

**THE WERNER EDUCATIONAL  
SERIES. ESSENTIAL LESSONS  
IN HUMAN PHYSIOLOGY AND  
HYGIENE: FOR SCHOOLS**

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The Werner Educational Series. Essential Lessons in Human Physiology and Hygiene: For Schools by Winfred E. Baldwin

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BY  
WINFRED E. BALDWIN, M.D.



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Science in Psychology.



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## PREFACE.

IN the preparation of the following chapters on human physiology and hygiene, the author has attempted to present only such facts as are essential to the most practical knowledge of the subject—that is, such facts as people in the common walks of life most need to know, and such facts as all can remember and make use of whenever occasion demands. The plan of the work is such as adapts it to the needs, not only of intermediate classes in graded schools, but of the large number of pupils in the country schools where the time which can be devoted to the study of this subject is necessarily limited. As a general rule, an effort has been made to speak briefly and to the point, without unnecessary verbiage; and, wherever such could be done without sacrificing accuracy or clearness of statement, rigid condensation has been practiced. It is believed, however, that this will not detract from the interest of the narrative or from the practical worth of the lessons. Many interesting facts, especially in anatomy, have been ruled out as not being knowledge of value to those for whom the book is intended. As the purpose and end of all such studies is the inculcation of rules and principles for the preservation of health, anatomy and physiology are throughout made subservient to hygiene and hygienic precepts.

Technical terms have been avoided as far as possible. Instead of confronting the learner with a pre-

liminary chapter of definitions—such as is often found in text-books of this kind—and thus obliging him at the outset to master a number of disconnected and, to him, meaningless statements, the more common terms and expressions peculiar to anatomy or physiology are explained in alphabetical order at the end of the book. By this plan, the greater number of formal definitions are omitted from the regular lessons, and all are placed where they are most convenient for ready reference whenever required.

Especial attention is given to the effects of alcohol, tobacco, and other stimulants and narcotics upon the human system, thus adapting the work to the requirements of the law in several of the states. The supplementary chapters on emergencies and the care of the sick-room contain brief and simple directions, such as every boy or girl should learn when young and remember all through life. The growing demand for school instruction regarding the prevention of contagious and communicable diseases—a demand which has found formal expression in the laws of at least one of the states of the Union—has induced the author to add a third supplementary chapter on that subject. Here, as in the other portions of the book, he has endeavored to state his message briefly, and to give that kind of information which every person can utilize and apply to the benefit of himself and those around him. It is knowledge of this kind, succinctly given, that imparts to the following chapters their distinctive character as *essential* lessons in human physiology and hygiene.



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## INTRODUCTION.

PHYSIOLOGY is the science which treats of and describes the action and functions of the various parts and organs of the body. In its most general meaning it has to do with all forms of life, both animal and vegetable. That division of the science which relates to the human body alone is called human physiology.

Anatomy is the science which treats of and describes the situation and the appearance of the component parts of the body. A general knowledge of the more common facts of anatomy is essential to a clear understanding of physiology, just as a knowledge of the structure and appearance of any object helps us to acquire a clearer comprehension of the nature and uses of that object.

Hygiene is the study which relates to the laws of health. It tells us how to take care of our bodies in such a way as to promote the health and strength of the organs composing them, and warns us against practices and habits which would be injurious to our physical well-being, or would prevent the full and harmonious development of all the parts and organs.

These three studies, physiology, anatomy, and hygiene, are very closely related, each really depending upon or supplementing the others. They teach the most important facts that can be learned about our physical nature: how our bodies are made, and how