Working with the Pulsed Technologies' Harmonic Frequency Calculator

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http://www.pulsedtech.ro/rx/freqcalc/

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PULSED TECHNOLOGIES

Note: This is an evolving research project and it will be updated as time permits.

The role of this harmonic frequency calculator is to generate more efficient useable frequencies starting with utilizing readily available fundamental frequencies from existing public and private lists. These list have typically been quite limited to much lower frequencies, representing the limitations and capabilities of then current equipment, but do not necessarily reflect today's state-of-the-art capabilities.

This harmonic frequency calculator was devised as a tool to assist the researcher in calculating and selecting these more efficient harmonics so that these higher frequencies may be utilized as the fundamental frequency. At the same time, the calculator consolidates seemingly dissimilar numbers collected over time from available lists while also indicating the relationships of these numbers, allowing for a single number to more efficiently replace 2, 3, 4, or more separate and less efficient numbers which in actuality were probably each less efficient sub-harmonics of the "real" MOR or target frequency.

A harmonic is a parasitic frequency multiple that is being generated both above and below the fundamental frequency. The term "harmonic" is a frequency multiple above, while a "sub-harmonic" is typically a frequency multiple resonant frequency below the fundamental frequency being generated. For the purposes of this discussion, we will primarily be referencing those frequencies above the generated frequency.

Different waveforms allow their power to be more or less distributed into these harmonics with square waves having the most harmonics, and sine waves having the absolute minimum.

When a frequency is generated using the square wave, it will generate, almost, an infinite number of harmonics, at least theoretically, but the amplitude (power) in each harmonic decreases with each subsequent harmonic. It is therefore MUCH more efficient and advantageous to use a frequency much closer to the actual target than to rely on greatly reduced amplitude of say the 25th, 51st, or 75th harmonic to affect the target.

For example, let's examine a sample base (fundamental) frequency of 1000 Hz. (as in the example diagrams). The harmonics that will be generated will be many, however, our intent is to utilize a frequency "at" or "closer to" the actual mortal oscillatory rate, (MOR), which is the exact frequency at which the energy transfer most efficiently takes place with the intended target: 3000, 5000, 7000, 9000,
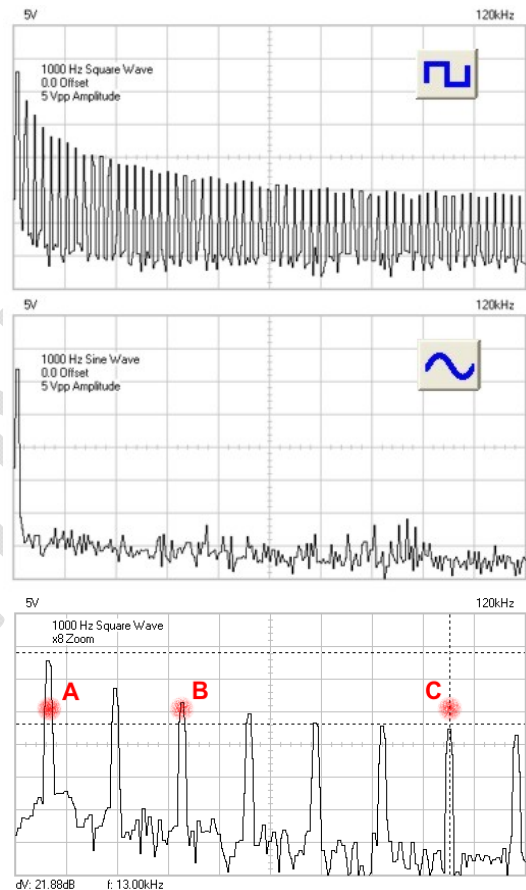
11000, 13000, 15000, 17000, 19000 etc… basically odd multiples above the base frequency (3x, 5x, 7x, 11x etc.).

Obviously, there will be lots of harmonics and you want to know which one to utilize. Frankly, almost ANY of the higher harmonics will likely work better than the original "low" frequency you began with.

At this moment, the program does NOT suggest "optimum" frequencies for a single frequency. However, we are currently working on a proprietary algorithm that does so.

If you attempt calculating harmonics for just ONE frequency, you will get 0 suggested frequencies.

The calculator undoubtedly works best for frequencies groups or lists rather than individual frequencies. What it basically does is calculate ALL odd harmonics within the predetermined range for each of the numbers provided. The process then does a relational analysis and extract like of similar frequencies based of the selected criteria maintaining the source relational data.

Typically, you will obtain your base source frequencies from the CAFL database, freely available on the internet or other published such as Dr. Nenah Sylver's *Handbook of Rife Frequency Healing*.

Fine Tuning

It is very important to fine tune the application by changing the default values: quantification, start X value, end X value and maximum harmonic. (A bit of experimentation by the user will reveal a technique most suitable for his or her particular area of interest or applications.)

Quantification is the maximum distance/difference, (in frequency/Hz), between two or more frequencies. The default value for this option is set to 2. You can change this to a lower value (minimum 0) or a higher value (you can have values as high as 1000, not really recommended, but may turn useful). This will drastically alter the quantity and significance of the final output of *suggested* frequencies.

When this value is set to **0**, it will pick out only those harmonics of fundamental frequencies that match exactly.

Example 1 – Example of matching numbers: We have 2 base frequencies 1550 and 2170; they both have a harmonic that match, which is 54250 Hz… they have other matching harmonics like 10850, 32550, 75950, 97650 etc. Those are matching harmonics and it is better to be used over those 2 initial numbers (base frequencies). We consider that those 2 base frequencies are good and validated, and obviously, they both work but in reality they are one and the same frequency because of the harmonics (and sub-harmonics) they generate. Now, those numbers will appear in the suggested frequencies list. It is up to you what numbers you want to try. Remember, you are a researcher too! (As a general rule, we target harmonics around 50-85,000 Hz when working with our P3 Plasma device although even higher numbers are easily capable when working with the PFG, contact application, alone.)

Example 2 – Example of Quantification/Proximity: Let's assume we have the following harmonics generated: 2000, 2001, 3000, 3002, 5000 and 5002. We have a few situations:

- When this value is set to 1 it will identify numbers like 2000 and 2001, where the difference between them is less or equal to 1, it will not select 3000 and 3002 where the difference in their values is greater than 1.
- When this value is set to 2 it will identify 2000/2001, 3000/3002, and 5000/5002. Because all have difference values less than 2.

Increasing this value will help getting more suggested numbers.

- If you set this value to 1000 it will pickup numbers that the difference between them is less or equal with 1000, example 2000 and 3000 will be picked up.

Decreasing this number will help reducing the suggested numbers.

Start X value (default 0) – this is where the application starts working with numbers; minimum 0; cannot be higher than End X value;

End X value (default 100,000) – this is where the application stops checking the numbers. Over this value the application will not check anymore harmonics. This value, 100,000 Hz is the maximum value we recommend to be used, but you can go over that. Given that we target harmonics around 50-85 000 Hz, 100,000Hz is more than enough.

For instance you could set an interval, instead of 0 – 100000 Hz, to something like 30000 Hz – 90000 Hz... and the suggested numbers will fit within this interval.

Maximum harmonic – Default value is 100. However, this value can be increased or decreased to better reflect your unique application.

If you have really low numbers, like 2 Hz, increasing this value will help get workable numbers into the higher harmonic ranges. Let's take frequency 2 Hz for example. With 100 maximum harmonic that means the maximum frequency you will get is 194 (that is 2*97). If you start with 10 Hz, the maximum frequency is 970 Hz. Clearly this frequency is far lower than our desired range. Entering a larger harmonic value into the calculator will be required to generate values in the more desirable range. In future versions of this harmonic frequencies calculator, this may be able to be determined automatically. At this moment, if you feel you don't have enough "recommended frequencies", we suggest increasing this entry to a higher value. It is also recommended that these very low base frequencies be eliminated from your list, as they may generate an excessive number of matches.

So, there are several ways on how to increase/decrease suggested frequencies.

1. Quantification
2. Start X value
3. End X value
4. Maximum Harmonic
5. Eliminating some frequencies from the fundamental (base) frequency list

The last method to select frequencies is to do it in a manually mode (Mr. Holman's personal choice). Consult the table that appears under the suggested frequencies. Typically you will only need the first few pages.

You will see 4 columns of data:

1. **Freqs. Count** – the total number of frequencies identified to be within the quantification value (including matching numbers)
2. **Spike #** - a spike is considered quantification interval, not really useful. It is basically the number of the interval where frequencies are found close or matching.
3. **Interval** – this is the interval within the identified frequencies are. It has the size of the quantification minus 1.
4. The last column, and most important, are the **identified frequencies**, close or matching frequencies. Right to each frequency you will see written in subscript the base fundamental. So, if you have a matching frequency for example 10850 it will appear twice or as many times it is discovered as an odd harmonic of other frequencies, like this: 10850_{1550}, 10850_{2170}.

Note: it is important to remember that there might be harmonics that do NOT match with other harmonics; this is not common. Its harmonics will not appear in the suggested frequencies list, but that specific base frequency might be very useful, so it is important to separately/manually calculate a higher harmonic for that single number within your optimal range and add to your final protocol.

Note: depending on the settings you have, especially the maximum harmonic value, IT CAN INCREAE THE PROCESSING TIME that the application spends on generating and analyzing the data. The computing that is involved is extensive and it is very likely that the operation can time out if excessive demands are placed on the server. Simply return to a lower value if this occurs.

IMPORTANT NOTE:

This entire process may seem at times to be not worth the effort. We must remember that many may actually using these generic processes in health related applications, even life and death situations where conventional treatments have repeatedly failed. As a research resource, we need to strive to keep our data and notes as accurate as possible, so that better comparisons and improvements can be made. The quality of lives, health and the well being of often many other people may often be the result of the little extra time and effort put in by YOU, the user.

In most cases, the numbers available to the public are relatively poor numbers but do have tried and tested foundations and they serve as good starting points. We must continually remind ourselves that advances and improvements begin RIGHT HERE and others typically don't have access to the technology, the tools, or the experience to affect a difference.

If you have access to this calculator, then you likely also have access to the "Protocol Index" where you can share and compare your validated results with others of similar interests. In some cases, something

you may be getting ready to calculate, may already be located there in a prepared script form, ready to use.

The Calculator is a fully functional work in development. Modifications and improvements to the algorithm of generating and suggesting frequencies are planned for the near future. Your feedback is always welcomed.

For more information, please contact:

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