

Translation into English: [Chapter 2 - Catalogue of Errors for Both Theories of Relativity](#)

from the German documentation of G.O. Mueller

"On the Absolute Magnitude of the Special Theory of Relativity - A Documentary Thought Experiment on 95 Years of Criticism (1908-2003) with Proof of 3789 Critical Works" - Text Version 2.1 - June 2004
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F: Electromagnetism / Error No. 3

The STR was developed without any knowledge of unipolar induction, which is an induction without relative motion between field and conductor

It is true that Albert Einstein mentions in AE 1905 (p. 910) "unipolar machines", but he does not treat the fundamental findings of unipolar induction. - Unipolar induction has been known since Faraday. This effect has been closely examined since the end of the 19th century, and since 1905 it has become increasingly important as conclusive experimental proof against the validity of the principle of relativity of the STR. As a result, unipolar induction has never been a subject of discussion in the presentations of the relativists.

The experiment on unipolar induction has two different designs: (A) a round bar magnet that can rotate on its longitudinal axis, and a wire loop attached to the bar magnet at two different points (both ends) with sliding contacts; (B) the wire loop is affixed to the bar magnet.

If, in the setup (A), the magnet is rotated once (relative to the laboratory table) and another time the wire loop, i.e. two relative motion whose relativity is completely identical, the location of the electromotive force is different. With this the complete symmetry of the processes is broken.

If the rotation takes place in setup (B), in which the whole (magnet and wire loop) exists as a single moving part, a current is induced. In other words, an induction without relative motion between magnet and conductor, or if one wishes to assume a relative motion, then with respect to the ether or to space. The induction without relative motion is thus evidence of absolute motion or of relative motion with respect to the ether (medium, space), depending on one's interpretation. The relativists may choose which of the two should disprove their theory.

It is no wonder that in the physics establishment no research into unipolar induction takes place. It has therefore been left fully in the hands of the critics. Further proof of how the STR handicaps research in that it prevents it.

Pegram, Kennard and Barnett agree completely on the experimental findings; although they take fundamentally different positions when it comes to interpreting them. Whereas Pegram declares the result to be a confirmation of the STR, Kennard and Barnett see it as a refutation of the STR, though they in turn differ in their interpretations of the individual processes of unipolar induction. Yet despite the obvious need for an explanation: no experiments! They could harm the theory.

Unipolar induction has direct importance für Albert Einstein's deed of 1905, in which he begins with criticism of Maxwell's theory, because it does not work with the complete relativity of motion in the induction between magnet and conductor. The physics textbooks hold tightly to complete symmetry right up to the present day (?); moving magnet and moving conductor give the same induction result. However, unipolar induction shows an asymmetry that Maxwell's theory may confirm. At any rate it refutes the stout assertions made by the STR as to the relativity of motion.

So Albert Einstein, who wanted to revolutionize the entire branch of mechanical and electrodynamic kinematics, did not even know all of the fundamental facts of electromagnetism. The only mitigating

circumstance was that most professional colleagues had not concerned themselves either with the problems of unipolar induction. They, on the other hand, did not plan to immediately revolutionize the foundations of physics.

AE 1905. - Pegram, George B.: Unipolar induction and electron theory. In: Physical review (The). Lancaster, PA. Ser. 2, vol. 10. 1917, pp 591-600. - Kennard, Earle Hesse: On unipolar induction : another experiment and its significance as evidence for the existence of the aether. In: London, Edinburgh, and Dublin Philosophical magazine (The). Ser. 6, Vol. 33. 1917, pp 179-190. - Barnett, Samuel Johnson: On electromagnetic induction and relative motion [Part 2]. In: Physical review. Ser. 2, 12. 1918, pp 95-114. - Galeczki/Marquardt 1997.