as they work. A mayordomo (a communal task organizer) walks to each corner of the field, pointing out where some plants have already been chewed by predators. Firecrackers are set off to scare them away, at least for a while, as equally branched crosses -an ancient indigenous symbol- made of pericón flowers (Mexican tarragon) are ceremoniously placed in each corner. They take a break, enjoy hot soup, tamales, and coffee, awaiting the local priest who will join them to bless the cornfield, and say mass under the shade of trees. A song eulogizing the corn can be heard wafting sweetly from a trio of elder musicians.

When the communal task is complete, everyone has eaten, and most families have filled their baskets with chipil, quelite, and medicinal plants for their homes the group gathers briefly on a grassy knoll overlooking the field. The mayordomo and his family ceremonially transfer the traditional power staff to the family selected to assume the next year's task of organizing these

communal efforts. When everyone has piled into departing vehicles, the ritual continues.

Just outside of Tepoztlán, the caravan parks on the shoulder of the road. Everyone is either holding corn stalks, lit candles or carrying painted images of Christian saints. Children give clusters of flowers from their baskets to adorn the cornstalk standards and quietly take their places. In rows of six abroad a singing procession begins, chanting religious eulogies, marching to the same neighborhood church where the ritual started to place the corn stalk offerings on the altar inside.

Outside in the courtyard, more ponche is shared as neighbors chat, pat each other on the back, and bid each other farewell...until the next communal gathering.



TOÑA LUISA OSHER COMENZÓ A INVOLUCRARSE EN EL TRABAJO A FAVOR DEL CAMBIO SOCIAL EN SECTORES EN DESVENTAJA ECONÓMICA DE LA SOCIEDAD ESTADOUNIDENSE. SUS VIAJES LA LLEVARON A FILMAR TRES ZONAS DE GUERRA. GRAN PARTE DE SU AMPLIA DIVERSIDAD DE GRABACIONES SE HA DISTINGUIDO POR EXPRESAR LA VOZ DEL PUEBLO. CREÓ UN COLECTIVO DE MEDIOS DE COMUNICACIÓN DE MUJERES. ES CO-FUNDADORA DE HUEHUECOYOTL, UNA ALDEA ECOLÓGICA EN EL ESTADO DE MORELOS, MÉXICO; TAMBIÉN ES CO-FUNDADORA DE LA ORGANIZACIÓN CAMPESINA DELAMILPAATUMESA. DEDICA SUS DIVERSAS CREACIONES ARTÍSTICAS A RESALTAR LA IMPORTANCIA DE LA AGRICULTURA EN PEQUEÑA ESCALA Y A PROMOVER LA DEFENSA DE LAS SEMILLAS CRIOLLAS EN MÉXICO.

## EL ACABADO: UN RITUAL ALEGRE DEL MAÍZ EN MÉXICO

### TOÑA OSHER

El acabado es la tercera y última tarea de arrimar tierra y aumentar el bordo que sostiene firme a las plantas de maíz en las milpas. Es también un antiguo ritual comunitario y se realiza en la recta final del intenso trabajo de cultivo antes de la cosecha. Si los vendavales y las inundaciones no han tirado las plantas, este esfuerzo colectivo asegura tener éxito en la cosecha.



Hace varios años, cuando filmé el acabado del barrio de Santa Cruz me impresionó el ambiente de cooperación, amor y celebración de la comunidad. El ritual empezó la noche anterior en el atrio de la iglesia de la Santa Cruz en Tepoztlán, Morelos. Mujeres, hombres, mujeres y niños ayudaban a preparar una cantidad enorme de masa de maíz y a extenderla

a lo largo de varias mesas. Sobre la masa se dedicaron a esparcir una capa de frijoles refritos y luego la enrollaron como si fuera una salchicha, cortaron porciones y se pusieron a envolver y amarrar cada una con hojas de maíz. Acto seguido, cocinaron al vapor estos envoltorios en ollas grandes colocadas sobre fogatas, para elaborar cientos de tamales deliciosos para la mañana siguiente.

Hasta altas horas de la madrugada persistían la alegría y el buen ánimo "Una tiene que estar contenta cuando prepara tamales, si no, de plano no salen" me dijo una de las tamaleras. Esa noche, los hombres hacen tareas consideradas comúnmente como 'trabajo de mujeres' y también las personas mayores y los jóvenes se 'arremangan las mangas' para cooperar en el esfuerzo comunal del acabado. "Hacemos esto para congraciarnos con..." comentó otra tamalera, dirigiendo la mirada y su cara hacia el cielo.

La mayoría se queda en el atrio la noche anterior mientras se preparan otras delicias como caldo de mariscos y ponche de leche con piquete, que suben después a los, junto con platos hondos de cerámica, cucharas y tazas para café para desayunar en el campo.

Alrededor de las 4 am se fue juntando más gente frente a la iglesia para partir en caravana a las milpas comunales del barrio de la Santa Cruz a unos ocho km de distancia. Cargaron azadones, cohetes y ollas. Algunos llevaban canastas para cosechar hojas, plantas comestibles y hierbas medicinales. Antiguamente, los campesinos iban a los campos a pie bajo el cobijo de un cielo repleto de estrellas. Hoy cual hormigas, una fila de vehículos avanza rumbo a las milpas y lentamente por la vereda llena de baches.

Una vez en las milpas del barrio, se pueden ver mujeres de hasta noventa años con todo y azadón, apilando tierra apasionadamente en la base de los tallos de cada planta, haciendo gala de su experiencia. Se encienden fogatas para calentar la comida y los niños pasan entre las hileras de maíz alegremente ofreciendo ponche a los campesinos

que se han distribuido en todas direcciones. Risas emanan de las hileras de maíz mientras las cuadrillas de hombres parlotean al trabajar.

El mayordomo se dirige hacia cada esquina de la milpa señalando las plantas que ya han sido roídas por animales depredadores. Se tiran cohetes para espantarlos simbólicamente mientras que, en cada esquina, se colocan ceremonialmente cruces hechas de flor de pericón. Poco después toman un descanso para disfrutar la sopa caliente, tamales y café, mientras esperan que llegue el cura del pueblo a bendecir la milpa y decir misa bajo los árboles. La brisa transporta los cantos de alabanza al maíz de un trío de abuelos.

Una vez concluida la labor colectiva, cuando ya todos han comido y las familias han llenado sus canastas con chipiles, quelites y plantas medicinales para llevar a casa, el grupo se reúne en una lomita que da hacia la milpa, para ser testigos de la ceremonia donde el mayordomo y su familia transfieren el bastón de mando a la familia seleccionada que asume las tareas de organizar los esfuerzos colectivos para el año siguiente.

Y el ritual continúa, se suben a los vehículos -que conducen y estacionan a orillas de la carretera a las afueras de Tepoztlán. Todos bajan cargando tallos de maíz, velas encendidas e imágenes de santos. Los niños traen flores en canastas para adornar los estandartes hechos con tallos de maíz y en silencio toman su lugar en una formación de hileras de unas seis personas. Entonces inician una procesión donde cantan alabanzas religiosas hasta llegar a la iglesia donde empezó el ritual y colocan las ofrendas de maíz tierno en el altar. Afuera, los vecinos del barrio siguen compartiendo ponche, conversan, se dan palmadas en la espalda y se van despidiendo... hasta la próxima reunión comunitaria.

PHOTO CREDITS: DIBUJO CAMPESINO CON SU HIJO EN MILPA PAINTING TOÑA LUISA OSHER.

DE LA MILPA A TU MESA CARTEL. TOÑA LUISA OSHER AND HORACIO FARINA

OLLA DE TAMALES. TOÑA LUISA OSHER



# PLANTCRAFT: MEDICINAL BOTANICALS OF NEW MEXICO

JOANNA KEANE LOPEZ



*Ericameria nauseosa*

## CHAMISO BLANCO

**CHAMISA, RABBITBRUSH, GOLDEN BUSH**  
**ERICAMERIA NAUSEOSA**  
**ASTERACEAE FAMILY**

Chamisa grows abundantly along roads and arroyos and blooms an ecstatic golden yellow in autumn. Dense clusters of yellow-green flowers turn to rich gold atop this perennial shrub that can grow as tall as a person. It has a deep root system that allows Chamisa to tap into underground moisture. It grows alongside Apache plume, juniper grasslands and piñon eco-zones.

### MEDICINAL USES

A hot tea of chamisa is used to break fevers and promote sweating. A strong tea of dried leaves and yellow flowers added to bathwater is used to reduce swelling and pain of arthritis.

### TRADITIONAL USES

Chamisa is known as one of the oldest indigenous dyes of the Southwest and has been used extensively as a natural yellow dye. Spanish-Mexican-Americans created a solution of guaco (*Cleome serrulata*) and the boiled flowers of chamisa to make a yellow paint. A tea from the leaves have been used as a remedy by the Rio Grande Pueblos to cure stomach disorders. At Jemez it has been used as a throat gargle for colds and as a bath to ease fevers. At Sandia, ground leaves mixed with cornmeal were used in treating wounds. It has also been used a febrifuge, a medicine used to reduce fever.

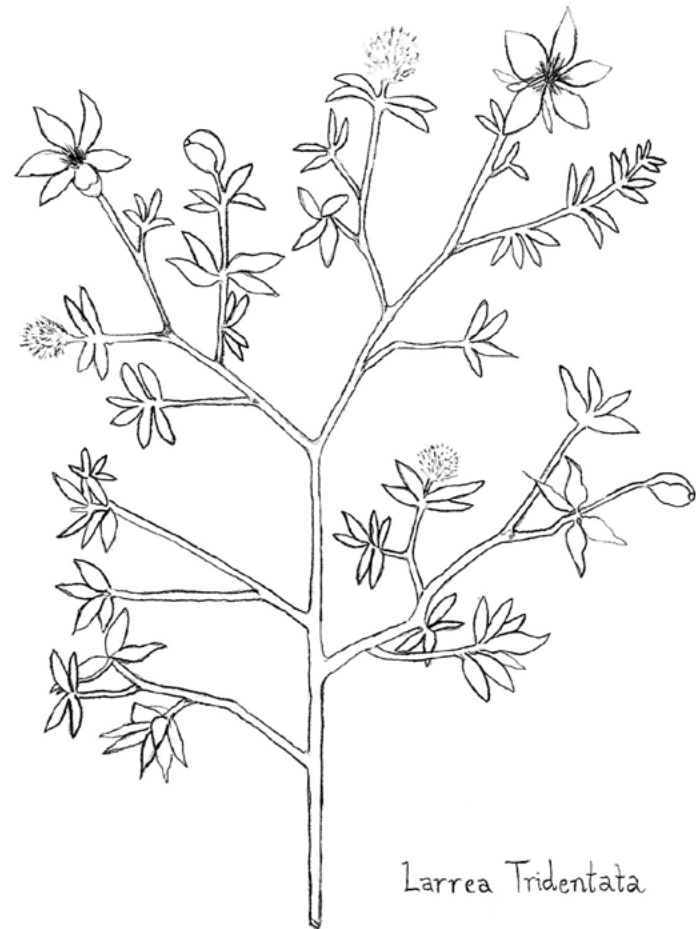
### DOSAGE

Internally as a tea of 1 tsp herb per cup of water to 1-3 times a day. Externally as needed in the bath. As a dye, simmer flowers until desired consistency.

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JOANNA KEANE LOPEZ WAS BORN AND RAISED IN ALBUQUERQUE, NEW MEXICO. SHE GRADUATED WITH A BFA IN STUDIO ART AND A SECOND MAJOR IN SPANISH WITH THE HONORS OF SUMMA CUM LAUDE FROM THE UNIVERSITY OF NEW MEXICO. AS AN ALUMNI OF LAND ARTS OF THE AMERICAN WEST, SHE RECEIVED AN INTERNATIONAL RESEARCH GRANT THROUGH THE ANDREW W. MELLON FOUNDATION. SHE IS A VISUAL ARTS TEACHING ASSISTANT WITH THE OXBOW SCHOOL IN NAPA, CA.

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*Larrea Tridentata*

## CHAPARRAL

**CREOSOTE, GOBERNADORA, HEDIONDILLA**  
**LARREA TRIDENTATA**  
**ZYGOPHYLLACEAE FAMILY**

### DESCRIPTION

The warm olive foliage of this evergreen shrub is found throughout the Sonoran, Mojave and Chihuahuan desert below 4000ft and grows 3 to 9 feet tall. Chaparral lives in washes and slopes and can tolerate sandy soils. At times, especially during a summer rain, it fills the air with a pungent salty aroma that gave rise to its Spanish name, hediondilla, "the little bad smeller". It is also sometimes called gobernadora "the governess" due to its root's efficiency at absorbing water which prevents other plants from growing nearby.

### MEDICINAL USES

Chaparral is anti-oxidant, anti-inflammatory, anti-microbial and anti-fungal. These attributes help prevent infection for insect and spider bites and minor cuts and burns. It can be used as a hair tonic to relieve itchy scalp and dandruff and as an anti-bacterial mouthwash. Chaparral is useful as a salve in first aid kits to treat skin sores, bites and ringworm. It can be added to baths for aching muscles, rheumatoid pain, stiff or swelling joints, psoriasis and eczema.

### TRADITIONAL USES

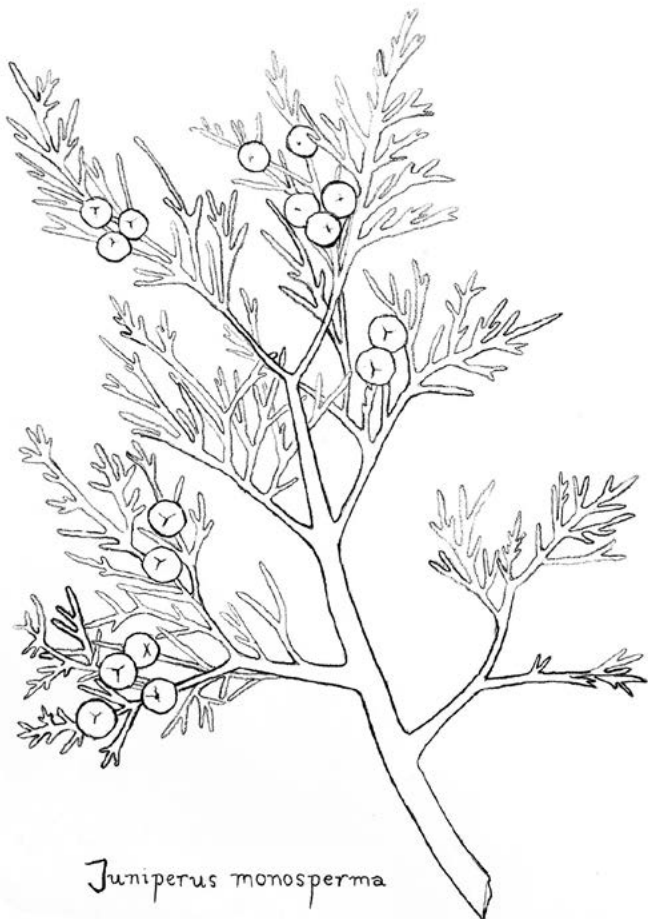
Chaparral is known for its use as a poultice or bath for rheumatism pain or arthritis. An ointment made with a combination of trementina de piñon and beeswax works well in alleviating pain caused by rheumatism. The tea has been used for stomach and intestinal pain, aching muscles and joints. It has also been employed as a disinfecting diuretic for urethritis. The plant has also been used internally to clean out the system from environment toxins and/or recreational drugs.

### CONTRAINDICATIONS

Pregnant and nursing women and those with compromised livers or kidneys should avoid internal use.

### DOSAGE

Use externally as needed in the form of a salve or bath. If taking internally it is suggested to work with an herbalist.



## BELLOTA DE SABINA

**ONE-SEED JUNIPER**  
**JUNIPERUS MONOSPERMA**  
**CUPRESSACEAE FAMILY**

Juniper is found between 3000-5000ft and commonly surrounded by piñon pines, sagebrush and chamisa. It is omnipresent throughout the West, growing in canyons, slopes and mountain sides and is highly aromatic. Along with piñon pine, Juniper is the dominant tree throughout the lower expanses of the middle Rio Grande watershed. Bellota de sabina refers to the juniper berries. Confusingly, the name "bellota de sabina" also refers to a very different remedy, Juniper Mistletoe.

### MEDICINAL USES

Bellota de sabina is diuretic, antiseptic, carminative, and anti-rheumatic. It is known as a long standing treatment for the urinary tract and works well to clear up low-grade urinary tract infections and discomfort. It is especially effective if combined with uva-ursi, pipsissewa or berberine rich plants such as oregon grape root. Juniper berries are also useful for treatment of nephritis, inflammation of the kidneys, acts as a mild carminative and eases bloating and cramping. Externally, juniper oil can alleviate eczema and psoriasis problems. Bellota de sabina is also the primary flavoring ingredient to gin.

### TRADITIONAL USES

In North America, southwestern Native Americans have used juniper as incense in saunas and sweat lodges. The branches can be burned in homes and spaces to fumigate or as an incense for their fresh woody fragrance. The smoke of juniper is thought to clear bad energy.

Bellota de sabina has been used historically as a diuretic, to settle a stomachache or for internal chills by drinking it as a tea. A weak juniper tea is said to act as a stimulant and a strong one, an emetic. As a bath, the berries are boiled and used to soothe arthritis and rheumatism or to relieve itch from spider bites. One or two berries are chewed to help stimulate digestion.

The berries are also used to season meat, such as venison and in stews.

### CONTRAINDICATIONS:

Do not use with kidney infection or a history of nephritis. Not for use during pregnancy.

### DOSAGE:

Alcohol is the best extraction method, making a tincture the most useful. Externally, can be added to salves and used as needed for skin conditions. Internally, infusion of 2 tbsp 2-3 times a daily. Tincture, 1-2 drops 2-3 times daily.



## YERBA DE LA NEGRITA

**SCARLET GLOBE MALLOW**  
**SPHAERALCEA ANGUSTIFOLIA**  
**MALVACEAE FAMILY**

### DESCRIPTION:

Yerba de la negrita "the herb of the little dark woman" is common on roadsides and well-traveled paths. This orange flowering perennial is native to the southwestern United States, Central and Northern Mexico. The dainty yet hearty herb seems to prefer disturbed land and once established it endures for many years.

### MEDICINAL USES:

Yerba de la negrita is primarily used as a hair rinse, to condition the scalp, stimulate the hair follicles and to add body and luster to the hair. A tea can be made to treat a raspy, dry, soar throat and to soothe the urinary tract with painful urination. It is used to sooth any skin rash in adults and children.

### TRADITIONAL USES

Broken bones have been treated by mashing the roots and mixing them with a little flour as a poultice. To draw out infection from sores and boils, a poultice was made by pounding and mixing the herb with saltwater. If bitten by mosquitos or ants, the plant is crushed, salt is added and the mixture is applied to the skin to treat swelling. A plaster prepared like that for insect bites is placed on the forehead for headaches.

The people of Santo Domingo have boiled globe mallow and added it to gypsum as a glue for calcimine house paint. In Taos, the pulp of the plant has been mixed with mud to make hard floors.

### TOXICITY

None.

### DOSAGE

Strong decoction, 4-6 fluid ounces up to 4 times a day for internal use; as needed externally.

## SEEDS OF REJUVENATION

### PATRICIA LARENAS

This year I attended the 37th Annual EcoFarm Conference held at Asilomar in Pacific Grove, California, as a personal antidote to the devastating outcome of the presidential election. I greatly looked forward to spending time with organic growers and advocates. I always learn something, connect with interesting people, and return rejuvenated with a renewed commitment to my work with edibles and seed saving. The theme of this year's conference was "Cultivating Diversity", as in people, as well as seeds. It's a theme close to my heart, as an immigrant and a seed steward.

So I got to thinking about seeds and my ancestral origins and as I day-dreamed about the coming spring planting season, strong emotions were stirring within. I'm passionate about seeds, they truly stir up my emotional side. It took me a while to understand why, and to be able to begin express it words. Seeds, especially for edibles, have been saved by humans for many thousands of years. First Nation Peoples consider them as "living, breathing, ancestors", in a literal, not figurative sense. And in fact, viable seeds ARE alive, and they are handed down through families and communities to this day, although alarmingly, much less so. These are true heirloom varieties that provide a critical means by which we carry on our culture, whether it's rooted in Native American traditions, or in a family group of immigrants, perhaps generations ago.

We all have family food stories with origins in those who came before us, if we dig deep enough. For immigrants like me, those connections to our cultural foods are strong and present. I arrived in the USA with my parents and brother from Chile many years ago as an infant, but I grew up around an extended family and community of Chileans. It was years into adulthood before I realized that many of our favorite Chilean dishes originated with Native Peoples in the region, especially the Mapuche ("people of the earth"). In fact many of our words in Chilean Spanish have their roots in Mapuche language (Mapudungun).

So it's not surprising that my garden reflects my cultural roots, a mix of what the European conquistadors brought with them, plus Native foods: different types of common beans (*Phaseolus vulgaris*), fava beans, salad greens, artichokes, squashes, and various perennial herbs are my staples, including two shrubs of Lemon Verbena for herbal tea (*Aloysia triphylla*), native to Chile and Argentina.

Recently I received a precious gift of seeds from Chile: winter squash, beans, a sweet pepper and a spicy one, and corn with which to make a favorite national dish, pastel de choclo (derived from the Mapuche word for corn). Through my research I discovered that the old varieties are stewarded by dedicated guadañadores de semillas or seed savers, same as in the USA, but not accessible by me, as far as I know.



I have been conducting seed trials of heirlooms as a volunteer for Seed Savers Exchange for several years, and this work has been very satisfying. At the EcoFarm conference I was fortunate to meet Rowen White and participate in her "Seed Keva" training online that weaves Native People's traditional seed practices with western methods, and she is indeed a knowledgeable, and precious mentor.

It is both tragic and traumatic that many tribes have lost the seeds specific to their People as an outcome of colonization- the seeds were critical carriers of the culture. My current focus is finding seeds of traditional Native crops in this country, perhaps rare ones, and to put my effort into growing, eating and maintaining those- certainly a worthy cause. An accessible source is Native Seeds/Search in Arizona, specializing in seeds for crops that are Native in origin, as well as suited to arid areas, (quite relevant to our dry and warming climate in California).

My passion for saving seeds has found a new purpose and fulfillment in connecting with traditional Native seeds, after all, those are my ancestors as well, but from parts further south.

"Institutions do not save seeds- humans with hearts do."

Dr. Gary Paul Nabhan.

PATRICIA LARENAS LIVES IN THE SAN FRANCISCO BAY AREA WHERE SHE SAVES SEEDS AND PROMOTES EDIBLE LANDSCAPING THROUGH A GARDEN DESIGN BUSINESS. AS A VOLUNTEER FOR SEED SAVERS EXCHANGE SHE HAS PARTICIPATED IN TESTING VARIETIES OF HEIRLOOM VEGETABLES FOR THEIR MEMBER GROWER EVALUATION PROJECT (M-GEN, NOW CALLED CITIZEN SCIENCE) SINCE 2012. SHE BELIEVES THAT TRADITIONAL SKILLS IN SEED SAVING AND GROWING FOOD ARE MORE IMPORTANT THAN EVER BEFORE, NOT ONLY TO SAFEGUARD CROP DIVERSITY AND PRESERVE CULTURE, BUT AS PREPAREDNESS AGAINST THE DIRE STATE OF OUR PLANET AND THE UNPREDICTABLE NATURE OF CLIMATE CHANGE, THAT IS ALREADY IMPACTING FOOD PRODUCTION.

WWW.URBANARTICHOKE.COM

PHOTO CREDIT: PATRICIA LARENAS,




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ANNE VALLEY-FOX SEEDS THE COSMOS BY WRITING POEMS ABOUT ORDINARY RESIDENCY ON OUR EXTRAORDINARY EARTH. HER MOST RECENT POETRY COLLECTION IS NIGHTFALL (RED MOUNTAIN PRESS, 2016). SHE WAS AWARDED A MARK FISCHER PRIZE (TELLURIDE INSTITUTE, 2017) AND THE WILLIAM MATTHEWS POETRY PRIZE (ASHVILLE POETRY REVIEW, 2016).

[WWW.ANEVALLEYFOX.COM/](http://WWW.ANEVALLEYFOX.COM/)

PHOTO CREDIT: SEEDBROADCAST

## BEE BUSINESS

ANNE VALLEY-FOX

Bee in its orange orbit, skimming  
 Apache plume's pink  
 fringe, makes a beeline  
 for ivory bullseye—nectar pooled  
 in five-petaled cups  
 like vestal virgins open for business.

Ecstatic mind diving for sweetness  
 plunges into a glacial  
 lake—& back  
 to honeybee, flitting  
 from flower to flower, businesslike  
 & promiscuous.

## GARDEN PLOT (FOR NANCY SUTOR)

ANNE VALLEY-FOX

What to plant? In clear relation  
 to what's there—rhythms of sunlight,  
 shade stanzas, soil composition.  
 & what do you need to see?  
 Imagine the green contours of leaves  
 & textured blossoms—frilly  
 or plain, perfumed or stitched with air?  
 Will there be breathing room enough  
 & intoxicating commotion?  
 Start with red-birds-in-a-tree  
 at one end of the bed & lavender  
 at the other. Throng the center  
 with snapdragons, yellow & white;  
 add posies of African violets, purple  
 parasols draping the rock wall.

# PRÁCTICAS EN LAS MILPAS EN TEPOZTLÁN

ANA RUIZ DÍAZ

Durante dos años tuve la suerte de entrevistar a nueve campesinos de entre 69 y 98 años de edad, que cultivan maíz con sus semillas. Me enfoqué en sus prácticas en torno al maíz. Ellos viven en tres comunidades: Amatlán, San Andrés de la Cal y Tepoztlán, en Morelos. Estos son fragmentos de sus relatos.

En San Andrés, don Pedro me explicó que en el mes de mayo, los ancianos y mayordomos van a pedir buenaventura a los Señores del Aire y les presentan una ofrenda en una cueva:

*Es una tradición con la que pedimos cada año a los Aires que no nos dañen los cultivos, pedimos la lluvia y que no falte el pan, las tortillas, pues. La gente en la comunidad da dinero, alimentos o flores para la ofrenda*

- Doña Rosaura me contó sobre el día de la siembra

*Aquí en la casa antes de sembrar se le hace una despedida tradicional a la semilla, se le sahúma con copal, se le dice al maíz que nos disculpe, que va a sufrir, que lo vamos a atender y esperamos que vuelva en gran cantidad. Mi mamá le hablaba en náhuatl, es que es como las abuelitas nos enseñaron. Yo así les hablo: (siguió en náhuatl y luego tradujo) Tonacayo, maíz, mi carne, mi sustento, te voy a tapar con tierrita, pero te voy a cuidar de la hierba y los animales, te voy a proteger del daño; no tengas miedo que te voy a sepultar para que nos des la vida.*

- Para cultivar maíz hacen tres tareas con la yunta (dos bueyes o caballos), don Pedro las describió:

*Mire la primera mano o el despacho es así: con el azadón se cortan de raíz las hierbas a un lado del maíz y se voltean, luego se pasa la yunta y las plantitas se cubren con tierra del surco, se arrima un bordo de tierra hasta casi cubrir las.*

*En la segunda mano a los veinte días, se repite el deshierbe, y con la yunta se cubre para subir el bordo de tierra en la parte baja de las plantas...*

*Ya en la tercera mano, luego de cinco o seis semanas, se deshierba y se arrima más tierra al pie de la caña. Eso se hace para que el maíz resista el viento, para que no lo tire el viento.*

*A mí no me costó trabajo que la yunta me siguiera sin dañar al maíz.*

Cuando pregunté a don Juan a qué edad aprendió a cultivar maíz él solo, dijo:

*Mire a los catorce, quince años, pero uno solo no hace nada.*

*Primero se limpia el terreno, luego el barbecho, luego se meten los animales con el arado a surcar, atrás va otro va echando de a cuatro en cuatro la semilla y va tapando con el pie: una semilla para el ratón, otra para el ladrón y dos para el patrón.*

- Dijo bien don Juan "uno solo no hace nada," porque aquí hacen tequio, que es una forma de trabajo colectivo no remunerado, para beneficio de la comunidad, pero encontré que estos campesinos lo definen distinto; cuando le pregunté a don Aurelio qué es el tequio, respondió:

Tequio es todo, es la unidad...es vivir en comunidad para que nos apoyemos mutuamente

Doña Irene:

*Así como las mujeres trabajamos en hacer la comida para la fiesta, a algunos hombres cada año se les toca por obligación el tequio de hacer una guardarraya alto en los cerros; van así limpiando un camino largo, haga de cuenta que hacen una vereda de tierra, porque le quitan la hierba y las ramas secas para que quede limpia y el fuego no pueda pasar ni bajar hasta las tierras o hasta las casas del pueblo. Si hay fuego en el cerro se tocan las campanas y todos salimos con palas a apagarlo.*

- En las milpas, mientras crece el maíz las mujeres cosechan hierbas silvestres.

*Después de la siembra si estaba hierboso mi papá nos mandaba a clamatequear y apartábamos mi hermana y yo las verdolagas, quelites, el epazote, los té y la demás hierba la dejábamos en el suelo. Luego pasa la yunta para tapar lo limpiado y baja un poco el surco. Esto se hace dos o tres veces mientras crece el maíz, yo vengo cada año a clamatequear.*

La práctica de cosechar hierbas<sup>1</sup> continúa en la casa. Las mamás ense-

<sup>1</sup> Entre las plantas que se pueden comer, cosechan verdolaga (*Portulaca sativa*), diente de león (*Taraxacum officinalis*), hojas de rábanos (*Raphanus sativus* spp.), diversos quelites (*Amaranthus* spp.) y tomatitos silvestres (*Solanum lycopersicum* spp.). Para te, se recolectan entre otras más hojas de anís (*Agastache foeniculum*), de sauco y de mirto, te limón (*Cymbopogon flexuosus*) y te de monte (*Nepeta mussinii*). Para condimento,

ñan a sus hijas las tareas que necesitan hacer con las plantas: clasificar, lavar, cortar, tender para secar en distintos sitios, y más tarde guardar las que están listas para usar, intercambiar o vender. Con otras plantas, su trabajo es lavar y hacer manojos, colgar para secar; después elaborar té o preparar cataplasmas y pomadas medicinales. Con plantas que tienen flores se encargan de ponerlas a secar dentro de bolsas de papel, y días después de sacar las semillas, ventear (sacar las pajillas) y envolver las semillas en papel para que se conserven. Algunas plantas que cosechan para obtener semillas son rabanillo (*Raphanus raphanistrum*), mostazas (*Brasica nigra* y *Brasica alba*), caléndula (*Calendula officinalis*) y cempasúchil (*Tagetes patula*).

- Cuando pregunté a don Aurelio cómo controla a los insectos plaga, me contó:

*Antes del 20 de junio, vemos a las hormigas reinas volar, luego caen y ponen huevos por miles, a los quince días empiezan a salir las hormigas chicanas. Hay que darles de comer, se les pone mango verde que recogemos de los que tira el viento y los levantamos debajo de los árboles, aunque estén agusanados. Los colocamos en hileras entre los surcos, las hormigas se lo comen muy bien. Esto de los mangos lo repetimos dos o tres veces, luego las hormigas se van cuando damos la primera mano, porque como se revuelve la tierra, las hormigas prefieren irse donde no las molesten.*

En una cueva junto a sus parcelas doña Irene me relató la espantada:

*Aquí venimos a dormir, todos los siete y mis papás, la primer vez para mí que yo recuerde, mi mamá estaba criando un niño, yo tenía cinco años... Aquí hacíamos el fuego, en un petate nos echábamos y muy calladitos esperábamos escuchar al tejón hasta que nos quedábamos dormidos... y luego empieza mi papá a tocar el badajo que hizo mi abuelo y nos despertábamos asustados, los más chicos lloraban... Así era tres o cuatro veces por noche. Luego a partir de esa vez, todos los años, aunque estuviera lloviendo, sabíamos que bajarían los tejones en parvadas, así que nos encargaban que viniéramos a la espantada, a velar aquí en la milpa.*

Pedro:

*¡Anteriormente con mi papá sembrábamos puro maíz! Y recuerdo cuando tuve que pasar la noche en la parcela, teníamos mi hermano y yo seis y siete años. La tarea era espantar a los tejones y al venado. Recuerdo los ruidos de la noche, que nos vencía el sueño y que los perros nos despertaban a ladridos y entonces echábamos cohetes para ahuyentar a los animales. También casi para cosechar, nos mandaba mi papá "vayan a darle de comer a la codorniz y a las ardillas" llevábamos maíz de segunda y resto de tortillas y lo tirábamos alrededor de la milpa, así estos animalitos comían y no molestaban al maíz. Ahora lo seguimos haciendo mi mujer y yo porque los tejones y otros animales prefieren comer maíz criollo. No les gusta el maíz híbrido ¿cómo saben? Así que nuestro maíz requiere de más cuidado.*

- Al terminar las labores de cultivo, la familia hace la fiesta de la acabada para celebrar. Invita a los compadres, a sus familias y a quienes hayan colaborado. Para la fiesta, adornan con flores los bueyes o el tractor y también una cruz que ponen en el centro de la milpa, echan cohetes, toman ponche, comen mole...y el anfitrión le habla al maíz sobre la acabada: Hasta aquí llegamos, vamos a venir a cuidarte, tú florece y poliniza.

- La cosecha del maíz la suelen hacer los varones y doña Irene narró cómo ha colaborado desde niña en la velada:

*Ese día que se cosecha se quedan las mazorcas en el campo; si se sacan se echan a perder, tienen que pasar la noche para despedirse del suelo, si no, se pone triste. Yo las acomodaba... y el perfume lo sigue a uno, por eso hay que acompañarlo y no dejarlo solito, pero los animales huelen bien y esa noche hay que velar y cuidar al maíz. Nosotros dormíamos en una cueva. El día 28 de septiembre se le hace su fiesta al maíz, le damos gracias porque ya maduró. Le hablamos a la madre Xilonen, le agradecemos que ya dio fruto el maíz, nos sentimos bien a gusto. Antes de esa fecha hacemos una cruz de pericón que colocamos a la entrada de la casa, y en cuatro esquinas de la milpa, significa que a los cuatro rumbos agradecemos a Xilonen por el favor del maíz maduro, al oriente, al poniente, al norte y al sur...*

- Pregunté a doña Irene cómo selecciona las semillas:

epazote (*Chenopodium ambrosoides*), flores de mastuerzo (*Nasturium*, spp.) y cebollín entre otras; para uso medicinal, entre las que se cosechan están la salvia (*Salvia officinalis*), borraja (*Borago officinalis*), ortiga (*Urtica dioica*), valeriana (*Valeriana officinalis*), manzanilla (*Tanacetum parthenium*), toronjil (*Melissa officinalis*), mercadela (*Calendula officinalis*) y cempasúchil (*Tagetes tenuifolia*). Algunas hierbas con espinas se colectan para cercar, otras para elaborar escobas.

Para sacar semilla se escogen las mazorcas más bonitas del maíz de primera, que tiene el olote menos ancho y los granos más grandes.

Mire, se empieza quitando los granos de la base del elote, girando de manera que salgan fácil sin romperlos, hasta llegar a un tercio del largo hacia arriba. Luego, desde la punta hacia el medio se retiran los granitos pequeños - uno cinco o seis centímetros- y del cinto que queda con granos más gorditos, éstos son los que se sacan y se guardan para semilla, se echan en un costal diferente que se aparta de los otros. Así se saca la semilla del maíz criollo, el blanco, el maíz rojo, el maíz azul o el piquetillo, son mazorcas con el olote delgado.

Han venido, vienen personas a comprar para que ellos siembren la misma semilla. He pedido maíz azul, por ejemplo, el azul es otro maicito negro muy sabroso el maíz azul y yo le doy el blanco y ella me da el azul.

Siempre trato de conservar lo que más pueda de semillas, lo primero que tengo que hacer, es seleccionar las mejores mazorcas de maíz para tomar de ellas las semillas. No he intercambiado, pero sí he dado semillas en varias ocasiones a quienes me las han pedido.

Para concluir, pude documentar prácticas que no estaban descritas: que los niños trabajan hasta 60 noches vigilando el maíz; que con ceremonias y ofrendas atienden al Aire y a los ancestros, que se le habla a las semillas, que no hay malas hierbas, que el tequio colectivo asegura la buenaventura, que se festeja la cosecha. Estas prácticas dan alegría para vivir a estas familias campesinas de México y agradezco mucho sus testimonios.

## RELATOS DE CAMPESINOS

Cuando les pregunté a qué edad pudieron hacer las tareas del cultivo, doña Irene respondió:

Mire, mis hermanos se hicieron cargo de distintos terrenos a los ocho a catorce años, según. Desde los quince años voy solita, contrato un gañán que traza los surcos con la yunta. A mí me dejaban ir desde los quince y siempre se me ha dado el maíz.

Luego de enseñarnos cómo seleccionar la semilla de maíz, mi papá nos dijo a todos "no vayan a perder la semilla; conserven ustedes esta semilla; otra semilla no es igual." Sí, les dijo a mis hermanos mayores que luego se apartaran, les dijo "ya siéntanse de obligación," tendrían como 18 años.

Don Aurelio dijo que a los ocho años y agregó:

Cuando hice mi casa propia, esta, antes de irnos, mi papá me entregó semilla, esta es la cuarta generación que la sembramos, mire, porque al terminar la Revolución (1921) todo estaba revuelto, de la familia habían muerto algunos, otros se habían ido y regresaron, no nos conocíamos, poco a poco encontramos a los parientes, así que esta semilla seguro viene de mi bisabuelo, luego mi papá, yo, mis hijos y nietos, van cinco generaciones.

Le pregunté cuándo dió semilla a sus hijos:

Un día antes de que se casaran, hicimos una ceremonia; en ella le di un pedazo de tierra, luego la semilla. Les dije "Esta es nuestra vida, es nuestro alimento, estamos entre la madre tierra, hay que acordarnos cada año que hay que protegerlos, a la tierra y a la semilla, pues es un proceso que es nuestra sobrevivencia".

Doña Cecilia dijo:

Pues para mí el maíz es sagrado, bueno para nosotros es sagrado. Es que sin ese alimento no podemos vivir, el que es puro, criollo, o sea, nada de Maseca, ni Minsa ni híbrido, ni transgénico, eso no sirve. Por eso conservamos el maíz criollo. Mi suegro nos dio semilla de maíz criollo cuando nos venimos a nuestra casa y lo conservamos hasta ahora.

Si se cambia la semilla original no todos tendrán acceso a la semilla mejorada. La gente dejará tirado el campo y se irá a las ciudades, es una manera de arrebatarlos la posibilidad de ser autosuficientes, es una manera de quitarnos la autonomía, porque nos pone en manos de otra gente. Para nosotros es indispensable conservar nuestra semilla original porque de ello depende nuestra supervivencia, nuestro alimento sano, y si nos la quitan, quizá



estemos condenados a desaparecer.

Don Aurelio dijo:

Bueno, nos llama el espíritu, los trabajos van por etapas, va uno cambiando, hasta con gusto lo hace uno, es estar de acuerdo con el espíritu, porque no somos industriales, nunca nos dijeron nuestros padres "se van a hacer ricos" nos dijeron: "con esto viven su vida y son ejemplo de sus hijos, aquí todos somos iguales."

Los campesinos enfatizaron que los jóvenes ya no quieren trabajar en el campo y lo atribuyeron al proceso de escolaridad.

Cuando pregunté a doña Irene qué pasó con la modernidad en Amatlán y si hubo cambios, respondió:

Sí ¡claro!

Había una regla y se cumplía de qué días tocaba cosechar a cada quien, se decidía después de una asamblea o reunión con los grandes y era bueno el acuerdo. Nosotros pagábamos para cosechar y con la regla había orden y nos cooperábamos.

La juventud respetaba lo que decían las personas grandes. Y hubo cambios, ¿eh? y no duraron los cambios. Ora cada quien jala por su lado. ¡Ya no hay respeto! Antes se respetaba lo que decían los señores grandes, ora mucho estudio y poco respeto.

Durante los 1980s, sembraron jitomate sin tomar en cuenta a los viejos, sin colaborar entre ellos y perdieron por la plaga de mosquita blanca (Bemisia tabaci) o porque no obtuvieron buen precio de venta.

Hubo otras consecuencias graves en Amatlán. Doña Irene contó:

Esos años ¡cómo perdimos semilla!

porque mire, se sembró menos maíz y perdimos el frijol serrano lilita, ese que al cocer se hacía negro; se daba muy bien con el maíz y se dejó de sembrar y cuando acordamos nadie tenía semilla del frijol lilita ¡la perdimos!

Dos mujeres me explicaron que con la quiebra con el jitomate aumentaron el alcoholismo, la violencia y el deterioro de las relaciones entre los hijos y sus padres; me contaron que las nueras se han organizado para atender a los viejos y que los hijos han vendido sus tierras para pagar las deudas del padre.

- Las ceremonias y el tequio se realizan por reciprocidad hacia los santos y la naturaleza. Para doña Cecilia el tequio y las ceremonias "son poderosos porque dan fuerza" y cuando le pregunté si en alguna ocasión alrededor del maíz, recordaba haber sentido ese poder, respondió sonriendo:

¿Poder? ¡Ah sí! con la cosecha. Siento fuerza con la cosecha, la fuerza de los señores grandes, de antes, la fuerza de mis papás. Poder sembrar, hasta ahora nosotros seguimos en lo mismo.

# LOS CULTIVOS TRANSGÉNICOS NO SE PUEDEN CONTROLAR

ANA RUIZ DÍAZ

Lo que las transnacionales quieren hacernos creer es muy distinto a lo que han reconocido ante el poder judicial. Científicos, organizaciones campesinas, de derechos humanos y artistas, demandaron a dos secretarías del gobierno de México, a Syngenta, PHI (DuPont), Dow y a Monsanto para proteger la diversidad del maíz.

Durante el juicio de acción colectiva los demandados presentaron ante los tribunales federales documentos (nov 2015) para responder a los cargos de la demanda y este artículo se elaboró en base a ellos.

Resalta que cuando los demandados y otras entidades del gobierno presentaron informes ante la justicia federal tuvieron que aceptar que sus argumentos no tienen sustento.

Las citas provienen de dos tipos de documentos, los de contestación donde las corporaciones y las dependencias de gobierno demandadas responden a los tribunales sobre la demanda, y de opinión, que son informes que dependencias del gobierno entregaron sobre la conveniencia o no de suspender la siembra de maíz transgénico durante el juicio.

La siembra de maíz transgénico no es segura porque no se realizan evaluaciones, ni hay control del maíz importado de los EUA. En un informe del Instituto Nacional de Ecología y Cambio Climático que fue presentado a los jueces, se reporta que en seis estados han detectado 89 casos de maíz criollo contaminado con transgénico. Y ningún caso debió suceder, pues conforme a la ley, el maíz GM que México importa se debe destinar a uso industrial, no a sembrar.

PÚBLICAMENTE AFIRMAN QUE	ANTE LA JUSTICIA ACEPTAN QUE
Los transgénicos producen más toneladas que los demás	En su contestación a los jueces la Secretaría de Agricultura, Ganadería, Desarrollo Rural, Pesca y Alimentación reconoce que los maíces transgénicos no incrementarían la producción de maíz.  Los transgénicos No producen más.
Las variedades transgénicas de maíz están debidamente aprobadas por las autoridades sanitarias	En la opinión que dirige a los jueces, la Secretaría de Salud, acepta que no hay ni habría estudios sanitarios sobre los cultivos de maíz transgénico y se declara incompetente en la materia
El Maíz transgénico es seguro y puede coexistir con los maíces nativos sin contagiarlos; se establecerán barreras para evitar el flujo de polen	En la contestación que Monsanto envió a los jueces reconoció que hay flujo génico de maíces híbridos a maíces nativos de diferentes regiones.  De igual manera los maíces nativos serán contaminados con ADN transgénico
Los transgénicos pueden tener mejor rendimiento porque aunque no produzcan más, podría ser más barato producirlos	La Cibogem reconoce en su opinión que producir maíces transgénicos es más caro que producir maíz nativo.  Y Cibogem es la comisión intersecretarial encargada de la bioseguridad de los OGM.
Los transgénicos representan avances en investigación científica	Syngenta, en su contestación al juez reconoce que con la siembra de OGM de maíz la empresa busca aprovechar en forma exclusiva su tecnología.  Se propone obtener utilidades no aumentar el conocimiento científico



ANA RUIZ DÍAZ ES DOCTORA EN ANTROPOLOGÍA FÍSICA, Y ASESORA INDEPENDIENTE EN AGRICULTURA ORGÁNICA Y PERMACULTURA. COFUNDADORA DEL CONSEJO DE VISIONES GUARDIANES DE LA TIERRA (1991-2017) UNA RED DE TERAPEUTAS NATURALES, ARTISTAS Y ECÓLOGOS. COLABORA EN EL JUICIO DE ACCIÓN COLECTIVA QUE HA PROHIBIDO LOS PERMISOS DE SIEMBRA DE MAÍCES GM EN MÉXICO DESDE SEPTIEMBRE DE 2013.

DR. ANA RUIZ DIAZ IS AN INDEPENDENT ADVISOR ON ORGANIC FARMING AND PERMACULTURE. COFOUNDER OF THE VISION COUNCIL GUARDIANS OF THE EARTH (1991-2017) A NETWORK OF NATURAL THERAPISTS, ARTIST AND ECOLOGISTS. SHE COLLABORATES WITH THE CLASS ACTION LAWSUIT THAT HAS BANNED PERMITS TO SOW TRANSGENIC CORN IN MEXICO SINCE SEPTEMBER OF 2013.



# RAIN NUMBER

PETER CALLEN

Rain, more than a number:  $0.04'' + 1.20'' + 0.64'' = 1.88''$

Cloudy coolness of many days each side of a rainy one

Three luscious days with temps in the 70's, moist tropical breezes  
followed by the rainy day itself, a paid vacation from

Dry oven heat and burning sunlight

Three beautiful days after the rainy one, lingering clouds,

Cool days

And cooler nights, no AC required, the perfect temperature for  
anything human, animal or plant

Miracle upon miracle, another day of rain! Too good to be true  
what did we do to deserve such a reprieve from the  
glare of 90° cloudless days on end with whipping dry winds?

Surely we shall pay for such indulgence as continuously moist soil  
going outside sans hat and sunglasses, shutting off the constant rattle  
and hum of the swamp cooler, breathing cool  
moist air, feeling alive and refreshed, secretly hoping it will never end.

The clouds stay for another week, and another, the dryness  
starting to fade from memory and reality.

The rain falls hard one day  
and softly another.

It comes at night slowly filling the dry cracks in the Earth,  
swelling the wooden doors and beams

Every seed that was ever sifted, blown, planted by a squirrel  
accidentally dropped from a child's hands, every forgotten seed  
every remembered one too, all given this long, even soaking

Germination time, Thunder shakes the ground AWAKE !

Seeds burst into sprouts, are gobbled up rodent style and sprout  
some more, seed style

In their multitude, tiny roots cover the Earth, set free in the  
flowing water, sinking deeper, inch by inch, down into the topsoil continuing  
with each flood, every soaking, encouraged by still cloudy days  
and cool, moist nights, wetness saturating and sinking into the subsoil.

Quickly the miracle spreads: inundating dry, powdery  
and hard-baked ground, absorbed deeply into the sandy  
bottoms dripping from rocky buttes, cascading over mesa's edge  
ponding in the flats, slaking the dry months of thirst, resurrecting  
dormant grasses, saving the lives of countless trees and jackrabbits  
laying the foundation for another cycle of life for mountains, grasslands herds  
and flocks, swarms and those they feed.

Yes, rain is more than a number when surrounded thus.

"Nothing makes sense without rain and snow"



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PETER CALLEN LIVES IN THE HIGH DESERT, DOING RESTORATION WORK, GARDENING  
AND ORCHARD TENDING, WILDLIFE RESEARCH AND LEARNING THE LAYOUT OF THE  
ENTIRE PLANT "KINDOM" IS WHAT OCCUPIES HIS YEARS.

PATHWAYSWC.WORDPRESS.COM/

PHOTO CAPTION: RAIN IS COMING

# APPRECIATION

PATRICIA WATTS



Ted Purves (1964-2017) was a Bay Area artist/curator and chair of the first social practice graduate program in the USA at CCA in Oakland. Sadly, he passed away July 7, 2017. I met Ted and his wife/ artistic partner Susanne Cockrell in 2006, while working on an exhibition in Sonoma County titled Hybrid Fields, a group show of artists addressing food issues. They had recently completed a two year project in Oakland, in their neighborhood of Temescal, where they operated a storefront and mobile cart collecting unused fruits, and offered canning demonstrations, as well as books and films on foraging or gleaning, and seed saving techniques. The project titled Temescal Amity Works served as a the "perfect camouflage" as Purves called it, for promoting local food production to their non art world neighbors. For the exhibition Hybrid Fields they created a broadside or poster with a call for local residents to enter a preserves contest, which submissions were displayed and judged, with a winner selected whose preserve was accessioned into the permanent collection at the Sonoma County Museum in Santa Rosa. Just prior to the exhibition, Purves had also recently edited the book What We Want Is FREE: Generosity and Exchange in Recent Art in 2005, which promoted generosity based, relational and social arts practices, where the distribution of goods and services were considered the medium for artist production. Purves grew up in the Midwest and was somewhat low key about his influence on the lives of those he touched. He has inspired numerous artists over the last decade in the Bay Area and beyond, and will be missed terribly.

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PATRICIA WATTS IS THE FOUNDER AND WEST COAST CURATOR OF ECOARTSPACE, A PLATFORM FOR ARTISTS ADDRESSING ENVIRONMENTAL ISSUES SINCE 1997.



## HOW 121 NOBEL LAUREATES WERE MISLED INTO PROMOTING GM FOODS<sup>1</sup>

DAVID SCHUBERT, PHD AND STEVEN M. DRUKER, JD

Over the last four months, 121 Nobel laureates have signed a letter extolling the safety and benefits of genetically modified (GM) crops and alleging that organizations and individuals that don't support their unfettered introduction are committing a "crime against humanity". The campaign to obtain the signatures was organized by Richard Roberts, chief scientific officer of New England Biolabs, who, with assistance from Monsanto's former head of corporate communications, staged a press conference in Washington, DC to publicize the letter.

Not surprisingly, this letter has had a major impact. However, although it purports to be science-based, most of its chief assertions are demonstrably false.

Among them is the claim that scientific and regulatory agencies have "consistently" found that GM crops are "as safe or safer" than conventional ones. This is clearly untrue, and multiple scientific panels have concluded otherwise. For instance, an expert panel of the Royal Society of Canada asserted that the "default prediction" for every GM food should be that it contains unintended and potentially harmful side effects. Other respected institutions, such as the British Medical Association and the Public Health Association of Australia have also expressed concerns, with the Australian association calling for an "indefinite freeze" on GM crops until their safety has been demonstrated. Most recently, Vladimir Putin, on the advice of Russian scientists, signed a ban on GM crops into law.

Equally false is the letter's assertion that "there has never been a single confirmed case of a negative health outcome for humans or animals" caused by consuming a GM product. In fact, many people died and thousands were sickened by a food supplement of tryptophan produced from GM bacteria. And a large body of peer-reviewed scientific literature demonstrates adverse health effects on laboratory and farm animals caused by GM foods, as well as by chemicals required for their cultivation.

The letter's claims about the only GM product it specifically mentions, Golden Rice, are also bogus. That product, which is designed to overproduce beta-carotene, the precursor to vitamin A, was developed in hopes of solving the widespread vitamin A deficiency in parts of Asia, which can lead to blindness and even death. Astonishingly, the letter insinuates not only that the rice will solve the problem, but that those who question its safety have unconsciously caused millions of deaths by blocking its use. Yet, in reality, it's not in circulation because it hasn't performed well and is nowhere near readiness; and the International Rice Research Institute has stated it's still unclear whether the rice is capable of curing the deficiency.

Furthermore, even if this GM rice were fully efficacious and ready, from the perspective of a scientist who has studied beta-carotene in the context of brain development (a perspective one of us possesses), it should be delayed because it poses a major health risk.

First, as recognized by the recent National Academy of Science (NAS) report on GM crops, the type of modification required to make golden rice is prone to generate unwanted byproducts. Second, some of the rice's abundant byproducts will likely be related to retinoic acid, a compound that causes birth defects even at ultra-low levels. Perhaps more worrisome, proponents apparently want to feed this experimental rice to multitudes of children without first performing rigorous testing to make sure that it won't harm mice!

The letter's other main claims are contrary to fact as well. For example, it boasts that GM crops are "less damaging to the environment" and are necessary to "feed the world". But in reality, GM monocropping and the high levels of herbicides it requires have decimated the population of monarch butterflies, induced the development of herbicide-resistant super weeds, and contaminated the bodies of the human population in the developed world with

glyphosate: a toxin, endocrine disrupter, and potential carcinogen. Moreover, an extensive study sponsored by the World Bank and four United Nations agencies determined that GM crops are not needed to feed the world and that sustainable agroecological techniques should instead be utilized.

So why would more than a hundred Nobel laureates sign a grossly inaccurate letter that was apparently intended to suppress serious discussion about the risks of GM foods?

The most likely explanation is they were not aware of the relevant facts, trusted that the letter was accurate, and assumed they were upholding science and supporting an important humanitarian cause. A substantial percentage are physicists and economists (one even received her prize for literature), and we'd be willing to bet that none of the biologists was aware of the pertinent facts either — and that if they had been adequately informed, they would not have lent their names to such a devious public relations ploy. We're also confident that if they knew the truth about golden rice, and how questionable it is, they would not promote it unless it had gone through extensive safety testing in animals and there was a rigorous post-release monitoring program in place.

It would be a shame if their unfairly obtained endorsements afford the deceptive letter an aura of scientific authority it doesn't deserve—and persuade policy makers to weaken the current set of regulations that are already inadequate to screen for the abnormal risks of GM crops about which so many independent experts have warned. While GM technology may have valuable applications in fields such as medicine, its current use in food production entails substantial risks that are routinely misrepresented.

The letter signed by the laureates does not reflect reality. They should confirm this fact for themselves and then denounce it as an affront to science and the public trust.

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PHOTO CREDIT: VIVA LA MILPA MANDALA MURAL BY TOÑA LUISA OSHER.

<sup>1</sup> First published by GM Watch on Nov 16th 2016 [gm-watch.org/news/latest-news/17320](http://gm-watch.org/news/latest-news/17320)  
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SILVIA RIBEIRO ES DIRECTORA PARA AMÉRICA LATINA DEL GRUPO DE ACCIÓN SOBRE EROSIÓN, TECNOLOGÍA Y CONCENTRACIÓN (GRUPO ETC), CON ESTATUS CONSULTIVO ANTE LA ORGANIZACIÓN DE LAS NACIONES UNIDAS Y CON SEDES EN CANADÁ, FILIPINAS Y MÉXICO. EL GRUPO ETC HA SEGUIDO EL DESARROLLO DE LAS BIOTECNOLOGÍAS DESDE HACE MÁS DE 30 AÑOS, INCLUYENDO SUS ASPECTOS CORPORATIVOS Y DE PROPIEDAD INTELECTUAL Y SUS IMPACTOS SOBRE LA SALUD, LA SEGURIDAD Y SOBERANÍA ALIMENTARIA Y LOS DERECHOS DE LOS AGRICULTORES. TAMBIÉN INVESTIGA Y DIFUNDE INFORMACIÓN SOBRE OTRAS NUEVAS TECNOLOGÍAS COMO NANOTECNOLOGÍA Y GEOINGENIERÍA.

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PHOTO CREDIT: TOÑA OSHER

## PREMIOS NOBEL AL SERVICIO DE MONSANTO Y SYNGENTA

SILVIA RIBEIRO



Son pocas las veces que tanta gente prominente del ámbito científico presume su ignorancia en tan corto espacio. Así es la carta pública que un centenar de ganadores del premio Nobel publicaron el 30 de junio defendiendo los transgénicos, en particular el llamado "arroz dorado" y atacando a Greenpeace por su posición crítica hacia estos cultivos. La misiva abunda en adjetivos y apelativos altisonantes, hace afirmaciones falsas y no da argumentos, por lo que parece más una diatriba propagandística de empresas de transgénicos que científicos sosteniendo una posición.

Para empezar, el llamado arroz dorado (arroz transgénico para expresar la pro-vitamina A) que defienden con tanto énfasis, no existe. No por las críticas que le hayan hecho Greenpeace y muchas otras organizaciones, sino porque sus promotores no han podido hacer una formulación viable, pese a casi 20 años de investigación y más de 100 millones de dólares invertidos. Tampoco han demostrado que tenga efecto en aportar vitamina A.

La primera versión de ese arroz transgénico con betacaroteno (GR1) fue un accidente de investigadores suizos que experimentaban otra cosa, por lo que nunca controlaron

exactamente el proceso. Esa versión requería comer kilos de arroz diariamente para completar la dosis necesaria de vitamina A. Luego Syngenta compró la licencia y como propaganda donó la licencia de investigación a una fundación, de la que es miembro la Fundación Syngenta. Pero retuvo los derechos comerciales. En 2005, anunciaron la versión GR2, con más pro-vitamina. Pero no han podido demostrar que la pro-vitamina sea estable, ya que se oxida fácilmente y en post cosecha disminuye hasta 10 por ciento del contenido. Como es una manipulación genética experimental de alteración de rutas metabólicas, podría tener cambios imprevistos con potenciales efectos graves para la salud. Varios científicos han señalado los riesgos y mitos del "arroz dorado" (entre otros, David Schubert, 2008 y Michael Hansen, 2013 [goo.gl/Chv14Q](http://goo.gl/Chv14Q)).

Por otro lado, vegetales comunes como la zanahoria, col, espinaca y muchos tipos de quelites –hierbas comestibles comunes que acompañan la siembra campesina y las culturas culinarias tradicionales– aportan mucho más vitamina A que ese arroz, sin efectos secundarios y sin pagar a transnacionales. Por el contrario, la agricultura industrial y de "precisión" que defienden en la carta de los Nobel,

por ser plantadas en grandes monocultivos con agrotóxicos, eliminan esos quelites y también a los campesinos, desplazados y contaminados por las megaplantaciones.

La carta afirma que el hambre es por falta de alimentos, lo cual es falso: la producción mundial de alimentos sobra para todos los habitantes del planeta ahora y en el 2050. Si existen hambrientos y desnutridos es porque no tienen tierra para producir ni pueden acceder a los alimentos. La cadena agroindustrial de alimentos –que detenta los transgénicos– desperdicia del 33 al 40 por ciento de la comida producida según datos de la FAO, lo cual alcanza para alimentar a todos los hambrientos del mundo. Además, como informa Greenpeace en su respuesta, el 75 por ciento de la tierra agrícola se usa para producir forrajes para animales en cría industrial y agrocombustibles, no alimentos ([goo.gl/e5xEwc](http://goo.gl/e5xEwc)).

La afirmación de que los transgénicos son seguros para el ambiente y la salud ha sido rebatida con argumentos y referencias científicas, por más de 300 científicos convocados por la Red Europea de Científicos por la Responsabilidad Social y Ambiental ([goo.gl/VM8i3W](http://goo.gl/VM8i3W)).

Pero quizá lo más notable es que la carta no menciona que sólo seis transnacionales (en vía de volverse tres) controlan todos los agrotransgénicos en el mundo, 61 por ciento de todas las semillas comerciales y 76 por ciento del mercado global de agrotóxicos ([goo.gl/QiXKAc](http://goo.gl/QiXKAc)). ¿Cuánta falta de ética y honestidad es necesaria para ocultar que su propuesta de "agricultura de precisión" es el negocio de un puñado de transnacionales, todas con larga trayectoria de violación de derechos ambientales, humanos y a la salud?

La sombra de las transnacionales cae pesadamente sobre esta carta supuestamente científica. Se dicen preocupados por el hambre y los niños desnutridos en el Sur global, pero eligen presentar la carta en una conferencia de prensa en Washington, Estados Unidos, en un momento muy oportuno para favorecer a las empresas de transgénicos. En esta semana el Congreso debe votar una ley sobre etiquetado de transgénicos que quiere impedir que los estados puedan tomar decisiones en este tema. Buscan anular la norma de etiquetado que comenzó a regir desde el 1 de julio en Vermont, luego de un referendo.

A su conferencia de prensa se impidió asistir a Greenpeace, cuyo representante fue bloqueado por Jay Byrne, ex jefe de comunicaciones de Monsanto, que increíblemente ¡funcionaba de portero de la conferencia! ([goo.gl/i8FXDg](http://goo.gl/i8FXDg)). Lejos del "altruismo científico", los firmantes organizadores de la carta, Richard Roberts y Phillip Sharp, son también empresarios biotecnológicos. El sitio donde publican la carta, es un espejo de otro que redirige al Genetic Literacy Project, frente de propaganda disfrazado de las transnacionales de transgénicos y agrotóxicos (GM Watch [goo.gl/WekAin](http://goo.gl/WekAin)).

Pero lo más ofensivo es su pregunta final "¿Cuánta gente pobre debe morir para considerar [la crítica a los transgénicos] un crimen contra la humanidad?" Los firmantes deberían ir inmediatamente a las zonas de plantaciones de soya transgénica en Paraguay, Argentina, Brasil donde hay madres que pierden embarazos y niños y trabajadores que mueren por envenenamiento o cáncer, por los agrotóxicos de los cultivos transgénicos. Eso son crímenes contra la humanidad.

- Investigadora del Grupo ETC

# A CLASS ACTION OF PEASANTS IN MEXICO HAS STOPPED TRANSNATIONALS FROM SOWING GMO CORN

FRANCIA GUTIÉRREZ HERMOSILLO



A class action lawsuit to protect the biodiversity of corn was filed in July 2013 led by peasant farmers, scientists, human rights advocates, and environmental organizations. The defendants are Syngenta, Dow, PHI-México (DuPont), Monsanto and the federal Ministries of Agriculture and Environment. A temporary injunction was granted by the tribunals to prevent the Ministries from giving permits to sow transgenic corn to protect against its potential to contaminate native corns while the trial is ongoing. This is an update about it and the trial itself.

## IN REGARD TO THE CAUTIONARY MEASURE THAT HAS BANNED PERMITS TO SOW GMO CORN

- Mexican judges have put in place a Cautionary Measure which, in effect, has banned planting GMO corn since September 2013.
- Opinions in favor of transgenic seed corporations were filed in the trial, and supported by several government officials.
- Eight Amicus Curiae ("friends of the court" letters from organizations not party to the lawsuit) were filed against the transgenic seed corporations. Seven were presented in favor of them.
- On behalf of the petitioners trying to stop the spread of GMO corn, specialists such as Dr. Antonio Turrent have testified at several court hearings since April of 2015.
- Three of the significant pieces of evidence we presented were: the presence of illegal transgenic DNA in native corn seeds, scientific proof of damage to human health caused by glyphosate and the genetic contamination of wild cotton caused by GMO cotton planted over 1000 kilometers away.
- Defendants submitted responses about

the Cautionary Measure, and requested permission to sow GMO corn

- But the Measure has well established two levels of protection. The first one is that even though judges have allowed the government -for the past 14 months- to give permits to sow GMO corn on experimental plots for scientific research purposes, such permits are conditioned to judicial control and surveillance, and to this day, not a single permit has been granted. The second protection provided by the Cautionary Measure is that permits to sow GMO corn on pilot pre-commercial and commercial plots are forbidden.

- Recently, on May 11th 2017, the National Supreme Court of Justice announced it would not take the case seeking the cancellation of the Cautionary Measure, requested by Monsanto.

## IN REGARD TO THE TRIAL

- Despite winning several battles since July of 2013 this trial is not over yet...we need support from consumers and advocates in the U.S.
- The class action to prevent any and all planting of GMO corn in Mexico has been accepted by the Court.
- The District Court has denied defendants' third request for dismissal.
- According to the rules of procedure in Mexican courts, the judge may, at any time, re-analyze the elements and the claim of the class action lawsuit, and may dismiss any of them.
- Fortunately our team of lawyers has a strong record: seventeen Courts and the Civil and Criminal Chambers of the Supreme Court ruled in favor to allow the class action lawsuit to proceed, and prohibited the sowing of GMO corn for the duration of the trial.
- At this point in the trial, we are presenting evidence. The transgenic seed corporations filed documents of self-funded research, and the "Nobel prize letter." We filed four independent scientific reports showing evidence of transference of transgenic DNA into native varieties of corn, potential consequences in Mexico if GMO corn is planted, and official reports done by the National Institute of Ecology, the National Biodiversity Commission, the Council of the Ministry of Ecology, the National Agriculture, Food Sanitation, Safety and Quality Service, and one from the International Agency for Research on Cancer done for the World Health Organization that demonstrate the immitigable risks of transgenic contamination.
- The Court denied our request to have impartial experts examine the evidence presented and attend the hearings.
- We immediately appealed this decision and the trial is currently suspended until the appeal is decided.

# CAMPESINOS Y CIENTÍFICOS DETIENEN MAÍZ TRANSGÉNICO

FRANCIA GUTIÉRREZ HERMOSILLO

En julio de 2013 campesinos, científicos, artistas y organizaciones de derechos humanos y ambientales iniciaron una demanda de acción colectiva para proteger la diversidad del maíz en México, su centro de origen. Demandaron a Dow, Syngenta, PHI-México (DuPont), Monsanto y a las Secretarías de Agricultura y Medio Ambiente. Los tribunales emitieron una medida cautelar que prohíbe al gobierno dar permisos de siembra de maíz GM para evitar la causa de daño a los maíces nativos mientras transcurre el juicio. ¿Cómo vamos?

## SOBRE LA MEDIDA PRECAUTORIA QUE PROHÍBE DAR PERMISOS AL MAÍZ TRANSGÉNICO

- Los tribunales emitieron una Medida Precautoria que ha prohibido sembrar OGM de maíz en todo el país desde septiembre de 2013 que ha enfrentado una gran oposición de parte de las corporaciones transnacionales de semillas GM.

- La decisión judicial de otorgarle carácter definitivo sigue en espera.

- Funcionarios del gobierno federal presentaron opiniones a favor de las corporaciones de semillas transgénicas ante los tribunales que también divulgaron públicamente.

- Especialistas encabezados por el Dr. Antonio Turrent han testificado en audiencias en el juzgado, a favor de detener los OGM de maíz.

- Los demandantes (la Colectividad) presentamos tres evidencias significativas: la presencia ilegal de ADN transgénico en maíces nativos; el estudio científico del Instituto Internacional de Investigación en Cáncer IARC, que prueba el daño a la salud causado por el glifosato de los herbicidas que se aplican en cultivos GM y la contaminación genética en algodón silvestre ubicado a más de mil kilómetros de distancia de cultivos de algodón transgénico.

- Los demandados contestaron sobre la Medida, solicitaron que se permita sembrar.

- Pero la Medida ha establecido bien dos niveles de protección. El primero es que aunque los tribunales accedieron –desde hace 14 meses– a que el gobierno emita permisos de siembra de OGM de maíz para investigación científica en parcelas experimentales, dichos permisos, están condicionados a vigilancia y control judicial, y resalta que hasta mayo de 2017 no se ha otorgado ningún permiso. El segundo nivel de protección es que la Medida Precautoria todavía prohíbe los permisos de siembras piloto pre comerciales y comerciales.

- La Suprema Corte de Justicia de la Nación anunció el 11 de mayo 2017 que no atraerá el caso de la Medida Precautoria, que Monsanto le había solicitado.

## SOBRE EL JUICIO

- Los tribunales rechazaron por tercera vez la petición de los demandados de anular la demanda.

- A pesar de haber ganado muchas batallas desde 2013, este juicio no ha terminado, los tribunales hace apenas unas semanas finalmente admitieron la demanda colectiva y en la Colectividad necesitamos muchos tipos de apoyo de parte de los consumidores y organizaciones en todos los países.

- Hasta este momento 17 tribunales del Poder Judicial Federal, incluyendo la Primera Sala de la Suprema Corte de Justicia, han permitido que se inicie el juicio y que durante el mismo no se permita la siembra de maíces transgénicos.

- En México en cualquier momento, el juez puede volver a estudiar los elementos y la petición de la demanda colectiva y puede desechar cualquiera de ellos en el juicio, aunque para hacerlo debe valorar antes las sentencias que sobre ese tema particular ya ganamos en otros tribunales.

- En el juicio, estamos en la etapa de presentación de pruebas. Las empresas de semillas GM entregaron investigaciones financiadas por ellas mismas y la carta de los Premios Nobel (misma que se comenta en dos artículos en esta edición de SeedBroadcast); mientras que la Colectividad presentó cuatro informes científicos independientes y solicitó al juzgado cuatro pruebas periciales (de expertos) junto con audiencias de interrogatorios verbales acerca de las afectaciones que se causarían en México con la siembra de maíz transgénico; también presentó informes oficiales –del Instituto Nacional de Ecología y Cambio Climático, el Servicio Nacional de Sanidad y calidad Agroalimentaria, la Comisión Nacional para el Conocimiento y Uso de la Biodiversidad, del Consejo Consultivo de la Secretaría de Medio Ambiente y Recursos Naturales y de una dependencia de la Organización Mundial de la Salud– y solicitó al juzgado que se tomara en cuenta todo lo que los demandados han reconocido.

- El Juez rechazó las solicitudes de tener peritos para examinar la evidencia presentada y los interrogatorios verbales.

- La Colectividad presentó una apelación inmediatamente y el juicio quedó suspendido hasta la resolución de la apelación.

FRANCIA GUTIÉRREZ HERMOSILLO HAS A MASTER'S DEGREE IN PUBLICITY MANAGEMENT FROM THE CENTER OF STUDIES ON COMMUNICATION SCIENCES, AND ANOTHER ON EMERGING AGROECOLOGY AND FOOD SOVEREIGNTY FROM THE INTERNATIONAL UNIVERSITY OF ANDALUCÍA. COFOUNDER OF THE NATIONAL CAMPAIGN WITHOUT CORN THERE'S NO COUNTRY (SIN MAÍZ NO HAY PAÍS); SHE IS THE HEAD OF THE COMMUNICATION'S COMMITTEE FOR THE CLASS ACTION SUIT AGAINST TRANSGENIC CORN. SHE HAS COLLABORATED WITH CIVIL ORGANIZATIONS THAT SUPPORT SMALL FARMER'S AGRICULTURE FOR MORE THAN TEN YEARS IN MÉXICO.

FRANCIA GUTIÉRREZ HERMOSILLO TIENE UNA ESPECIALIDAD EN ALTA DIRECCIÓN EN PUBLICIDAD Y COMUNICACIÓN DEL CENTRO DE ESTUDIOS EN CIENCIAS DE LA COMUNICACIÓN Y EL GRADO DE ESPECIALISTA EN SOBERANÍA ALIMENTARIA Y AGROECOLOGÍA EMERGENTE POR LA UNIVERSIDAD INTERNACIONAL DE ANDALUCÍA. ES COFUNDADORA DE LA CAMPAÑA NACIONAL SIN MAÍZ NO HAY PAÍS, DIRECTORA DE LA COMISIÓN DE COMUNICACIÓN EN LA DEMANDA DE ACCIÓN COLECTIVA CONTRA EL MAÍZ TRANSGÉNICO Y MÁS DE DIEZ AÑOS HA COLABORADO CON ASOCIACIONES CIVILES QUE PROMUEVEN LA AGRICULTURA CAMPESINA EN MÉXICO.

PHOTO CREDIT: TOÑA OSHER

# EXPLORE “SEEDS ~ SEMILLAS” AT NEORIO 2017

NeoRio offers thought-provoking art installations right on the rim of the Rio Grande gorge. Now in its 9th year, this annual event is truly a unique experience for the Taos area. The outdoor contemporary art and community event will take place at Montoso Campground at Wild Rivers in the Rio Grande del Norte National Monument on September 16, from 4-9pm.

*“NeoRio gives us an opportunity to see the natural world through the eyes of gifted, creative artists, and their visions take turns surprising, amazing, or entertaining me,” muses Monument Manager, John Bailey, reflecting on the annual event.*

Each year, NeoRio features a different theme. This year's theme is glorious and fascinating seeds, a natural follow-up to last year's focus on “Pollination. Seeds will inspire the art installations and activities throughout the afternoon and evening at NeoRio.

Not only are seeds essential to our survival, provide our food, and shape our world, they are also incredibly beautiful and mysterious sources of life. The miracle of seeds and the global importance of healthy seed diversity are driving forces of this year's theme. It is also a local call to action to “get our own hands dirty,” plant our own seeds, explore, learn and perpetuate the valuable, cultural and agricultural practices of our local communities and learn about native plants and their roles in the ecosystems here, in Northern NM and beyond.

The event will host featured artists, Kaitlin Bryson and Hollis Moore, as well as contributing artist, photographer Geraint Smith and others, each approaching this year's theme of seeds in a unique way.

Featured artist, Kaitlin Bryson, is originally from Reno Nevada and now hails from Albuquerque, where she is currently pursuing a Master of Fine Arts in Art & Ecology from the University of New Mexico. She works with natural materials to illuminate the processual nature of life, and to call attention to the agency of the non-human environment. Her artwork is made to allow the materials involved to unfold and transform, living out their own dynamic processes. About seeds and her work for NeoRio, she says,

*“A seed is a container of pure potential. When the time has come, it threshes off its hull and is born into a radicle – the plant embryo – and begins to simultaneously grow upward and downward, reaching towards the light while also rooting deeply into the soil. The story of the seed, with its radical breakthrough, has shaped my artwork and inspired me to*



*cultivate similar moments within my own life. The piece presented at NeoRio 2017 is made to signify the moment of the radicle breaking free from dormancy, while also calling to the potentiality stored in material breakdown. It is made from dried flowers, soil, and other natural materials, and as it begins to fall apart, native seeds will be dropped in a swale below to grow in the spring.”*

Featured artist, Hollis Moore, fell in love with the West during her undergraduate studies at Colorado College. Now she lives in Albuquerque, NM where she is a Master of Fine Arts candidate at the University of New Mexico in the Printmaking department. In her work, Hollis seeks personal and collective journeys, exploring how the environment shapes her creativity and how her imagination lends a voice for the environment. Her work is rooted in traditions of printmaking, emphasizing manipulations of materiality in paper, natural materials, fiber arts, and found objects. Her current research and creative practice focuses on the Colorado River Delta. Moore will bring her new current project, Pulse Flow, to the site for NeoRio, which involves installing a full-size, 16 ft. paper maché canoe that she is building to navigate the Colorado River Delta. She describes:

*“I will use the NeoRio site at Wild Rivers as an outdoor studio to work towards completing the canoe's construction...The Rio Grande's*



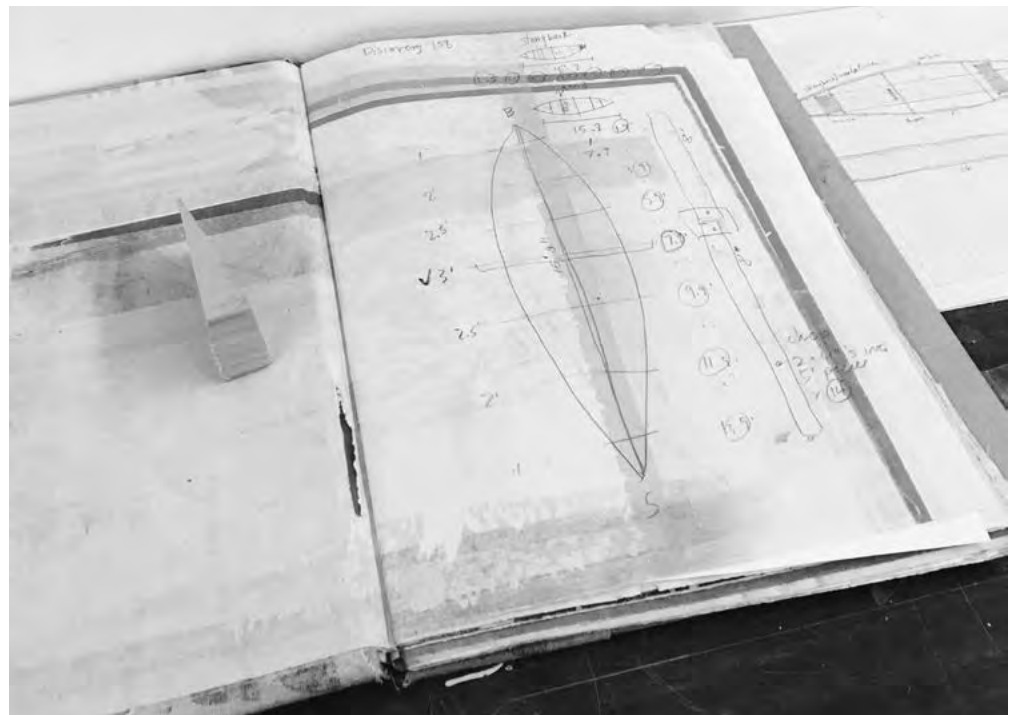
*National and Scenic River designation, will prompt conversation about the management of our rivers in the arid Southwest. How can we preserve sections of free-flowing river for the Colorado River, like the Rio Grande in the Rio Grande del Norte National Monument, whilst supporting the needs of water-users? NeoRio's theme, “Seeds ~ Semillas” relates directly to these questions as many riparian plants sync their seed broadcast with Spring floods. At NeoRio, I will also set up a paper-making workshop with local seeds and plants where participants can make their own paper, even paper boats, to imagine river water carrying a medley of seedlings to deliver to river banks downstream.”*

Both Bryson and Moore have a unique relationship with and love for Northern NM and Wild Rivers in particular.

*“In September of 2016, we visited Wild Rivers with the Land Arts of the American West Program, in which students work collectively to investigate place-based land issues in the Southwest bioregion,” says Moore.*

*“I am thrilled to be coming back to work in the gorge again and am make offering to the landscape,” says Bryson.*

During the afternoon, guests are invited to tour the art installations and projects and explore





the family-oriented, hands-on "Seed Sensorium," a collaboration with SEED Taos, as well as the "Questa Seed Exchange," a collaboration with the Questa Library. The seed-inspired afternoon poetry and music salon is also a new element to this year's event, featuring a curated series of poems by Deborah Hutchison and Gabrielle Herbertson with related musical interludes by Jonathan Hutchison.

Music from the High Desert Acoustic Duo (Justin Dean and Mark Dudrow) will usher in the evening festivities. Enjoy a locally-sourced, northern NM Fall Feast from the Questa Farmers Market growers, cooks and bakers. The Feast is coordinated by Gaea McGahee, manager of the Questa Farmers Market and contributors to the feast will be familiar to those who have visited the market this season. At dusk, on the heels of dinner, portable solar power provided by PPC Solar will allow NeoRio featured artists to offer short, informative, illustrated talks, giving behind-the-scenes looks at the onsite artworks and brief visual tours of past works.

Organized by LEAP (Land, Experience, and Art of Place) in collaboration with the BLM and others, this event celebrates National Public Lands Day, and is a great chance to discover the Wild Rivers area of the Rio Grande del Norte National Monument, or, see it in a whole new way.

*Claire Coté, LEAP director, says, "The vision for NeoRio is for people to experience the 'confluence of art and environments' through the lens of each year's theme. The combination of art and wild places can be an exciting recipe; at best perception-*

*changing and heart-opening and at least entertaining, novel, and fun. With NeoRio, it's also about community, the place and artworks together with a delicious meal and beautiful, fall sunset."*

LEAP (a program of Local nonprofit Localogy) brings innovative artists to the monument each autumn, transforming the Montoso Campground with surprising, site-specific art amid the piñon and cliffs.

**NeoRio 2017 Schedule,  
Montoso Campground, Wild Rivers:**

- 4PM** Seed-Inspired Art Installations and Activities
- 5PM** Afternoon Poetry and Music Salon
- 6PM** Local Fall Feast and Music by Justin Dean and Mark Dudrow
- 7PM** Artist Talks by NeoRio Featured Artists
- 8PM** Campfire and Music (bring an instrument!)

Please carpool if you can; parking is limited and it's better for the planet! This is a free event; donations are much appreciated. NeoRio is made possible by individual donations, local business and media sponsorships as well as generous grant support from the Questa Economic Development Fund, Chevron Questa Mine Community Fund, Taos County and others.

LEAP IS AN EXPERIMENTAL, INTERDISCIPLINARY, ARTIST-RUN INITIATIVE BASED IN QUESTA, NM. A SUBSIDIARY OF LOCAL NON-PROFIT, LOCALOGY, LEAP CREATES ARTS AND EDUCATIONAL EVENTS AND OPPORTUNITIES REFLECTING THE NATURAL AND CULTURAL ECOLOGY OF NORTHERN NM. LEAP IS KNOWN FOR ITS ANNUAL NEORIO ARTS EVENT IN THE RIO GRANDE DEL NORTE NATIONAL MONUMENT. SINCE 2009, LEAP HAS COLLABORATED WITH LOCAL LAND MANAGEMENT ORGANIZATIONS, NONPROFITS, MUNICIPALITIES, BUSINESSES AND SCHOOLS TO SERVE LOCAL AND VISITING ARTISTS, STUDENTS, AND THE PUBLIC THROUGH EDUCATION PROGRAMS, EVENTS AND PROJECTS. CLAIRE COTÉ IS THE DIRECTOR OF LEAP.

[WWW.LEAPSITE.ORG](http://WWW.LEAPSITE.ORG)



**Clockwise from top left:**

"Pom | Pelt" Kaitlin Bryson, Courtesy of the artist

"Pulse Flow" Paper Mache Canoe under construction, Hollis Moore, Courtesy of the artist

Cooks and volunteers ready to serve the local fall feast at NeoRio 2016, Photo by Carrie Leven

Amidst the event hubub, NeoRio also offers quiet moments, Photo by Carrie Leven

Milkweed Pod and Sky, Photo by Geraint Smith

Milkweed Pod, Photo by Geraint Smith

"Pulse Flow" Sketches for Paper Mache Canoe, Hollis Moor, Courtesy of the artist

"To Maintain Oneself by Self-Sown Seeds" Kaitlin Bryson, Courtesy of the artist



## MARCIAL CAMILO AYALA (1952-2016)

Creció en un pueblito en Guerrero, en México. Hablaba náhuatl y desde niño desarrolló su don y honró a su cultura a través de la belleza. La cosmogonía nahua distingue a sus pinturas, pintó mitos de creación, nahuales, sus sueños, conflictos contemporáneos, faenas comunitarias, escenas mágicas.

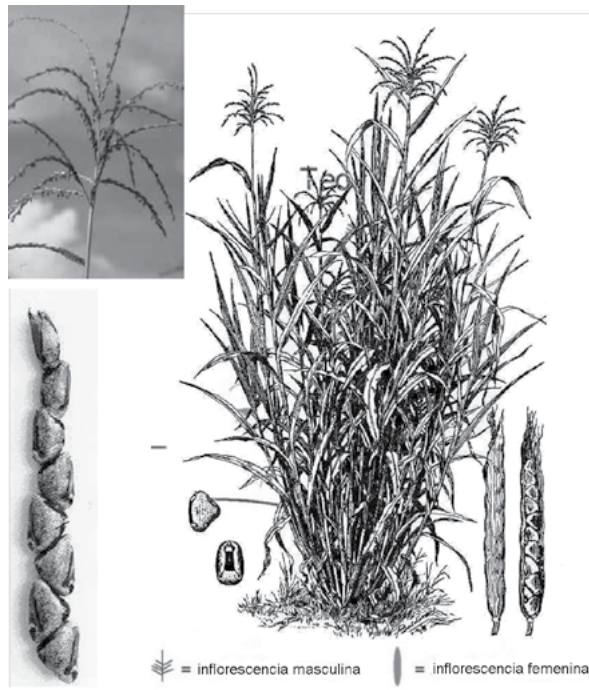
En su pueblo, San Agustín Oapan, Marcial desempeñó cada uno de los cargos del servicio comunitario, desde Topil (mandadero), Mayor, Regidor, Presidente de Bienes Comunales... hasta Comisario Municipal en 1993 -el cargo más alto en la jerarquía. Vivió muchos años en Cuernavaca y cada año asistía a las fiestas patronales o a los tequios de siembra en Oapan. A sus hijos siempre les habló en náhuatl y les inculco el amor a su cultura.

Realizó muchas exposiciones en México, Estados Unidos y Francia, hay colecciones permanentes de sus pinturas en el Museo Nacional Indígena del Smithsonian Institute, en Washington, DC y en el Museo Internacional de Arte Folklórico, de Santa Fe, Nuevo México.

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MARCIAL CAMILO AYALA (1952-2016) WAS AN EXTRAORDINARY ARTIST AND HUMAN BEING. HE PAINTED FROM THE HEART SCENES OF HIS VILLAGE AND PEOPLE, THE NAHUA OF THE ALTO RIO BALSAS OF GUERRERO, MEXICO. HE WAS KNOWN AS A 'TLAQUILO', A DISTINGUISHED PAINTER OF ANCIENT CODICES AND HE PICTURED AN ENORMOUS VOLUME OF ELEMENTS THAT BROUGHT THE SPECTATOR TO TRAVEL, SMELL, TASTE AND FEEL THE MAGIC, BEAUTY AND RICH CULTURAL HERITAGE OF HIS REGION. COMMITTED TO HIS ROOTS AND COMMUNITY, MARCIAL ENABLED PEOPLE TO LEARN ABOUT HIS VILLAGE, HELP HIS FAMILY AND NEIGHBORS AND DEFEND NAHUA LANDS WHEN THREATENED BY MEGA CONSTRUCTION PROJECTS. NACIÓ EN SAN AGUSTÍN OAPAN, GRO. AND RECEIVED GREAT RECOGNITION AND TRAJECTORY AS AN ARTIST IN MEXICO, THE USA, FRANCE, AND CANADA, BOTH IN PRIVATE COLLECTIONS AND DISTINGUISHED MUSEUMS SUCH AS THE SMITHSONIAN INSTITUTE IN WASHINGTON D.C.





## SEMILLA UNIVERSO

EQUIPO MARAKA, LETRA Y ARREGLO CAMILA RIVERA  
Y DANIEL ROA, COLOMBIA, 2014

Semilla de amor, fuente de alimento.  
Semilla corazón, origen, nacimiento.

Viajas con el viento por el espacio abierto,  
vienes de mano en mano con nuestros ancestros.  
Viajas en el tiempo, déjenme la vida.  
Eres causa y origen semilla universo, eres causa y origen ¡semilla!  
Eres la memoria, semilla heredera, semilla viajera, semilla sin frontera  
Eres la memoria, semilla alimento, semilla sustento ¡semilla!, ¡nativa!

Este es un rezo por la libertad, este es un rezo por la diversidad  
Semilla que crece hacia el sol, semilla multicolor.  
Viajas simplemente, echando raíces.  
A una semilla nadie le enseña a nacer.  
Diseño perfecto de la creación.  
A una semilla nadie le enseña a crecer,  
¡A una semilla nadie le enseña!

Eres la memoria, semilla heredera, semilla hermana, semilla sin frontera  
Eres la memoria, semilla alimento, semilla sustento, ¡semilla!

Este es un rezo por la libertad, este es un rezo por la diversidad  
Esta es la tradición de los pueblos  
Patrimonio sagrado de nuestros herederos  
Esta es nuestra herencia, herencia de vida,  
¡Legado de los hijos de los hijos de tus hijos.  
En la voz de la tierra, la voz de la semilla,  
porque ella no habla pero siempre está viva.  
Si se muere la semilla, la tenemos perdida  
porque llevas la vida en tu vientre ¡semilla!

Este es un rezo por la libertad, este es un rezo por la diversidad  
Semilla memoria, semilla heredera, semilla hermana, semilla viajera  
semilla memoria, semilla heredera, semilla hermana, semilla sin frontera.

Semilla que crece hacia el sol, semilla multicolor,  
semilla que crece hacia el sol, semilla de corazón.  
Semilla que crece hacia el sol, semilla multicolor  
semilla que crece hacia el sol, semilla de tradición.  
Semilla memoria, semilla heredera, semilla hermana, semilla viajera,  
semilla memoria, semilla heredera, semilla hermana, semilla sin frontera.

## UNIVERSE SEED

EQUIPO MARAKA, WORDS & MUSIC BY CAMILA RIVERA  
AND DANIEL ROA, COLOMBIA, 2014

Seed of love source of food, seed, heart, origin, birth.  
You travel on the wind through open space  
You come hand by hand from our ancestors.  
You travel through time, let me live  
You are cause and origin, universe seed You are cause and origin  
seed!  
You are the memory, heir seed, traveler, seed without borders  
You are the memory, feed seed, and sustenance seed, native!

This is a prayer for freedom, a prayer for diversity

Seed that grows toward the sun, multicolor seed.  
You simply travel, yielding roots.  
No one teaches a seed how to be born.  
Perfect design of creation.  
No one teaches a seed how to grow, no one teaches a seed!  
You are the memory, heir seed, sister seed, seed without border  
You are the memory, food seed, sustenance, seed!  
This is a prayer for freedom, a prayer for diversity

This is people's tradition, sacred patrimony of our heirs.  
This is our inheritance, heritage of life,  
legacy of the sons of the sons of your sons.  
In the voice of Earth the seed's voice,  
seeds don't speak but seeds are always alive.  
If seeds die, we lose all, because you carry life in your womb, seed!

This is a prayer for freedom, a prayer for diversity

You are the memory, heir seed, sister seed, traveler seed,  
You are the memory, heir seed, sister seed,  
traveller seed, seed without borders!  
Seed that grows toward the sun, multicolor seed,  
seed that grows toward the sun, seeds of heart.  
Seed that grows toward the sun, multicolor seed,  
seed that grows toward the sun, tradition seed.  
You are the memory, heir seed, sister seed, traveler seed,  
You are the memory, heir seed, sister seed,  
traveller seed, seed without borders!

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TRADUCCIÓN ANA RUIZ DÍAZ

WWW.YOUTUBE.COM/  
WATCH?FEATURE=PLAYER\_DETAILPAGE&V=VJKHK4KWWP8

PHOTO CREDIT: DOÑA CANDIDA CON SU MAIZ AZUL. TOÑA OSHER



# TUSTEN HERITAGE COMMUNITY GARDEN

FIELD & GUIDE  
BOOK



The Tusten Heritage Community Garden is located in the hamlet of Narrowsburg NY in the greater town of Tusten. For the past five years the garden has grown in its mission of being a public green space centered on education, events, services and products that provide unique botanical resources for the community of the Upper Delaware Valley. The garden's common purpose is to create a healthy, productive, community garden inspired by the indigenous heritage of early settlement days as well as contemporary eco-friendly practices such as permaculture, pollinator planting, and edible forest design.

The garden is all organic and organized according to the principles of permaculture. All gardeners are strongly encouraged to learn about this process of planning and growing—recommended reading material: *Permaculture: A Designer's Manual*, by Bill Mollison 1988 and *Gaia's Garden, Second Edition: A Guide to Home-Scale Permaculture*, by Toby Hemmenway 2009. The garden is a registered way-station for pollinators & Monarch butterflies, we ask gardeners to be mindful of

our local pollinators—bees, butterflies and insects—in selecting their plantings, so there are a wide variety of herbs, flowers and vegetables throughout the growing season. Heirloom and organic seeds and starters are required and available at the Tusten Heritage Seed Library and local nurseries.

In the garden's passive water collection system, rainwater is collected in a series of five containers located on the upper bank between the library and the garden. Gravity provides water pressure to water the beds with the hose and/or dripping irrigation system.

Gardeners are responsible for their own beds and the surrounding areas. After the growing season, in either fall or early spring, the areas surrounding beds need to be mulched with wood chips. The garden provides these, as well as newspaper and hay for mulching beds, to promote water retention and discourage weeds. Hardwood sticks and bamboo are available for trellises. Low tunnel steel hoops & row cover are available to extend the growing season.

## WATER

In our passive water collection system, rainwater is collected in a series of five containers located on the upper bank between the library and the garden. Gravity provides water pressure to water the beds with the hose and/or dripping irrigation system.

The water supply is managed so that it is always on and available; gardeners simply need to drag the hose with the attached nozzle from its place hanging vertically on the fence to their beds and turn the water on. Please monitor usage, as water is a limited resource, and be mindful to always turn the water off, roll up the hose and return it to its place.



## SEASONAL MAINTENANCE & CLEAN-UP

Gardeners are responsible for their own beds and the surrounding areas. After the growing season, in either fall or early spring, the areas surrounding beds need to be mulched with wood chips. The garden provides these, as well as newspaper and hay for mulching beds, to promote water retention and discourage weeds.

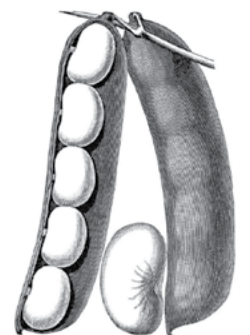


## COMPOST

Located inside the garden; it is for private household gardener use only. Please do not compost any animal products. There is a clean-up pile outside the garden near the railroad.

## SEED-SAVING

The garden has an ongoing collaboration with the Tusten branch of the Western Sullivan-Cochecton Library, which houses the Tusten Heritage Seed Library. Heirloom seeds are available to all gardeners through an honor system during library hours.





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COLLABORATIVE WRITING BY GARDEN'S NON-FOR-PROFIT FOUNDERS ANIE STANLEY, JULIETTE HERMANT & CLAYTON LEWIS.

GARDEN'S FIELD & GUIDE BOOKLET DESIGN BY KAY SCHUCKHART. ART DIRECTION BY JULIETTE HERMANT.

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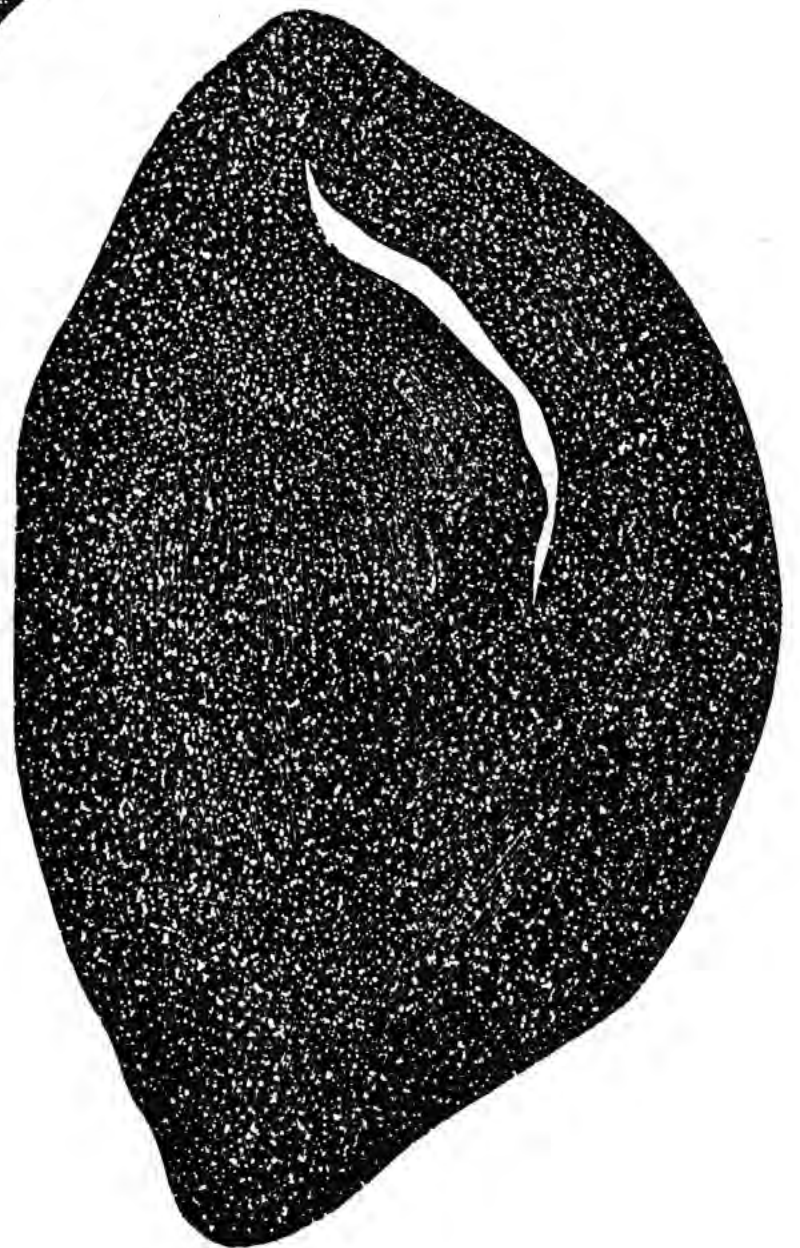
PHOTO CREDIT: P. HEAL

SELECT PAGES FROM THE GARDENS FIELD AND GUIDE BOOKLET

ANIE STANLEY IS A NATIVE OF THE CATSKILL MOUNTAINS. MULTI MEDIA ARTIST WHO ART DIRECTED THE NON-PROFIT FILM ORGANIZATION MIX NYC, FOUNDER & CAPTAIN OF SMOKEY BELLES CATSKILLS HOMESTEAD IN NARROWSBURG, NY, HOST TO VISITING ARTISTS FROM ALL PORTS AND CO- CHAIR, TUSTEN HERITAGE COMMUNITY GARDEN, NARROWSBURG, NY 2014-17.

CLAYTON LEWIS IS AN INTERDISCIPLINARY ARTIST WHO BELIEVES THAT CREATIVE MINDS HAVE THE ABILITY AND RESPONSIBILITY TO REDESIGN EXISTING SYSTEMS TO BE MORE HOLISTIC AND HUMANE. HIS RESEARCH FOCUSES ON COMMUNITY DYNAMICS, LIBERATION PEDAGOGIES, ECOPSYCHOLOGY, BIOREGIONAL HERBALISM, AND THE HEALING ARTS. HE CURRENTLY LIVES IN CHICAGO, IL AND IS WORKING TOWARDS A PH.D. IN DEPTH PSYCHOLOGY AT THE PACIFICA GRADUATE INSTITUTE.

JULIETTE HERMANT IS AN ARTIST, INTERIOR & EXTERIOR DESIGN CONSULTANT. A NATIVE OF FRANCE, SHE BRINGS AN OLD WORLD REFINEMENT AND A TOUCH OF GLAMOUR TO EVERYTHING SHE CREATES. SHE HAS SPEARHEADED THE PLAN FOR THE ENVIRONMENTALLY CONSCIOUS RESTORATION IN HER 1920S INDUSTRIAL WAREHOUSE - WHOSE PREVIOUS INCARNATIONS INCLUDES SCHOOL BUS GARAGE AND WORLD WAR II PARTS FACTORY - THE STEADFAST VISION SHE HOLDS FOR HER COMMUNITY HAS SHOWN THROUGH THE DEVELOPMENT OF THE TUSTEN HERITAGE COMMUNITY GARDEN & ADJACENT TUSTEN SEED LIBRARY REFLECTING HER DEDICATION TO CREATE PRODUCTIVE POLLINATORS GARDENS.



## **VESSEL I** **VESSEL III** MELODY OVERSTREET

These prints were initially inspired by observations I made of fava beans with cracked seed coats that I gathered and saved from my home garden. I was reflecting on the Rumi poem that speaks to 'the wound as where the light enters you,' and the parallel this has to the profound unraveling of seed coats as they begin to germinate. These two prints are titled Vessel I and Vessel III (Vessel II was part of the Spring 2017 Agri-Culture Journal).

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MELODY OVERSTREET IS AN ARTIST, EDUCATOR, FOOD GROWER AND SEED SAVER THAT IS INTERESTED IN THE MYRIAD TEN THOUSAND THINGS THAT COMPOSE AND SUSTAIN US. WWW.MELODYOVERSTREET.COM

# FRUIT FUTURES

## FRANCES WHITEHEAD

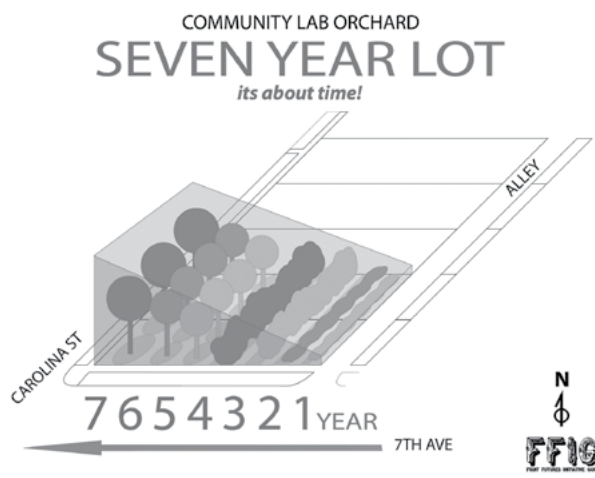
Fruit Futures Initiative Gary (FFIG) is an experimental community orchard project under development with the Emerson community of Gary, Indiana. These multipurpose landscapes of fruiting trees and shrubs aim to engage, educate, and express the creative aspirations of the community. The growing of fruit trees has many dimensions: fruit can contribute to food access, social cohesion, participation, and neighborhood beautification in an underserved community. And the fruit trees can be the focus of thematic festivals and youth programs. Fruit tree blossoms are visually compelling and temperature sensitive, and are a valuable tool for climate awareness. And, the fruit trees can be, over time, the beginning of small businesses; a new fruit economy and culture is possible from this modest start.

However, as art and artistic activism, this initial tree-planting project is aimed at changing perceptions, at making manifest new possibilities with the community of Emerson, and moving outside the inertia of conventional (and so far failing) strategies of typical urban "re-development". The project reopens the question of "beauty" and of "the commons" and explores the potential of multipurpose flowering landscapes to catalyze a new participatory "Art of the Everyday", a new imaginary.

Perched at the south end of the Chicago Metro Area, Gary was founded in 1909 by US Steel and has suffered the predictable fate of company towns. The neighborhood of Emerson is an extreme example of the distress suffered by the city as a whole. The past four decades of Gary's history are largely a story of disinvestment and marginalization, exacerbated by racism, and by the failure of city planners in the 1950's and '60's to prepare for the impacts of suburbanization. Today Emerson lacks the basics: steady population, employment, affordable housing, and public safety. The closing of Emerson school, the focal point and social "glue" of the residential neighborhood severed the last remaining community ties of many long-time residents, who followed the mass emigration out of the city and abandoned their properties. Repeated conventional urban re-development efforts have not altered this population loss and economic decline, and none have benefited the lives of the ordinary residents of Emerson. In spite of a deep-seated love for the neighborhood among residents, Emerson now faces a dimension of disengagement and inertia that is challenging to overcome. This disengagement is coupled with very low population density, creating an atmosphere of desertion and vacancy that is reinforced visually and spatially. Now the stigma of dysfunction has added to these conditions.

*How can we ask new questions, and find other possibilities for Emerson? Other than conventional re-development strategies, what potentials are there to increase quality of life in Emerson?*

Gary's economic history and its identity as an industrial center have obscured the fact that Gary has the same soils and microclimate as the famous Michigan "fruit belt" just to the east. In spite of a growing interest in fresh local food access, no one has considered large-scale fruit growing. Seen in this context the vast available land in Emerson offers an opportunity to re-imagine the once-residential fabric of post-urban Gary and rethink the future character of this place. Co-op orchards are often shared assets, re-establishing the commons and creating value outside commercial development.



This experimental civic approach is part of an emerging type of critical art practice where artists intervene into urban planning. The "artist urbanist" is a new kind of problem solver, a new kind of urban planner. Here planning is culturally-driven, and co-created with community. FFIG embraces the emerging spatial character of Gary's east side. This speculative post-growth creative and economic strategy has the potential to narrate a different story of land stewardship and community engagement. FFIG, revalues invisible community assets, challenges conventional assumptions of race and place, and models a radically multifunctional approach to culture change, creating diverse value and growing community capacity through cooperation and culture.

On a visual and visceral level, we want to see whether the compelling beauty of spring flowering fruit trees might catalyze curiosity and engagement in the harsh urban fabric of the vacated Emerson streetscape. The stunning natural beauty of flowering fruit trees and productive landscapes reveal that the open space in Emerson can be the key to belonging, the key to inclusion and cooperation.

The initial FFIG project is the Community Lab Orchard, which emphasizes the values of curiosity, cooperation, engagement, and beauty. In the Lab Orchard, neighborhood "fruit explorers" learn a wide variety of innovative and traditional growing techniques and become acquainted with favorite and forgotten small fruits. Embracing the vibrant oral traditions well known in the neighborhood, this hands-on fruit-growing will be accompanied by "Jams and Jellies" cultural programming for greater inclusion and enhanced quality of life.

The Lab Orchard is being developed collaboratively with a wide range of community leaders, organizations and partners. These include Orchard Collaborative co-founders Walter Jones and Deb Backhus, the Rev. Curtis Whittaker, founder of Faith Farms urban ag site, the Neighborhood Spotlight planning process run by the Legacy Foundation, Andrew Hart, the US Forest Service Community Tree Liaison, and many others. These efforts are supported by the City of Gary Departments of Environment and Green Urbanism, and Planning/ Redevelopment. To facilitate the operation of FFIG, and secure the orchard site into the future, we have formed a civically oriented community land trust, The Gary Commons.

This first orchard prototype will inform the long-term work of FFIG towards a network of community orchards and a conversation about cultural futures beyond re-development. As soils are readied and public imaginations engaged, community driven productive landscapes and experimental orchards allow low-density neighborhoods to contribute to foodshed resilience, grow civic pride, and collectively evolve new creative foodways, linking place, identity and environmental justice.

FRANCES WHITEHEAD IS A CIVIC PRACTICE ARTIST BRINGING THE METHODS, MINDSETS, AND STRATEGIES OF CONTEMPORARY ART PRACTICE TO THE PROCESS OF SHAPING THE FUTURE CITY. CONNECTING EMERGING ART PRACTICES, THE DISCOURSES AROUND CULTURALLY INFORMED SUSTAINABILITY, AND NEW CONCEPTS OF HERITAGE AND REMEDIATION, SHE DEVELOPS STRATEGIES TO DEPLOY THE KNOWLEDGE OF ARTISTS AS CHANGE AGENTS, ASKING, WHAT DO ARTISTS KNOW? . SHE IS PROFESSOR OF SCULPTURE + ARCHITECTURE AT THE SCHOOL OF THE ART INSTITUTE OF CHICAGO.

# HYMN FOR THE SEEDS

CRISTOBAL A. WELLS

G D C G

Seed of a bright new day  
Sun sown the blessing way  
Seeds of the forests, of the sky,  
Seeds of the mountains high

Seed in the rolling sun  
Seed of a heart that spun  
Breathing seed  
Seed divine

G C G D G

Seeds of the spiraling of the stars  
Seed on the Wind  
Seed of the beginning  
And beginning again

Seed in the motion of the ocean  
On the waves  
Seed of tomorrow  
All the seeds of yesterday

Am F G

In these times would you return to us  
Bring your flowers and your fields  
Hold tight the ancient ones  
Health and flavor prove the yield

Let our children learn to grow  
We are not just here to fight  
The way the Earth provides for us  
If we treat her right

G C G D G

Seeds of the spiral of the stars  
Seed on the wind  
Seed of the beginning  
And beginning again

Seed in the motion of the ocean  
On the waves  
Seed of tomorrow  
All the seeds of yesterday  
Am F G

Sprout of maple, limb of oak, stone of peach  
May our people bring you within reach  
Grain of corn, blossom of squash, ovum of bean  
Sing them strong and pure, standing ancient free

G D C G

Seed of a bright new day  
Sun Sown the blessing way  
Seeds of the forests, of the sky,  
Seeds of the mountains high

Seed in the rolling sun  
Seed of a heart that spun  
Breathing seed  
Seed divine

# HIMNO DE LAS SEMILLAS

POR CRISTOBAL A. WELLS

Semilla de un nuevo día brillante  
Sol sembrado en el camino bendito  
Semillas de los bosques, del cielo  
Semillas de las montañas

Semilla en el sol que rueda  
Semilla de un corazón que gira  
Semilla que respira  
Semilla divina

Semillas de la espiral de las estrellas  
Semilla en el viento  
Semilla del principio  
Y principio de nuevo

Semilla en el movimiento del océano  
En las olas  
Semilla del mañana  
Todas las semillas de ayer

En estos tiempos vuelve a nosotros  
Trae tus flores y sus campos  
Mantén cerca los ancestros  
La salud el sabor el rendimiento

Deja que nuestros niños aprendan a crecer  
No sólo estamos aquí para luchar  
La forma en que la Tierra nos provee  
Si la tratamos bien

Semillas de la espiral de las estrellas  
Semilla del viento  
Semilla del principio  
Y principio de nuevo

Semilla en el movimiento del océano  
En las olas  
Semilla del mañana  
Semillas de ayer

Brote de arce, de roble, piedra de melocotón  
Que nuestra gente te traiga a nuestro alcance

Grano de maíz, flor de calabaza, vaina de frijol  
Cantamos fuerte y de pie, son ancestrales y libres

Semilla de un nuevo día brillante  
Sol sembrado en el camino bendito  
Semillas de los bosques, del cielo  
Semillas de las montañas

Semilla en el sol que rueda  
Semilla de un corazón que gira  
Semilla que respira  
Semilla divina

---

CHRIS IS THE TORCH BEARER OF ALL SPECIES PROJECTS. "ONE DAY I REALISED THERE WAS NO HYMN FOR THE SEEDS AND IF SEEDS ARE NOT DIVINE THEN WHAT IS? THIS SONG CAME TO ME AS A GOSPEL REGGAE SONG."

[SOUNDCLOUD.COM/SEEDBROADCAST/CHRIS-WELLS-SINGS-HIS-SEED](https://soundcloud.com/seedbroadcast/chris-wells-sings-his-seed)

[ALLSPECIES@EARTHLINK.NET](mailto:ALLSPECIES@EARTHLINK.NET)

[ALLSPECIESPROJECTS.COM](https://www.allspeciesprojects.com)

[ALLSPECIESMUSIC.WORDPRESS.COM](https://www.allspeciesmusic.wordpress.com)

PHOTO CREDIT: LISA LAW





## SAVING SEEDS TO SOW THE FUTURE

BEN COHEN

The first seeds I ever saved were Cherokee Trail of Tears black beans. They were a gift from a local gardener and while this may not seem like a very big deal, I still remember that moment like it was yesterday. I had been questioning him about the heirloom varieties he featured in his garden and why were they significant... what made these seeds any different than the ones I could buy down the road from the garden supply center? To answer my question, he simply reached up in the vines of the nearest pole bean, pulled loose a few of the dried pods that were hanging there, stuck them into my hand and said, "Take these seeds home. Grow them next year. Save your seeds and share them with a friend." And that was it. I don't know if either of us knew how much a difference that moment was going to make in the course of my life. Or maybe he did.

In the years since that fateful moment, saving seeds has become a fixture of my daily life. I have had the opportunity to work with a number of heirloom preservation groups and I've even had the chance to travel to neighboring states to share my thoughts on seed saving and the importance of community seed sharing networks. I've also worked to help open nearly two-dozen seed libraries here in my home state of Michigan... That handful of beans sure had quite the impact!

While I take pride in knowing that I've been able to get so many people involved in gardening and seed saving, what really matters to me the most is seeing my own children out there in the gardens, actively engaged in growing their own food and participating in the timeless cycle of planting, harvesting and saving seeds. Watching them kneel down in the dirt to plant these precious seeds, I know that they are connected to their food, to their ancestors and to their future. We even still grow those Cherokee Trail of Tears beans. And we still save our seeds and share them with our friends.

Elijah (8) and his brother Anakin (3) are also the best helpers any gardener could ever ask for! Always enthusiastic and eager learners, they help make even the most mundane chores enjoyable. Leave it to a young child to remind you to look up from hoeing the corn to catch a glimpse of a fluttering butterfly or to listen to the hum of a bumblebee passing by. The relationship of teacher and student is always in flux as we help guide each other to sow a better future for all of us.

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BEN COHEN IS THE OWNER OF SMALL HOUSE FARM, A SUSTAINABLE HOMESTEAD PROJECT IN SANFORD, MI, WHERE HE IS AN HEIRLOOM SEED ACTIVIST AND EDUCATOR. BEN TRAVELS THE MIDWEST SHARING HIS PASSION FOR GARDENING AND SEED SAVING WHILE ALSO SHARING SEEDS WITH EVERYONE THAT HE MEETS! HE HAS GROWN SEED CROPS COMMERCIALY FOR BAKER CREEK HEIRLOOM SEED COMPANY, THE RARE VEGETABLE SEED CONSORTIUM AND ANNIE'S HEIRLOOM SEEDS.

[WWW.SMALLHOUSEFARM.COM](http://WWW.SMALLHOUSEFARM.COM)

FROM LEFT:

PHOTO 1, ANAKIN: YOUNG ANAKIN, AGE 3, POSES WITH A PUMPKIN THAT HE GREW ON HIS OWN FROM SEED.

PHOTO 2, ELIJAH: ELIJAH, AGE 8, HAS FUN WHILE HE COLLECTS SEED FROM HIS YELLOW PEAR TOMATOES.

PHOTO 3, BEN: BEN COHEN, OWNER OF SMALL HOUSE FARM IN MICHIGAN.



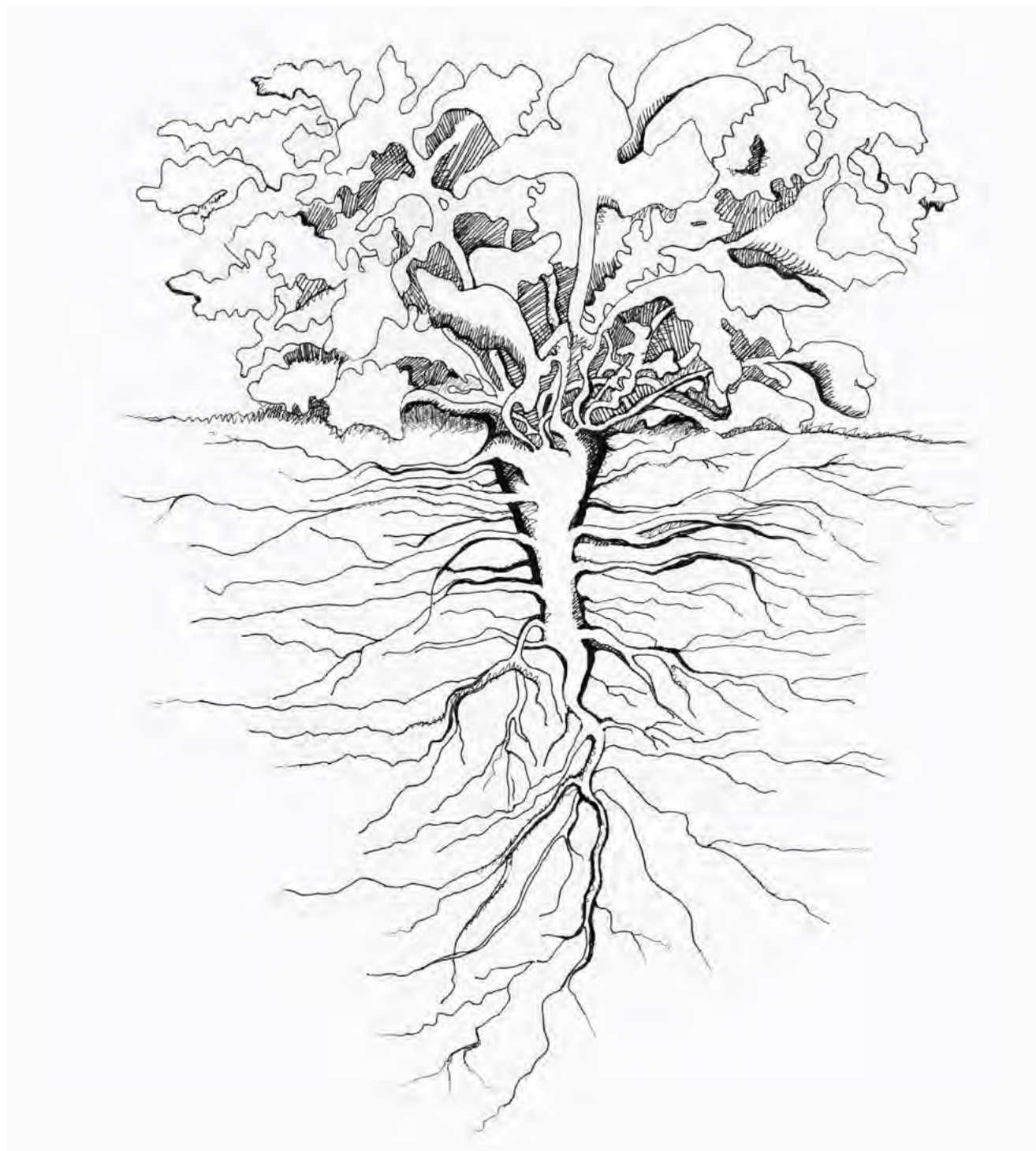
## HERMANAS MAICERAS JADE LEYVA

"Hermanas Maiceras", Acrylic/canvas, 12" X 12"

This image is dedicated to the deep religious and cultural relationship between maize and all Native peoples of the Americas for which this ancient crop is a deep part of every day life, not only in food form but cultural & religious one as well.

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JADE LEYVA HAS BEEN CREATING ART SINCE SHE WAS A YOUNG GIRL IN MEXICO CITY. HER INFLUENCES RANGE FROM PRE-COLOMBIAN TO POST-MODERN. IT IS AT TIMES WHIMSICAL, CELEBRATORY AND REFLECTIVE, YET ALWAYS THOUGHT PROVOKING AND EXPRESSIVE - A VISUAL "MAGICAL REALISM". THE CENTRAL THEMES OF HER WORK ARE LOVE, UNITY, AND OUR FRAGILE RELATIONSHIP TO MOTHER EARTH. MORE OF HER WORK CAN BE FOUND ON INSTAGRAM & FACEBOOK: JADE LEYVA ART.



## "DAIKON AT WORK" AVIVA RAHMANI 2017

Ink drawing on paper 11.5"x 9" (based on a conversation between ecological artist Aviva Rahmani and soil scientist Ray Weil about no-tillage agriculture and soil health, prepared for:

"Rocks, Radishes, Restoration: on the relationships between clean water and healthy soil." In: Toland, Noller & Wessolek, Field to Palette (CRC Press, 2018, forthcoming)

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DR. AVIVA RAHMANI'S THE BLUED TREES SYMPHONY IS SUPPORTED BY A BLADE OF GRASS AND WAS AWARDED A 2016 FELLOWSHIP FROM THE NEW YORK FOUNDATION FOR THE ARTS (NYFA). HER "TRIGGER POINTS/ TIPPING POINTS," PREMIERED AT THE 2007 VENICE BIENNALE, AND CONTRIBUTED TO GULF TO GULF (2009- PRESENT), A NYFA SPONSORED PROJECT ACCESSED FROM 85 COUNTRIES. SHE IS AN AFFILIATE WITH INSTAAR, UNIVERSITY OF COLORADO AT BOULDER.

WWW.GHOSTNETS.COM

# FOLLOWING THE PATH OF THE WOMEN SEED GUARDIANS

EMILY ARASIM

***“Women...are at the forefront of shaping new scientific and economic paradigms to reclaim seed sovereignty and food security across the world. They are leading movement to change both practice and paradigm: how we grow and transform our food. As seed keepers and food producers, as mothers and consumers, they are engaged in renewing a food system that is better aligned with the ecological processes of the Earth's renewal, the laws of human rights and social justice, and the means through which our bodies stay well and healthy.”***

**- Vandana Shiva, 'Food Sovereignty, Food Security: Women in the Vanguard of the Fight Against GMOs and Corporate Agriculture'**

***“The Corn-Mother has been talking to people for a long time. We've just forgotten how to listen.”***

**- Marilou Awiakta, 'Selu: Seeking the Corn-Mother's Wisdom'**

Tracing back the story of a seed, we often come to the hands of a woman. The hands of a mother, of a grandmother, of a daughter, of a healer, of a leader - hands beautiful and scarred with the telltale signs of countless days at work in the field, in the home and in service to our diverse communities.

For over 12,000 years, and across the continents - women selecting, planting, harvesting, processing, storing and preparing sustenance using local, traditional and Indigenous plants has played a major role in nurturing ecological diversity and ensuring our common survival - as well as cultural continuity and remembrance for peoples across globe.

In countries around the world, women are responsible for producing 40 - 80% of all of our food - and despite systemic marginalization in their access and rights to land, water and support - they continue to rise daily to do what must be done to sustain humanity, and provide nourishment, seeds and hope to the generations to come.

In the age of agribusiness, and corporate patents and genetic violations of the sacred seed - women are also rising to lead policy, education and action through all manner of movements, including those for farmers rights, health, Indigenous sovereignty, ecologic and social justice, and climate change solutions. With chemical agriculture as one of the number one sources of the greenhouse gas emissions

causing the global climate crisis, the vision and work of women seed guardians grows everyday in its importance and urgency.

These women's innumerable stories are stories that we so deeply need to hear - and while most go unrecorded and unnamed as women continue in their humble daily work, we can still be encouraged and inspired to action by those stories that we can tell. We can commit ourselves to amplifying these stories, and perhaps, begin again ourselves to walk the path to becoming one of these vital Earth and community stewards.

In the province of Meghalaya, India, Indigenous Khasi women<sup>1</sup> are working ceaselessly to continue matriarchal traditions of carrying and passing on to their daughters a rich array of agricultural seeds; associated knowledge in culture, health and medicine; and practices for caring for and living in good relationship with the Earth.

Across the country, many individuals and women's groups have been at the forefront of efforts to save seeds and combat rampant cycles of rural debt and degradation caused by chemical agriculture. One of the world's foremost seed educators and activists, Dr. Vandana Shiva, has helped through her organization Navdanya<sup>2</sup> to spur 122 community seed

<sup>1</sup> Yes Magazine (2016) - In Photos: The Seed-Saving Farmers Who Pass Down Land to Their Daughters

<sup>2</sup> Navdanya - Women of India Pledge to Defend Seed Freedom and Fight GMO's and BioPiracy

banks in 18 states of India and Bhutan - most all led and managed by local women seed keepers, young and old, who understand the deep need for protection and restoration of diverse traditional varieties.

In Palestine, agronomist Vivien Sansour of Beit Jala has founded the Palestine Seed Library<sup>3</sup>, working collaboratively with local farmers to share and save biodiversity and ancestral seeds - while also recording stories and teachings to help the Palestinian people maintain both their farming practices and their culture in the face of illegal military and settler occupation.

Across the Americas, women are standing to protect maíz and other native food crops as critical sources of sustenance and survival; as symbols of the hearts of their nations; and as part of a living, daily relationship with ties back to the most ancient agreements and partnerships between their ancestors and the land.

Adelita San Vicente, a leader with Semillas de Vida<sup>4</sup> based in Mexico City, has been working with a growing coalition to prevent the spread of GMO maíz across the country, which, critically, is the center of origin and diversity for the plant. Over many years and decades, Adelita, and countless women like her across Mexico<sup>5</sup>, have engaged in political, educational and legal advocacy; seed keeping; and other diverse efforts to support the farmers engaged in planting and saving native crops.

In Argentina, the Mothers of Ituzaingó<sup>6</sup> continue to raise their voices and take action to oppose the engulfment of their town, and the country, by GMOs and chemical pesticides - drawing global attention to the dangerous health impacts of these poisonous practices, such as cancer and heightened rates of infant mortality, including the death of the child of one of the group's own brave woman leaders.

In Ghana, Uganda, Mozambique, Ethiopia, Kenya, Tanzania and other nations across

<sup>3</sup> The Guardian (2016) - Palestinians Create New Seed Bank to Save their Farming Heritage in the Holy Land's Hills

<sup>4</sup> Huffington Post (2014) - On National Day of Maize in Mexico, Protecting the Sacred Plant

<sup>5</sup> Our Seeds, Ourselves (2011) - "'Mujer, Maíz y Resistencia' - Woman, Corn and Resistance'

<sup>6</sup> The Goldman Environmental Prize (2014) - One Woman's Fight Against Glyphosate



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EMILY ARASIM IS A YOUNG FARMER AND SEED STEWARD FROM TESUQUE, NEW MEXICO. SHE CURRENTLY WORKS AS THE COMMUNICATIONS DIRECTOR FOR THE WOMEN'S EARTH & CLIMATE ACTION NETWORK, AND AS A SPIRITUAL ECOLOGY FELLOW - WHILE LEARNING WITH MENTORS AND FARMERS ACROSS HER HOME REGION AND BEYOND SURROUNDING THE PROTECTION OF TRADITIONAL SEEDS, STORIES AND FARMING PRACTICES.

EARASIM@GMAIL.COM

Africa<sup>7</sup>, women are forming local seed sharing collectives, working to demand women's land rights, and leading work to stop new seed laws and regulations meant to criminalize community exchange of ancestral seeds, in favor of GMOs and export-agriculture.

In United States, the heart of the industrial agriculture machine, women are also protecting and growing the seeds of life.

Northern California based Rowen White<sup>8</sup> of the Mohawk People is engaged in diverse farming and educational efforts, replanting seeds and sharing knowledge of how to respectfully and reverently steward this precious heritage with hundreds of people around the world. Deepening the connection further, Rowen is using the word 'rematriation' to describe her work to reclaim and restore sovereignty and just use of her people's Indigenous seed varieties - recognizing that Indigenous women have traditionally, and continue to, act as central keepers of seeds and stories for their people.

Also working from California, Rebecca Newburn of Richmond Grows Seed Lending Library<sup>9</sup> has created a dynamic space for seed education and sharing within her city's public library, providing a model and important resources that have helped catalyze a movement consisting of over 500 local seed libraries and counting.

In the north-central part of the US, Ojibwe peoples have been fighting for years to prevent genetic contamination and violation of their sacred manoomin, wild rice. Winona LaDuke<sup>10</sup> - Ojibwe woman leader of the White Earth Land Recovery Project and Anishinaabe Seed Project at White Earth Reservation in Minnesota, as well as Indigenous environmental organization, Honor the Earth - has been at the forefront of many vital actions which have brought important gains to protect this source of sustenance and life. Mounting challenges however, now come not only from seed and chemical corporations, but also from mining and oil projects, such as the Enbridge pipelines<sup>11</sup>, which threaten dire impacts and contamination of the waterways and lands of the region, including key ancestral ricing areas. Winona and her allies share 'pipeline free manoomin' across the

7 Food First (2015) - We Are the Solution: African Women Organize for Land and Seed Sovereignty + The Ecologist (2015) - Ghana's Women Farmers Resist the G7 Plan to Grab Africa's Seeds

8 Civil Eats (2017) - Returning Native Seeds to Their Roots  
9 Pacific Standard (2017) - Seed Librarians Are Fighting To Protect The U.S.'s Resilient and Diverse Food System

10 Yes Magazine (2006) - On Wild Rice, Wind Power, Thunder Beings, Self-reliance, and our Covenant with the Creator

11 In These Times (2016) - Extractive Economies Threaten an Ancient Grain in Minnesota



THE HANDS OF AN ELDER WOMAN SEED SAVER WITH HER MAÍZ, SAN PEDRO DE VILCABAMBA, SOUTHERN ECUADOR

PHOTO CREDIT: EMILY ARASIM

world as but one symbol of their resistance and continued flourishing in the face of all those that seek to violate their seeds, health and lifeways.

In New Mexico, the land where I have the honor to farm and learn, the loving work of women is strong and deeply rooted - from the women stewards of farms such as Zulu Petal's Farm in Dixon, to the women storytellers and educators of SeedBroadcast - from the women advocates and organizers with Cuatro Puertas<sup>12</sup>, the Taos Seed Exchange, the New Mexico Acequia Association, and the ABQ-BERNCO Seed Library - to the Indigenous educators and leaders of the Flowering Tree Permaculture Institute at Santa Clara Pueblo<sup>13</sup>; Tewa Women United and the Espanola Valley Healing Oasis<sup>14</sup>; Red Willow Farm at Taos Pueblo<sup>15</sup>; Grandmother Flordemayo's 'The Path'; and the Four Bridges Traveling Permaculture Institute - amongst many, many other individual women, women-led groups, and generations of families to whom we owe the deepest gratitude.

12 SeedBroadcast (2013) - Isaura Andaluz Talks About the Stories of Seeds and Why We Should All Care

13 Santa Fe New Mexican (2016) - You Are What Your Ancestors Ate: 'The Pueblo Food Experience Cookbook

14 Edible New Mexico (2016) - Group Plants Seeds For Change'

15 The Taos News (2017) - Saving Seeds and Stories at Taos Pueblo

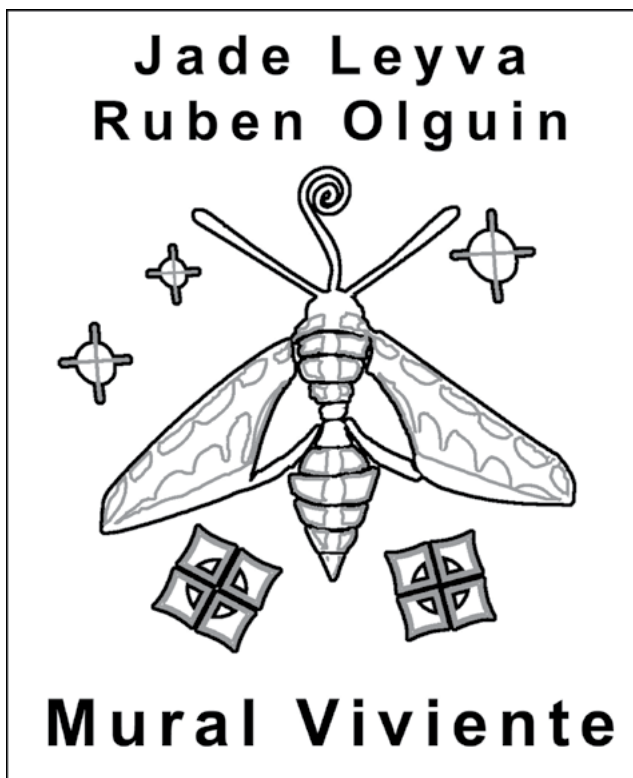
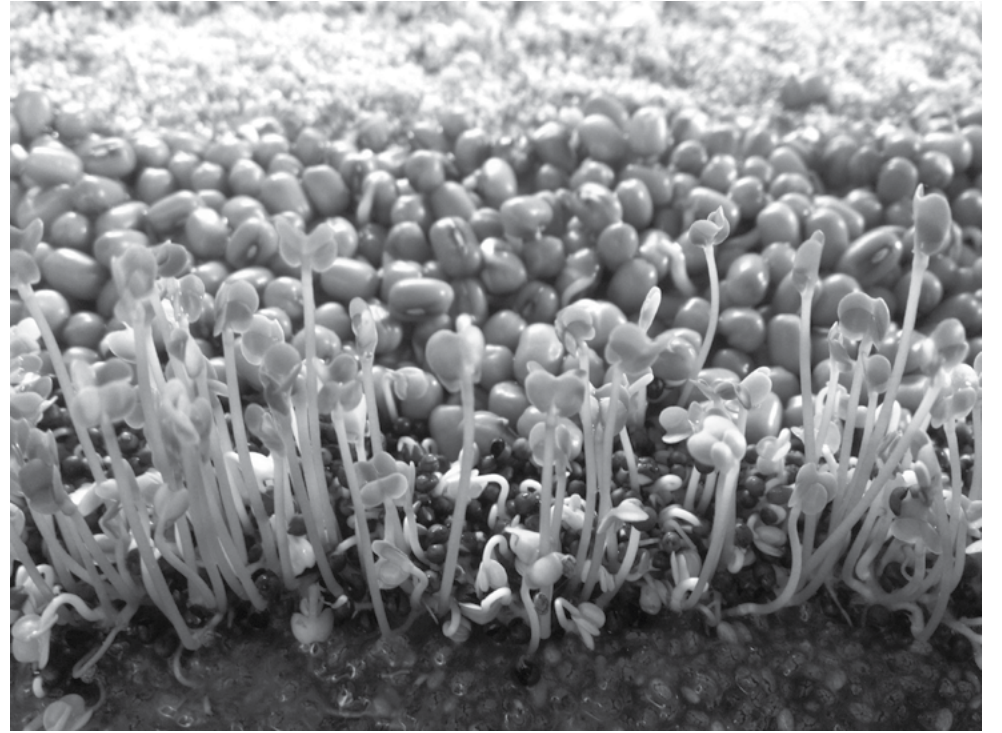
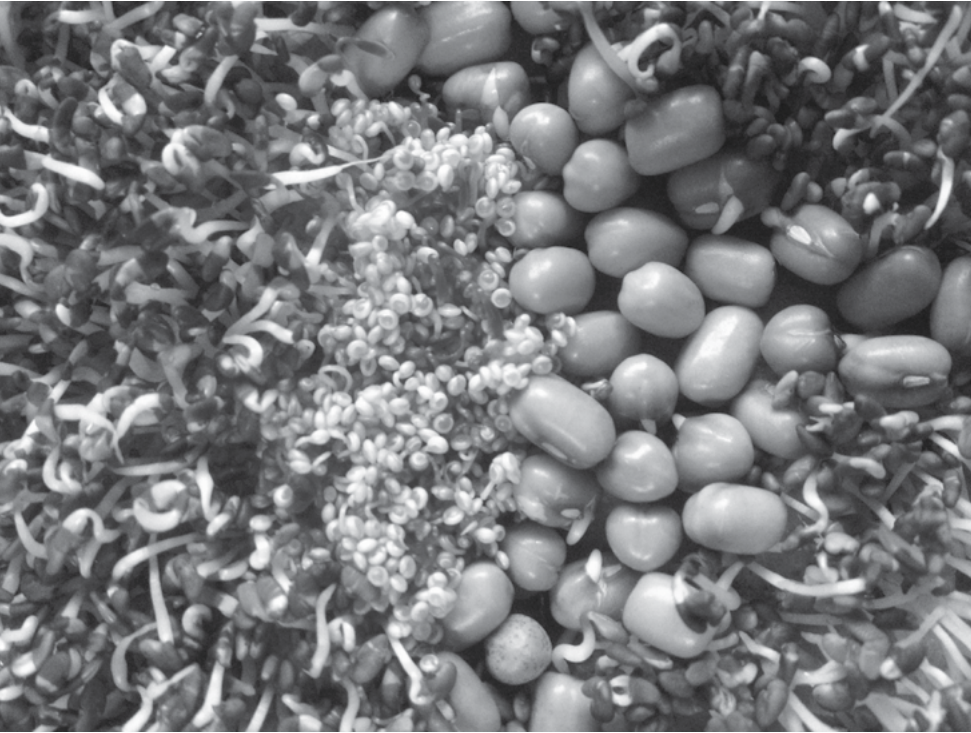
And when we pause to reflect, it is no surprise that women rise for the seeds. In the histories and cosmologies of peoples across the world, seed is also associated with the Great Mother in her many forms - from Sky Woman of the Iroquois, to Demeter of the Greeks.

Indeed, the sacred seed is herself feminine - bursting with life, reproducing and carrying forward our world in miraculous manifestations of the generous life force of Mother Earth.

As a young woman farmer learning slowly on the path of the seeds - I admire these women, I honor these women, I celebrate these women - the historic and the mythic, the young and the old, the ancestral and the living, the near and the far. Thank you to all those who have led the way with a hand full of seeds, and a determined heart.

## MURAL VIVIENTE.

JADE LEYVA, RÚBEN OLGUÍN



Mural Viviente was a mural image of a Hawk Moth using colorful seeds of edible plants embedded in a layer of natural multicolored clay and soil. Artist Rúben Olguín, a member of the SeedBroadcast collective, approached artist Jade Leyva to create a collaborative piece that would be a living mural incorporating these two artists' mediums to create a unique living –sprouting– seed artwork, which they called Mural Viviente. The piece was created with a growing medium and Ruben Olguin's native clays, harvested in different areas of New Mexico as well as many different colored sprouts, among them, Red Amaranth, Alfalfa, Mung Beans, Blue Kale, and more– creating a beautiful piece.

The Hawk Moth is an important figure in Pueblo culture and often a perceived enemy of non-native gardens. Mural Viviente looks at the need to encourage pollinator awareness, spread seeds, and increase biodiversity in our local ecosystems and gardens. This piece was displayed for a month at Axle Contemporary

Mobile Gallery during the month of May, 2017, with two main events that happened at the Farmers Market in the Santa Fe Railyard, and at the Farms, Films, Food event at the Center for Contemporary Arts in Santa Fe.

The seeds sprouted and grew over the exhibition period, enhancing the image of the mural with the textures of sprouting plants. This mural adapted the concept of community seed murals in Tepoztlán Mexico and the Central Mexico area, which Jade Leyva grew up seeing. She has introduced the concept to diverse New Mexico communities with her Community Seed Mural Project. In Mexico, they are called Murales de Semillas (seed murals), created over several months with the entire community and displayed during celebrations such as Easter and Carnival. The imagery for Mural Viviente is in the spirit of Tepoztlán, but incorporates designs and elements of the American Southwest, honoring native species and their ancient relationship in the ecosystem and cultural history of New Mexico.



JADE LEYVA IS THE CREATOR AND COORDINATOR OF THE COMMUNITY SEED MURAL PROJECT AT SEEDS A COLLECTIVE VOICE. SHE IS A VISUAL ARTIST AND UNDERSTANDS THE POWERFUL TOOL THAT ART CAN BE. LEYVA WAS RAISED IN MEXICO AND NOW LIVES IN NEW MEXICO. SHE HAS BEEN CREATING SEED MURALS FOR THE PAST FOUR YEARS.

RÚBEN OLGUÍN WORKS PRIMARILY IN CERAMICS, ADOBE, SOUND, VIDEO, AND ELECTRONIC MEDIA. HIS WORK DRAWS FROM HIS MIXED PUEBLO AND SPANISH HERITAGE. HIS WORK HAS EXHIBITED INTERNATIONALLY, SHOWING IN GERMANY, MIAMI, SANTA FE AND TAOS. OLGUIN COMPLETED AN MFA IN STUDIO ARTS FROM THE UNIVERSITY OF NEW MEXICO IN 2015, AND A BA IN CINEMATIC ARTS FROM THE UNIVERSITY OF NEW MEXICO IN 2012. HE IS A MEMBER OF THE SEEDBROADCAST COLLECTIVE.

[AXLEART.COM/MURAL-VIVIENTE](http://AXLEART.COM/MURAL-VIVIENTE)

PHOTO CREDIT: AXLE ART



## FARM STORIES FROM ESPAÑOLA FARMERS MARKET

SABRA MOORE

February 2017

A Few Comments: All three farm stories were collected in 2014 for the second manifestation of THE FARM SHOW, a collaborative art project that I organized between farmers at the Española Farmers Market and local artists. There are 31 stories collected from these two projects and these three stories were collected by three artists-participants- Bobbe Besold, Norma Navarro and Iren Schio. These artists are also gardeners. Norma has worked with the Market for several years as Assistant Manager. The Market is a community space where people come together through the enjoyment of food, concern for the wellbeing of our environment, and a shared sense of creativity based in working with your hands. Two of the interviews are with women who make soaps and remedios from herbs or wild plants that they collect. The use of local medicinal remedies is a part of the traditional rural Norteño culture. The third story is from a farmer who grew up in Guanajuato. The Market is home to many immigrant farmers who have brought seeds from Mexico with them and re-introduced varieties of crops once grown here.

### GABRIELA SILVA—GABRIELA'S GARDEN ART

Gabriela gathered her knowledge of plants from her father and her mother's family. Her mother is an incredible gardener: "She can grow anything! She has a green thumb! She knows all the plants and their names, but Dad knows what they are good for. My father always said that you should never administer medicine/herbs to anyone. You can tell people how to use the plants, but you never, ever give it to them yourself."

"My grandmother Carmen Munoz Garcia taught me everything about herbs. She was always in a rush to get me that information; she was diabetic and knew she didn't have long to live. She was so clear...she said what had to be said, what was meant to be said."

"Wherever I lived I always had my little garden or greenhouse of herbs, plants and flowers."

"I have been working with roses for over 20 years now. The roses I use must be organic and untouched."

"Only roses and the lotus flowers have that powerful energy that we know of."

"If you keep picking and trimming them you will keep getting roses. People don't know that."

The wildflower globe mallow is good for your hair, "I put the flowers into shampoo - it makes your hair shiny."

"Yerba de vibora or escoba de vibora (a shrub-like plant with a yellow bloom) is good for gout."

"Geranium leaves are good for bug bites, just rub the leaf on the bite."

"Cucumber takes the swelling down."

Pointing out two of her best-selling salves, she says, "Folks from Chama and the higher elevations like the jalapeno rub, while those at the lower elevations go for the red chile."

Gabriela learned distillery from a book her

older sister brought back for her from Egypt. Cleopatra was the first to create essential oils from plants. She buried her husband's body in chamomile and placed a gallon of the essential oil of chamomile with him. "Can you imagine how long it must have taken to distill that much essential oil? And how many flowers, grown over how many years?"

INTERVIEW BY BOBBE BESOLD, 2014

### CINDY STONE

Iren: What inspired you to wild-craft?

Cindy: For me, Nature has always been a place of learning, sanctuary and healing. I want to promote compassion and awareness of the natural world with my work. So when I took a wild-crafting class with Lucy McCall in Taos, one of our project was making herbal creams and I just fell in love with it, my friends liked my creams and started ordering, and it all fell into place. I have always loved the mountains, plants and wildlife and feel at home in the great outdoors.

Iren: What are your favorite plants?

Cindy : I love them all , but if I had to pick three of my favorites: Roses, Arnica and Yerba Negrita. Roses have incredible vibrations and are so beautiful, and they have flourished even during this drought. I use them in my skin lotions for their toning and healing properties. Rosehip has lots of vitamin C and is great for tea. It is mildly diuretic and is also used to improve and relieve the symptoms of kidney disorders. Arnica is such a powerful healer, a counter irritant herb,

an analgesic pain reliever and anti-inflammatory; it also helps with bruising and promotes healing after surgery. Yerba Negrita is in the globe mallow family. It's a great emulsifying oil for skin and I use it in creams. Taken internally, it heals inner tissue. Some people make tea out of it & you can also make a tonic to use in your hair during chemotherapy to promote healthy hair growth after treatment.

Iren: I see you use horsetail in this cream; please tell me about it.

Cindy: Horsetail is one of the oldest plants on the planet and was used by the ancient Greeks and Romans in their medicines. It is an astringent herb and helps to stop bleeding, heals ulcers and wounds. It is also a diuretic. It has a high natural silica content, which strengthens hair, skin and nails. It is important where you pick it that there weren't any agricultural pesticides that might have been used, because the roots easily absorb what is in the soil. I pick it in the high mountains in safe areas.

Iren: You mentioned that you work at the Carnelian Center in Dixon; that sounds interesting.

Cindy: During my first herbalism class I fell in love with this traditional method of healing and knew that this is something I want to be dedicated to in order to help others. Plants are pure and like spiritual helpers; they work on many levels, and having a longer evolutionary life than humans. They have a lot to teach us. They help clean our air, rivers and bring balance to our bodies in wholesome holistic ways. The skin, being our largest organ, absorbs so much. That is one reason I feel the skin care line of my herbal products is important for those who want to nurture themselves in this way. To get fresh products made from your backdoor Wild Lands is a rare a gift! It is not about having them shipped long distances from other countries where they are possibly irradiated on the plane and are not freshly picked. New Mexico! What a great place to harvest medicinal plants with our diverse ecosystems! We have some of the oldest unique geology any-where, which enhances the properties of the plants, not to mention the rich cultural history with the use of herbs in healing. I am a practitioner there and also own my own animal business called Animal Wise and my herbal business Wild Earth Remedies.

Iren: Can you tell me about trementina?

Cindy: Trementina is a traditional drawing salve for many local people in New Mexico. It helps with bee and spider bites, boils, healing of wounds, acne. It's also a counter irritant, like arnica. Everyone makes it a little differently; I put chaparral and osha root in it. That makes it more powerful, like a black salve that can be used on surface skin cancer. Osha is used in Trementina for the skin to fight infection. Chaparral grows south of Albuquerque. Osha grows in the mountains here in northern New Mexico and everybody wants it for its healing qualities. It is recognized for its anti-viral, anti-bacterial, anti-fungal and anti-inflammatory properties. People don't realize what a great skin herb it is.

Iren: I imagine that your work follows the seasons of the year?

Cindy: Yes, the violets are the first to come up, by the end of March in the mountains. Most of my gathering takes place in June, July, August. As the weeks go on I have to go to higher and higher elevations. I am very mindful of how and when I gather plants and I also think of the animals that live in the mountains and eat the plants. I specialize in skin cream, it is the biggest organ we have and we absorb all kinds of pollutants thru it and so we need to cleanse it from impurities in our environment.

Iren: What advice would you give to young people?

Cindy: I would like to say how important it is to care for oneself in a natural way, and to really learn first about what herbs are growing right outside their door, explore making tea or healing skin salves with the different plants. Some plants are poisonous, but usually the ones people need do grow in a close proximity.

INTERVIEW BY IREN SCHIO, 2014

#### JESUS ZAVELA

Jesus's life has always been about farming. In Yuriria, his grandparents and

parents taught him how to farm using only rainfall. In New Mexico, he enjoys irrigating with the acequia because even with its challenges it is more dependable. Jesus has farmed throughout the Española Valley including Hernandez and La Mesilla. Jesus takes great pride and care in the vegetables that he grows, including

white, yellow, blue and red varieties of corn from Guanajuato. The Colorado corn is used to make posole.

Two years ago he bought land in El Guache where he and his wife, Maria, live and farm. Together they work the land, Maria helping with the watering. Maria also waters the garden with rainwater. Tomatoes, tomatillos, rosebushes, volunteer squash and a chiltepin tree greet visitors at the front door. Like most good farmers, Maria is an amazing cook, making handmade corn tortillas every day and wonderful dishes combining New Mexican ingredients with native Guanajuato cuisine.

Jesus is employed with Wal-Mart but his real work is in the fields. He enjoys being outside, taking in the fresh air and watching the plants grow. "I love all the vegetables I grow and eat." His strong work ethic and optimism is reflected in the statement, "Give young people land so they can farm."

INTERVIEW BY NORMA NAVARRO, 2014



SABRA MOORE IS AN ARTIST AND WRITER LIVING IN ABIQUIU, NEW MEXICO. THIS IS HER EIGHTEENTH YEAR MANAGING THE ESPAÑOLA FARMERS MARKET. MOORE HAS ALWAYS WORKED WITH OTHERS AS PART OF HER ART PRACTICE. LAST FALL, *OPENINGS: A MEMOIR FROM THE WOMEN'S ART MOVEMENT*, NEW YORK CITY, 1970-1992, HER NARRATIVE OF MAKING ART AND ACTIVISM WHILE LIVING IN BROOKLYN, WAS PUBLISHED BY NEW VILLAGE PRESS.

# SEED BIOMIMCRY

CLAIRE COTÉ



In West Bengal, India there is a tradition of musical storytelling with illustrated scrolls painted by artists called Patua or Chitrakar, "Picture Maker." Patua art is dynamic and informative and Patua-Makers adapt their work to changing times and topics. The "Seed Biomimcry Scroll" is my version of a Patua scroll, which tells two biomimetic stories of seeds.

Biomimcry, or biomimetics, use the emulation of Nature's patterns and strategies to find solutions for human challenges in order to create innovative products, processes, and policies that both address these challenges and are sustainable and well-adapted to life on earth.

The two illustrated series on this scroll are imaginative representations of current research topics in the field of biomimcry: smart-fabrics, inspired by pinecones and nontoxic antifouling strategies for ships and harbors, inspired by palm seeds. The smart-fabric jumpsuit adapts to changing temperatures by opening up microscopic flaps when warm and shutting them tight when the wearer cools off, just like a pinecone's scales do in nature.

The palm seed morphed ship represents research to develop a new nontoxic antifouling surface based on seeds from a palm tree. The new surface would replace the toxic paints used on ships and harbors to keep them free from barnacles.

The "Seed Biomimcry Scroll" is a score to help inspire new stories of biomimetics in our world today. If you feel inspired to sing its story, please don't let anyone stop you!

May it inspire you to delve more deeply into the amazing potentials of Seeds and Biomimcry.

CLAIRE COTÉ LIVES WITH HER HUSBAND AND DAUGHTER IN THEIR OFF-GRID HOME IN NORTHERN NEW MEXICO. CLAIRE'S INTERDISCIPLINARY ARTS PRACTICE, EDUCATION OUTREACH AND COLLABORATIVE AND CURATORIAL WORK TAKE HER ON LOCAL AND INTERNATIONAL ADVENTURES INTO NATURE, CLASSROOMS, GALLERIES AND BEYOND. CLAIRE HOLDS A BA IN FINE ART AND CULTURAL ANTHROPOLOGY FROM UNIVERSITY OF NM AND MA IN ART AND ECOLOGY FROM DARTINGTON COLLEGE OF ARTS, ENGLAND. SHE IS FOUNDER AND DIRECTOR OF LEAP (LAND, EXPERIENCE AND ART OF PLACE), A SMALL NON-PROFIT PROJECT, OFFERING ART AND EDUCATION PROGRAMMING AND EVENTS.

WWW.CLAIRECOTE.COM

SEED BIOMIMCRY STATEMENT AND DRAWINGS  
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## OTHER EXAMPLES: BIOMIMCRY RESEARCH

**Energy:** Learning from humpback whales how to create efficient wind power

**Architecture:** Learning from termites how to create sustainable buildings

**Agriculture:** Learning from prairies how to grow food in resilient ways

**Medicine:** Learning from mosquitos to create "a nicer needle"

**Communication:** Learning from dolphins how to send signals underwater

## BIOMIMCRY RESOURCES

**Biomimcry: Innovation Inspired by Nature**, Published: September 17, 2002. This profound and accessible book details how science is studying nature's best ideas to solve our toughest 21st-century problems.

**Biomimcry Institute** is working to naturalize biomimcry in the culture by promoting the transfer of ideas, designs, and strategies from biology to sustainable human systems design. They do this through the Biomimcry Global Network, AskNature.org, Design Challenges and education programming. [biomimcry.org](http://biomimcry.org)

**AskNature** is the world's most comprehensive catalog of nature's solutions to human design challenges. This curated online library features free information on more than 1,800 (and growing!) natural phenomena and hundreds of bio-inspired applications. [www.asknature.org](http://www.asknature.org)

**Biomimcry Colorado** is cultivating the practice of Biomimcry in Colorado by connecting local people to: learn from nature, cross-pollinate innovative ideas, and to inspire locally attuned design for accelerating the path to a regenerative human impact on our state. [www.biomimcrycolorado.com](http://www.biomimcrycolorado.com)

**Biomimcry 3.8** is the global leader in biomimcry innovation consulting, professional training, and educational program and curricula development. Our mission is to train, equip, and connect engineers, educators, architects, designers, business leaders, and other innovators to sustainably emulate nature's 3.8 billion years of brilliant designs and strategies. [biomimcry.net](http://biomimcry.net)



# GOLDEN BEETS WITH MÂCHE, PICKLED SHALLOTS AND PURPLE ORACH

DEBORAH MADISON

**3 large golden beets**

**2 large shallots**

**3 tablespoons apple cider or champagne vinegar**

**Sea salt and freshly ground pepper**

**4 tablespoons best olive oil**

**4 good handfuls or more of mâche or arugula greens, washed and dried**

**Purple orach thinnings, if possible, washed and dried**

**Yogurt, Cumin and Green herb sauce (see below) optional**

- Cut the stems off about an inch from the tops of the beets, then steam them over simmering water until tender but not too soft when pierced with a knife. Remove them, rinse under cool water, and slip off the skins with your hands. Cut the beets into ten to twelve wedges each and set aside in a bowl in the refrigerator.
- Peel the shallots and then slice them cross-wise a scant ¼ inch thick. Separate the rings and put them in a bowl with the vinegar add ¼ teaspoon of salt. Let stand for 5 minutes or so to color and soften, then whisk in the olive oil. Spoon a tablespoon or two of the dressing over the beets and toss. Taste for acid and salt, adding more vinegar or salt if needed. Season with pepper.
- Dress the greens with the remaining dressing and heap them on individual plates.
- Tuck the beets in and around the greens. If using the yoghurt sauce spoon some close to the clusters of beets.

## YOGURT, CUMIN AND GREEN HERB SAUCE

**1 plump garlic clove, pounded to a paste with ¼ teaspoon sea salt**

**¾ cup thick yogurt**

**¼ cup sour cream**

**½ teaspoon ground roasted cumin**

**About 1 generous cup of herbs with their stems removed: equal amounts dill, basil, and cilantro**

**Sea salt and freshly ground pepper**

**Best olive oil**

**Sumac or red pepper flakes**

- After you've pounded the garlic to a paste with the salt, put it in a bowl with the yogurt and sour cream.
- Stir in the cumin.
- Chop the herbs finely and stir them into the yogurt-sour cream mixture.
- Taste and add more of any particular herb if you want more of its flavor.
- Season with more salt, if needed, and freshly ground pepper.
- Scrape the sauce into a bowl and drizzle a little olive oil over it just before serving, then sprinkle with sumac or pepper flakes.

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DEBORAH MADISON, WHO HAS LIVED IN NEW MEXICO FOR THE PAST 27 YEARS. SHE IS THE FOUNDING CHEF OF GREENS RESTAURANT IN SAN FRANCISCO AND THE AUTHOR OF FOURTEEN COOKBOOKS, INCLUDING LOCAL FLAVORS, VEGETABLE LITERACY, AND HER MOST RECENT BOOK, IN MY KITCHEN. SHE SERVED ON THE BOARD OF THE SEEDSAVERS EXCHANGE FOR SIX YEARS AND IS NOW ON THE BOARD OF THE SOUTHWEST GRASSFED LIVESTOCK ALLIANCE. SHE WRITES, GARDENS AND SAVES SEEDS IN GALISTEO.

DEBORAHMADISON.COM.

# ***Liberar nuestras semillas***



## ***Semillas como bienes comunes***