

# Effect of music on structuration of water

## Abstract

**Aim of the study:** To detect possible structuration effect of music on water.

**Methods:** The Dynamic Electrophotonic Imaging (EPI) analysis based on Gas Discharge Visualization (GDV) method was used to study the structuration of water under the influence of music. In the experiment modern electronic music “Yippi Wave 3.0” (<https://yippiweb.com/what-is-wave>) in \*wav format and Handel music have been used.

**Results:** Statistically significant difference between background parameters of water and parameters after the influence of “Yippi Wave 3.0” music was detected in all experiments. No effects from Handel music were found.

**Conclusions:** This study should be considered a pilot study and the results are preliminary. We need to conduct experiments with different sources of both acoustic and electromagnetic signals and the possibility of their registration by the Bio-Well device.

**Keywords:** water structuring, music, electrophotonic imaging, gas discharge visualization

Volume 13 Issue 1 - 2020

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**Received:** December 28, 2019 | **Published:** January 15, 2020

**Abbreviations:** EPI, electrophotonic imaging; GDV, gas discharge visualization

## Introduction

In recent years, increasing attention has been paid to the molecular and structural properties of water and their modification under the influence of various factors.<sup>1-3</sup> An advanced theory based on quantum electrodynamics<sup>4</sup> allows to quantify many effects, but the decisive word remains with the experiment. In several studies<sup>5-7</sup> the possibility of using GDV Bio-Well technology for the detection of water parameters change under the influence of different factors was demonstrated. The aim of this pilot study was to experimentally evaluate the possibility of structuring water under the influence of music.

## Study design

- Bio-Well device with Pt water electrode ([www.bio-well.com](http://www.bio-well.com)) was positioned in the laboratory and turned on in an automatic off-line mode, after that all people left the room.
- Bottle with 0.3L of commercially available potable water was opened before the beginning of the experiment and electrode connected to the Bio-Well device was immersed into water.
- After about an hour of background recording person entered the room and turned on music, and then left the room. Music was playing for 20minutes, and then the signal was recorded for about one more hour. By the end of this time device was turned off and data were processed in Bio-Well programs.

In the experiment files of the modern electronic music “Yippi Wave 3.0” (<https://yippiweb.com/what-is-wave>) in \*wav format and files of Handel music have been used. Music was played from Samsung 7 mobile phone.

## Results

In different days 10 experiments was conducted: 8 with “Yippi Wave 3.0” music and 2 with Handel music. Results are presented in Table 1 and Figure1.

As we see from the results, in all cases of playing Yippi Wave music, statistically significant changes of a water sensor were recorded, while in case of playing Handel music signal did not change.

## Discussion

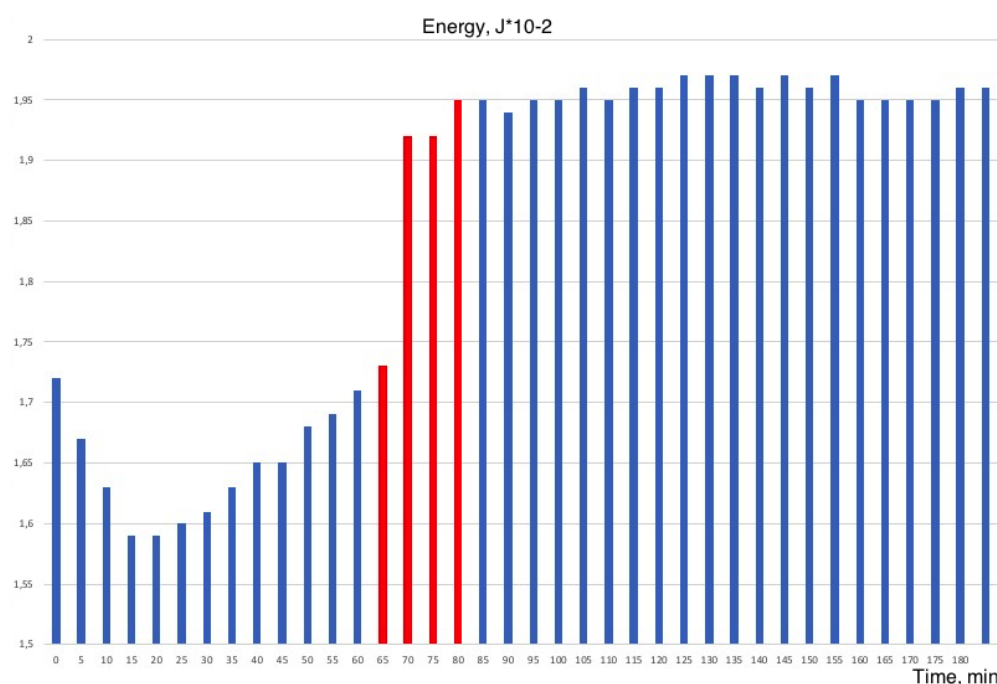
According to the software developers (<https://yippiweb.com/what-is-wave>), their device uses the principle of scalar waves, or longitudinal waves, proposed by Nikolai Tesla.<sup>8</sup> Without going into a discussion about the nature of this phenomenon, we realize that it is possible to modulate the radiation of the phone in a certain way using the application on the phone. It is known that water properties may change under the influence of electromagnetic fields.<sup>9</sup> In the experiments under discussion, water was in an initial electromagnetic field, which is constantly present in the surrounding space. It should be noted that in different days the initial parameters of the discharge differed (Table 1), which indicates the change of conditions of the environment and, above all, the electromagnetic field. When the music file was turned on, the electromagnetic field was modulated, which affected water structure and led to changes in the registered parameters. As was shown by the experiments, this effect was kept for at least one hour.

## Conclusion

This study should be considered a pilot study and the results are preliminary. We need to conduct experiments with different sources of both acoustic and electromagnetic signals and the possibility of their registration by the Bio-Well device. At the same time, the observed effect seems to us to be interesting and we will listen to all suggestions for improving the research protocol.

**Table 1** Comparison of the Energy of photons measured in Bio-Well software before (1) and after (2) playing music

Experiment N	Date, mm.dd.yy	Music file	Energy 1	Energy 2	t-test
1	12.13.19	Yippi Wave	1.65 +/- 0.05	1.95 +/- 0.03	< 0.001
2	12.16.19	Yippi Wave	1.55 +/- 0.05	1.90 +/- 0.03	< 0.001
3	12.17.19	Yippi Wave	1.75 +/- 0.05	1.95 +/- 0.03	< 0.001
4	12.18.19	Yippi Wave	1.69 +/- 0.05	1.90 +/- 0.03	< 0.001
5	12.19.19	Yippi Wave	1.54 +/- 0.05	1.88 +/- 0.03	< 0.001
6	12.20.19	Yippi Wave	1.82 +/- 0.05	1.99 +/- 0.03	< 0.001
7	12.20.19	Yippi Wave	1.80 +/- 0.05	1.95 +/- 0.03	< 0.001
8	12.23.19	Yippi Wave	1.77 +/- 0.05	1.90 +/- 0.03	< 0.001
9	12.24.19	Handel	1.69 +/- 0.05	1.68 +/- 0.05	0.44
10	12.25.19	Handel	1.72 +/- 0.05	1.71 +/- 0.05	0.68

**Figure 1** Time dynamics of Energy parameter from water sensor. Every bar is averaged for 5min. Highlighted bars indicated the time of playing music.

## Acknowledgments

None.

## Conflicts of interest

Author declares there are no conflicts of interest towards the article.

## Funding

None.

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