Psychoanalysis, Science or Pseudoscience?

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ABSTRACT

As much as the couch is a piece of furniture associated with television, the “divan” or Turkish couch is a piece of furniture associated with psychoanalysis. Starting at the end of the 19th century, the Austrian Sigmund Freud abandoned neurological research to develop his psychotherapy, the method that acquired such notoriety that it became an ingredient of Western popular culture, elevating its originator to the position of the most famous psychiatrist —something he never was— of all time. But his status is wrapped up in a perennial polemic: Is there any scientific evidence to support psychoanalysis? Or is it merely pseudoscience, perhaps among the most academic of them all?

Keywords: Psychoanalysis, Psychology, Science

In 1885, Freud (6 May 1856 – 23 September 1939) traveled to Paris to study the use of hypnosis in the treatment of psychopathology by the neurologist Jean-Martin Charcot. On his return to Vienna the following year, he began to apply this technique to the treatment of his patients, but soon dispensed with it to limit himself to an extensive dialogue that brought out the subject's experiences and memories. Of particular importance were dreams, which for Freud were a door to the unconscious and the repressed memories from childhood, usually of a sexual content. Oedipus complex, castration and penis envy became theoretical pillars of his method, which a decade later was already being applied under the name of psychoanalysis.

Freud's approach was considered innovative at the time, and has evidently permeated the later evolution of psychopathology. However, right from its inception it was the subject of criticism by renowned figures such as the neuroscientist Santiago Ramón y Cajal. Starting in 1919, the philosopher of science Karl Popper, hitherto an enthusiast of psychoanalysis, began to object that psychoanalysts were always able to explain the symptoms of their patients a posteriori through their theories, but did not come up with predictions subject to experimental verification, something that purely scientific ideas did, such as Einstein's relativity.

SCIENTIFIC VALIDITY IN QUESTION

This impossibility of falsification led Popper to define psychoanalysis as a pseudoscience, comparable to astrology. Over the years, the scientific validity of this discipline has been challenged by prominent figures such as psychologist Steven Pinker, linguist Noam Chomsky, evolutionary biologist Stephen Jay Gould and physicist Richard Feynman. Among the critics who have dissected the shortcomings

of psychoanalysis are the philosophers Adolf Grünbaum and Frank Cioffi and psychologist Malcolm Macmillan, among others.

One of the most fervent and cited detractors of psychoanalysis is Frederick C. Crews, Professor Emeritus of English at the University of California, Berkeley. His recent work Freud: The Making of an Illusion (Metropolitan Books, 2017) has been described as “the book that definitively puts an end to the myth of psychoanalysis and its creator.” For Crews, the main argument that Popper began to gestate a century ago and that he developed in his book Conjectures and Refutations (1963) still stands today: the propositions of any scientific theory must be refuted by evidence to the contrary, but those of psychoanalysis are not. “No evidence can refute them, because they entail no testable consequences,” Crews summarizes for OpenMind. “As a result, there can be no orderly refinement of psychoanalysis as a science,” he adds.

This has not prevented some defenders of psychoanalysis from seeking to build bridges between Freud’s method and science. On the one hand, neuropsychologists such as Mark Solms (who did not respond to questions from OpenMind) attempt to find the traces of psychoanalysis in the brain through neuroimaging techniques. But as Joel Paris, a psychiatrist at McGill University (Canada), wrote, “the observed correspondences are superficial and hardly support the complex edifice of psychoanalytic theory.” “Psychoanalysis is not a therapy with an evidence base and should be stopped,” Paris tells OpenMind.

On the other hand, studies and meta-analyses —studies that gather and summarise the evidence from several other studies— have been undertaken to assess the

possible benefits of the technique in the treatment of various disorders. And although some of these investigations have found positive results, the methodology of these studies has been criticized for lacking the rigour and control of randomized clinical trials.

For Crews, there is another, even more radical criticism of these studies, which is that they are contaminated by the bias of their authors, who “inevitably begin from a psychoanalytic point of view and are determined to salvage it at all cost.” “How likely is it that we will ever see the reverse: a well-trained, non-Freudian scientific researcher who finds himself compelled by the evidence to reinterpret all his data in psychoanalytic terms?” he asks. “It can’t happen, because to be well trained in science is already to discount a shapeless mass of self-contradictory theory that never had straightforward empirical content in the first place.”

A CLOSED AND DOGMATIC TREND

But the truth is that this search for bridges between psychoanalysis and science does not seem to be something that interests the entire psychoanalytic community. Journalist and neuroscientist Casey Schwartz, who in his book In the Mind Fields: Exploring the New Science of Neuropsychoanalysis (Pantheon, 2015) reviewed the attempts to combine neuroscience and psychoanalysis, explains to OpenMind: “When I was reporting my book, many analysts I met were hugely enthusiastic and excited about neuroscience, others cautiously curious, others disinterested.” According to Paris, many traditional psychoanalysts “do not want to dilute Freud’s wine with neuroscientific water.”

In fact, one of the main criticisms of psychoanalysis has been, according to some authors, the closed and excessively dogmatic nature of this trend, which from the beginning provoked clashes between Freud and some of his closest collaborators, such as Otto Rank or Eugen Bleuler; the latter compared the movement to a religious community. “The slander of critics and rivals, a bad habit that was liberally indulged by Freud himself, becomes, necessarily, the routine substitute for empirical dialogue,” says Crews.

As part of this flight from the scientific field, psychoanalysis has sought refuge in the humanities, a field in which it is not obliged to respond to empirical demands. As psychoanalyst Siegfried Zepf from the University of Saarland (Germany) points out to OpenMind, “psychoanalysis is not a natural science, but a hermeneutic science.” In other words, it interprets phenomena, but does not test hypotheses empirically.

However, many experts believe that this departure from science is not acceptable for a discipline that today aspires to compete with scientifically validated treatments such as cognitive-behavioral therapy, which according to Paris is currently the most influential psychotherapy, and which inherits from psychoanalysis its format dialogue, but dispenses with Freudian theories. In the world of the twenty-first century, concludes Paris, psychoanalysis “may only survive if it is prepared to dismantle its structure as a separate discipline and rejoin academia and clinical science.”

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