TEA & TAO MAGAZINE May 2016

GREENTFEA

HISTORY, PRODUCTION, Brewing & Lore

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STREAM-ENTERER TAIWANESE GREEN TEA



GLOBAL TEA HUT Tea & Tao Magazine



STREAM-ENTERER

This is our third issue in the Seven Genres of Tea series. There is no better way to celebrate the change in weather and the opening of the 2016 tea season than with some fresh, bright green leaves in a bowl, covered in steaming spring water. This month, we all awaken dormant energies, entering the stream of green tea and a love for spring!

Love is changing the world bowl by bowl

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No part of this publication may be reproduced, stored in a retrieval system or transmitted in any form or by any means, electronic, mechanical, photocopying, recording, or otherwise, without prior written permission from the copyright owner. n May, all of this year's tea is flushing its last, and tea farmers around the world are either finishing up their processing, or in the midst of sleepless weeks as they struggle to work at the pace of the Leaf. Their lives over the next year will revolve around what happens over the next weeks, as will ours—the tea lovers who are destined to receive the tea they work so hard to produce. May is a time to honor the artisanal farmers who craft our leaves, and recall that tea is one of the most labor-intensive agricultures on Earth, with up to a fivefold reduction in drying. That means twenty kilograms of raw leaf become four kilograms of dried tea! May is also a good time to reinvest our hearts in sustainable agriculture, towards tea that lasts into future generations and is good for the Earth and us equally.

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We are working hard on the website. It is going to take some time, though. As we discussed the project with web developers, we realized that it would take a few months to complete, as our goals are ambitious. We plan to fund the new website using three months of gifts, but since it may take more than three months to complete, we thought we would space out the months that are contributing to that project, so gifts will be intermittent over the spring and summer. But it will all be worthwhile when you see the amazing site, and hopefully start using it to host and attend tea sessions locally, as well as to visit with other Global Tea Hut members when you travel.

For our special Extended Edition in September of 2014, we covered puerh tea in all its facets. It was one of the largest sources of information on puerh ever published in the English language! At the time, we knew that we would one day devote a whole issue to each of the seven genres of tea. In March of this year, we covered red tea. Since spring is officially here, we thought we would take the time to explore as much about green tea as we can. In the future, as Global Tea Hut matures, we will publish hardbound compendiums of similar topics like the Seven Genres of Tea, our translations of the Classics of Tea and other books. Some of you have expressed that it would be nice to have hardcover copies of Global Tea Hut issues together.

Nothing heralds the change in weather quite like some fresh green tea. In ancient times, the official start of spring was marked by the emperor's first sip of the first flush of green tea. Let us similarly raise a cup of green tea and welcome the brighter sun and warmer weather. Green tea is light and fresh, and uplifts us. It



cleanses. Like a lot of green teas, being so simply processed and lacking pretension, this month's tea enjoys being made in the oldest way: leaves, heat and water in a bowl. Now is a good time for washing away the past and starting an outward period of growth!

I tend to feel nostalgic when I drink green tea. It takes me back to other times; it uplifts me and encircles me in its gentleness and simplicity. Green tea, to me, is an embodiment of light, and drinking it is a communion with the season. I feel it filling the cells of my body, I hear it singing through my soul and my spirit joins in its playful, gentle dance. Green tea is playful, and it reminds me of a time when sunbeams inspired me to play with them, or the way light dances at the bottom of a clear pool of water. I love to drink green tea in a bowl when the weather is warming up. The simplicity of it reminds me that I am alive.

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🐳 Further Reading ≽

Tea of the Month, Issue 39, Apr. 2015, pp. 3-7
 Taiwan Tea Varietals, Issue 31, Aug. 2014, pp. 7-16
 The Seven Genres of Tea, Issue 39, Apr. 2015, pp. 33-38
 Oxidation & Fermentation, Issue 26, Mar. 2014, pp. 6-7
 Tea of the Month, Issue 16, May 2013, pp. 2-3



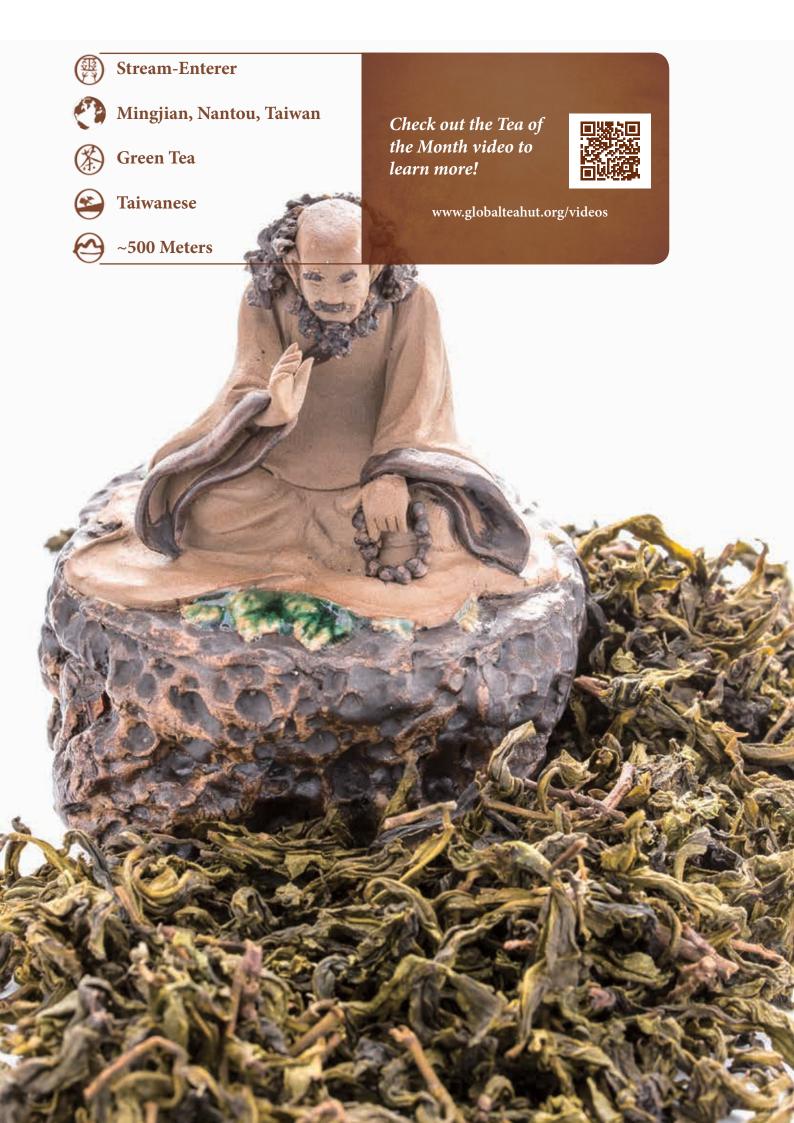
s spring unfolds in full blossom, the outdoors call to us. We wanted to take our guests to make tea and see the unfolding buds of this year. And we thought that this would be the perfect opportunity to take you all along with us! What better way to start the 2016 tea season than with some fresh handmade green tea, full of the care and love of the residents and guests here at the Center? It was out of this desire to put our own effort and love into your Tea of the Month that we formed the idea of a whole issue devoted to green tea. Nothing inspires as much as contributing to this worldwide tea experience with our own hands.

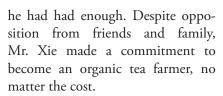
We got up very early and headed off to Mingjian to meet up with Mr. Xie, whom many of you know and love. Aside from teaching us to make green tea and donating the leaf for this month's tea, he also agreed to finish the job, since we couldn't possibly finish enough tea for all of you in one day. (But our leaves and energy are all mixed in!) Mr. Xie is a very important part of the scenery at our Center, and will be very important for many of you as well, because so many of our visitors come here with a curiosity about how tea is processed. It is very important to experience with your own hands just how difficult it is to make tea, so that in your own soreness you will develop a tremendous respect for the Leaf. This respect isn't just in the billions of years of evolution, or in the Nature we always wax poetic about-the wind and rain, sun and moonshine, minerals, mountain and water that flow from roots to crown-it is also in the blood, sweat and tears of generation after generation of farmers. And there is a deep reverence in seeing just how much mastery, skill and art go into the crafting of the Leaf. And so, with great joy, we take as many of our guests as possible to a few different farms to try their hands at tea processing. It is amazing to make your own tea and take it home with you. If you didn't have enough reasons to come stay with us, here's another: Mr. Xie has formally invited each and every one of you to come to his farm and make tea, eat a nice lunch and take the tea you picked and crafted home with you!

Mr. Xie is a third-generation farmer in Mingjian, Nantou, Central Taiwan. Mingjian is lower altitude, in the foothills of the central mountain range. In the past few decades, such lower-altitude tea has been eclipsed by the popularity of the teas grown higher up. Though areas like Hsinchu and Miaoli counties (where Eastern Beauty is grown) have struggled since high mountain oolongs have come to dominate the market, Mingjian has prospered by providing lower-priced teas for export, or large-scale production for the bottled tea market (often called "Ready to Drink" or "RTD"). Mr. Xie's family has grown small-scale productions of oolong tea through three lifetimes, since before the higher-altitude teas even existed.

When we discuss organic farming and the need to make changes in tea farming—as well as other kinds of agriculture—it's important to remember that the farmers are always the first victims. It is they who handle the agrochemicals in large amounts, and most directly. Furthermore, it is only by humanizing and befriending them that we can bring about change. We must include rather than exclude—educate rather than ostracize!

Like so many other farmers, Mr. Xie started to get the nagging (coughing, wheezing) feeling that these chemicals were harmful to his family, his community and his land. When his wife almost miscarried their second child in 1997,





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From 1997 to 2000, Mr. Xie and his family struggled to maintain their principles. His tea was sub-par and he lost almost all his customers. His father, who had been worried when he suggested upsetting the status quo in the first place, was very critical of his decisions. Organic farming is difficult, and it requires radical changes in farming and processing methodology-changes that would take time to learn. Rather than give up, as many would have done, Mr. Xie got a part-time job as a painter and carpenter, working day and night-either painting or farming-to keep his family afloat. Finally, in the early 2000s, his acumen for organic farming improved to the point that he was able to take his teas to market again. Since then, he has gone on to win awards, been featured on TV and has even heard his father, now a sprightly eightythree years old, bragging to others about how his tea is organic and good for the environment!

Mr. Xie's work hasn't stopped with his own farm. He knew that he would have to keep improving his skills, creating new and better teas, and to help show his neighbors the value of organic farming, especially since their land and his are close enough to influence each other. He formed a co-op with other farmers and began teaching locals to shift to organic methods, offering them equal shares in their combined enterprise. As more people have joined this local group, the incentive to do so has also increased. To date, more than twenty-five farmers in the Mingjian region are organic, including Mr. Xie's immediate neighbors.

Mr. Xie's kind heart shows in his teas. He cares deeply about Tea and the Earth. He produces green tea, large and small leaf red tea, as well as several kinds of oolong, and all with great skill. To us, he is an inspiration and a kind of hero-the kind not talked about enough these days. It's easy to follow the crowd and maintain the status quo, or to say, "I am just one person. What can I do?" It is difficult to face criticism from family and friends and stand up for what you believe to be right! The problem is that it is too easy for farmers to make more money with agrochemicals, and to do it with less work. And that's also why so many of them are over-using fertilizers and pesticides, reducing the average life of a tea bush to fifteen years, all in the name of personal gain. Many of them get cancer from improper exposure to such chemicals, themselves victims, as we mentioned above. Mr. Xie is a man who has seen a different way, and more inspiringly, lived that way and taught others to do so. And that is the true spirit of Tea!

The Varietal: Four Seasons of Spring (Si Ji Chun)

In 1644, the Manchus once again conquered China, beginning the Qing Dynasty. Around that time, huge waves of immigrants moved to Taiwan to start a new life, often running from the economic and political problems resulting from such dynastic change. Most of these immigrants came to Taiwan from Fujian, one of the brightest leaves on the great tree of Chinese tea, for Fujian is the birthplace of oolong tea, as well as many other famous kinds of tea. Even today, it is a certain stop on any tea lover's tour of tea mountains, including Wuyi Mountain, where Cliff Tea (Yancha) is grown, Anxi, birthplace of Iron Goddess (Tieguanyin) and Fu Ding, where white tea comes from, etc... It should come as no surprise, then, that the settlers from such a tea land would bring tea with them, hoping to plant it on the magical island they saw shimmering above the

mist, rising out of the ocean like the great turtle their beloved Guanyin rides through the Heavenly waters.

The tea that those early settlers brought thrived in Taiwan, especially in the mountains. The soil is rich in volcanic minerals and the mists that come in from the seas fill the valleys and highlands with the moisture that tea loves. The humidity, temperature, rainfall, mists and clouds as well as the gravelly soil are all ideal for tea growth-so much so that you have to wonder if the Fujianese found that out after they brought tea here, or if they brought tea after they realized how suitable the island would be for the cultivation of tea. Of course, the destiny of the tea trees was also rewritten by the journey across the strait.

One of the ancient names for tea is "Immovable." All the earliest tea sages had to find wild tea trees, gathering leaves like any other sacred herb. It took a long time for tea to be domesticated. For many thousands of years, tea trees were of the forest-a medicine that the shamans and Daoist mendicants sought out for its spiritual effects. Eventually, though, tea was domesticated, and then carried further than it could have spread on its own. Soon enough, tea was propagated on many mountains in China, and new varietals started to evolve, with amazing new characteristics, flavors, aromas and Qi.

As with many plants, every tea seed is unique, allowing it to rapidly evolve to new environs. And without any of the grafting technology used in plantation agriculture today, all the traditional teas were what we call "living tea," which, as many of you will remember, means that they were seed-propagated, allowed room to grow, lived in biodiversity, without agrochemicals or any irrigation, and were cultivated with respect. The early farmers quickly realized that when you moved tea to a new location, it changed completely to suit its new home. As a sacred herb, tea has always decorated Chinese

Si Ji Chun has a characteristic reddish hue and the leaves also taper to a spear point. These are the easiest ways to distinguish this tea from the other varietals in Taiwan. It is close to Tsui Yu in shape, but Tsui Yu does not taper.



relationships, from business deals to spiritual transmissions, offerings to the gods and even weddings. Even today, the Chinese wedding ceremony is centered around tea: the bride makes tea for the groom, and his acceptance of the tea into his body is an acceptance of his new wife. One of the reasons tea was used in such ceremonies is precisely because they also hoped these commitments would be "Immovable."

It should therefore come as no surprise that the tea trees planted in Taiwan quickly developed unique personalities due to the terroir here. It's amazing how quickly this happens, especially when skilled craftsman are involved. Not only do the trees evolve into new varietals naturally, but farmers begin to create new hybrids, researching the differences in search of wonderful new teas. They also adapt their processing methodologies over time, listening to how the leaves want to be dried. Great skill (gongfu) is always a listening to the medium. In tea brewing, for example, we try to brew the tea as it wants to be brewed. Similarly, master tea makers adapt their processing to suit the leaves, the season, the rainfall, and so on. Saying that they process the tea the way it "wanted" to be processed is perhaps misleading, but English lacks the proper sentiment. More literally, what we mean by this is that as new varietals evolved to new environments, influenced by the unique terroir there, the farmers also evolved their processingtesting and experimenting, "listening" to the results as they drank each year's tea, and slowly changing their methods to bring out the best in the tea. In fact, bringing out the best qualities of that varietal is what we mean by processing the tea the way it "wants" to be processed. You could say the same about brewing any particular tea.

Though you could perhaps call Si Ji Chun a hybrid, it is a natural, wild varietal that arose in Muzha. Since it is a more natural varietal, it is hardier than the other Taiwanese varietals. This is a testament to one of the principles we always promote in these pages when discussing living tea, which is that the leaves produced by man will never compare to Nature's. It is possible to further distinguish manmade teas by calling them "cultivars." These trees yield buds at least four times a year, which is where this tea's name comes from. "Si Ji Chun" might also be translated as

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"Four Seasons like Spring," referring to the fact that this bush can produce as much in other seasons as in spring, which is rare in the tea world. Si Ji Chun does not have a Taiwan classification number, since it evolved naturally. Si Ji Chun is more closely related to Ching Shin than it is to Jin Xuan or Tsui Yu, the other two "daughters" of Taiwan. The leaves of Si Ji Chun are round in shape, with veins that shoot off at 30-to 60-degree angles. The leaves have a light green hue, with less foliage, like Ching Shin. The buds of Si Ji Chun are often a gorgeous reddish hue when they emerge.

As many of you will remember from June of 2013, when we sent out this fabulous tea processed as oolong, *Si Ji Chun* has an exuberant, golden liquor that blossoms in a fresh, musky floweriness. It is tangy, with a slightly sour aftertaste, like the *Tieguanyin* varietal it evolved from. Many Taiwanese compare the aroma to gardenias. Of course, this month's tea will share some of these elements and have some unique characteristics since it is a green tea, not an oolong.

Making Green Tea

The guests who go with us to make green tea are always shocked at how difficult the picking is, no matter how well we prepare them. You pick and pick throughout the morning, and then take a glance down into your basket to see how you are faring, only to find that your basket is far more empty than you thought it would be-and not just by a small margin, but rather more of a "That's it?" kind of feeling. It's very hard work picking tea. And actually, our green tea is much easier than many kinds of green tea in the world because we are picking leaf and bud sets, as opposed to many green teas, which are composed of only buds. In fact, it can take as many as twenty thousand buds to make a single *jin* (600g) of tea!



You have to pick with fingernails, so you don't tear the stems. You want to squeeze the stem at just the right spot. When it is done right, it comes off as if it is given. There is a satisfying squishy feeling when you have released the stem in the best way. We started our day with prayers, offering our service to the tea bushes and asking for permission to share their medicine. And before we started picking, we asked the guests to respect the tea and remember this promise, allowing their heart to choose the proper bud sets to pick. In that way, the sensitive picker gets a real feeling that the tree is bestowing its buds on you. There is a fair energy exchange, especially in those moments when you choose the right stem and squeeze it to the perfect degree and in just the right place.

Traditionally, all-bud green teas would be considered higher quality. This is true, but only in terms of flavor and aroma. An all-bud tea will usually be more delicate and fragrant, since the cells of the tea have been less affected by withering. The issue of quality in green tea can be more complicated than just buds versus leaf-bud sets, however, as you have to take into account the weather, the varietal and the time of year the tea is picked. There are teas that benefit from having some leaves mixed in, as they can add breadth and strength, especially if you plan to brew the tea as leaves in a bowl. Of course, most of the time, mixing leaves in with the buds is done for economic reasons, since it vastly increases the yield of a harvest. Green tea farmers will often have a grade that is all bud and one that is composed of bud and leaf sets, which is available at a lower cost. In our case, the choice to use leaf and bud sets was based on two main criteria: First, it would have cost us more time and effort than we had to produce such a large quantity of all-bud tea. And second,





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The firing arrests the oxidation of the tea. It is very hard to pan fire tea. You can only touch the tea, as the wok is very hot. You must move quickly, so the tea is not seared. The leaves come up and then fall down in a dance. Mr. Xie makes it look easy, but it's not!

The rolling is also a lot more difficult than it looks. You must keep the tea in a bowl, rolling it across the mat without tearing any of the leaves. The leaves should curl up into nice stripes that will open beautifully in the bowl.

we wanted some leaves in this tea because *Si Ji Chun* is a hearty liquor that responds to the added breadth, astringency and Qi. It makes more sense as a bolder green tea. Mr. Xie said that he wouldn't ordinarily make a delicate, fragrant green tea from these bushes. The decision to use buds and leaves together was, consequently, a mix of economy (more in time/effort than in money) and art—in terms of the tea we wanted to produce.

Whether your tea is all buds or bud-leaf sets will determine how it is processed. With all green tea, you want to arrest the oxidation as quickly as possible. In fact, the main difference between oolong and green tea is withering. Oolong is withered and shaken—the latter of which bruises the cellular structure of the leaf and encourages oxidation. Green tea, on the other hand, should progress to the kill-green stage immediately. Green tea can be baked, steamed or pan/basket fired to arrest oxidation. In Taiwan, green tea is pan fired the way oolong would be, as that is the more traditional tea processing method used here. The pan firing arrests oxidation and kills a green enzyme that makes tea bitter. In green tea, this stage is often lighter than other genres of tea. It is done at a lower temperature, but can be repeated several times in some green tea processing. You might wonder how the firing, or other kill-green (sa qing), "arrests oxidation" if there is no oxidation in green tea. Well, there is always some oxidation. The moment the leaf or bud is separated from the tree it starts oxidizing. And it will continue to do so as it sits in the basket waiting to be taken to the processing

facility. However, the aim is to keep this duration as short as possible.

We used a large wok to pan fire this month's green tea. It is a very difficult job, as you have to keep moving and not allow your hands to touch the pan. Even with the temperature turned down for our safety, it is still very hot. You must try to touch only the leaves, and lift them up without touching the metal, scattering them apart as they fall. You don't hear as much of the crackling sound you hear when firing oolong, as the temperature is much lower.

After the tea is fired, it is immediately rolled to shape it. This rolling would not be included in the processing if we were making allbud tea. All-bud teas are usually shaped by repeated firings, like the famous Dragonwell tea (*Long Jing*) of Hangzhou, which is pressed flat during firing. However, rolling is



necessary when making green tea with leaves. With green tea, the rolling is more about shaping the tea than it is about breaking down the cells to encourage oxidation, as it is in oolong production. Even all-bud teas that have no rolling are in a sense "rolled," it just happens in the pan itself. They are shaped as they are fired, in other words. Like all the stages of processing tea, even a simple green tea, this stage looks easy when a master like Mr. Xie does it, but it is, in fact, very difficult. We roll the leaves across the mats, which curls the leaves into stripes.

After this, the tea is dried in an oven and we get a chance to sit and share some tea with Mr. Xie, discussing his experience and wisdom. Most all tea is dried similarly. It is roasted—traditionally over coals, but nowadays in an electric oven. It will be baked three to four times, depending on regional preferences and which varietal is used. Typically, tea is dried for an hour at around one hundred degrees centigrade. Then it is baked at ninety degrees for another hour, and then again at eighty degrees. If there is less leaf to dry on that day, or if it is all buds, that will typically be enough time, but for a larger quantity of leaf-bud sets, there is sometimes a fourth hour at seventy degrees. This will, of course, depend on the farmer's observations of his leaf. (Other kinds of green tea are dried in very different ways, as you will read about throughout this issue.)

Tea of the Month

"Stream-Enterer" is a bold tea with a deep Qi and strong fragrance. The varietal and processing result in a brisk, simple and pure green tea. It is the perfect way to herald the spring. As the first flush of the year, it sings of changing weather. It is Nature's expression of rising from dormancy to vibrancy, Yin to Yang. The flavor is sweet, yet bitter and crisp with astringency. You will find the energy expansive and uplifting, somehow purifying you and leaving you clean. If you can, enjoy this month's tea outdoors with some loved ones or organize a Global Tea Hut gathering at a park, by a stream or in your backyard. This tea is particularly suited to early morning or late afternoon/early evening gatherings. We hope you can also feel the personal love and tenderness in these leaves since we plucked and harvested some of them ourselves! The rest were made by Mr. Xie.

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Stream-Enterer

This month, instead of sharing what the guests felt about this special green tea, we asked Wu De to drink it and write some Stream-Enterer-inspired poems to share with us all. Next month, we'll return to our guests' impressions of the tea, but for now, poetry can sing of spring better than any description of one's experience drinking a tea!

茶

A thousand, thousand bowls And yet only one To enter the stream.

茶

Leaves set adrift, Spinning and tumbling, Lofty and Low, From here all the way to the rain... If they come back, It won't be the same as before— It will be this very bowl!

茶

Simple village brew Poorly steeped Bitter and strong So worthless Even a gem From the Dragon Throne Couldn't buy a bowl

Check out the video on brewing tips now!

www.globalteahut.org/videos



Brewing Tips

There is really only one way to brew this tea, and no matter how you drink it, do yourself a favor and save at least a few leaves to put directly in a bowl! There is nothing more pleasurable than drinking the year's first green tea in a bowl, watching the gorgeous green leaves unfold. The traditional character for tasting tea, "pin (品)" is composed of three "mouths," symbolizing that we enjoy tea with our mouth, nose and eyes. And in fact, you can learn to discern fine tea with these three senses. Actually, a tea session unfolds through all the senses, but certain teas, prepared in certain ways, will be more enjoyable to the nose, the mouth or, in this case, the eyes. Green tea is glorious to behold, and watching the leaves unfold is a huge part of enjoying a green tea, which is why many Chinese people drink their daily green tea in a glass.

Ordinarily, we want to use bowls with a lighter shade of glaze so that we can appreciate the tea liquor or leaves in a bowl. Though green tea leaves unfolding may be more beautiful than some other kinds of tea, all leaves in a bowl are beautiful, as is the liquor itself in steeped tea. It is therefore rare for us to choose a dark bowl, unless there is a good reason. Actually, when drinking a green tea like Stream-Enterer, it is better to use a dark bowl, as the liquor will be pale anyway and the dark color of the ceramic will highlight the bright green color of the leaves. The ideal is "Rabbit's Fur" glaze, which was popularized in the Song Dynasty. (We showed you some pictures of such bowls in April's issue within the emperor's Treatise on Tea.) If you have the chance, a real antique one will enhance your tea in ineffable ways. (You are all invited to the Center to drink some green tea in a Song Dynasty bowl during the warm months!) If you don't have access to a Rabbit's Fur bowl, antique or modern, choose any dark-colored bowl you can get and give it a try.

GREEN TEA THE HERALD OF SPRING

pring arrives with green tea. Green tea is one of the purest kinds of tea, and the least processed. It is often a Chajin's first love-the tea whose aroma carries us to the places where names like "Temple Mist" and "Dragonwell" make perfect sense. Green teas often taste of such vistas as well, recalling clear stream water singing over stones, forest pines, or sometimes the lightest fragrance of a flower caught on the breeze, though not for long enough to identify... There is a magic in these light aromas, and in the uplifting Qi that often sweeps us up off our cushions. Sometimes it is nice to return to our roots, remembering Nature through perfect fragrance. The freshness of green tea also reminds us of the weather, though it can also be great when it is aged. Let us all celebrate the poetry of tea fragrances this month, as we stray into old dreams of bright leaves floating around a cracked bowl...

The official beginning of spring in ancient China was the day the emperor sipped the first cup of the first flush of green tea, heralding the arrival of the new year. Preserving the freshness is the key to all green tea processing. This is done by altering the leaf minimally. The two most important aspects of green tea production are to reduce the withering/oxidation as much as possible and to shape the leaves in a way that suits their nature, color and fragrance.

Green tea is lighter than other teas because the processing is minimal. Plant cells have thick walls, and so without cellular breakdown, the tea does not release as much of its essence. It is impossible for tea to be processed without some oxidation; it begins oxidizing the moment it is picked. Also, the water content of fresh leaves is too high to process. If you fired or shaped such tea, it would break, being brittle from the water in the leaves. During the trip from the field (or forest if it's living tea) to the processing area, the tea naturally withers, losing moisture and becoming soft enough for processing. Ideally, green tea should be processed quickly, on the same day as plucking.

Traditionally, the best green teas were made from buds only. It takes tens of thousands of buds to make one jin (600 grams) of tea. The buds can also be processed with less oxidation, retaining more of the essence of the fresh leaf. They are also young and Yang in energy, which contributes to the magic of green tea. Over time, a greater demand for green tea has led to many kinds of green teas that are combinations of buds and leaves, or even just leaves. In many instances, such blends or leafy green teas are inferior quality. But as green tea has gained popularity, more regions are producing it and using many different varietals that weren't traditionally used in green tea production. Sometimes, depending on the varietal and terroir, a leaf-bud

blend can actually be better than just buds, adding depth and Qi to a particular green tea.

Though green tea began in China, it spread to both Korea and Japan by the tenth century. These three could be considered the homes of "traditional" green tea, which is why we choose to cover these three in this issue. There are many ways of processing green tea-based on local varietals of leaf and terroir-especially if we include the mastery of tea production handed down from generation to generation within the umbrella of "terroir." Remember, "terroir" is a French word that is generally used in discussions of wine, but it is so applicable to tea as well that most tea lovers have adopted it into their discussions of the Leaf. Terroir denotes the special characteristics of a place, found in its geology, geography, climate and even cultural heritage, which interact with a cultivated plant species to create unique expressions. Terroir is the soil and weather of a particular region: the geography and culture of the people and their relationship to the plant, and even the local microorganisms. Every place has a unique soil composition, pH, mineral content and climate-all of which create a distinctive tea.

When we talk about a tea's "terroir," we are speaking of the unique environment that created it, one which couldn't be reproduced elsewhere. Even if you took a grafting of a tree and cloned it elsewhere,





it wouldn't be the same since the sun would be weaker or stronger, the soil composition different, etc.

Green tea is most essentially defined by a lack of oxidation. The aim is to arrest oxidation as quickly as possible and thereby preserve the freshness of the tea. Green tea is picked and then goes through some form of heat to arrest oxidation. This could be steaming, baking, or most commonly, pan firing. It is then dried. If the green tea has leaves along with bud, then, after firing, it is rolled/shaped before drying. The rolling shapes the tea. The rolling for a green tea will always be significantly less than for other teas. All-bud green teas are not rolled, however. They are shaped in the pan. Sometimes the firing and rolling will be repeated a few times until the desired shape/color is achieved. The liquor of green tea can

be clear to yellow or even vibrant green, depending on local variations. The Qi often enters the body through the aroma.

Whether the green tea is all buds, bud-leaf sets or just leaves will also determine how it is processed.

The basic kinds of traditional hand-processed green tea are: pan fired, basket fired, oven baked and steamed. With the introduction of modern machinery, however, many of these steps have changed. Pan firing to arrest oxidation and de-enzyme the tea, for example, is often done in large, heated tumblers nowadays. Steaming tea is only done in Japan, which is how they arrest oxidation/de-enzyme their tea. The result is the dark green color of Japanese teas, as well as the bright green liquor and distinct flavors such tea offers.

Great skill is required to process green tea, since it is so simple. Sometimes we assume that mastery is in the more refined of the arts, but it is often the simplest things that take the greatest effort and skill. Great chefs don't need to cook with tons of spices all the time; they can also bring out the natural flavors of ordinary ingredients in unexpected ways. We once had a vegetarian chef stay at the Center and he cooked up the carrots we eat regularly, only they tasted somehow more "carroty" than usual! They were delicious. And it was carrots, oil and saltnothing else! Similarly, green tea at its finest is an expression of simple tea leaves as they are in Nature: bitter, astringent, with a transforming sweetness that lingers on the palate. And the simplicity shines when a green tea is good, like ours this month!



南的

In the Chinese lunar calendar, Qing Ming (清明) is an important holiday. People pay a visit to their family tombs and clean them up before making prayers. It usually falls on April 5th each year, though it wavers like the moon. The highest quality spring green teas are often Pre-Qing Ming (明前茶). The leaves that sprout just before this time are more tender and sweeter, often with less bitterness and astringency. For that reason, they are valued in the market as the highest grades of green tea. The next highest grade is that which is produced a couple of weeks after Qing Ming, which is called "Pre-rains tea (雨前茶)." The buds from this flush are also often tender, but not as tender as Pre-Qing Ming teas. With climate change, agrochemicals and other human influences, much of the meaning and premium of "Qing Ming" is lost nowadays. Even leaving aside the many fakes, different regions have very different terroirs, which means different qualities of tea. Also, what is valued by the mainstream is often based on different standards than the tea lover has. Sometimes we value the energy (Qi) of the tea more than the flavors, especially when viewing tea as medicine. And all of this does not take into account the changes that have started due to climatic fluctuations and agrochemicals, especially chemical fertilizers, which change the time and manner in which tea bushes flush with buds.

LOOKING INTO THE DRAGON'S WELL

-Wu De

Hangzhou has been a mecca for tea lovers for a long time. Wu De went back there for a day last year, after many years away. He made a determination to travel with Tea spirit in his heart, allowing us a kind of double vision of beautiful West Lake, one eye open to the outer world of modern China, and the other turned inward towards the spiritual lay of the land, as seen from a heart of Tea.

hile we are sharing а beautiful organic green tea this month, I thought I would share some memories of my trip to Hangzhou. Tea lovers have journeyed to West Lake for hundreds of years to enjoy Dragonwell (Long Jing) tea under all the willows that dance to the breezes of the scenic lake. It is a treasured vista indeed, and immediately inspires poetry and nostalgia for lost ages of Tea: times when long-robed sages played chess and discussed the Dao, as small boats lazed on the lake, floating as if with nothing to do... One of the sages shakes his long sleeve back from his wrist, moves a piece and smiles triumphantly at his comrade. With two gentle hands, he sips from a bowl with bright, jadegreen leaves floating on it. Through the steam that surrounds his face. he says to no one in particular: "The Dragon flies light and low this year." His friend casually agrees, dismissing the distraction to concentrate on his chess stratagems, perhaps sipping his own tea, though never taking his eyes from the board and pieces...

Green ten

It is almost impossible to take a trip to West Lake and not feel nostalgic for times lost, feeling the vibrant thrum of Chinese culture that has left calligraphy on top of paintings—lost palimpsests for the explorer to riddle out. There are hints of other times all around. Without that, a trip here would be lost on me. I have no interest in the superficial tourism that covers everything, and only find a trip here rewarding because I see with my naked eyes the many lives that have lived here and loved Tea in these surrounds. I feel keenly their passion, art and the lore they have left over everything like teaware rings on an old teahouse table. As I go around and visit all the tourist traps, like the Dreaming of Tiger Pawing Spring and the eighteen original Dragonwell bushes, I find myself quite naturally lapsing into reverie. I feel old here. My mind drifts in and out of legend, and I smile at the end of the day. Exhausted and riding a way-overpacked bus to the way-overcrowded train station, I feel it is a day well spent. And also, at

the same time, grateful it is but *one* day...

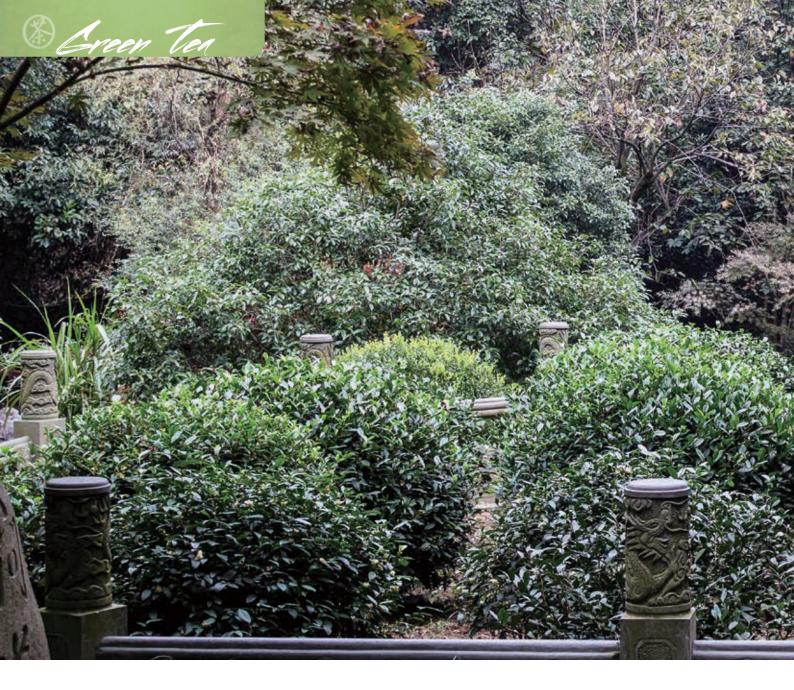
There are many legends that surround the tea from here. The tea's name, Dragonwell, comes from an old tale of a drought that was destroying the land ages and ages ago. The villagers traveled to a magic well at the top of the hill, beneath Lion Peak Mountain (Shi Feng Shan). Farmers had seen magic swirls in the depth of the well, and believed it to be connected to the great underground sea where the kingdom of dragons was to be found. They offered the dragon king their prayers, and promised to return every season if he would grant them rain. The dragon king heard their prayers and sent forth a great blue dragon to shake the sky with thunder, bringing muchneeded rain to the area. And the tea was called "Dragonwell" from that day forward...

Dragonwell is said to have become an Imperial Tea in the Qing Dynasty, when the great emperor Kangxi's grandson Qianl Long, China's most famous emperor,



Down the dragon's well Thunder rises To carry me home. Mother is ill, So I dare not tarry Where the tigers once played. I carry the Morning Dew Folded onto my breast. **Opening Heaven's Way**, We ride from West Lake Never to see its shores again. The golden light Will still shine on these waters Long after my empire has faded. Will those who rest here and sip Feel me, as I carry away these leaves? Do we drink of the same cup Or does the distance swell too vast? Ask the dragons.

-Mu pe



visited West Lake and drank the tea. Qian Long loved Tea, almost as much as he loved leaving the Forbidden City in disguise, having many legendary adventures during his outings. And being a tea lover, many of them have to do with tea. They say that tapping on the table to say thanks for a cup of tea, for example, comes from bowing to the disguised emperor when he was sharing tea with ordinary people. On one trip, he went to see the monks at Hu Gong temple in West Lake because he had heard of their marvelous tea. He fell in love with the green tea from the original eighteen bushes and conferred them imperial status. They say that those eighteen bushes still live today,

though locals question their authenticity. Still, the tea from those old trees does glimmer with energy, and is auctioned off for quite a price whenever they are harvested.

I visited the eighteen trees and sat and drank some unclean Dragonwell in the café there, feeling nostalgic after a long day strolling by the willows that surround West Lake and later admiring the tea fields there. I asked several locals about organics and was met with quizzical looks. One café owner said that "yes" her tea was organic, "We only spray pesticides in the spring and now it's autumn!" The old eighteen bushes themselves were definitely clean, though, and worth admiring. Many of the locals I passed said that the trees weren't the original ones, and had been transplanted there more recently to invite tourists. It was hard to tell if there was any truth in this, as most of them wanted me to sit in their café and buy their tea rather than travel to the old bushes further down the road.

I contemplated how a lot of Chinese historical sites are rebuilding and repackaging themselves to attract a new kind of tourism based on nostalgia. It often seems as if the aim of rebuilding has nothing to do with recreating the original sites, most of which were destroyed in the Cultural Revolution. Rather, the focus in construction these days seems to be about how to inspire



nostalgia and cultural identity in modern Chinese tourists so that they buy tickets. Obviously, a man living here in Hangzhou during the Qing Dynasty (1644-1911) wouldn't have had to stop on a given Tuesday and admire his queue hairstyle, long robes or traditional furniture, with a hand on his hip, proudly thinking, "Yep, I'm Chinese alright!" He didn't need to feel Chinese; he was Chinese! Nowadays, globalization and the Cultural Revolution have resulted in a modernized China. Like most people in the world, Chinese mainly wear Western clothes, use cell phones and eat a variety of foods. They decorate their homes in many styles and with more and more variety as they join

the global economy and the quality of life improves. When you add the fact that a whole generation of Chinese was raised without its own history or culture, it's no wonder there is a market for things that make one nostalgic—for a feeling of connection to heritage and history.

Despite the often plastic and shallow aspect of repackaged culture, much of the nostalgia for ancient/traditional Chinese culture isn't lost on a sinophile like myself. I sat above the gorgeous eighteen trees, surrounded by a beautiful garden and drinking my mediocre tea, and strayed into another time... I imagined hiking up trails where there are now roads with a gourdfull of spring water and heating it over a small fire. I could see myself meditating in the temple here with the monks, and saw in my mind a montage of leaves dancing into bowls, covered in steamy water and jade swirls as the flat green leaves floated around and under the swirling water. I stroked my beard in a kung fu movie way, and smiled at the old trees—they seemed to be in on my secret.

Legend has it that the flat shape of pan-fired Dragonwell also comes from Qian Long. He wanted to try his hand at tea processing, but during the harvest, a messenger ran up with word from the palace: his mother had fallen ill. He quickly stuffed the magical leaves into his coat pocket and raced to Beijing.



Back in the capital, he brewed the green jade for his ill mother. She was quickly healed, as people always are by Tea in such stories. They say that the flattened shape of Dragonwell is in honor of that handful of leaves that were crushed in his pocket on the journey.

I have written often of old Qian Long. I imagine him sneaking out, drinking tea he shouldn't be preparing himself in some nook of the palace-much like Huizong, whom we discussed last monthand sometimes even have visions of him hanging around laughing and drinking with the cooks and dishwashers in the palace kitchens. Such imaginations seem very Zen to me, and make me feel warm inside. In honor of my old tea brother, who still inspires so many artists, poets and Chajin worldwide, I picked a few buds from the old trees while nobody was looking and put them in some paper in my pocket. Sure

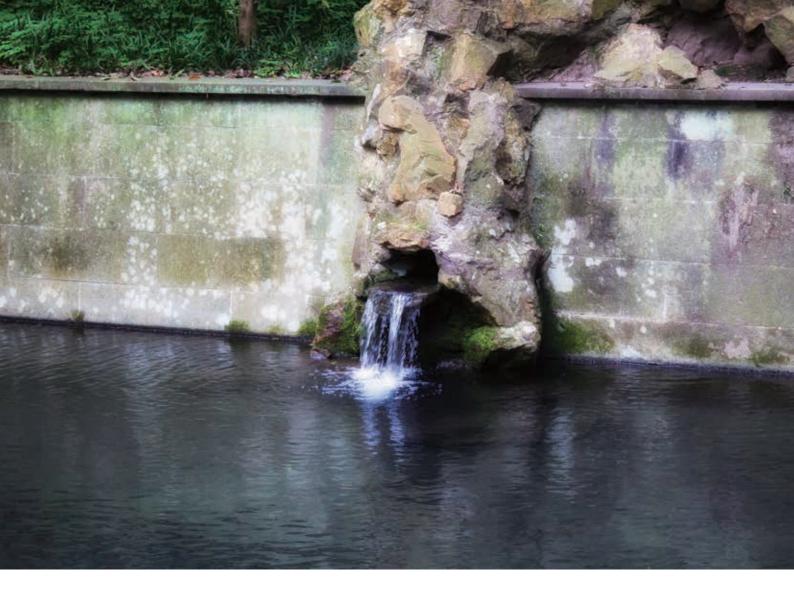
enough, they were flat a few days later when I tossed them in a bowl and reminisced about my trip to West Lake.

After the eighteen trees, I headed down to the Dreaming of Tiger Pawing Spring, which is often mistranslated as the Tiger Leaping Spring, because 'pawing' and 'leaping' are homophones in Chinese (pao 趵 and pao 跑). There are two springs nowadays, and a controversy over which is the authentic one. The more public one is full of tourists, while the other is quieter. I drank some tea with both and found the water to be about equal. The more famous spring comes up out of an underground source, passing over minerals and quartz crystals to lend it power and breadth that is good for Tea. This water has been paired with this tea for centuries. I imagined myself coming here when it was just a spring in the forest, having just picked and processed some

fresh spring Dragonwell with my own hands. What it must have been like to drink that tea? *Uplifting* and *clearing* are the sentiments that come to mind, as I sit drinking my own watered-down version, ignoring the kids camping and tourists clacking photos.

The spring gets its name from the monk Huan Zhong. He was traveling and looking for water when he finally passed out, lost and parched. In his dream, an immortal told him that two tigers would soon come and rescue him. He awoke to find two tigers peacefully resting at his feet. Due to the immortal's words, he was not alarmed and stood up, brushing off the dust. The tigers began playfully prancing down the trail, leading the old monk onwards. Eventually, they took him off the trail and up a slope to a small clearing. They began pawing at the ground until crystal spring water rushed out





of their hole. The monk bowed to the tigers, which roared and leapt off into the woods...

Many people wait in line for hours at the spring's bottom to fill plastic jugs and bottles, once again projecting a modern drear over an otherwise scenic hike. But I'm impressionable. I sit with a glass of Dragonwell floating in some spring water I got and heated myself (for a small fee to the café) and find a nice rock in a corner of the park that is uninteresting to others. I can feel all the tea lovers who have loved this water. And underneath all the pollution-of modern industry and tourism-Mother Earth's song is still audible to me. It takes a real tea lover to turn a trip to these spots into something meaningful and rewarding. But if you do love Tea as much as I do, it isn't that hard. There's a lot of Tea energy around to inspire and reward you.

The temple here is also the burial spot of one of my favorite Zen monks, Li Xiu Yuan, known as "Ji Gong." better He lived in the Southern Song Dynasty (1127-1279). According to legend, he was a champion of farmers and simple peasants, who still have shrines honoring his image. He has taken on the airs of a Daoist immortal to them, with stories of supernatural powers and the same eccentric manners as most Daoist sages: he's one of the wellknown Zen rascals, whose misbehavior simultaneously causes one to cringe, giggle and also realize profound truths about the limitations of any one approach to the sacred. I said some prayers for him-one rascal to another-and left to stroll by the lake one last time in the dying light...

If you ask me if it is worth braving the noise, crowded buses

and overfull tourist traps filled with kitschy, post-modern nostalgia to pay homage to the Dreaming of Tiger Pawing Spring and the eighteen original Dragonwell bushes and then brew them together, I'd say yes. But that is only because I am a poet and a dreamer. The West Lake itself has a natural charm that transcends the modern, so it is easy to recommend Hangzhou to those traveling in China. It's not that I don't see the inorganic, unsustainable tea and the tourism that surrounds it as a call to change. I do. But while there, I made a heart-commitment to breathe, transcend and travel mythically-to travel with both the open eye and the half-closed one. It's a combination mystics are famous for...



Conglu Experiments

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THE FLOW OF WISDOM

-Sam Gibb

Sam discusses the process of learning and the importance of one's perspective and attitude to one's tea journey. The Right View is the beginning of the journey, and sometimes knowing how to travel is even more important than the destination. It is beneficial to discuss how to journey, in order to better understand our approach in experimenting.





onth in and month out we publish these gongfu experiments for you to try at home. Before we dive into the May experiment, I thought it would be appropriate to tip our hat in the direction from which knowledge always flows: above.

Wu De often gives the example that with a book and a teacher, everyone can learn algebra within two years. If you take away the teacher, maybe only 20% of people can learn quadratic equations. Without the book or the teacher, no one learns algebra! Knowledge is accumulated. This means it is passed down, absorbed, understood, applied and then refined, generation after generation. As knowledge is given to us, it comes through the lives, experience and spirit of all those who carried it before us. Lifetime after lifetime, master after master, these teachings flow down to us. The wisdom becomes sharpened through the hands of those who hold it correctly, like a knife on a sharpening stone-one turning century-slow. Knowledge, like the blade, can also be dulled if those wielding it do not care for it. (But that is a topic for another day.) The fundamental point made here is

that teachings are greater than any individual. They are the collected insights of all those who have passed them down to us. This is what we are bowing to in the learning process, the wisdom flowing through the teacher, not the teacher herself!

But for this formula to work, there must be one to teach and one to be taught, one above and one below. Our Western minds often struggle with this idea, without fully understanding it. We believe that we are giving something away through surrender when in fact the truth is at the other end of the spectrum: we are receiving. As the Dao De Ching says, "All streams flow to the sea because it is lower than they are." In other words, the ocean does not decrease because it embraces the rivers. Instead, this is the reason it is so vast. The sea's humility is the source of its power. In Zen the concept of Shoshin, or "Beginner's Mind," is the goal of practice. Such a mind is open to possibilities, eager and lacks all ego and pretension. Even as we develop some mastery, we should always maintain a practice of beginner's mind. In other words, it is the teacher's job to teach and the student's responsibility to learn. If we cannot put ourselves below, then we

demonstrate a lack of understanding that means we are not ready to be above. We are stuck in the perception that it is about who is higher and lower and have not seen what is really important: the flow of wisdom that reaches beyond any one of our individual lives.

The teacher's role is to inform, clarify and correct. The Eightfold Path always begins with Right View. Right View means understanding things as they are. It is an essential starting point, without which we can head off down the wrong path or take a detour. Teachers ensure we continue to cultivate Right View in whatever they teach and to correct us as we learn. They too have placed themselves below another, applied themselves and seen the benefit. The teacher is offering you the opportunity to have the same experience. Their job is to create the conditions for wisdom to arise: what you do with the situation is up to you. These experiments, month in and out, offer you this chance. They are opportunities to develop your tea wisdom. They are invitations to growth.



Now for this month's experiment! This time we looked at the influence of the brewing vessel's shape on the final cup. There seems to be no shortage of options when it comes to choosing a vessel; each one will obviously impact the tea. We need to be able to test and understand the differences between these to develop our gongfu. Initially, a teacher can help design these experiments and tell us about signposts to look for along the way. In the end, we have to be able to create our own investigations to evaluate tea and teaware. Some of the experiments, like this month's, you may not be able to do at home because you do

not have the teaware. Do not worry, though! Merely adjust the procedure to your teaware.

Here in the Center we are fortunate to have the opportunity to compare the effects of the shape of the brewing vessel directly. We have a gaiwan and teapot that were made from the same material (porcelain) and fired in the same kiln on the same day! This means we can assess the influence of shape and remove much of the question of material.

Do not forget to take notes as you go and share your findings on our discussion board or through social media!



What You Will Need

You will need two vessels to compare. We used the gaiwan and teapot mentioned above. Identical cups are best if you have them. We use the same white porcelain ones every month. You will need two of these. We always use a lightly oxidized oolong, brewed weakly, so the flavors do not distract us from mouth sensations. And that is it. No need to make things too complicated!

How to Undertake the Experiment

Heat your kettle until it is just below a full boil. Place two or three grams of tea in each vessel, then rinse the leaf. You will want to be able to pour the vessels at the same time, with one in each hand. I had the gaiwan in my right and teapot in my left for practical reasons. (You should try switching hands if you feel confident doing so, as this also influences the final brew.) Do not warm the cups, but pour straight into each from the respective vessel, as warming adds another dimension and we want to isolate the influence of shape by itself. Try to get the same amount of water in both vessels. I counted as I poured from the kettles as a way of measuring. Then pour into both cups from the respective vessels at the same time. Taste back and forth between the cups. We started with the gaiwan, looking for the differences in mouth sensations mentioned in the March issue.











VARIETALS OF Korean Green Tea

-Brother Anthony of Taizé

Korea's green tea is amazingly under-esteemed. There is an ancient and very special tradition of tea production there, with many kinds of tea processing. And many of the traditions of tea making, brewing and pottery have stayed relatively unchanged for centuries. There is a lot of hand-processed tea in Korea that is worth exploring. Brother Anthony has lived in Korea for many years and along with translating classic tea texts has studied tea production in depth.

t is surprising how little information is generally available about the ways in which different kinds of tea are processed in different countries. Korean tea is particularly easy to explore because it is grown in a very small area and made by only an insignificant number of people. In China, there is a much greater variety of green teas, regions, varietals, etc. However, Korean tea is also rich in processing techniques, resulting in a greater variety of teas than one would expect.

Green ten

The finest tea in Korea is entirely hand-processed. Perhaps that explains why there is so little of ittoo little to be exported in commercial quantities. If you are visiting tea-growing regions, you will seek in vain for the room full of machines that so many Taiwanese and Mainland Chinese tea producers seem to take for granted. The most industry you will find in the tea-producing houses along the slopes of Hwagye Valley and the other tea-making areas of Mount Jiri is a row of gas rings under some iron cauldrons and a few rush mats for rolling the tea

on. At first, it seems that all Korean tea is roughly similar in taste, even when it is processed using a machine in a factory. Yet there are a variety of processes, and of course the best tea is always handmade, even in factories.

Nothing is more challenging than making tea by hand. Much of the finest tea is made by devoted laypersons and Buddhist monks, who regard the task as a spiritual discipline requiring great concentration. Certainly, no one can expect to earn money or fame by tea making; it can only be done as a labor of love, as a service to those who practice the Way of Tea. Some people begin each day's tea making with prayers, meditation and the reading of scriptures. The modern tea revival began largely among monks, who made tea for their personal use, with leaves from the bushes growing wild around their temples.

Ideally, perhaps, the person making the tea should also pick the leaves, but this is not usually possible. It is slow, wearisome work when the tea bushes are growing in irregular clusters up steep, rough slopes. The leaves must come from bushes that are located well away from any road, for tea readily absorbs the smell of exhaust fumes. Likewise, those making tea must not use any perfumed soap or cosmetics for the same reason. Externally and inwardly, there must be real cleanliness, simplicity of mind, and devotion of heart.

Korean tea is often classified according to the date at which the leaves were picked, as in the "first flush" system used since ancient times in China. Superimposed on the Korean lunar calendar are twenty-four seasonal dates based on the movement of the sun, which were borrowed from Chinese tradition. The day known as "Kok-u" normally falls on April 20th. The tea gathered before this date is known as "Ujon" and commands the highest price. The next seasonal date, "Ipha," falls on May 5th or 6th, and tea gathered between those two dates is known as "Sejak." Tea gathered after Ipha is known as "Chungjak." It should be added that the Korean weather



Korean tea is often grown wild and cared for by monks who, like so many Zen masters of old, revere the production of tea as an important part of their self-cultivation.





is colder than that in China, with the result that Korean tea-makers, although they pay lip-service to the traditional dates, actually go on making "*Ujon*" from the first growth of shoots beyond April 20th, when sometimes there are almost no shoots on the tea bushes.

The leaves have to be carefully selected, especially when making the finest tea by hand. It is a little like wine-making, for certain patches of ground yield leaves that are particularly fragrant while other parts of the same valley or hill are incapable of producing tea of that quality. Some plantation owners apply liberal doses of fertilizer, which encourages the rapid growth of insipid leaves; obviously, there must be no trace of insecticide on the fresh buds used for making tea, but in some plantations even that is not guaranteed! People making tea need to check very carefully where the leaves they use have been picked from, if they do not pick their own.

Here are the different processes involved in making Korean teas:

Processing the Tea Called Pucho-cha

Firing

There are two main methods of hand firing in use in Korea when making the best green tea. One way of processing results in what is known as "*Pucho-cha*" and is by far the most common. This involves repeated transfers of the leaves to and from the cauldron, in alternating stages of heating and rolling, up to nine times. About three kilograms of fresh leaves are fired at a time.

The firing is done in a thick iron or steel cauldron, which is traditionally heated by a wood fire although nowadays a gas ring is often used, since that allows easier control of the temperature. The cauldron is first



heated to about 350 degrees Celsius before the fresh leaves are tipped in. The leaves may emit a slight hissing crackle as they touch the hot metal. They must be tossed gently and stirred constantly to prevent burning. This softens them; then, once they have absorbed the heat, they can be briefly compressed and rolled together to encourage the evaporation of their moisture. Often two or more people work together to keep the leaves turning, hunched over the hot cauldron in what is a truly backbreaking task.

Rolling

After an initial ten minutes or so of softening and heating over the fire, the leaves are removed from the heat to be rubbed and rolled vigorously by the palms of the hands on a firm, flat surface—often a rough straw mat or basket—so that they curl tightly on themselves. This encourages the development of an intense taste; but if too much violence is used, the leaves will tear and break and the quality of the tea will suffer. Speed and strength are both essential here.

Separating

The next step is the most delicate and time-consuming. The emerging juices make the rolled leaves stick tightly together, and they have to be shaken apart one by one in order that their moisture can evaporate freely. Without this, the tea cannot dry properly, and the final result will be clumped in unsightly knots, but if too much force is used, the leaves will tear and break.



Final Drying





Throughout the entire drying process, older leaves, twigs and harder stalks must continually be removed as they are noticed. The partially-dried leaves may next be spread out on a thin layer of paper laid on trays and left exposed to the air while other batches of fresh leaves are processed.

By the end of the first cycle of firing and rolling, the leaves have already diminished considerably in volume. They are now put back in the cauldron, which is cooler than for the first firing, though still quite hot. Again they are turned, pressed and rolled gently as the process continues. Then the hot leaves are once again removed from the cauldron, rubbed and rolled together on a hard surface, and shaken apart.

Once again, they are given a short time to go on drying in the air. Then the same process is repeated, several times, until they are virtually dry. The period over the heat is shorter each time, and the heat is gradually reduced.

Final Drying

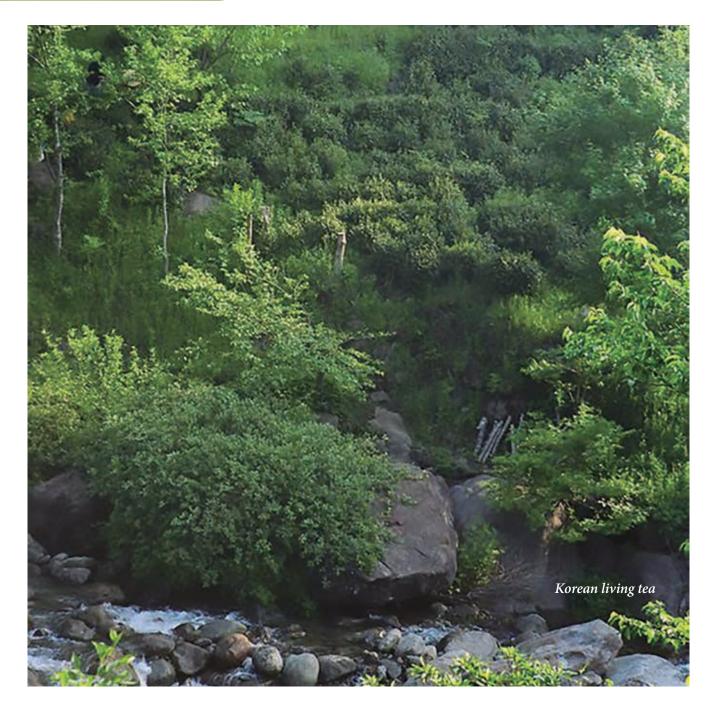
The leaves are then spread out thinly and allowed to go on drying on sheets of clean paper spread on the heated floor of an indoor room for at least four to five hours, often overnight. The next morning, they are returned to the cauldron, which is now only lightly heated, and kept turning gently, all the time being stirred and pressed until the leaves are completely dry. This is the decisive final process, known in Korean as "mat-naegi" or "hyang-olligi" (taste-giving or fragrance-enhancing), lasting some two hours. As the final drying progresses, the leaves

emit a pale cloud of intense fragrance. By the end, their color has changed from bright green to gray.

Once the tea is completely dry, it is given time to cool before being packed. This is important, since tea that is sealed too quickly may retain a taste of roasting that can spoil it.

Korean tea is not usually vacuum packed, but is sealed in foil bags containing thirty or fifty grams in the case of "*ujeon*" (first flush) and fifty or one hundred grams for other grades. The most important thing is to prevent any contact with moisture. The tea should be stored in a cool place. Once a pack is opened, the tea should be drunk fairly quickly, especially in the case of *ujeon*, which can easily lose its delicate taste once exposed to the air.

Green Ven



Processing the Tea Called Chung-cha

For the tea processed as "*Chung-cha*," represented most notably by the Venerable Hyodang's Panyaro tea, fresh leaves are plunged for a moment into nearly-boiling water to soften them, then allowed to drain on straw mats for a couple of hours before being placed over the fire.

Once in the cauldron over the fire, they remain there, and the entire process of rubbing and rolling, separating and stirring is done by two or three people bent over the cauldron. This process takes more than two hours for a single batch of about three kilograms of leaves. There is no further processing over the fire, but an equivalent prolonged period in which the tea lies spread thinly on a well-heated Korean *ondol* floor has the same effect of enhancing and deepening the taste.

One characteristic of the tea made by this method is its depth and subtlety, which can be developed by using relatively cool water for the first brewing and allowing the water for the initial brew to remain on the leaves for a longer duration. If the tea has been well made, the resulting intensity of taste is quite overwhelming. Sometimes it is mistakenly said that all Korean tea should be prepared in this way, whereas in fact normal Korean green tea should be made with hot (though not boiling) water.

Processing the Tea Called Ttok-cha

"*Ttok*" (or *ddok*) is the Korean term for any kind of rice cake, whether the white stick of well-pounded rice paste broiled in peppery sauce, as "*ttok-bbokki*," or sliced into broth to make "*ttok-guk*," or the multiple sweet varieties that correspond to Western cakes. "*Ttok-cha*" is so named because it is a caked tea resulting from a similar process of pounding and shaping. It is an ancient tradition that has recently been revived and I confess that I have never drunk it, as it is quite hard to find.

Our fellow Global Tea Hut author, Steven D. Owyoung, explains it thus: "To make *ttok* tea, fresh leaves are picked and selected, and then the leaves were steamed in an earthenware steamer. The cooked leaves were pounded to a pulpy mass and the pulp formed into little cakes, some as small as the size of a coin. To dry and store, cakes were pierced and strung together on a cord, like a string of copper cash. This is why one traditional name for this tea is 'Cash Tea (*Yopjon-cha*).""







The varieties of Korean tea are all worth exploring, though they are sometimes neglected in international tea communities. Being produced by hand in traditional ways and with a sense of spiritual presence means that Korean tea stands out from the bulk of mostly commercial tea, helping lead the drinker inward to the mountain stillness that is the tea's true source.



EMERALD DREAMS THE MANY SHADES OF JAPANESE GREEN TEA

-Steve Kokker

When the first flush of Japanese tea arrives at the Center in May, we are thrilled to taste the fresh emerald bliss. There is a wonderful world of Japanese green teas to explore, and we can't think of a better guide than Steve, whose passion for these teas inspires us to learn and taste more. The vast tea map is full of hidden treasures, beyond a lifetime!

have noticed time again how diehard lovers of Japanese green teas (and very often these same do not take too warmly to Chinese greens) seem to be attracted to the clean precision, to a certain elegance and refinement, a certainty of perfection, if you will, of these delightful teas. Indeed, a glance at the stunningly seductive dark green needles, a whiff of the overwhelming freshness that they give off, and a sip of their sometimes consciousness-expanding, intoxicating explosion of grass-sweet, fresh-air, seaweed bliss is enough to knock a first-timer off their seat.

Yet, others find the taste almost too clean, too perfect, lacking in the down-to-earth appeal of many Chinese greens, which are slightly milder and friendly in comparison. These are the types who would be happy in a bohemian-style teahouse, whereas the Japanese tea fans seem to have a notable preference for more pristine, ordered, organized social surroundings. Indeed, there is much to compare in the generalities between the Chinese and Japanese as reflected in the different kinds of teas they produce. (I'll leave that for another article.)

For now, let's aim for a brief overview of Japanese teas—a guide to help navigate one's way through what can at first appear deceptively simple. Simplicity masking complexity, somewhat like the concept of "*shibui*": objects or spaces which appear simple on the surface but whose intricate complexity or meaning is often hidden or subtle.

There are three major factors and criteria in the appraising of Japanese green teas (leaving experiential factors such as smell, visual appearance and taste aside for now):

- Cultivar and origin of the original material.
- *Type of steaming.*
- Whether the plants have been shaded or not.

These are the main variables affecting the production of all Japanese green teas, and knowledgeable vendors will be forthcoming with the name of the cultivar used, general geographic origin of the tea, as well as whether it was shaded or not and the kind of steaming used.

Although spring harvests are the most prized, plants are har-

vested throughout the year in Japan to keep up with high demand. Freshly-plucked leaves are brought down from the fields to the processing farm as quickly as possible and go through the kill-green stage (with no withering) to preserve color, freshness and a lightly bitter "bite." This enzymatic deactivation is done primarily by steaming in Japan.

Ironically, the word "sencha" literally means "roasted tea," which refers to older methods of processing Japanese leaf tea, versus the ground, or "mo," tea (matcha), which had been part of Japanese culture for centuries before steeping leaf tea became popular in the 17th century. The processing of sencha was developed in the 18th century. By steeping leaves, tea was brought into the houses of the common folk and could finally be an everyday experience, or at least not a luxury to be experienced rarely in formal ceremonies or almost exclusively by the ruling classes.





One Category, Many Differences

Although Japan produces almost only green tea (their red and oolong teas are far from refined in taste, but exciting to try—until the 1960s, when cheaper African and Indian red teas came to dominate the world market, Japan produced quite a bit of red tea), the differences between the kinds of green tea can be staggering.

Here's a very, very brief introduction to some of the different kinds of green teas you may find in Japan.

There are four main categories of Japanese green tea: *bancha* (late-harvest, or "common" tea), *sencha, gyokuro* and *matcha. Sencha* accounts for over 80% of all tea produced in Japan, bancha about 10%, matcha about 2% and growing, and gyokuro, which can be among the world's most expensive teas, about 0.3%. There is also a miniscule production of hei cha (black, fermented teas), which the Japanese make very differently from the way shou puerh or Liu Bao are produced in China, for example. One popular kind of post-fermented Japanese tea is called "batabatacha," definitely an acquired taste-best boiled, it has a unique pickled flavor, which mellows after several steepings and is an excellent summertime drink.

Both *matcha* and *gyokuro* are made with so-called "shaded leaves."

Entire plantations and tea gardens are shaded from the sun for a few days to several weeks before harvesting. The materials used to shade the plants as well as the length of shading time, plus the gradient of shading, all influence in very distinct ways the resulting taste of the tea. Shading causes numerous changes in the leaf, which increase *umami* (a difficult word to translate, it means a kind of savoriness or full-bodied flavor), sweetness and intensity.

Other kinds of teas, which can be considered subdivisions of *sencha* and *bancha* teas, include those listed below.





Kinds of Sencha and Bancha

Houjicha roasted bancha with twigs and leaves.
Kukicha made from sencha or even gyokuro twigs.
Karigane blend of high-grade sencha or gyokuro stems plus leaves.
Genmaicha a popular blend of sencha, puffed brown rice and/or popped corn.
Kabusecha shade-grown tea, usually taken from the first plucking of the season.
Tamaryokucha a specialty from the Kyushu region, a rolled and sweet tea.
Shincha the first plucking of the season.
Kuradashi aged sencha.
Konacha green tea fannings or fine particles, used for tea bags.

Sobacha not a tea really, but an infusion made from roasted buckwheat.











Let's Talk Cultivars

Although the words "varietal" and "cultivar" are often used interchangeably, in botany, a "varietal" is used to indicate naturally-occurring differences in related subspecies of a plant; "cultivars" are human-made subspecies created from cross-breeding and hybridization (often from stem cuttings). Cultivar is short for "cultured varieties."

A brief look at Japanese tea cultivars would be instructive, as they play a major role in Japanese tea farming, with their vastly different taste profiles, crop yields and "personality characteristics." Cultivars have been registered officially in Japan since 1953. Understanding how different cultivars behave in different circumstances helps to ensure stable crop yields and avoids potential disasters created by monocultures.

As domestic consumption of tea started to soar in the 1970s, Japanese tea farmers looked for a way to reduce dependency on importing tea from elsewhere and increase domestic production. The Yabukita varietal at this point became king, and even today, some 75% of all teas produced in Japan are made from Yabukita leaves. This particular strain offers a pungent and pleasant umami taste profile and proved high-yielding and relatively easy to cultivate. Eventually, however, having such a one-varietal dominance led to immunity problems and Yabukita became susceptible to pests and diseases, which in turn required a large amount of fertilizers and pesticides to be used. Other varietals were then developed, and today there are more than fifty official cultivars classified in Japan, though

the real number may be infinite only Nature truly knows. Most tea plants in Japan remain productive for a maximum of thirty-five to forty years, when they need to be replaced; this is due to rather intensive farming methods, and to the fact that human-made cultivars do not live as long as seed-propagated varietals.

Yabukita, which was developed from an indigenous wild variety of *Camellia sinensis* growing in Shizuoka, still dominates production, but let's look at a few other varietals currently being farmed in Japan:

Yutakamidori is a distant second to *Yabukita* in terms of volume of production—mainly grown in Japan's southern Kagoshima and Miyazaki regions.



Okumidori is noted for its mild, slightly smoky notes and lack of astringency. It was developed in the early 1970s as a cross between *Yabukita* and another Shizuoka variety. This variety is often used in *gyokuro* and *matcha* processing, along with the equally revered *Samidori* varietal.

Okuyataka is one of the newer varietals in Japan, but it is quickly gaining popularity for its sweet aroma and deep, rich notes. It is also used in *matcha* production.

Asatsuyu, meaning "Morning Dew," is known as the "natural gyokuro," as its taste profile resembles the famous gyokuro teas. Often used to make fukamushicha (see the section below, What's Your Mushi?), this was the first green tea cultivar to be registered (other cultivars are used to produce red teas—those with "*beni*," or "red" in their names) back in 1953. It makes a delightful, sharp, sweet and elegant brew, yet it is not more popular simply due to its propensity to fall prey to frost damage.

The word "Zairai" sometimes pops up in discussions of Japanese varietals, and lucky the buyer who sees this word on the tea they buy! While not an actual cultivar, it designates leaf material that comes from wild trees of unspecified genetic origin. These are teas made from older, wilder bushes which may be many different varieties blended together but which are impossible to determine as they are growing wild and uncontrolled. Their ancestors are thought to be some of the earliest tea trees planted in Japan. They are also seed-propagated. While this might sound tantalizing and amazing to us Global Tea Hut readers (and believe me, the life felt in a nice Zairai is strikingly different from other, perhaps equally delicious teas), they are not very popular (or expensive) in Japan as the market finds them cumbersome: their yield differs year to year, and of course their taste is very hard to keep standard. Often, even in one basket of freshly-harvested Zairai tea, the leaves might differ in size, shape and color. So, commercially these are only of niche interest, although they can be stunning teas, producing taste profiles which were enjoyed in a Japan long gone. There are relative few Zairai fields left in Japan.





What's Your Mushi?

The kill-green (*sa qing*) process (to kill enzymes in the leaf that would otherwise lead to oxidation) in Japan is almost always done by steaming (rather than by firing, as is the common rule in China). *Mushi* means "steamed." Just how long the leaves are steamed, however, can affect the resulting green tea massively. In addition to knowing when your Japanese tea was picked, from which region, and whether or not it was shaded, you also want to know the tea's *mushi*-ness.

As with all categorizations, this one is also illusory in that teas rarely sit neatly in one category or the other. Think of different amounts of steaming as a continuum rather than as strict categories. Also, the definitions of these categories have changed somewhat over the years, as teas in general are being steamed for longer than they were traditionally. This has to do with the changing palate of consumers, but also with the fact that extremely short steaming produces teas best drunk after having "sat" for several months; and the modern market demands more ready-to-drink teas. That's why most current Japanese teas don't age as well as they used to and are best drunk within a year or so of production (with notable exceptions).

Asamushi Short steamed. This is the most common form of steaming, and the resulting leaves tend to be longer, intact, with fewer small bits of leaf visible. The liquor is quite clear, often a transparent green-yellow, and the taste is lighter than that produced by other steaming methods; many people like this as it tends to preserve the leaf's fresh, vegetal taste. Almost all *shincha* (early spring pluckings) are *Asamushi* to emphasize their gentle nature. The taste is refined, elegant, crisp and clear.

Fukamushi Those stepping into the Japanese green tea world tend to go wild over Fukamushi (deep steamed) teas. These teas are often quite intense in taste, but very sweet as well: umami and bitterness are backgrounded to a very full-bodied experience, which appeals to those who haven't developed a palate for Japanese teas yet. These teas are not subtle (as evidenced by the cloudy, thick appearance of the liquor) and not known for delicacy, but quite often the first two steepings can be intensely delicious mouthfuls. Their appearance is easy to spot: lots of small leaf pieces, as if they've been finely chopped. The wet leaves clump together in a paste-like glop that's fun to mix with soya sauce after steeping and eat up! Legend has it that the deep-steaming process was developed about thirty years ago to compensate for declining water (or tea leaf) quality-the more intense taste masked any other defects. Low-grown teas (versus high-mountain-grown) are better suited to becoming Fukamushi.

Chumushi Not much to say here, as these "medium-steamed" are predictably in between the other two extremes, exhibiting characteristics of both. It is sometimes hard to visually discern a *Chumushi* from some *Asamushi* teas.

We talk about shorter and longer steamings, but how long is long? It's hard to give a precise definition, as the length of steaming depends on the leaf and climatic conditions, but very generally, Asamushi usually means a steaming of up to thirty seconds, Chumushi around forty-five seconds and Fukamushi up to ninety seconds. Some teas are given up to two minutes of steaming, and some rare teas go through a two-step steaming. The difference might not seem long to us, but these few seconds make all the difference to your drinking experience!





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Brewing Tips for Japanese Green Teas

It's always tricky to write brewing suggestions, as there are so many variables to consider. There are many ways to shine a penny! Some gyokuro does very well steeped in just 40C water for four to five minutes. Many kinds of sencha are delightful when steeped in cold water, with a slightly higher leaf-to-water ratio, and left to steep for ten to twelve minutes.

While some Japanese teas are rather forgiving of brewing liberties, overly generous steeping times, and higher-than-desired water temperature, others can be fragile, demanding exact and focused attention. The difference of just a few degrees in water temperature or of a few seconds can sometimes be the difference between mouthgasm and mouth-catastrophe. As a very general guide, we recommend relatively cooled (ideally spring) water (70-75C), with a proportion of 4-6g (a heaping teaspoon) per 225-250ml of water. Steepings can be 45-60s for the first, 30-45s for the second, over a minute for the third and then longer and longer steeps... With this and other teas, do experiment with brewing times and water temperatures. The experience of brewing and drinking is where a real understanding of Japanese green tea is to be found!

THE GOSSAMER TEA POWDER OF JAPAN -Mary Lou Heiss

reen tea lovers know that there is a striking difference between Japanese and Chinese green teas. A comparison of green teas from these two countries presents a wonderful example of "cultural dissimilarity" in taste, aroma and appearance as well. In fact, it is safe to say that the only similarity these two styles of tea bear to one another is that they are both manufactured without any oxidation of the fresh leaf, which therefore classifies both of these teas as green tea.

One of the most important green teas synonymous with Japan's unique tea culture is *matcha*, the vivid, emerald-green, finely powdered tea that is at once sweet and slightly astringent and creamy in the mouth. Powdered tea is rarely drunk in China today, as leaf tea has become the tea of choice. But the roots of powdered tea drinking traveled from China to Japan during the height of the lavish Song Dynasty (960-1279) tea culture.

Centuries ago, China was the only country that possessed the secrets of tea cultivation and manufacture. During the Tang Dynasty (618-907), Lu Yu, known as the father of tea, shaped China's fledgling tea drinking culture, and codified tea drinking protocol that is still relevant today. However, this early tea was a far cry from the sophisticated, terroir-specific leaf tea that China began producing centuries later. But Japanese priests and monks visiting China on diplomatic and religious missions during this time were enthralled by this wondrous beverage. They brought both the knowledge of tea and a taste for tea with them back to Japan, and eventually tea seeds as well, which were first planted in temple gardens.

In Tang-era China, it was the fashion to drink tea that had been scraped and cut from a small tea cake made of compressed, coarse leaf that had been steamed, then crushed and bound with a small amount of plum juice and dried. The tea would be placed into a pottery vessel to which hot water was added. Pieces of onion, jujubes, dogwood berries and spices would be added to the pot as well, in some cases just salt. Either way, the tea mixture would be served in dark brown-or black-glazed, low and wide tea bowls known as *tenmoku*.

In China, this style of tea steeping and drinking went unchanged until the Song Dynasty (960-1279). During this era, tea continued to be scraped from tea cakes, but a new refinement was introduced. Tea cakes were now pressed from leaf tea that had been powdered, and a kind of tea "mud" was used to shape the cakes.

New tools were developed to cut, grind, and sieve the tea into a fine powder. Learning the art of properly whisked tea was the goal of every tea master and wealthy tea devotee. In this way, the Song took the tea traditions developed by the Tang and elaborated on them with new refinement and their use of whisked, powdered tea.

To accommodate this new style of tea drinking, elaborately glazed tea bowls became popular. These bowls were narrow at the bottom and wide at the top, and were shaped and sized to accommodate the use of the bamboo tea whisk in the tea bowl.





Unfortunately for the worldly Song, their love affair with tea and tea equipage came to a stunning end when China was overtaken by Mongol outsiders and Kublai Khan established his Yuan Dynasty (1271-1368).

Despite this unhappy turn of events for Song-era tea culture, the Japanese, familiar with Chinese tea preparation customs, were able to continue the practice of whisked, powdered tea drinking in Japan. The Japanese took a Chinese practice and re-shaped it to fit their cultural and aesthetic style. This tea-drinking method, combined with Japanese aesthetics, Zen meditation and the philosophical ideals of *Wa Kei Sei Jaku* (Harmony, Respect, Purity and Tranquility), ultimately led to a tea drinking experience that was shaped more by Japanese sensibilities and detail than by Chinese ways.

By the 16th and 17th centuries, four essential Japanese tea masters had each contributed to the philosophical underpinnings of the practice of making and drinking a bowl of whisked powdered tea and named it Chanoyu, the Japanese tea ceremony. Tea and tea drinking is central to the experience and practice of Chanoyu. In this intimate gathering, the tea master carefully uses a bamboo whisk and precise hand movements to prepare the whisked tea. The tea bowls, known as chawans, are large in size, can be glazed or slightly rustic in shape and texture, and are earthy in color and appearance. The most prized tea bowls are those that are hand-made by a potter. Although the generous proportions of these *chawans* require that guests cradle them in two hands while drinking, only three to four ounces of tea is prepared by the tea master for each guest.

Matcha Processing

As is true for all aspects of tea and tea culture in Japan, the cultivation and production of *matcha* powder is very specific and detailed, and the attention to quality is taken very seriously. As an outsider peering into Japan's tea culture, *matcha* embodies



the essence of a simple thing that can take a lifetime to understand in all of its complexities and nuance.

Matcha is referred to as powdered tea, but *matcha* should by no means be thought of as simply ground-up leaf tea. It is a precise combination of leaf cultivation with fresh leaf processing and the blending skills of a tea master that results in powdered tea that possesses an astonishing array of invigorating tastes, a velvety texture and a rich, vivid, emerald-green color.

Matcha is manufactured from the fresh leaf of tea bushes that are grown in the shade under tented canopies, in a similar fashion to Japan's other exclusive tea—gyokuro. In fact, tea farmers who grow leaf for *gyokuro* nearly always pluck leaf for *matcha* as well. The difference between the cultivation and manufacture of these two famous shaded teas is slight but important, and it has to do with:

- 1. The seasonal timing of the pluck.
- 2. The configuration of the pluck.
- 3. The degree of shading and the type of tenting material used.
- 4. The differences in the manufacturing technique applied to gyokuro and matcha in the tea factory.
- 5. The visual appearance of the finished tea: matcha is a rich, matte green powder and gyokuro is rolled into slender, needle-like, dark forest-green-colored leaf.



The tea bushes that yield these teas spend most of their spring growth cycle leafing out under a tented cover away from sunlight. After the first initial growth spurt in the spring, a trellis is erected over the tea bushes, and densely woven netting is draped over the trellis and secured. The simplest netting is made from dark, woven plastic; the most traditional and expensive netting is constructed of fine straw.

This arrangement, called a *tana*, covers both the top and sides of the trellis (it is roomy enough for tea pluckers to work inside) and the netting blocks roughly 90% of the sunlight from reaching the plants. The plants, nevertheless, still grow, and a peek under the netting reveals elongated leaf sets that have stretched towards the light.

The reason for shading the bushes is to increase chlorophyll production in the plants by reducing natural photosynthesis in the leaves. The extra chlorophyll changes the balance of the natural components of the leaf, but especially affects the proportion of:

- L-theanine (amino acid), which is responsible for flavor.
- Caffeine, which controls bitterness.
- Catechins (antioxidants), which give tea its texture.

This forced change in leaf chemistry yields soft leaves, and slightly astringent tea, with the sweet and buttery undertones that high-grade *gyokuro* and *matcha* are known for. Additionally, fine *matcha* contains a high degree of *umani*—the quality of rich mouthfeel, derived from the presence of certain amino acids, that is defined as the fifth element of taste, along with bitter, salty, sour and sweet.

Although these are coddled tea bushes, a peek beneath the *tana* gives one a view into the odd world of plants that grow without the usual amount of light. These plants emit an eerie color due to the lack of sunlight, and their new growth is lankier and thinner than that of their tea bush cousins growing in the sunlight in traditional tea fields.

Gyokuro production occurs in the spring, and is followed closely by *matcha* production. *Matcha* is made from the spring-plucked leaf, which is deemed to have the best structure and flavor. When we visited Uji (Kyoto Prefecture) in May, one of the growers told us that he plucks the bud and the next two leaves when he is picking for *gyokuro* (for competition-grade *gyokuro*, only the bud is selected), but the bud and the next three leaves are plucked for *matcha*. He uses this extra, slightly older third leaf to "influence" the final flavor of the *matcha*.

Thick and Thin Matcha

Most *matcha* producers make two primary types of premium *matcha* that are used in the Japanese tea ceremony: *usacha* and *koicha*. All tea ceremonies serve *usacha*, or thin tea, but some serve an additional, communal cup of *koicha*, or thick tea. When *koicha* is served, it is presented first in the ceremony and all guests take a sip from the bowl and then pass it to the next person. Only one *chawan* of *koicha* is made by the tea master, whereas each guest



receives an individual *chawan* of *usucha*.

Koicha is made from the leaves of older tea bushes, and as a result, it is more expensive. A bowl of koicha is stronger tasting and more densely textured in the tea bowl-like thick, luscious cream. It is prepared with more tea and less water than usucha, and the tea and water are gently "kneaded" with a special whisk made for preparing koicha. These whisks have fewer bamboo tines (16-48 versus 72-120 tines for usucha whisks), which are thicker than the bamboo tines on whisks made for usucha. The reason is that koicha requires the surface of the tea to be thick and smooth, bright green and without any froth at all. Froth is

okay with *usucha*, but not with *koi-cha*.

Once the fresh leaves are plucked, they are taken immediately to the tea factory. Here, the leaves will be processed into *tencha*, and then into *matcha*. The process for manufacturing *tencha* (and *gyokuro*) is slightly different from that used to make other Japanese green teas such as *sencha*. Some tea producers bring their semi-processed tea to a *tencha* factory; others utilize a traditional *sencha* factory that has been outfitted with the additional pieces of equipment necessary for *tencha* production.

Either way, as soon as the fresh leaf enters the *tencha* factory, it will be placed on a conveyor belt and pass through a steaming chamber. (All Japanese green tea is steamed in this manner.) This process softens the leaf, prevents oxidation, retains the natural leaf color, and begins the process of breaking down the cellular structure of the leaf.

After this, the leaf travels down the conveyor belt, where it will be blown vertically into tall, enclosed, vertical nylon cylinders and kept aloft by warm air. This is the primary drying step. After this, the leaves are cooled, spread flat on the conveyor belt, and passed through a horizontal drying oven. Unlike in *sencha* production, this leaf will not be rolled or shaped—it must remain flat throughout the entire process.





From this point, the veins and stems of each individual tea leaf will be removed, and the remaining leaf will be chopped into uniform small pieces. What remains (after a final electrostatic cleaning to remove lingering bits of stems, etc.) is the heart-matter of the tea leaf, which is now called *tencha*.

At this point, the tencha can be vacuum-packaged and stored in temperature-controlled freezers until it is needed. The final step that turns tencha to matcha takes place in the grinding room. Here, the tencha is fed via a hopper into the center of a slowly-revolving two-piece granite grinding mill that pulverizes the leaf into a silky smooth powder. The mills are small and in grinding rooms, rows of them are lined up on work counters. In earlier days, the grinding mills were turned by hand. Today, the grinders are operated by means of a control panel, but they still move at a very slow speed in order to properly obtain precisely ground, micron-fine tea powder.

If the grinders operate too fast, the tencha will overheat, the delicate flavor of the tea will be lost and the silkiness of the powder will be compromised. Matcha producers operate the speed of their grinders so that they obtain no more than fifteen grams of matcha per hour, per grinder. So even with modern intervention, it remains a slow and laborious process. Additionally, periodic re-calibration of the grooves on the grinding side of the stones is required for the mills to grind precisely. This detailed work is carried out by craftsmen who ply their traditional hand-craft of adjusting and honing these stone mills using custom-made tools.

Quality Matcha

Matcha is produced in several regions of Japan—the town of Uji, near Kyoto city in Kyoto Prefecture, Nishio in Aichi Prefecture, Shizuoka

in Shizuoka Prefecture and northern Kyushu Island.

Most tea companies produce several different grades/kinds of matcha, which they make from a careful blend of tencha from different tea farmers, different tea growing regions and different tea bush cultivars. Each matcha has a unique taste, fragrance, color and even particle size. Matcha producers create signature matcha blends for their clients based on the requirements of cost, flavor, color, fineness, and usage. Ceremonial grades of matcha are the most costly, while matcha to be used as a baking or cooking ingredient is considerably less expensive (and less tasty).

The most expensive matcha comes from Uji, the first tea gardens developed in Japan. Uji tea producers provide matcha to Japan's oldest, most venerable tea shops, to temples in Uji and Kyoto and to the established tea schools (Urasenke, Omotesenke, Mushanokōjisenke, Sohenryu and more), which teach the philosophy and skills of Chanoyu. For Chanoyu, each trained tea master chooses the matcha he or she prefers based on the taste of the matcha appropriate for the type of tea ceremony she or he will be conducting. Or perhaps they choose the matcha favored by the present or former grand master of the tea school where they trained.

In Japan, *matcha* is sold in sealed canisters of 20, 40, 100 or 200 grams. Because it is ground micronfine, *matcha* stales very quickly, so purchasing small quantities as needed insures that the tea will retain color, flavor and antioxidant benefit. *Matcha* ranges in price from modest offerings suitable for use in desserts (\$8.00 or so for 20 grams) to the best ceremonial grades used in formal Japanese tea ceremonies and also drunk at home by *matcha* tea enthusiasts (\$40.00-\$150.00 for 20-40 grams).

Shopping for *matcha* offers a seemingly endless array of confusing names and choices. *Matcha* is sold

not so much by place of origin, but by tea names that recall a season, a concept, a feeling or emotion, a celebration, or something lovely that is admired in nature (snow-covered pines, flying cranes, cherry blossoms, etc.). Or *matcha* may be selected and named by the grand master of one of the Japanese tea ceremony schools for its suitability to the philosophy of that tea tradition.

To add to the confusion, the same *matcha* packed in a twenty-gram or forty-gram-size tin might have a different name. Some *matcha* is packed and sold for seasonal use, such as *matcha* sold from early December to early January. And of course, there is *matcha* for *koicha* and *matcha* for *usucha*. So it is best to focus on what you want to use the *matcha* for, decide what your budget will allow and then ask for advice.

Matcha is not simply ground-up tea leaves. It is an essential practice for the intricate, vibrant, fascinating and delicious Japanese tea culture of yesterday and today. *Matcha* was the drink of Samurai and warrior-elite as well as monks and priests. Its adoption into Japan created the need for Japan to solidify its identity with *Chanoyu* and produce Japanese tea bowls and other tea ceremony vessels and tools with distinctly Japanese aesthetics and sensibilities.

The required decorative items such as calligraphy scrolls and *chabana* (simple flower arrangements) for use in the tea rooms, and lush landscape gardening on a small scale outside of the tea rooms. For the preparation of tea, this spawned the development of many tea items culled from Japan's most famous arts traditions: wood-fired pottery, bamboo utensils, cast-iron water kettles, lacquer tea containers and tiny tea ceremony sweets.

This was quite a feat for what some might say is just a simple cup of tea!







Each month, we introduce one of the Global Tea Hut members to you in these magazines in order to help you get to know more people in this growing international community. It's also to pay homage to the many manifestations that all this wonderful spirit and Tea are becoming, as the Tea is drunk and becomes human. The energy of Tea fuels some great work in this world, and we are so honored to share glimpses of such beautiful people and their Tea. This month, we would like to introduce Amy Woodruff.

was introduced to tea through my dear sister Tian Wu. A mutual friend excitedly led me to Tian's home, where I sat with the Leaf for the first time. I didn't know exactly what was in store, but soon my bowl was filled with tears. I couldn't stop crying. The tea enveloped me, and I felt as if I had been taken under Her spell. I felt like I had just drunk the most ethereal and sweetest, yet earthy and rooted essence of life.

A few months later, Tian served a large group of us as we sat for the very first Spirit Weavers gathering in November 2013. Now that we're heading into our fourth year, the tea ceremonies have become a huge part of the gatherings. It has been incredible to watch and witness the Leaf speak to each woman in her own way. We gather together as women, and Tea wants to be right along there with us! When I think of the gatherings, Tian's early morning sits are among my favorite memories.

Initially, I was relieved that the Tea hadn't wrapped Her leaves around me too tightly. I was filled with so much already. How could I make room for another practice in my life? And most of all, I truly enjoyed just sitting and receiving medicine through Tian. Then, one day, Tea spoke to me in a different way, and I was afraid to listen because I knew exactly what She was up to. Later that same week, a package arrived in the mail from a friend filled with a handful of different teas. From that day on, Tea wouldn't stop flowing into my life, so I took Her in, and each day my beloved and I sit and share tea together. With a five-year-old daughter, finding some quiet and alone time is a task. Tea was a beautiful opportunity to make time and space to sit and just be. We like to drink in silence for a few bowls, and then tune in deeper about our day, our thoughts and our hearts. This time is a gift that we treasure, and the tea always awakens exactly what we are seeking to find.

Last summer here on Kauai, the sticky humidity during our tea sessions turned into an even deeper cleanse with each new day. I was releasing so much and the tea... well, She just kept on listening. Soon I begin serving tea to my island sisters each Tuesday morning. As island folks, we tend to do things on "island time," so tea was the perfect gift for us all, and She slowly made Her way into each of our lives.



Without other guides here on the island, we surrendered to what was available: the Leaf, the true Teacher Herself! The island has its own flow, and like the water of the spring, women drift in and out, keeping the sits always alive and ever-changing. My sister Ali brings fresh spring water from near her home deep in Manoa Valley. Sometimes my daughter and I make the pilgrimage ourselves.

Just after I arrived back from the Tea Sage Hut in Taiwan, I had the pleasure of meeting Tian in the Center. My appreciation for Wu De grows each time I have the opportunity to sit with him, from California to Kauai to Taiwan. The Tea Sage Hut is a perfect example of what we can manifest when we listen closely to our heart's calling in a community where wisdom is always being spoken and Tea is always the guest of honor.

If you ever find yourself on the magical island of Kauai, come and share tea with our community here. A bowl of Her Majesty will always be waiting for you!



Because of the large number of tea sessions happening around the world, we are going to post about them on our site from now on and use this section to discuss news happening around the world. If you have any news, like a wedding, birth or tea happening, let us know and we'll write about it here. Also, our new site coming in the next few months will connect you to tea sessions around the world in a much better way than this page ever could!

We only have a few Light Meets Life Cakes left! The first of the 2016 cakes has already arrived. It is an amazing aged Dian Hong, which is why it got here early. We call it "Ambrosia." It should be up on the site for a small contribution soon!

There is a good chance Wu De will be doing some workshops in San Francisco, Los Angeles and Austin this summer, probably at the end of June. Keep an eye on our social media for details.

🕿 We also have uploaded our blog to the site (www.globalteahut.org/blog). We will publish the *"Further Reading" there, as well as extra content, like* a new series on the exercises in Tea Medicine.

There are a number of paintings and scrolls available on the website. If you are interested in having a piece of Wu De's artwork in your tea space, you can now get one through the website (www.globalteahut. org/paintings).

Searce Please make some comments under the new videos and let us know what you think of the multimedia Global Tea Hut. Does it facilitate better understanding of the topics? How can we improve them or the magazine? We want to hear from you!

I am expansive, growing with spring.

in Aftermation

Every day we make a decision to grow or stagnate, to rise up to a new form or stay the same. This growing season, I will work to become the next best me!

Wu De will be facilitating a six-day retreat in the Spanish Pyrenees. It will be a Zen & Tea One Flavor retreat, focusing on the connection between meditation and tea. Participants will gather fresh spring water, meditate a few hours a day, learn chanting and have tea as well as Zen discourses throughout. It will be a rare chance to deepen your practice and learn tea at the same time. And, if that wasn't enough, it is being held at a gorgeous venue in the mountains of rural Spain. This event will run from October the 8th to 14th. If you are interested in attending please check out the site: (www.casacuadrau.org)

Wu De will also be traveling in Germany and the Czech Republic after the retreat, sharing tea and teaching Cha Dao.

Center News

差 Before you visit, check out the Center's website (www.teasagehut.org) to read about the schedule, food, what you should bring, etc. We've had a big increase in our number of guests lately, so if possible, please contact us well in advance to arrange a visit.

We are looking for help with farming, photography, video and web design. If any of you have experience in these things and are interested in staying at the Center to learn Cha Dao, with free room and board, contact us!

The Center will be closed from April 24th to the end of May for the third annual Global Tea Hut Trip.

The new farm has been cleared and we are getting ready to plant our first crop. We will use organic seeds and also start our own compost system. We have already had the first official "Farming Friday." Help us pray for abundance, so that we can offer guests hand-grown nutrition.



www.globalteahut.org

The best tea magazine in the world! Sharing rare organic teas, a magazine full of tea history, lore, translations, processing techniques and heritage, as well as the spiritual aspects of Cha Dao. And through it all we make friends with fellow tea lovers from around the world.





