borer." It was intimated that eburia quadrigeminata (Say) spent forty years growing from egg to mature larva, in the top piece of an old birch bookcase. A number of such stories are current, but I am of the opinion that the simple solution of the whole matter is as follows: Eburia quadrigeminata breeds in the heartwood of dead, dry, seasoned logs and wood,-Hicoria, Quercus, Robinia, Betula, Fagus, Fraxinus, Castanea, Ulmus and perhaps others. The eggs are placed in the cracks and crevices of dry, weathered or seasoned scars, "cat faces," and similar placed. An impregnated female in some manner got into the house, and in crawling over the piece of furniture took advantage of a crack in the varnish or wood, and inserted an egg.

I can not believe that any Cerambycid larva could exist for forty years in a piece of furniture. In fact, the normal duration of the larval stage of insects of this family is from one to five years.

I think the same explanation will cover the other case mentioned in this article. The adults of this species often hide beneath bark, and might have crawled between the bricks and doorsill.

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PERCIVAL LOWELL

The absorbing interest that Dr. Percival Lowell was able to throw about the astronomical investigations of his later years has obscured to an extent the fact that he was a man of many parts. There are comparatively few who are familiar with his keen observations of the nearer Orient, crystallized into published essays, and fewer still have known of his interest in botany, geology and general natural history, in one or more departments of which he has made contributions to science.

A comprehensive view of him is presented in Miss Louise Leonard's recent volume, "Percival Lowell—An Afterglow" (Boston: The Gorham Press), a book which through the medium of selections from his own writings shows him in his variety of studies. No seri-

ous undertaking has yet been made towards a biography of Lowell—the time since he passed on is perhaps yet too short, but in this volume one has a valuable reminder of him. Extracts from his letters are deftly framed in a Foreword, a prelude and an afterpiece, the last a poem that he loved. There is no appraisal of Dr. Lowell's scientific achievements, but everywhere is reflected his spirit of investigation, cheerfulness and wish to help his fellow man.

J. R.

THE PASTEUR CENTENARY

The year 1922 marks the lapse of a century from the year of Louis Pasteur's birth and a "Centenary" volume of Pasteur's collected scientific writings would be a fitting homage to the memory of such a man.

In view of the conditions in Europe, is it not possible for investigators here to sponsor such an undertaking, in the English language, and contribute to it by means of translations of the original French articles and memoirs?

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SCIENTIFIC BOOKS

Insect Transformation. By George H. Carpenter, D. Sc., Professor of Zoology, Royal College of Science, Dublin, London. Methuen & Co. Ltd. 1921, pp. 282, figs. 124.

Professor Carpenter for many years has been doing admirable work in Ireland. Well trained in biology, and a broad zoologist, he has interested himself in many aspects of scientific work. His publications on crop and animal pests have been of great service to the Irish farmers and stock growers; he has been much interested in the admirable zoological garden in Dublin, where they breed lions in confinement more successfully than in any other place in the world, and has been active in the Royal Irish Academy, of which he is secretary.

His book on "Insect Transformation," just published, is a mature book, written by a broad man, and differs in many interesting and important ways from any book yet published.