



In this book, the information available at national as well as at international level on poultry science has been critically reviewed and recommendations have been made for further research, technology transfer and other related aspects of production of avian species both under urban and peri-urban, intensive poultry production, and under rural poultry production both having small and extensively reared units as well as relatively larger units raising layers and broilers collectively as is in co-operative dairy farming and now also under producer companies. There are serious differences in poultry production, processing and marketing of products compared to dairy and suitable modifications in the approach to the rural poultry producer have been suggested to become economically viable and competitive production system. It is hoped that the book will also be useful to the students of Poultry Science discipline.

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information on all aspects of poultry production involving chicken, quail, ducks, turkey and emu. These institutes also provided library facilities. This information along with the published information in the international journals related to animal science and particularly to poultry science has been critically reviewed and recommendations have been made for further research, technology transfer and other related aspects of production of avian species both under urban and peri-urban, intensive poultry production, and under rural poultry production both having small and extensively reared units as well as relatively larger units raising layers and broilers collectively as is in co-operative dairy farming and now also under producer companies. There are serious differences in poultry production, processing and marketing of products compared to dairy and suitable modifications in the approach to the rural poultry producer have been suggested to become economically viable and competitive production system. The authors are grateful to the Directors of CARI and PDP for providing not only the requisite information both published and unpublished but also interaction with the scientists, which is gratefully acknowledged.

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CHAPTER-1

Historical Background of Avian Production, Health and Product Technology in India and its Critical Analysis and Projections for Future Research, Education, Training and Development

1.1 Early History of Poultry Development in India

Poultry rearing in India dates back to 2000-2500 BC with the evidence for domestication of chicken in the form of seals found at Mohenjo-Daro depicting fighting cocks. Collection of chicken made of clay including one of a hen with a feed dish, chicken bones (Femur ~ 130 mm in size) which was much larger than that of jungle fowl (~ 69 mm) and other chicken that existed in India at that time. Till 1900s, the poultry rearing remained restricted to indigenous birds under free range backyard rearing system. Presently, poultry farming has taken a shape of an organized industry. The history of poultry development may be divided into two periods *i.e.* pre and post 1950.

1.1.1 Pre 1950s period

- i) It is only in the early 1900s, the initiative was taken for organized poultry farming with improved birds. In 1907, the then most reputed British Poultry Firm "Sperrin" established its business in India, but did not have much success. During the early 1900s, some European Christian Missionaries started importing purebred European stocks in the then provinces of Agra and Oudh and the Madras Presidency. The birds came from UK, USA and Australia and were given to poor people for improving their economic and nutritional conditions, however this made little impact.
- ii) A mission's poultry breeding farm was established at Etah in UP in 1912 and maintained Rhode Island Red (RIR), White Leghorn (WLH) and Black Minorca breeds. In 1919, another important development took place when Sir Harcourt Butler, the Governor of UP, advised