

## BOOK REVIEWS

students. The contents have been chosen carefully to enable a good foundation for further studies in physics. The text is written in a coherent manner and the treatment of the topics chosen carries a flavour of the old style of teaching. The author introduction shows that he has a long academic experience, and this comes out in the book.

However, there are some issues to be addressed by the publisher or the author which would help in making the book a better resource.

1. The formatting and layout of the book should be improved to make it more appealing. In the present format it looks like a locally produced book, even though it has a rich content.

2. The author introduction is too detailed and should be cut down to one-third of its present size. In addition, it appears in two places—once inside and once on the back cover—one of them should be removed.

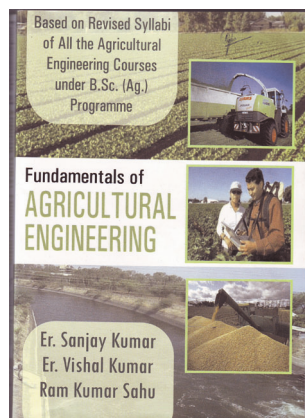
3. A photograph of Acharya Vinoba Bhave for the dedication is completely inappropriate in a science textbook. Physics is one of the most fundamental disciplines of human knowledge, and has nothing to do with the kind of spiritualism exemplified by Vinoba Bhave.

4. The preface is too long and elaborate, containing details of every chapter which is just a repetition of the table of contents. The preface should only mention facts like motivation for the book and acknowledgements. If any details of each chapter have to be included, they should be in the introduction to that chapter.

5. A better title for the book would be *Quantum Mechanics for Atomic Physics*, since the atomic physics part is only discussed in the last few chapters.

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**Fundamentals of Agricultural Engineering.** Er. Sanjay Kumar, Er. Vishal Kumar and Ram Kumar Sahu. Kalyani Publishers, New Delhi. 2013. 567 pp. Price: Rs 350.00, ISBN: 978-93-272-2168-8

This book is a good compilation of topics written by experienced authors and in many ways meets the present need of undergraduate agricultural engineering students. The book consists of five parts. Part one covers farm power, including thermodynamics, IC engine, combustion and fuel system, ignition system, cooling system, lubrication system and governing system.

Part two comprises of farm machinery, including primary and secondary tillage equipment, sowing and planting equipment, weeding, interculturing and plant protection equipment, harvesting and threshing equipment, land development and horticultural equipment.

Part three deals with renewable energy, including energy resources, solar radiation, power cycle, solar collector, solar appliances, solar-photo voltaics, biomass, biomass gasification, briquetting of biomass, wind energy and liquid bio-fuel.

Part four covers food processing, including greenhouse technology, threshing, winnowing, decorticator/sheller, grain drying and storage structures, fruit and vegetable cleaning and grading, size reduction, evaporators and food safety standards.

Part five discusses soil and water conservation engineering, including surveying, levelling, irrigation, hydrology and soil and water conservation.

Overall, the book is a detailed and useful compilation of the basics in the field useful specifically for agricultural students.

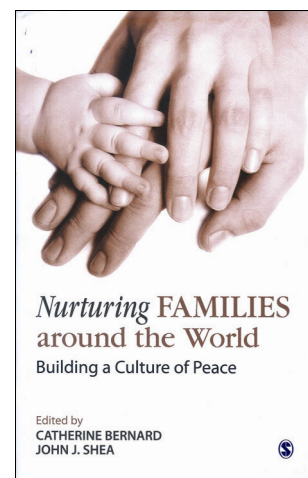
However, there are a few minor drawbacks. First, the book should have been arranged subject-wise, which would directly help the students. More figures and photographs are needed to explain a particular aspect practically. Need arises for more numerical and MCQ for individual parts, which will be useful for students taking competitive exams.

A second major concern is related to practical guidelines which will help the students to learn more about practical aspects: ICAR had laid emphasis on practical aspects like RAWE and experiential learning programmes in agricultural engineering.

In spite of these shortcomings, the book will be useful for B Sc (Agri) students. Figures and photographs are also nicely presented.

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**Nurturing Families Around the World: Building a Culture of Peace.** Catherine Bernard and John J. Shea (eds). SAGE Publications India Pvt Ltd, B1/I-1 Mohan Cooperative Industrial Area, Mathura Road, New Delhi 110 044. 2014. xxxiv + 121 pp. Price: Rs 550.

The cover of this book translates the message the book aims to share with its readers. It speaks about the need of having secure and stable relationships within the family. At the time when the world is

facing turmoil with violence, there lies a strong need to bring up children in an environment promoting peace and to create a healing approach so as to not restrict the next generation by the complexity of the global society. The book shares insights on family values like cohesion and equality for the good of the children. Divided into six chapters, the book uncovers the many ways of minimizing emotional strain in family members due to the changes that take place in whirlwind speed.

In the first chapter titled 'Nurture', Joan Haliburn looks at the influence of family in one's life. Many events in a person's life like parenting techniques, violence, abuse, marriage or divorce can make or break him/her. It talks about the attachment theory, highlighting the importance of a nurturing relationship between the mother and her child for its emotional development. The chapter discusses the importance of nurturing, parenting methods and their transfer from one generation to the other, mental health and the concept of identity that constitutes towards the behavioural development of individuals, especially during their adolescence years. Haliburn also touches upon the topics of attachment trauma involving families and societies with the aid of the research conducted in these fields.

The second chapter by Victoria W. Thoreson titled 'Polishing the jewels of humanity: sharing responsibility for children' highlights the role of the society in shaping the personality of young minds. According to Thoreson, it is the responsibility of the society to nurture a global civic spirit and a culture of caring for children to grow up in. The third chapter by Sami Timimi looks at the consequences of globalization in both developed and developing nations on the minds and the emotional well-being of children. Today's globalized economy is not just limited to exchange of ideas, but also ideas and values that result in new social and cultural challenges. It underlines how shifting of one's focus away from the family towards an individualistic approach has the potential to give rise to unhappy childhood and related behavioural problems.

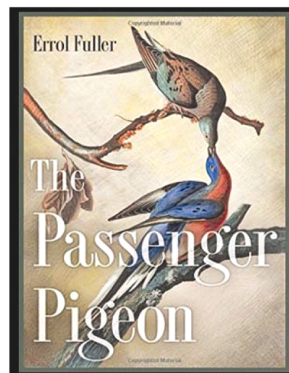
In 'Intimacy: stabilizing and strengthening family life', Beverly Musgrave explores the role of intimacy and empathy in a relation matrix. She also defines the role of culture, religion, gender per-

spectives, values and beliefs that shape the developmental process of a family for many generations. In chapter 5, John Shea touches upon the topics of honour and empathy as the essence for mutual development. He talks about social justice, spirituality and the power of the individual in building a culture of peace. The book concludes with the chapter 'Future of the family and family of the future: the unity based family and the advent of a civilization of peace' by H. B. Danesh. This chapter reviews the essential and irreplaceable functions that occur within a family. The author also describes the different categories families fall into and the relative contribution and participation of its members. Danesh recommends creating unity-based families which give priority to issues like equality and peace.

This book is highly recommended for students and professionals interested in family studies and human development. It would also prove to be useful to people involved in social and community work to help understand the importance of good family nurturing in order to create a culture that promotes peace.

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**The Passenger Pigeon.** Errol Fuller. Princeton University Press, 41 William Street, Princeton, New Jersey 08540, USA. 2014. 184 pp. Price: US\$ 29.95.

#### **And then there were none...**

This book marks the 100th year of the extinction of the passenger pigeon from

its habitat in North America. Found in large flocks, their numbers tumbled down towards extinction with the arrival of colonizers on the continent. Drawing from historical notes and records, the author Errol Fuller narrates the story of the passenger pigeon with the help of beautiful illustrations and archived photographs.

Since the arrival of the Europeans into the new found lands of the North American continent, species like the ivory billed woodpecker and the passenger pigeon have gone extinct due to rapid hunting and colonization. Each species has its own tragic tale on how it went extinct. The passenger pigeon gets its name from the French word 'Passanger' meaning passing by. A slender bird with long wings and a long tail, it was known for flying long distances in search of food. Found in large flocks, their numbers were estimated to be around 3–5 million during the early 19th century. The well-known American literary writer Mark Twain in his biographies wrote on the passenger pigeon:

'I remember the pigeon seasons, when the birds would come in millions and cover the trees and by their weight break down branches.'

Fuller is an acclaimed artist and has authored books like the *Dodo*, *The Lost Birds of Paradise* and has co-authored *Drawn from Paradise* with Sir David Attenborough. In this book he describes different aspects of the passenger pigeon in nine chapters. Fuller also dwells on the reasons the passenger pigeon did not survive the 20th century while many other birds like the Kakapo parrot in New Zealand did despite being heavily hunted. Over-hunting and destruction of the beech and chestnut forests which the pigeons were highly dependent upon were the main reasons behind the extinction of the species. Added to this was the fact that the passenger pigeon was evolutionarily adapted to survive in large groups. With the rapid destruction of woodlands for agriculture and development, areas that were vast enough to support large flocks of passenger pigeons were no longer available. Also, birds in such large flocks were an easy target for hunters. Initially the pigeons were hunted to provide cheap meals for the slaves. This later turned commercial and eventually ended up as a ritualistic sport with