render their liberties without a fight," he replies by describing the modern meaning of "a fight." He believes that there was justification for the last war but that there can be none for the next. The meaning of the word war has totally changed. He declares that our weapons are useless before an attack, when to use them would be folly, and that they would be useless after an attack, when to use them would be useless revenge. He fails to recognize at any point the usefulness of our weapons as a deterrent (the weapons exist with the hope that they will never be used but with the determination-this Toynbee considers immoral-that they shall be used after an attack, in the belief that such determination is likely to prevent the attack.) He is set straight on this point by Ayer, and when Toynbee concedes superior strength to the Russians, Ayer responds not only with doubt but with the "saturation" argument-that slight "disparity no longer greatly matters."

Toynbee is probably right in considering that the arms race, if it cannot somehow be limited, will almost certainly lead to disaster. However, he considers no half-way measures for ameliorating the situation. He despairs of our mincing diplomacy. What he proposes is unilateral disarmament-by the West if we Americans can be persuaded to go along, or failing that, by a neutral block in Europe, or by Britain alone. He believes that Russia, with the world as its dish, would probably recognize it to be indigestible and would not attempt complete occupation. He considers that occupation after unilateral disarmament is less likely than annihilation is if the arms race continues. He would rather risk occupation than face the race agony of annihilation. Some of his correspondents would rather risk annihilation than face occupation.

Perhaps the most remarkable feature of the debate is the small attention paid to the many-nuclear-nation problem and to the possibility of stopping nuclear tests as a means of controlling the development of nuclear weapons and of tapering off the arms race. One of the most plausible essays is that by Richard Löwenthal, who is prepared to risk "race suicide by accident" rather than accept "slavery by design," because the risk may be deliberately reduced: "We could negotiate steps to stop the spreading of weapons to further powers." In the first half of 1959 there is more reason for optimism concerning the negotiations than there was a year ago when these essays were written.

One often wonders how people react in their thoughts to the nuclear threat, and these essays provide a wide spectrum of interesting answers, ranging from, "Fear is a bad advisor" (Lord Portal of Hungerford) to the Archbishop 26 JUNE 1959 of Canterbury's, "Sufficient unto the day is the evil thereof," and "the spirit in which we negotiate must be . . . a general readiness to give more than we receive." Toynbee is remarkable in having a father who agrees with him completely; the senior Toynbee comments tersely: "Let us therefore put first things first, and make sure of preserving the human race at whatever the temporary price may be."

This little book is thought-provoking. It is much too brief to give a balanced view of the problem of avoiding thermonuclear war, and too few of the essays are keenly critical of Toynbee's position. None of it is to be swallowed without thorough mastication. It gives an interesting glimpse of America through English eyes. It provides a chance to examine the views of quite a variety of one's fellowmen and, through them, to be stimulated to broaden and strengthen one's own thoughts on the world's most important problem.

DAVID R. INGLIS Argonne National Laboratory, Lemont, Illinois

The Age of Improvement. Asa Briggs. Longmans, Green, New York, 1959. xiii + 547 pp. \$7.

Certainly any historian faces a major challenge in endeavoring to chronicle and interpret a period of national life in a volume that will be enlightening to the scholar and the general reader alike. In The Age of Improvement, a history of England from 1784 to 1867, Asa Briggs has met this challenge most successfully. Recognizing that his chosen period "cuts into what are usually thought of as two contrasting centuries -the age of balance and the age of progress," Briggs explains his choice on the ground that the sense of change felt by all classes of the population gave a unity to these years. According to the author, "it was the 'march' of events which fascinated contemporaries and sometimes horrified them. They were divided about the merits of 'improvement,' but they were at one in admitting that it existed."

The book is truly national in scope. It recounts the events associated with kings and queens, politicians, and military leaders, and it describes the changing lives of the "lower orders"—the farm workers, the mill hands, and the tradesmen. Due attention is paid to the religious, scientific, educational, and labor movements of the period. As one would expect from the author of *Victorian People*, there are sharp characterizations of the leading personalities, from the days of Pitt to those of Disraeli. Besides numerous works of historical scholarship, Briggs has drawn upon much contemporary writing, both serious and popular. He includes many apt quotations in prose and verse.

The Age of Improvement is part of a ten-volume history of England being published under the general editorship of W. N. Medlicott, whose own work will carry on the account from 1867 to the present. The excellence of the book by Briggs gives promise that the series will be an outstanding achievement in historical writing.

Washington, D.C.

HIRAM M. STOUT

Colorimetric Methods of Analysis. Including photometric methods. vol. 2A. Foster Dee Snell and Cornelia T. Snell. Van Nostrand, Princeton, N.J., 1959. \$15.

This book is a supplement to volume 2 of the third edition of Snell's *Colorimetric Methods of Analysis* and is primarily a compendium of significant developments in inorganic colorimetry in the 1946 to 1956 period. The authors have adopted the economical plan of periodically publishing supplements instead of continually revising and enlarging volume 2. In addition to colorimetric methods, fluorophotometric, nephelometric, turbidimetric, flame photometric, and ultraviolet spectrophotometric methods are included.

The 68 chapter titles in volume 2A are virtually identical to those in volume 2, and the chapters appear in the same sequence. Each chapter consists of (i) a brief introductory paragraph, (ii) procedures for treating a variety of samples, (iii) cogent discussions and detailed procedures for specific methods, and (iv) miscellaneous methods of limited applicability. Throughout the book the procedures are presented lucidly and concisely. Since the reader is frequently referred to volume 2 for the procedure to be followed in completing the analysis of a specific material or for relevant information, volume 2 should be available for maximum utilization of volume 2A.

In my opinion the methods and procedures presented in volume 2A have not been selected or evaluated critically. In many cases the probable utility and reliability of a specific method is indicated by the space allotted to the discussion. However, the extensiveness of treatment is often proportional to the extent of the original investigation. The reader should also be reminded that the inclusion of a method or procedure in volume 2A does not necessarily indicate superiority to methods and procedures found in volume 2.

It is a Herculean task to keep abreast