tion and replace it by the correcter doctrine of epigenesis —*i.e.*, of repeated or after-formation. Haller[1] thought very highly of this attack on his own view, but was not convinced by it; and although in botany Wolff's views on the cellular structure of plants were adopted in France by Mirbel, and those on metamorphosis were unknowingly reproduced by Goethe, his influence on embryology dates actually only from the year 1812, when Meckel translated one of his treatises and thus drew attention to his great merits. Wolff tried to refute the theory of evolution or pre-formation, supplanting it by that of epigenesis or after-formation, through actual observations of the development of germs in plants and animals in definite instances. In botany his views, after lying dormant for a long period, led ultimately to the famous cellular theory of Schleiden and Mohl. In zoology, shortly after Meckel's republication of his treatise in 1812, there were published the researches of Pander, who, in his treatise on the development of the chick, "gave a fuller and more exact view of the phenomena less clearly indicated by Wolff, and laid the foundation of the views of all subsequent embryologists."[2]

15. Pander and K. E. von Baer.

Pander was a Russian by birth, and so was his greater contemporary and friend, Karl Ernst von Baer,[3] a man

[1] As Prof. J. Arthur Thomson says ('Science of Life,' p. 120), "A single sentence, 'Es gibt kein Werden — there is no Becoming,' sufficiently indicates Haller's position."

[2] J. A. Thomson in article "Embryology" ('Ency. Brit.,' 9th ed., p. 165).

[3] The work of von Baer (1792-1876) remained for a long time unknown and unrecognised outside of Germany. Huxley made him known in this country by translating extracts from his principal writings for Taylor's 'Scientific Memoirs' in 1853, nearly thirty years after von Baer had begun the brilliant series of his researches. It can be said of him that he, even more than his forerunners, Pander and Döllinger, withdrew natural