sonalized Medicine by Olga Golubnitschaja, explores recent advances in digital health applications designed to effectively collect, process, and analyze large sums of data as health systems around the world are faced with an ever-growing body of information relevant to patients’ health status and well-being. Based on current challenges, one of the included studies, for instance, employed machine learning methods to identify relevant medical documents and then visualize relationships between extrapolated themes. Another study summarized the role of big data in healthcare with a particular focus on the information collected and stored on wearable devices and their utility in promoting health, preventing disease, and enabling proactive conversations between patients and their physicians.

Alongside the rise in patient-level data accessible for the development of personalized diagnostic strategies and therapeutic options, is the transition away from a one-size-fits-all approach to addressing the growing burden of chronic diseases across aging populations. Accordingly, Chaari includes articles specifically examining deep learning approaches to predict lung cancer risk, digital modelling methods to diagnose heart disease, and strategies for supporting older individuals affected by Alzheimer’s disease while also alleviating the burden placed on their caregivers. Studies addressing the latter ranged from the development of a more inclusive, multilingual memory-aid for elderly adults experiencing memory loss to the conceptualization of a system of home-based sensors that continuously monitor adults’ level of activity and ultimately guide whether professional assistance and caregiving are necessary.

As a collection of studies describing innovative approaches to integrating digital health technologies into the provision of precision medicine, these articles implicitly underscore the contemporary and future burden placed on global health systems along with the seemingly infinite volume of data generated through biomedical imaging scans, electronic health records, and other diagnostic and screening modalities. Future work in this space may benefit further from a more cohesive grouping of rigorous, evidence-based research that captures the practical applications of technology in precision medicine. Furthermore, this selection of studies – when combined with external evidence highlighting data privacy, security, ethics, and clinical considerations – offers readers a thought-provoking glimpse into how innovations in technology foster advances in health.

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Primary Care of the Solid Organ Transplant Recipient. Edited by Christopher J. Wong. 2020. Springer: Cham, Switzerland. ISBN (Hardcover): 978-3030506292. US $140.89. 340 p.

Primary Care of the Solid Organ Transplant Recipient edited by Christopher Wong serves as a practical guide for primary care providers (PCPs) caring for solid organ recipients. The stated audience includes PCPs, medical trainees, and anyone involved in the care of solid organ transplant recipients. Though the reader may not initially associate transplant recipient care and its complex postoperative concerns of organ rejection and immunosuppression, within the purview of primary care, Wong cogently establishes the importance of primary care in the post-transplant journey. (1) Patients may live far from transplant centers and require more local routine care, (2) PCPs often have a pre-existing relationship and may already be involved in their care, and (3) the number of patients receiving transplants continues to increase each year, and the population of transplant recipients and their chronic care may soon eclipse the resources at highly-specialized transplant centers. Undoubtedly, this book is a testament to the growth and establishment of the transplantation efforts in the United States and the importance of primary care as the backbone of patient health management.

Primary Care begins with an overview of solid organ transplantation and post-transplant anti-rejection medications. The book remains faithful to its stated goal as a handbook, with many of the following chapters functioning well as stand-alone resources in their given topic. The next section focuses on different organ transplants separated into distinct chapters (i.e., kidney, liver, heart, and lung). These chapters are parallel in organization, with helpful sections on transplant-related patient history-taking, clinical pearls, and graft function evaluation. The authors for each chapter take different approaches to describing the transplant processes, with some chapters including much more detail on the modalities for treating organ rejection, surgical approaches, and screening methods. For non-experts, it is unclear if this difference in detail reflects a difference in standards of care or in the individual authors’ discussion of new developments in their field. However, when the authors make clear that they are speaking specifically about non-standard care advances, it can be exciting and valuable for trainees to see how the field is developing.

The book concludes with a section featuring concepts common to all transplants such as infections, preventative health, and palliative care. Because the chapters are written in a way that they can be referenced individually, by necessity, some information may be repetitive when the book is read cover-to-cover, especially in this section where presenting concerns and screening guidelines may
be pertinent to multiple chapters. However, the final section is still able to summarize well without becoming too redundant. For example, the chapter on infectious diseases features helpful case vignettes to illustrate the approach to infection work-up; likewise, the chapter on common presenting symptoms includes useful charts with diagnostic steps and algorithms.

Overall, Wong has created a reference text that is easy to digest and well-suited for use in the clinic. The text’s outreach can easily extend beyond its intended audience of PCPs. While trainees, especially those training at tertiary care centers with access to transplant specialists as educators, may overlook the importance of a transplant patient’s continuity of care, this book underscores the breadth of considerations that could benefit from primary care expertise. As the field of organ transplantation grows, this text can support the collaboration between graft management and primary and preventative care.

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