

Rheumatology in Singapore – Moving Forward

Keng-Hong Leong,¹MD, FRCP (Edin), FAMS, Kok-Yong Fong,^{2,3}MMed (Int Med), FRCP (Edin), FAMS (Rheumatology)

The practice of Rheumatology and Clinical Immunology has made big strides in the last decade. The availability of immune modifiers, e.g. anti-cytokine agents, has changed the therapeutic landscape of arthritis treatment. What is refractory arthritis previously had now become controllable disease. Fan and Leong¹ had in this issue reviewed the use of biological agents in the treatment of rheumatoid arthritis and given us an overview of the evolving treatment regimens over the years. This experience is indeed repeated for other arthritis seen by rheumatologist in their clinics. The advent of biologics agents however do not exclude the need for better understanding of the epidemiology of rheumatological conditions. Howe et al² in their article reviewed seronegative spondyloarthropathy studies from the Asia-pacific region, bringing to the fore the collaborative research efforts among Asia-pacific rheumatologists. Thumboo and Strand³ touched on another important subject for rheumatologists who deal with chronic diseases daily. Treatment of chronic conditions have reached a level in which the question being asked is not “what is the mortality or survival rate” but “what is the effect on quality of life”. The importance of using health-related quality of life instruments to measure disease outcomes is paramount. The article dealt with systemic lupus erythematosus but the underlying principles are the same for other chronic rheumatic diseases. Today, information technology is widely harnessed for research and service, and transcends all disciplines. Immunology is no exception. The article by Chan and Kepler⁴ on computational immunology gives a snapshot of what’s possible and on the horizon. It promises to enhance the pace of immunology research as well as provides directions for new research areas. It is without doubt going to play an increasingly significant role in immunology research. Apart from the review articles, there is a good mix of letters, case reports and original articles dealing with research from the bedside to the bench. Clinical case reports and letters provide insights into particular aspects of rheumatic diseases. Hepatitis B infections are prevalent in Singapore and Thong et al⁵ reported the outcomes of chronic hepatitis B infection in local rheumatic diseases patients. It is of particular interest as corticosteroids and immunosuppressives therapy are used commonly in the treatment of rheumatic diseases, and rightly feared to be a factor in

causing hepatitis B infection flares. Xu et al⁶ reported on their study of cytokines gene polymorphisms in systemic lupus erythematosus (SLE) and Suppiah et al⁷ on cytokines levels in rheumatoid arthritis (RA). IL-18 promoter gene polymorphism (CC genotype) is found to be associated with SLE, while IL-1beta, IL-6, TNF-alpha and IL-18 proteins concentrations are elevated in RA patients. Conversely, TGF-beta levels are reduced in RA patients when compared to normal controls. The articles by Lim et al⁸ and Chong et al⁹ on patient satisfaction and value of joint aspiration respectively reveal important aspects of clinical management. They provide good insights into simple but important clinical research. The wide spectrum of rheumatic conditions studied as well as the various aspects of pathogenetic factors and clinical management published in this issue makes it a worthwhile effort, and highlights the active rheumatology and immunology research scene in Singapore.

REFERENCES

1. Fan PT, Leong KH. The use of biological agents in the treatment of rheumatoid arthritis. *Ann Acad Med Singapore* 2007;36:128-34.
2. Howe HS, Zhao L, Song YW, Springer L, Edmonds J, Gu J, et al. Seronegative spondyloarthropathy – studies from the Asia Pacific region. *Ann Acad Med Singapore* 2007;36:135-41.
3. Thumboo J, Strand V. Health-related quality of life in patients with systemic lupus erythematosus: an update. *Ann Acad Med Singapore* 2007;36:115-22.
4. Chan C, Kepler TB. Computational immunology – from bench to virtual reality. *Ann Acad Med Singapore* 2007;36:123-7.
5. Thong BYH, Koh ET, Chng HH, Chow WC. Outcomes of chronic hepatitis B infection in Oriental patients with rheumatic diseases. *Ann Acad Med Singapore* 2007;36:100-5.
6. Xu Q, Tin SK, Sivalingam SP, Thumboo J, Koh DR, Fong KY. Interleukin-18 promoter gene polymorphisms in Chinese patients with systemic lupus erythematosus: association with CC genotype at position -607. *Ann Acad Med Singapore* 2007;36:91-5.
7. Sivalingam SP, Thumboo J, Vasoo S, Thio ST, Tse C, Fong KY. In vivo pro- and anti-inflammatory cytokines in normal and patients with rheumatoid arthritis. *Ann Acad Med Singapore* 2007;36:96-9.
8. Lim AYN, Ellis C, Brooksby A, Gaffney K. Patient satisfaction with rheumatology practitioner clinics: can we achieve concordance by meeting patients’ information needs and encouraging participatory decision making? *Ann Acad Med Singapore* 2007;36:110-4.
9. Chong YY, Fong KY, Thumboo J. The value of joint aspirations in the diagnosis and management of arthritis in a hospital-based Rheumatology Service. *Ann Acad Med Singapore* 2007;36:106-9.

¹ Private Practice, Gleneagles Medical Centres, Singapore

² Department of Rheumatology and Immunology, Singapore General Hospital, Singapore

³ Department of Medicine, Yong Loo Lin School of Medicine, National University of Singapore, Singapore

Address for Correspondence: Dr Fong Kok Yong, Department of Rheumatology and Immunology, Singapore General Hospital, Outram Road, Singapore 169608.
Email: fong.kok.yong@sgh.com.sg