

BIONET RESEARCH CENTRE

Talk by Marcus Stueck, Director of the Leipzig School of Biodanza in Germany at the V European Congress of Biodanza in Portugal. Translated by Paula Jardim and edited by Jill Goodwin

Why science? Biodanza is fascinating. Science is also fascinating. Science can help us understand what happens in Biodanza. Even the magic is much bigger than we know; we can't measure everything. For example, we know that every living element makes its own music. But the institutions don't believe it. We think that phenomenology is a very important way to gain knowledge – to learn through direct experience, without analysing or interpreting; on the other hand we think it's also very important to understand with our head so that we can explain it to institutions. That's why we have started BIONET, an IBF research network that tries to bring scientists together with artists in a conference like this one. It facilitates the encounter between artists and scientists. This encounter also happens inside me, and this makes me complete. Intuition, emotion and experience meet rationality. During the last years of his life Rolando travelled to many universities and I was very lucky to accompany him to Africa, where we visited universities and the Ministry of Women, Gender & Work, where Rolando was showing the ministers how to embrace and my role was to explain how Biodanza works in the immune system.

Rolando always used science to explain Biodanza. By using scientific results he was able to access several institutions. Rolando was interested in four areas of research; 1) blood pressure and affectivity, 2) epigenetics, how can I influence the genes by doing Biodanza within a loving environment, 3) bio-photons, the light in our cells, how light is transported in our cells, and 4) biochemical research.

In BIONET we have defined 3 areas. Area 1 e 2 are classic science, you make studies, experiments, and then interpret and analyse them. Area 3 is like area 51 in Nevada but it's also science; it's phenomenology, learning from direct experience, and this is what we want to show the scientists. We're going to do a conference in Latvia with Biodanza teachers and scientists from seven countries, bringing body and mind together in science. If a scientist can make poetry, he is complete; if a scientist can dance, she is complete, if Biodanza teachers can read scientific texts, they are complete.

We might know how Biodanza functions because we feel it in our bodies, but we have to be able to explain how it works, and this is bringing body and mind together. In this way we can overcome Descartes error and explain it to schools and city councils. Descartes said I think therefore I am; Biodanza says I feel, therefore I am. And to bring these together is very powerful.

So, the first 2 areas are classic investigation in biology, medicine and pharmacy. Area 2 is classical research in education, psychology, anthropology and ethology; and area 3 is like area 51 in Nevada.

We have an official journal, a review journal that's free of charge. You can download it from our website. All our science work is there. It has been published worldwide and you can read it online. And you can also publish. Jorge, Raul's brother, published a very beautiful article, about experience as a scientific method. Our organization has everything freely available on our website. If you have questions just send us an email.

So here you see some books that you can read with all the Biodanza research that we have done. There's lots of knowledge but you have to read and learn it.

Our research plan has 8 categories and they are all done

1. Reflection on the theoretical model of Biodanza

2. Experimental life sciences basic research on the effects of Biodanza

Scientific research on the effects of Biodanza – I love Maite's work. She brings love to people and at the moment we're doing research in Switzerland on the effect of the caress. This affectivity is so important biochemically but we need scientific evidence otherwise institutions will not understand or accept it.

3. Studies on the effects of regular Biodanza practice

4. Quasi-Experimental research on Biodanza extensions

Experiments have been done and this knowledge needs to be passed onto institutions. For that you need to understand the research. People need to know about what Maite is doing in France, that Biodanza in water can help overcome attachment disorders.

5. Cross-cultural studies of Biodanza

We also studied the transcultural effects of Biodanza. In Germany and in other countries we found that one of the repeating parameters is the sense of self-efficacy, the feeling that our actions have an effect in life. This is true for all countries. Biodanza leads to optimism and a "can do" attitude.

6. Studies on the quality of the teacher training

7. Studies of Biodanza with children

To be able to work with children in institutions we need to show them evidence of the benefits of Biodanza. If you want to run projects you need scientific proof, so we did a ten-session program for children. We worked with two groups of children; one group of pre-schoolers and the other with children from 7 to 12 years old. It is very important for children to receive affectivity in order to be able to develop trust, celebrate life, express their emotions, and so forth. The results were very interesting. There was a reduction of testosterone in the boys after every Biodanza session but not in the girls. This reduction of testosterone comes about through the

power of caress. Although the testosterone goes back up again, the experience is still there.

At the moment we're in the process of publishing an article in a British Journal on the effects of Biodanza for pre-schoolers. We measured cortisol before and after ten sessions of Biodanza and the results showed a reduction of cortisol in all sessions. Cortisol is the stress hormone, which is also connected to sensitivity. One study proved that insensitive mothers can produce higher cortisol levels in three months-old babies and this cortisol never leaves their bodies, they grow to be constantly tense and on high alert.

Then we studied how little children recognise the emotions of other people. Here we found something interesting. Children with high cortisol levels before the Biodanza session and who significantly lowered the cortisol levels have a significant high ability to recognise emotions. This is great! It means that the change of behaviour is a biochemical change as Rolando had said.

I'll finish with blood pressure as Rolando wished. We measured the children's blood pressure before and after the Biodanza sessions. Unfortunately, in Germany we have children with high blood pressure and skin hypersensitivity, which is also connected to chronic stress in children. Now we're also measuring this in children, because we know that this is just one step before exhaustion and burn out. When I go to the German Ministry and give a talk I'm fighting for the children and teachers, so that they can have healthy and happy lives. I tell them that because of these findings in ten years we'll be talking about children burnout. We're already talking about high blood pressure in children, a sign of too much stress, and how their pressure lowers after doing Biodanza. If they had low blood pressure before the session, it becomes normal afterwards, so Biodanza helps to regulate the system.

Finally, Raul and Veronica's program in East Germany with two Biodanza groups of adults. We found that the pulse of the adults who come to Biodanza is higher than those doing yoga, so the target group of people who do Biodanza might have a different temperament. However, in the ten sessions they came to the same point, showing that Biodanza is all about auto-regulation!

8. Publications in scientific journals, high-quality scientific work (already covered)

To find out about the next Bionet conference in Riga go to www.bionet.name