

Pulse Quality Diagnosis

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In learning pulse diagnosis, before one can understand unhealthy or diseased pulses, obviously one must first learn what the foundational stomach pulse, organ pulses, and seasonal pulses feel like when they are healthy. However, it is difficult to learn what a peaceful and normal pulse feels like to the fingers since there are almost no chances to observe such ideal pulses.

One method of learning what a normal pulse should feel like is to observe the changes in the pulse that take place as the patient's symptoms improve. After observing, many treatments an image of a model pulse will gradually take form in your conscience.

Another method is to learn the classical definitions of a normal pulse and to then remember them with your fingers by having a practitioner with extensive clinical experience in pulse diagnosis point them out to you on actual patients. When learning meridian therapy one studies comparative pulse diagnosis in the beginning. Basic comparative pulse taking differentiates between deficiency and excess in the 6 positions.

Excess and deficiency are fundamental pulse qualities that are immediately used in determining the root treatment. Point selection is determined by gaining further understanding of the pathological changes in the patient's symptoms through reading the eight basic pulse qualities and using the finger-needle method.

There are said to be 30 or more pulse qualities. These can be used for even deeper, subtler observation of pathologies. These pulse qualities are mentioned below,

Eight Basic Pulse Qualities

1. Empty/Deficient
2. Full/Excess
3. Floating
4. Sinking
5. Slow
6. Fast
7. Slippery
8. Choppy/Hesitant

Other Pulse Qualities

9. Wiry

10. Tight

11. Hollow

12. Flooding

13. Hidden

14. Leathery

15. Minute

16. Thin

17. Soft/Soggy

18. Weak

19. Scattered

20. Moderate

21. Hasty

22. Knotted

23. Intermittent

24. Moving

25. Firm

26. Long

27. Short

28. Big

29. Small

30. Rapid

Just by initially touching the pulse there will be difficulty determining the quality. For example, a wiry pulse usually has a slippery quality in it. You first need to know the overall pulse quality before determining the specifics. An example of overall quality is excess or deficiency.

1. STOMACH KI

Pulse taking relates to the condition of the stomach ki. Stomach ki is understood as ki of the Earth influenced by the ki of Heaven. Stomach ki is the foundation of all the elements. Therefore, stomach ki governs the physical body and determines the future.

When one has a Stomach Ki pulse, you consider it as a normal pulse.

As we stated below there are three ways of evaluating Stomach Ki pulse, in any cases, if there is not enough Stomach Ki you judge that one has a weak vital energy and small power of natural healing. When a patient has a serious disease, you judge a prognosis good or bad by the level of Stomach Ki. When the pulse turns to the pulse that has Stomach Ki pulse after the treatment, you may consider that the treatment was successful.

There are three main points to understand about stomach ki.

1. The strength and quality of Stomach ki is ascertained mainly at the middle pulse.

The middle pulse is crucial, as it reflects the amount of life force (the combination of yin and yang). The term middle pulse refers to the middle level or depth between the superficial and deep levels where a clear and stable pulse can be felt equally in all three fingers at the same time. A healthy middle pulse should have a certain vitality, which is an indication of plentiful stomach ki and means that the prognosis is good. A weak middle pulse indicates an insufficiency of stomach ki, which in turn indicates that the patient has a weak vital energy and a low level of natural healing power. If the middle pulse cannot be detected at all, death may be near. When there is serious damage to the middle pulse/stomach ki the body cannot be renewed and death follows. People who attempt suicide have no middle pulse. Uniformly these patients do not have deficient pulses but the middle pulse is missing. The pulse feels as if it is sinking into moist mud. This probably occurs after a considerable amount of time has been spent in worry and anxiety.

2. **Stomach ki quality should feel moderate and peaceful.** It is soft and has a bounciness or springiness. The stomach ki quality as seen in the whole pulse is not too fast or too slow, and is neither floating or sinking excessively nor overly deficient or excess. Good Stomach ki quality feels very soft like newly budding leaves.

When the amount of Stomach ki decreases, the pulse becomes harder. For example, from childhood to old age, the pulse changes from yang to yin. Therefore, there is more definition as age progresses. If we tried to give an old man a newborn's pulse, we would make him sick or younger body.

However, when the pulse is very well defined and excess you may feel the patient is doing well, but this is sometimes a mistake.

In hard and strong pulses, it is not possible to detect the middle pulse. This pulse has lost its bouncy, peaceful nature. Most often, these pulses belong to people with chronic diseases and are difficult to treat. If you detect Stomach ki with middle pulse you may tell the patient, the prognosis is good, but if not, be cautious. Lack of a middle pulse is a death pulse. Terminal also with large quantities of drug patients will not regain the middle pulse. Most importantly, if there is no stomach ki pulse quality at any of the positions or in the overall pulse, it indicates that *jaki* (evil ki) has entered the corresponding area of the body.

3. Stomach ki can be judged as being abundant if the pulse has enough depth (thickness) in between the

superficial and deep levels.

First, find the pulse that lacks clear Stomach ki (middle pulse) and tonify the source ki. Ask yourself how much ki has been lost from the Stomach ki. If there is a great deal of Stomach ki, the prognosis is good. Ask which position is the worst or most deviant from normal. The same amount of Stomach ki may be found in all positions but it may also be different in any single position. For example, deficient Stomach ki in the Liver means the Liver is not well. If the condition of all the organ declines at the same rate, a person will die peacefully and comfortably, but if only one or two deteriorate, death is difficult. The acupuncturist's duty is to equalize ki in the meridians and organs.

Normal pulse of the five organs

According to the chapter Four of the Nan Jing the following pulse qualities should generally be seen in the zang-fu organs when they are healthy:

Lung shows a Floating-Hesitant-Short pulse,

Heart shows a Floating-Big-Scattering pulse,

Spleen shows a Moderate-Big pulse,

Liver shows a Wiry-Long or Sinking-Firm-Long pulse,

Kidney shows a Sinking-Soggy-Excess or Sinking-Soggy-Slippery pulse.

For example, the right First position/Distal should show a Floating-Hesitant-Short pulse, and left First position/Distal should show a Floating-Big-Scattering pulse.

However, you will naturally have questions as to how to distinguish between normal pulse qualities and diseased pulses in each of the positions. For example, if in the right distal position there is found a Floating-Hesitant-Short pulse has Stomach Ki quality, and then it should already be a different quality of pulse rather than a Floating-Hesitant-Short pulse. Therefore, some say that these pulses show up when there is a zang disease. We are going to use zang-fu organ pulses according to the most popular opinion.

The best for Heart and Lung pulse is a slightly Floating than Middle position, and for Liver and Kidney pulse is a slightly Sinking comparing to Distal. That is why we press a little harder on Middle than Distal position for pulse diagnosis.

Seven death pulse

In the classics, it is said there are seven-death pulse qualities associated with each organ.

All these pulse qualities have in common the lack of a middle pulse and no moderate, peaceful stomach ki quality. Mr. K has found all these pulses in his experience. Treating these patients is difficult. Mr. K recommends that you only treat those who will get better. Make referrals to other practitioners, or, if necessary treat them in an emergency and do not take money.

1. Sparrow pecking feed. When ki of the Liver weakens or disappears the patient will have this pulse.
2. Goldfish coming up for air. This is a frail pulse and Heart ki is gone.

3. Scattered & thread pulse. A thick thread when fibers separate and become frayed is a loss of Spleen ki.
4. Water dripping from a roof. The “waiting for another drip” pulse is tardy and the Stomach ki is gone.
5. Water boiling. Bubbles coming up from the bottom of a pan when the Lung ki is missing.
6. Dragonfly flying just above water. Just over the surface when Large Intestine ki is gone.
7. Striking the stone pulse. Feeling the pulse feels like poking a stone when the Kidney ki gone.

2. SEASONS AND TIME

Five seasonal Pulse

- (1) **(2/4—4/16)** A spring pulse is Soggy-weak and Long, and is called Fair-Wiry (*bigen*). Fair-Wiry means that it has Stomach Ki and soft wiry pulse. During the springtime the normal pulse should be like this. Spring is the time that Yang Ki is about rise by the power of Blood, but Yang Ki is not full yet, so it is called Soggy-Weak. But Yang Ki is hidden inside, so it is Long. We call this kind of pulse Wiry, too. Although it is not tough tight string like new bow, this is why they call Fair Wiry.
- (2) **(5/5—7/19)** The summer pulse becomes surge then slowly diminishes. We call it Flooding and Hook pulse. (Resembling the way a rooster walks, fast upward then slow downward) Of course, it is not a diseased Flooding pulse. You may think that because it is a soft Flooding pulse with Stomach Ki, it floats and touches your fingers well. During the summertime, if this pulse appears it is a normal pulse. Summer is the time Yang ki is prosperous. In the human body, it is better to have an abundant Yang Ki and perspire it with sweat. For that reason the pulse should be floating. That is why it is Flooding pulse.
- (3) **In the Doyo/midsummer**, it is said that the best pulse is Slow and Moderate. Moderate pulse means that Spleen and Stomach is working well and formation of Ki and Blood is active. Slow pulse means that summer Yang Ki is not trapped inside, so that there is not much Heat in the heart. When this pulse appears in each seasonal pulse, the pulse becomes soft and with good Stomach ki.
- (4) **(8/7—10/19)** The fall pulse is lightly Deficient and Floating and small consolidate pulse in the middle (in the process of going to yin in the winter so a little bit of hardness), so we call it Hair/Furry. It is Floating but when a pressure is applied, there is no strength. However it has Stomach Ki, it is not too soft. This is a normal pulse during the fall. In the body, Yin Ki becomes prosperous and Yang Ki hides inside. Although because of the leftover from the summer time, some Yang Ki is still on the surface. That is why it still shows Floating pulse, but Fall is the time everything becomes constricted, it feels like Furry pulse because Yin Ki becomes prosperous and Yang Ki is gather round into inside.
- (5) **(11/7—1/17)** The winter pulse is Sinking-Soggy-Slippery, then we call it Stone. Stone means sinking but not diseased pulse. It is soft Sinking pulse with Stomach ki. During winter, this is the normal pulse. Winter is the time that everything hides. In the body, too, Yin Ki becomes prosperous and Yang Ki hides inside. Sinking pulse means because Yin Ki is abundant. But because Yang Ki is trapped inside a lot, it becomes Slippery. Of course, it is not a diseased pulse. It is just Soggy and Slippery.

A healthy person would have a pulse stated above in each season. All of these pulses have Stomach ki because

they are healthy. On the other hand, you should treat a patient to make a pulse according to a season. Practically speaking there are very small people who have this ideal pulse.

In the clinical usage, we adopt this concept like the following: Someone who shows Sinking pulse in the summer, Flooding pulse in winter, Wiry pulse in the fall, and Floating pulse in the spring has very likely a slow recovery or a poor prognosis.

Next, find the position, which does not correspond to the current season. This season is the end of spring so if a patient is showing a winter pulse, that patient is ill. Determine if the overall pulse is out of season or just one position. If you find a winter pulse only in the Lung, it means yang ki which is prominent in the spring has not risen in the Lung. Find appropriate points to raise the yang ki in the blood or tonify the yang aspect of Metal in the Large Intestine. By doing so, yang ki will gather in Metal.

During the period of Doyo, the influence of the Earth element increases so the pulse is moderate and softer. If you have a very smooth pulse, full of luster, there is adequate Spleen and Stomach energy. When changing from Water to Wood and Fire to Metal, the largest changes take place (when extreme yin changes to yang and extreme yang changes to yin). You will have more patients than usual during Doyo seasons, especially between winter and spring.

Between spring and summer, Patients who have a remnant of winter, still have not taken the spring ki, and really cannot take in the summer ki. Fatigue will be a symptom because the patient will not be able to follow the increased pace.

There are several influences upon the pulses.

There is a relationship of sun and earth and these have an influence on the body. People adjust to their climates. Japanese people have lived on their islands for 2 thousand years but have created their own homeostasis by adapting their food. There may be differences among people but they are essentially all the same. By knowing the charts, you will have a grasp of what is normal for seasons and daily or hourly changes. You will then be able to treat appropriately.

Six stage

The annual shifts influence the pulses as follows: (Nan Jing Chapter 7)

Jan. 14-3/5	Shao Yang	big, short, long, small
March 5	Yang Ming	floating, big, short
May 4	Tai Yang	Flooding, big, long'
July 3	Tai Yin	Tight, big, long
Sept. 1	Shao Yin	tight, minute, thin
Oct. 3	Jue Yin	sinking, short

12 monthly pulse

Chinese Clock: Dates and Times (dates shift from year to year) :(Somon Yinyoubeturon)

Jan. 5-2/4	2 AM	Liver
Feb. 4	4 AM	Lung
Mar. 5	6 AM	Large Intestine
Apr. 5	8 AM	Stomach
May 5	10 AM	Spleen
Jun. 8	12 NOON	Heart
Jul. 7	2 PM	Small Intestine
Aug. 7	4 PM	Bladder
Sep. 8	6 PM	Kidney
Oct. 8	8 PM	Pericardium
Nov. 8	10 PM	Triple Warmer
Dec. 7	12 MN	Gall Bladder

There is the daily change in which the pulse gradually becomes floating and larger as the time approaches noon. Toward evening, the pulse becomes stony and slippery. During the night, it seems the pulse should be sinking but between 8PM and 11PM, the pulse is floating and between 11PM to 3AM, the pulse is wiry. The Triple Warmer and Pericardium are supposed to be meridians of the late fall and winter but their pulse qualities are at variance to these seasons. Triple Warmer time is when the yang ki comes out and becomes different. It is a kind of flooding which is different from the Heart's flooding.

Mr. K recommends that you draw these charts for your clinic. They seem to present contradictions for what the proper pulse should be for a given time and date but, in reality, there are no contradiction, rather an inability to explain the differences. For example, in this season, pulses should have the qualities of Spring (wiry), yang ming (floating, big, short), and showing a Stomach quality consistent with the season of Doyo. If you find a sinking pulse, you realize that a sinking pulse is none of these qualities. A sinking pulse does not have enough yang and cannot rise. This would be a problem of evil ki in the Liver or Kidney. The order of depth, indicating depth of evil ki, is:

Lung (*skin*)
Heart (*Blood vessel*)
Spleen (*Flesh*)
Liver (*Muscle/Tendon*)
Kidney (*bone*)

The sinking pulse cannot acquire the quality of yang for the yang ming season, so using LR-1 (Wood)

would bring up the power of Wood itself and LR-3 (Source) would also bring up the basic power of the element. LR-3 is also the Earth point and is indicated for manufacturing blood. The wiry pulse is coming from blood so tonify LR-3 to tonify blood. You would also tonify ST-36, another source of Yuan Ki. [The Triple Warmer Yuan Source point of Kidney is the strongest point of ki.]

In the controlling cycle theory, Wood is supposed to control Earth but during the night ki goes inward so the Earth nourishes Wood. Spleen has to nourish Liver where blood is manufactured. In this case, Liver and Spleen both have to be tonified. For some patients, simply tuning the Earth element by tonifying ST-36 is all that is needed. In others, it may be necessary to tonify SP-3 and SP-6 along with Mu and Shu points.

What if there is a flooding pulse in this season? A floating pulse is appropriate for this season but a flooding pulse means the pulse is exaggerated. The body is being hasty, taking in too much yang ki as if it were summer. This condition can occur because the yin is weak and the yang becomes excess as the yang ki increases and the body becomes more open. The patient will become easily fatigued. Tonify the yin. In this case, you would use LR-8 instead of LR-3 and use LR-3 instead of LR-1. (Why?)

Because you are working with Meridian Therapy, you work with the mother element of Liver, which is Water. By increasing Water, you increase yin and body fluids. If the pulse is flooding in this season, KD-3 or KD-10 is used. (If the pulse were sinking you would use KD-3 and KD-1.)

A fast pulse means heat stagnation of the body, so if the pulse is flooding and fast you must tonify yin and disperse heat. LR-4 (Metal) should be tonified. Metal functions to quicken the ki in the body. As a result yang ki circulates faster, heat is dispersed, and the pulse will become slower. Inflammation of the muscles such as lumbago of the lower back may also be released by using LR-4. If the Wood is deficient, probably Earth or Metal is excess. If the pulse is fast, it must also follow that there is excess in Earth or Metal. Reducing Earth or Metal will allow the pulse to slow. Tonify LU-10, 8 or 6 to reduce heat, or use *mild* dispersion or waho on LU-8 and 6 (dispersing could allow the ki to go inward and become stagnate.) KD-7 with LR-4 and LU-10 and 6 reduce heat stagnation. Liver and Kidney points are used as a set because there is a primary sho of Liver blood pattern.

A thin pulse is usually tight. A tight pulse indicates insufficiency of yang ki, which also means insufficiency of blood. The patient needs to have more yang ki of blood. Compared to sinking, thin and tight is better in this season even though it means blood deficiency. The main points are LR-3, KD-3, ST-36 and LI-11 (thread moxa may be used on the last two points). In addition, LR-8 and KD-10 may be used because of deficient yin. Lung and Large Intestine are deficient on this pulse (yin and yang deficiency). Also, tonify Bladder and Spleen. To increase the Bladder pulse use moxa on SP-6 and BL-17, 21 and 28. The thin pulse will become bigger and will become closer to wiry which is long and big. (Minute is a thin pulse, which has deteriorated.)

When the pulse is too wiry in this season, an OPI (usually evil wind) has invaded the body. If the pulse is wiry and floating in this season the OPI has invaded the yang meridian. Tonify yin and disperse the yang. However, if the pulse is wiry and sinking, the OPI has invaded the yin meridian. If the Liver is excess, according to the controlling cycle Metal and Earth should be deficient. Always tonify the deficiency first. First tonify the controlling cycle (Metal or Earth) then disperse the Liver. Which point to tonify depends on the particular pathology. If the Liver is excess caused by blood stasis, use LR-8. If Liver is excess caused by other reasons use LR-3. A healthy Liver pulse is wiry, slightly slippery and long. If Liver and yin are deficient, the overall pulse will be floating and the Liver and Kidney will be weak. But if the pulse is wiry and is slightly slippery and sinking, you have yin excess due to invasion of OPI. The stronger the OPI, the stronger the pulse.

If the pulse is weak, the cause is not an OPI but overexertion or overwork. The Liver pulse will be wiry, sinking and weak and Spleen will be excess. This type does not easily disappear and will be hesitant on the right side. If the patient has heat the pulse will be bigger and faster and hastier, especially on the middle pulse and Liver and Kidney will feel strong, big and floating.

If the Lung and Heart become sinking and wiry or hesitant and excess and acquire a slippery quality, Lung is excess, meaning Liver is deficient and Lung is excess. For the flooding and fast pulse, use LR-4 and KD-7. Look at the controlling cycle of Earth and Metal. Usually the Lung is excess or the Heart is excess. When you have this combination, Wood is floating but Metal is sinking. The Lung pulse should be floating but if influenced by the Liver pulse it becomes sinking. This is not a sinking quality which is natural to the Liver or Kidney, but has become more wiry, hesitant and sinking, the opposite of the natural state. Tonify LU-10 and use waho on LU-8 and 6. The sinking quality will disappear, the Lung qualities will return, and Liver and Kidney will sink again.

3. PATHOLOGY

If you are unable to restore the pulse something is not correct, either the point selection, pulse taking skill or the needling technique. Other techniques involve diagnostic techniques of looking, asking, meridian palpation, etc. Confirm the pulse with the other diagnostic techniques and connect the pulse condition and pathology in your head.

As an OPI invades from surface to deeper, the pulse changes. With an OPI invasion, the pulses change to excess. If there is also a lack of Stomach ki, the condition is serious. The condition of wind cold, which has reached the yang ming stage, will have a pulse, which is not as floating as the tai yang stage. There will be no tightness and it will seem more ambiguous than the tai yang stage. The OPI at the shao yin stage will have a thin and sinking pulse that is not tight.

· tai yang floating, fast, tight

- yang ming ambiguous
- shao yin thin and sinking

4. **UNSTABLE PULSE CONDITION**

The pulse position, which changes qualities as you feel the pulse, is the meridian, which is affected by the pathological factor.

5. **PULSE ASSOCIATED WITH AN INDIVIDUAL**

We may think that there is almost no ideal normal pulse. It is more important to know our patient's daily normal pulse sooner. For an instance, if someone is very comfortable with Liver Deficient pulse in his every day life, he may be with Kidney Deficiency, but feels sick with Lung Deficiency or Spleen Deficiency. Therefore, the purpose of the treatment is to correct to Liver Deficiency status. Inoue Keiri said in his Classic of Difficulties seminar, that we can make an ideal pulse, but there is no case that people feel better, on the contrary, people feel worse.

There is particular pulse qualities associated with individuals relating to age, sex, etc. Adults and children are different. Children's pulses are a little floating, softer, not as spread out as a flooding pulse and naturally faster. The elderly have pulses, which are harder, sinking and slower. Hardness among the elderly can be interpreted as stomach ki, which has diminished. There are differences between men and women. Men naturally have more yang pulses. A yang pulse is more floating, excess, fast and slippery. People who work outdoors have more yang pulses than people who work indoors. More physically active people have more yang pulses. Slender people have more yang pulses than overweight people. A pregnant woman's pulse is faster, slightly slippery and more excess than normal.

Fat person and skinny person's pulse

A fat person's pulse tends to be Sinking and hard to feel and a thin person's pulse tends to be Floating and easy to feel it. So we should take it granted. A fat person's entire pulse tends to be sinking. This Sinking pulse indicates the constitution of fat people. In fact, there is Water toxin or Blood stagnation. Therefore, when we treat these people with chronic disease or malfunction of the body, we may consider as Sinking pulse and decide the Pattern "Sho ". When it is an acute case, a pulse looks Sinking but it could be more Floating pulse for that person. So we should take it as a consideration.

There are skinny people and pulse tends to be floating more among men who does physical labor or exercise. This is also a clue as a constitution. Originally this type of person has a tendency to be Blood deficiency. Therefore, when we treat these people with chronic disease or malfunction of the body, we may use this Floating pulse in order to decide a Pattern (*SHO*). However, when it is an acute case and showing Cold, its pulse could be Floating. In this case, we should be careful not to misdiagnose as Yang Excess Pattern, and pay attention to Deficiency-Excess of the pulse.

6. VARYING QUALITIES IN ONE POSITION

Different levels of a pulse position will present different qualities. The depths vary from skin to bone. If the pathology is found in the deep levels, the patient will not heal with only one treatment. You have to know how to find the middle pulse. Find the depth where the pulse is equally strong. If there is no middle pulse, the patient may die. A pulse may have little yang or yin width and they may be difficult to distinguish.

The shape and quality of pulse and pathology / insertion technique

When we discuss about the shape and quality (pulse quality), we followed after the categorization of “Pulse Classic”. Regarding to those pulses; Prison pulse, Long pulse, Short pulse, Big pulse, Small pulse, and Hurried pulse, that appeared later period, we used “Gatherings from Eminent Acupuncturists (*Jiu Ju Zhen Ying*)” and “*Zoho myakuron koketsu*” as a reference.

First we explained about what “Pulse Classic” said about the shape and quality. Then we commented on pathology with consulting other books. Last we refereed the insertion techniques that Sodo Okabe once wrote for “*Tohoigakushi*”.

1. Empty/Deficient Pulse

Quality = It is Slow, Big and Soft. a pulse that disappears under the fingers with a heavy pressure.

Pathology = We want you to pay attention to a descriptions of Deficient pulse in “Pulse Classic”. This is not just weak pulse, nor Deficient pulse in Six basic pulses. It is very specific. This pulse appears when Blood or Body Fluids are deficient due to exhaustion. Or in the old book says that it happens when Summer Heat injures Meridians. Descriptions of symptoms are easy to get frightened and uneasy. From this fact, we can say that Deficient pulse appears mainly due to deficiency of Body Fluids, and its root is Kidney Deficiency.

Insertion = Tonification of Body Fluids that is to tonify Water point in Yin Meridian and Earth point in Yang Meridian.

2. Full/Excess Pulse

Quality = a pulse that is felt widely connected above and below, and felt a little strong. When you press this pulse, it feels like pulse gathering under the fingers and knotting. Excess pulse is not necessarily strong as to push the fingers back. When it does not disappear with a heavy pressure touch but it gets more knotted and hard, we take as Excess pulse.

Pathology = When Heat occurs due to external pathogen, and when it stagnates in Yang Meridian or Fu organs, it becomes Excess. When Blood Stasis stagnates, it becomes Excess. When it was affected by the Heat that happens from various Heat pattern, it becomes Excess.

Insertion = For Yang Meridian Heat, it should be quick insertion quick withdrawing, and for Yin Meridian Heat, apply deep insertion.

3. Floating Pulse

Quality = a pulse that is felt well with a light pressure touch and disappears with a heavy pressure touch.

Pathology = If it is floating and with strength, it is due to external evil. When Qi gathers on the surface (Yang Meridians) it becomes Floating. The reason that Yang qi gathers on the exterior surface is due to the

fever by those external evils like Cold Evil and Wind . If it is Floating and with no strength, it is due to Yin deficiency. When Blood and Body Fluids is scarce because of exhaustion, Deficient Heat occurs. Because of that heat, the pulse becomes Floating. It appears in case of Liver Deficient Heat pattern. When San Jiao Original Qi is almost gone, it becomes Floating pulse and this case the pulse is significantly deficient. When both Distal pulses are Floating, it is either Yang Excess or Yang Deficiency. If both sides of Proximal and Middle pulses are Floating, Yin (Blood or Body Fluids) of that position is deficient. During the fall, if the pulse shows Floating that is inclined to neither Deficient-Excess nor Slow-Rapid, it is a healthy pulse.

Insertion = If it's Floating-Rapid with strength, a dispersion technique with needle quickly in and out should be applied. If it's Floating-Rapid without strength, a tonification with shallow insertion technique should be applied. If it's only Floating and no strength, retain the needle and tonify.

4. Sinking Pulse

Quality = a pulse that is not felt with a light pressure touch and felt very clear with a heavy pressure touch.

Pathology = If the pulse is Sinking and with strength, there is a Blood Stagnation (Liver Excess). This tends to appear on the left Middle pulse. If Sinking with strength pulse shows in the other positions, There are Heat in that corresponding organs. If the pulse is Sinking without strength, there is Water Toxin such as Phlegm, or Cold-Cool (Cold pattern). This pulse tends to appear in each organ's Cold pattern. During the winter, if the pulse shows Sinking that is inclined to neither Deficient-Excess nor Slow-Rapid, it is a healthy pulse.

Insertion = If it's Sinking with strength, Yang should be tonified and Yin should be dispersed. If it's Sinking without strength, retain the needle or use warm needle technique in the lower abdomen area.

5. Slow Pulse

Quality = a very slow pulse that pulsates three times or less in one breath.

Pathology = If it is Slow and with strength, There is a chronic Cold or pain due to Dampness. If it is Slow without strength, either Blood or Body Fluids is deficient and cold. It appears when it is Kidney Deficiency Cold pattern.

Insertion = Tonification for a longer time should be applied. If there is strength, find a strong position and disperse there a little.

6. Rapid /Fast Pulse

Quality = a pulse that pulsates 6 or 7 times in one breath. We judge the Slow-Rapid quality as pulsing according to a patient's own breath. If a practitioner is breathing correctly, we can use it.

Pathology = The pulse becomes Rapid with strength when there is an acute Heat disease, when there is an internal Heat due to Liver Excess Heat, and when there is Heat in Yang Meridians or Fu organs. When Body

Fluids is Deficient and a lot of Deficient Heat exists, when Yang Qi becomes less due to mistreatment, and when a patient has a boil, the pulse becomes Rapid without strength.

Insertion = If it's Rapid with strength, disperse a position that has Excess. If it's Rapid without strength, it should be only a tonification.

7. Slippery Pulse

Quality = Slippery pulse is slippery and rolling. It is like Rapid pulse. It was named after the shape and it does incline to neither Floating-Sinking, Slow-Rapid, nor Deficient-Excess. It tends to appear together with Rapid pulse or Excess pulse.

Pathology = It shows up when Yang Qi is trapped and becomes Internal Heat due to Phlegm and Food Stagnation, and Heat influenced to Blood. Or it shows up to those people who have a lot of Blood as a constitution. Now these days, we see a lot among those people with high blood pressure. If a patient's blood pressure is not high, we think that Heat is trapped somewhere else.

Insertion = Tonify Yin first then disperse a position with Heat for a little longer.

8. Choppy/Hesitant Pulse

Quality = a pulse that is Thin and Slow. Pulsing is not smooth. Pulsing feels like tripping. It also has a feeling of Scattering, and sometimes irregular pulsing. This pulse is an opposite of Slippery pulse. This also named after its shape.

Pathology = It shows up when Qi is deficient and stagnated, or when Qi started to get deficient, so Blood does not flow and started to form *oketsu* (Blood Stagnation). If the right Distal is Hesitant, then it is Qi deficiency, and if the left Middle is Hesitant, then it is Liver Excess.

Insertion = We should tonify Qi and disperse if there is Blood stagnation.

9. Wiry Pulse

Quality = a pulse that is not felt with a light pressure touch and is felt like bowstring with a heavy pressure touch. Wiry pulse said to belong to Seven Superficial pulses, because it means it has something to do with Heat. It should be felt even with a heavy pressure touch considering from the pulse shape.

Pathology = This pulse appears because there is some Heat in somewhere. When Blood in muscle is depleted (Liver Deficiency), and becomes muscle pain or arthritis pain, the pulse becomes Wiry. Speaking of internal disease, it shows up when there is Spleen Deficiency and Liver Excess Heat. If there is Wiry without strength pulse in somewhere in Six-positions, we should consider that Blood of that meridian is deficient and Deficient Heat has occurred. If it is Wiry with strength, then it must be Heat stagnating in Zangfu organs of that position.

Insertion = We should Tonify Yin and disperse if it's necessary.

10. Tight Pulse

Quality = a pulse that is like as if one is touching tightly tied rope. It is tense. The sensation that fingers feel is rough, so it is called as if one is touching a rope.

Pathology = It is a pulse that shows up when there is an acute Cold-Coolness, pain, or boils and swellings. If it is an internal disease with pain, and showing Tight pulse, we should be very cautious. If Tight pulse appears in any of Six-position, we think that Stomach Qi of Zangfu organ of that position is scarce.

Insertion = We tonify both Yin and Yang to supplement Yang Qi for taking off Tight pulse. Or we can tonify Spleen and Stomach to supplement Stomach Qi. Even with these treatment does not take Tight pulse off, disperse Excess if there is any.

11. Hollow Pulse

Quality = This pulse is felt Floating, large and soft. It is felt Hollow in the center and can be felt outside with a heavy pressure touch. They say it is as if one pressing green onion.

Pathology = It is Floating pulse and one of deficient pulse. It does not have a core in the center and there is no strength as a whole. This happens with bleeding like bloody stool or bloody urine. Or blood gets deficient because of other reason, and Hollow pulse shows up in any of Six-position, we think that Blood in that position is depleted.

Insertion = We tonify greatly, but mainly we tonify Yin Qi.

12. Flooding Pulse

Quality = a pulse that is felt quite large and thick with a light pressure touch. It is Floating pulse and a part of Excess pulse. During summer if the pulse appears to be not too strong Flooding pulse, it is healthy. Later days, it is also called Big pulse.

Pathology = This is a pulse that appears when Yang Meridian has more Heat, or when the disease is strong. Of course it is Heat Pattern and Excess pattern. The cause is either from external pathogen or from Yin Deficiency.

Insertion = Disperse the position where Heat exists. Once in a while we use bloodletting.

13. Hidden Pulse

Quality = a pulse that is felt with quite a heavy pressure almost until you feel the bone. It belongs to Sinking pulse.

Pathology = This pulse appears when Qi and Blood become extremely deficient due to over-thinking, when a patient has chronic Cold pattern (possibly Dampness, too), or when a patient has a nodule (Accumulative stagnation “*sekiju*”) like Oketsu in Yin Meridian or Zang organs.

Insertion = Tonify with a deep insertion. Retaining needle is the best.

14. Leather Pulse

- Quality = This pulse can not be felt unless you apply a heavy pressure like Sinking or Hidden pulse. At the position where you applied a heavy pressure, the pulse is Excess, Big, and Long which is oversized from each Distal, Middle, and Proximal position. And also it is a slightly Wiry pulse. It belongs to Sinking and Excess. However this is not a real Excess. It feels just hard because Body Fluids became deficient and dried out Applying a further pressure, you will find it deficient in the bottom.
- Pathology = This is a pulse that appears when Body Fluids becomes insufficient and more Heat is inside, or when Qi and Blood stagnate due to Qi Binding. When there is Kidney Deficiency Heat pattern, the left Middle sometimes shows Leather pulse.
- Insertion = Tonify Yin Meridians.

15. Minute Pulse

- Quality = It is extremely thin and soft. It can be felt or sometimes not. It is just like a web, and it disappears with a pressure.
- Pathology = This is one of a Deficient pulse. It appears when Qi and Blood is extremely deficient, or Qi and Blood is not produced in the Middle Jiao. Either way it should be treated as Cold pattern.
- Insertion = Tonify both Yin and Yang quite a long time with thinner needles and less points.

16. Thin Pulse

- Quality = It is a little bigger than Minute pulse and thin. It is not like Minute pulse that can be felt or sometimes not.
- Pathology = This pulse appears when Qi and Blood both are deficient, and the Stomach Qi becomes scarce. It belongs to Deficient pulse and it appears to each Cold pattern.
- Insertion = Tonify both Yin and Yang lightly and slowly.

17. Soft/Soggy Pulse

- Quality = This pulse is floating and thin. It belongs to Floating and Deficient pulse. Some book says that Soft as Soggy, but it means the same.
- Pathology = It appears when Yang Qi of Lower Jiao becomes deficient and both Yin and Yang becomes deficient. Especially it appears when there is Kidney Deficiency Cold pattern.
- Insertion = Tonify both Yin and Yang of Kidney Meridian. Tonify lightly and long.

18. Weak Pulse

- Quality = It is extremely soft, Sinking and Thin. It feels like it is going to disappear with a heavy pressure. It belongs to Sinking and Deficient pulse.
- Pathology = It appears when both Qi and Blood become deficient. Especially when Blood becomes Deficient and Yang Qi disappears. It often shows when there is Liver Deficiency Cold pattern.

Insertion = Tonify both Yin and Yang. It is better to use just a touch method.

19. Scattered Pulse

Quality = It is a pulse scattering and has no unity. With a light pressure touch you can feel pulsing but can't recognize a shape of an artery. Of course with a heavy pressure touch you can't feel a pulse.

Pathology = It is a condition that Qi is gathering to the surface because Blood is becoming deficient. Moreover Qi is also about to disappear. If this pulse is going to be continued, a prognosis is bad. It is a Kidney Deficiency and also Yang Qi of Three Jiao is deficient.

Insertion = Tonify Kidney firmly and tonify Yang Qi of Three Jiao.

20. Moderate Pulse

Quality = It is slow and calm Pulse but a little faster than Slow pulse.

Pathology = The sick Moderate pulse appears when both Qi and Blood are deficient and the circulation is sluggish, or when Yang Qi is deficient. If a person is healthy and has a Moderate pulse, it is said to have a Full Stomach Qi.

Insertion = Tonify both Pericardium and Spleen Meridian to activate Stomach Qi.

21. Hasty Pulse

Quality = Pulsing is rapid and some times it stops. It is an irregular pulse.

Pathology = It appears when Blood become insufficient and pulse becomes Rapid because Qi wants to circulate fast and make Blood normal. But there are not enough Blood so sometimes it becomes irregular. It tends to appear when there is a Kidney Deficiency Heat or Liver Deficiency Heat, and became Heart Heat or Lung Heat.

Insertion = Tonify Kidney Fire point and Liver Metal point, and both Lung and Heart Meridians' Fire points.

22. Knotted Pulse

Quality = It is a slow pulsing and sometimes becomes irregular..

Pathology = It appears when both Accumulation or Binding are present and Yin Qi becomes prosperous, then the circulation of Qi and Blood becomes poor. It tends to appear when there is Spleen Deficiency-Liver Excess or Lung Deficiency-Liver Excess.

Insertion = Tonify both Yin and Yang first, and then disperse Excess portion.

23. Intermittent Pulse

Quality = Pulsing stops without coordination to the rhythm of the pulse, and it starts all over the sudden. It is a quite irregular pulse.

Pathology = It appears when Qi, Blood and Body Fluids of the Zang organs are deficient, and at the same time Source Qi of San Jiao is about diminish.

Insertion = This is a one of death pulses, so basically no treatment should be applied.

24. Moving Pulse

Quality = It is a pulse shaped like a round thing rolling only on Middle position.

Pathology = It appears when a person becomes Blood Deficiency due to either Exhaustion, Bloody stool, or female irregular bleeding

Insertion = Treat as a Kidney Deficiency and Heat Pattern.

25. Prison Pulse

Quality = Pulse is solid and has strength with a heavy pressure touch.

Pathology = According to “Gatherings from Eminent Acupuncturists “ , It says “ It is Interior Excess and Exterior Deficient. Qi in the chest becomes hasty. Taxation becomes extreme. Most of the time a person does not have Stomach Qi, therefore we say extremely dangerous pulse. And there are sharp pains between bones. And Qi goes out and stay in Exterior.”

Insertion = Treat as Liver Deficiency or Kidney Deficiency Cold Pattern, and most of the time Yin and Yang are tonified. Addition - In the later time Leather Pulse said to be a Prison Pulse. There may be confusion about this. Here we posted a line from “Gatherings from Eminent Acupuncturists “. In “Gatherings from Eminent Acupuncturists” the Leather pulse is “Sinking, Hidden, Excess, and Big, so it feels like as if touching a drum.” On the other hand in “Senkin *yokuhou*” it says that the variation of Leather pulse is Prison pulse.

26. Long Pulse

Quality = Usually each pulse position has its own length for the individual person, and normal pulse should be felt in each Distal, Middle and Proximal position. Long pulse is overly spread to neighbor positions. In “Gatherings from Eminent Acupuncturists” it says “It is under the finger and over passed.”

Pathology = Qi and Blood are abundant, Heat is stagnated inside, and San Jiao is heated, and a patient has feeling of fever all over the body.

Insertion = Most of the case it is a Spleen Deficiency and Stomach Excess Heat, so disperse San Jiao Meridian.

27. Short Pulse

Quality = It is an opposite pulse of Long pulse. Its length in each position is insufficient. For example, it pulsate small in Middle position and feels like apart from Proximal or Distal pulse. So it is said that it is not in the heads but sits in the middle.

Pathology = It appears when Qi is Deficient. And also it appears when Blood becomes stagnant due to Qi Deficiency and more Heat shows in the Yin Meridian. But the appearance of the symptoms is mainly Qi deficiency. It also appears when the food a patient ate is not digested.

Insertion = It shows up when there is Spleen Deficiency or Lung deficiency. Lightly tonify.

28. Big Pulse

- Quality = It is Floating and Flood by a light pressure touch, and Big with no strength by heavy pressure touch. So this is a kind of a Flood Pulse, but the difference is when you apply a heavy pressure touch, there is no strength.
- Pathology = It appears when Blood and Body Fluids is deficient and becomes Yin deficient, so Qi is gathering more in Yang.
- Insertion = It is a Yin Deficient Pattern, therefore tonify Yin Meridian well. There is little case to disperse Yang Meridian.

29. Small Pulse

- Quality = It is a pulse felt small by either a light pressure or a heavy pressure.
- Pathology = It appears when both Qi and Blood are deficient.
- Insertion = Tonify both Yin and Yang.

30. Hurried/Rapid Pulse

- Quality = It is a pulse faster than Rapid Pulse.
- Pathology = It appears when there is more Heat. If it is Hurried pulse with mainly Yang Meridian Heat, it will be treatable. If it is Zang organ Heat with Hurried pulse, it is hard to treat.
- Insertion = Tonify Yin Meridian and disperse Yang Meridian. If it is a Zang organ Heat, consider taking out the Heat by tonifying Yin Meridian.