



Profile

Stefan Leucht: a (meta)analysis of his life



Stefan Leucht

For Leucht's first published meta-analysis see *Schizophr Res* 1999; 35: 51–68

For the latest meta-analysis of acute antipsychotic treatments for schizophrenia see **Articles** *Lancet* 2019; 394: 939–51

For the meta-analysis of antipsychotics for relapse prevention see **Articles** *Lancet* 2012; 379: 2063–71

For the meta-analysis of antipsychotics and mortality see **Articles** *Lancet Psychiatry* 2018; 5: 653–63

For the latest meta-analysis on antipsychotic dosing see *Am J Psychiatry* 2020; 177: 342–53

For the comparison of efficacy of psychotropic drugs versus general medicine medications see *Br J Psychiatry* 2012; 200: 97–106

For the comparison of pharmacotherapy versus psychotherapy for psychiatric disorders see *JAMA Psychiatry* 2014; 71: 706–15

For the analysis of studies done by pharmaceutical companies see *Am J Psychiatry* 2006; 163: 185–94

During our interview, Stefan Leucht describes a seminal moment in his professional life. “During my final year as a medical student, Rolf Engel lectured about meta-analysis and I immediately knew that this was what I wanted to do in research. My university chairman Hans Förstl told me not to, as this would not lead anywhere. But I did not listen to him, and published my first meta-analysis on antipsychotics, which got quoted 1047 times. And now he tells his students ‘do like Dr Leucht and believe in your ideas, irrespective of what other people think!’” This comment highlights not only Leucht’s start in his pioneering career in evidence-based psychiatric medicine, but also his self-determination and belief that objective comparisons of psychiatric treatments are the correct thing to do.

Born and raised in Munich (Germany), as a youngster Leucht studied languages to meet people from other countries and exchange ideas with them. The father of his exchange student in Paris—a psychoanalyst—offered him his first Freud book (in French). This book stimulated his interest in psychiatry and psychology. Additionally, the divorce of his parents during his childhood caused trauma, but enabled him to later understand and empathise with his patients. He began studying law with the aim of working in foreign affairs, but changed study direction towards medicine after feeling that law was too artificial and man-made; however, he realises that he retains the judgment part of his law studies when doing systematic reviews and meta-analyses, where, like a judge, he tries to be as impartial as possible. Leucht embraced psychiatry during a rotation in Atlanta (GA, USA), liking the combination of psychology, biology, and social work (an aspect he particularly enjoys) needed to help psychiatric patients, stating “psychiatry is much too complex to be restricted to drug treatment [alone].”

Leucht is perhaps best known for his research on evaluating psychiatric treatments through meta-analyses. This interest was initiated by the lecture by Engel, and also by his fatherly friend and fellow researcher John Davis, whom Leucht considers the most influential pioneer in meta-analysis of psychiatric drugs since the 1970s (and, together with John Kane, his personal hero). Currently head of the section for evidence-based medicine in psychiatry and psychotherapy at the Technical University of Munich (Munich, Germany), and an editor for the Cochrane Schizophrenia Group, Leucht states his surprise that he has come so far, commenting that he would have been “just happy to contribute to research a bit,” and adding “I think that most of my success is about curiosity and a deep passion.” As one of the most highly cited researchers

over 2014–20, according to Web of Science, he has clearly contributed a lot. His most well known publications are meta-analyses of schizophrenia treatments tackled from different angles, including comparisons with regard to efficacy and side-effects, relapse prevention, increased mortality, time to effect, and optimum dosing, all assessed with his characteristic careful neutrality. To address the issue of the effectiveness of psychotropic drugs compared with the effectiveness of treatments used in general medicine, Leucht published a so-called meta-meta-analysis in 2012, showing that effect sizes for both were on average the same. With regard to the equally contentious issue of psychotropic drugs versus psychotherapy for psychiatric disorders, Leucht undertook a systematic overview of meta-analyses, showing that on average patients benefited from both forms of treatment, and how they could be combined should be considered.

Leucht’s work has not been without challenges, primarily hostility and criticism aimed at his early meta-analyses that questioned common beliefs held at the time. For example, Leucht showed that the idea that all atypical antipsychotics were better than all typical (and cheaper) antipsychotics was not true, and he also revealed bias in studies done by pharmaceutical companies in favour of the company. Although he finds it important to help the pharmaceutical industry to find better treatments for patients, he also feels that the industry needs to be contained. Leucht himself has dealt with fluctuating general anxiety disorder since adolescence. Psychotherapy helped; however, more recent treatment with antidepressants has been a game changer for him, relieving him of symptoms and leaving only regret that he did not use them earlier in his life. Being sceptical about antidepressants himself because of the tiny effect sizes noted in meta-analyses, his own experience has convinced him that they work.

Despite such challenges, Leucht is passionate about his work and life. He is kept busy at home by helping his two daughters at school, and a wide array of hobbies including repairing old bicycles, basketball, philosophy, and listening to pop and opera. His future work will stay focused on evidence-based medicine in psychiatry, especially schizophrenia, but with some shifts in focus (eg, towards living systematic reviews that are updated as new evidence becomes available). After producing evidence for 20 years, he is now keen to make evidence more accessible for shared decision making by doctors and patients. He enjoys partnering with patients in research projects, and finds these eye-level relations very enriching.

Priya Venkatesan