

# Would you like a cup of Japanese tea?



Japanese Tea goes well with healthy Japanese food and the Asian lifestyle. Here are a few easy tips for preparing Japanese tea and making it part of your life. Enjoy each day with a relaxing Japanese tea break.

- 1 How to boil the water ..... 3
- 2 Principles for preparing delicious Japanese tea .... 5
- 3 Tips for preparing delicious Japanese tea ..... 7
- 4 How to prepare Sencha ..... 9
- 5 Preservation method..... 13
- 6 Components of tea ..... 15
- 7 Health and tea ..... 17

**Special thanks:** Momijiyama Japanese Garden in Sumpu Park  
Takajo 2-23-9, Aoi-ku, Shizuoka City, Shizuoka, 420-0839, Japan

## 1 How to boil the water

**H**ot water is the key to preparing delicious Japanese tea. The hot water needs to be boiled for three to five minutes. Especially when you use tap water, you need to boil well to get rid of the smell of chlorine. It is also recommended to leave the water in the pot for four to five hours before use.

**I**t is important to use the hot water which is boiled well and cool to a temperature which is suitable for the preparation of Japanese tea. You should never use non-boiled lukewarm water nor add cold water to cool the hot water.

### Summary

- The hot water needs to be boiled.
- Use the hot water which is boiled well and cool to a temperature which is suitable for Japanese tea.



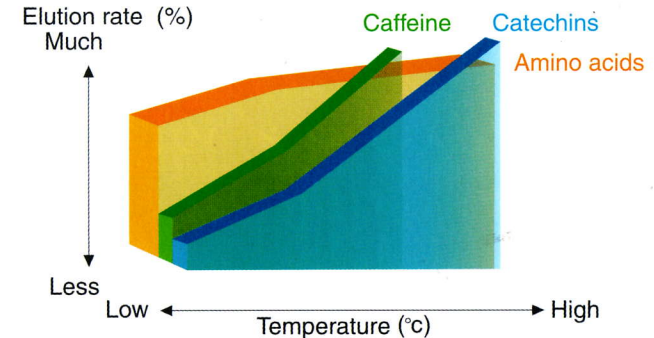
## 2 Principles for preparing delicious Japanese tea

“**U**mami” is important for Japanese tea. So the “umami” of Japanese tea needs to be fully extracted. **Amino acids**, which are the components of the “umami” of Japanese tea, are released regardless of the temperature of the hot water. On the other hand, **tannin** and **caffeine**, which are the components of the “astringency” and “bitterness” of Japanese tea, are released more and more as the water gets hotter (more than 80°C).

**B**ecause of the features of these components, you should use low temperature hot water for Japanese tea. The key is to extract amino acids for “umami” as much as possible and not to extract the components of “astringency” and “bitterness”.

## Hot water temperature and ingredient elution

(Image figure)



※Amino acids are eluted regardless of temperature.  
Catechins and caffeine are eluted more as water temperature goes up.

### Summary

- “Umami” is important for Japanese tea.
- The components of “umami” are released regardless of the temperature of the hot water.
- The components of “astringency” and “bitterness” are released more as the water gets hotter (more than 80°C).

### 3 Tips for preparing delicious Japanese tea

**R**emember these points below when you prepare Japanese tea.



- Understand the characteristics of tea.
- Use water which has been boiled once.
- Follow the measurements of tea leaves, hot water, the temperature of the hot water and brewing time depending on the number of people drinking tea.
- Make the strength of the tea even for each cup when pouring.
- Pour the tea to the last drop.



Now let's prepare delicious Japanese tea!

Next you will learn how to prepare "Sencha" which is the most popular tea in Japan.

## 4 How to prepare Sencha



Prepare Kyusu (teapot), Chawan (Japanese tea cups) and tea leaves for the number of people you want to serve.

### 【Utensils for Japanese tea】

- 1 Kyusu : The utensil to prepare medium-grade tea (teapot) (Sencha). Most of them have handles at a 90 degree angle to the spout of the pot.
  - 2 Chawan : The cups for drinking Japanese tea. They usually don't have handles.
  - 3 Chataku : The saucer to put chawan (cup) on. It is used (Saucer) to serve to guests.
- Yuzamashi : A special pot to cool hot water. A chawan (cup) can be used in its place.

### 1 Measure tea leaves



- About one heaped teaspoon of tea leaves (about 2g) per person.
- If it is for one person, it is better to use two heaped tablespoons of tea leaves (about 5g) to ensure a pronounced flavor.
- Put the tea leaves you measured into the Kyusu (teapot).

### 2 Prepare hot water



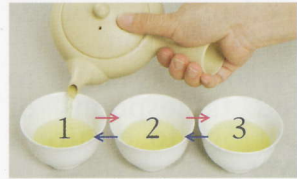
- Pour boiling water into chawan (cup) for the number of people you are serving.
- ※ This is for measuring the right amount of hot water, and also for cooling the hot water to the proper temperature.

### 3 Pour hot water into the Kyusu (teapot)



- Pour the hot water from the Chawan (cup) into the Kyusu (teapot) slowly.
- Put the lid on the Kyusu (teapot), and let it leach for one to one and half minutes.
- ※ Here, we are going to use chawan (cup) as yuzamashi.

#### 4 Pour tea into each chawan (cup)



- Pour the tea into chawan (cup), one each for the number of people you are serving.
- Pour a little amount of tea into each chawan (cup) several times to make the tea flavor equal.

• Pour the tea into the chawan in the following order : 1→2→3 first, then pour 3→2→1 next. Repeat it until the last drip of tea has been poured.

※ This routine is called “Mawashitsugi”, which is a tip for preparing delicious Japanese tea.

#### 5 About second use

- Unlike English tea, you can enjoy the same tea leaves for a second time and it will still taste good.
- Since the hot water has been soaked into tea leaves, pour the tea into the chawan (cup) about 30 seconds after adding the hot water to kyusu (teapot).

##### 【Difference between English tea】

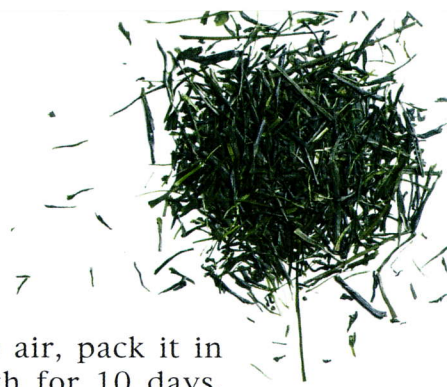
- Do not use boiling water for imperial tea. Use hot water which is cooled after boiling well.
- Do not weaken the flavor by adding hot water after pouring Japanese tea.
- You can enjoy the same tea leaves twice or three times.



## 5 Preservation method

**J**apanese tea is so sensitive that it is influenced by the air, humidity, temperature and lights. It tends to absorb the odor of other foods. So, when preserving Japanese tea, put it in a closed container and keep it in a cool damp space.

**I**t is best to keep tea in a refrigerator, but it will be influenced by temperature change when the door of the refrigerator is opened. So you will need to keep it where is less temperature change. Also, when it is taken out from the refrigerator, do not open the container right away. Open it after it becomes room temperature, since the temperature change makes the surface of the container sweat.



**T**ry not to expose tea to air, pack it in small quantities, enough for 10 days, and store it in separate containers. To store tea for a long time in the refrigerator, seal the container with Plastic tape and put it in a Plastic bag to prevent it absorbing the odor of other foods.

### Summary

- Put Japanese tea in a closed container and keep it in a cool damp space to preserve.
- Seal it well especially when storing for a long time.



## 6 Components of tea

Japanese tea contains various components.  
Below are some of them.

### Water-soluble components

Components	Content	Effect-efficacy
Catechine	10-18%	Antioxidation, antimutagen, anti-cancer, reduces blood cholesterol levels, decreases blood pressure and blood sugar levels, reduces platelet aggregation, cavity protection, anti-virus, improves intestinal flora, anti-allergy, odor elimination
Caffein	2-4%	Helps prevent central nervous system excitation, reduces sleepiness. Cardiac stimulation, diuretic effects, metabolic stimulation
Theanine	0.6-2%	Decreases blood pressure, adjusts cranial nerve functions
Vitamin C	0.15-0.25%	Antiscorbutic, antioxidation, anticancer, helps prevent colds, helps prevent cataracts, boosts immune functions
$\gamma$ -aminobutyric acid(GABA)	0.1~0.2% (By anaerobic treatment)	Decreases blood pressure, adjusts cranial nerve functions
Saponin	0.1%	Anti-asthma, antibacterial, decreases blood pressure



### Non-water-soluble components

Components	Content	Effect-efficacy
Fiber	Approx.30%	Helps prevent lifestyle-related diseases such as cancer and cardiac diseases
Protein	Approx.24%	Nutrition
Crude fat	3.4-4%	Nutrition
Chlorophyll	0.6-1%	Odor elimination
Vitamin E	0.02-0.07%	Helps prevent hemolysis, reduces lipoperoxidation, anticancer, helps prevent diabetes and cataracts, boosts immune functions
Beta-carotene	Approx.0.02%	Antioxidation, antimutagen, boosts immune functions

※Non-water-soluble components aren't released in hot water. They can be ingested by eating the tea leaves like powdered green tea.

※Content of the components might vary from the conditions of the production areas, climate and formulas.



## 7 Health and tea



### High in components which are good for colds!

Japanese tea contains various components effective against colds.

- Vitamin C : Improves immunity, helps you recover from fatigue
- Caffeine : Relieves headaches, improves circulation of blood and has a diuretic effect
- Catechin : High disinfection efficacy, weakens influenza viruses

Also, the “anti-histamine effect”, which Japanese tea has, controls bronchus contraction and relieves coughs.

### Allergic reaction halves!

According to a group of researchers in the University of Shizuoka, allergic reactions in a mouse can be halved by giving it about 120mg of Japanese tea per kilogram of its weight. This amount is equivalent to 10 cups of Japanese tea in humans.

This is because catechin which is contained in Japanese tea eases allergies. Although it is not recommended to drink large quantities of strong Japanese tea on an empty stomach since catechin can agitate the stomach. It is better to drink the right amount of Japanese tea everyday to ease the symptoms.

### Strong bactericidal effect!

One of the components of Japanese tea, catechin, exerts strong bactericidal effect. It controls the functions of multiple bacteria such as Vibrio cholera and staphylococcal. Even half to one tenth of the density of usual Japanese tea would kill all the bacteria within 24hours.

On the other hand, it helps the multiplication of intestinal bifidobacteria, good bacterium. Even if the density of the catechin is three times that of usual, it would not kill bifidobacteria.

### Controls carcinogenic rate!

There are 2 types of stages

- Making spores of cancer “Initiation”
- Growing cancer tissues “Promotion”

It is proven that Japanese tea reduces both incidence and proliferation of cancer when mice on each stage were fed bait contains Japanese tea.

It is found out that especially “epigallocatechin gallate”, a type of Catechin contained in Japanese tea, reduces the incidence of cancer dramatically. Effects of Japanese tea on cancer are still in the research phase, but there are great expectations for Japanese tea.

