Biomedical Approach is Not Good Enough for Treating Severe Mental Illness

The understanding and treatment of severe mental illness (SMI) or psychosis constitute the core business of psychiatrists. Such illness is a major financial burden to our mental health service, because of the frequent need for hospitalisation to prevent mishaps. Even though in relative terms the prevalence of SMI is not high, majority of patients have early onset of the disorder, namely at the prime of their lives (around age 20 years) such that its impact on their functioning can be profoundly detrimental. After the onset of SMI, more than 80% will become our patients for the rest of their lives, no matter how infrequently they relapse.[1] These disorders are chronic and relapsing. Therefore, affected patients stay in our services longer than many others with chronic physical illnesses. Some of the patients are refractory to treatment, which leads to prolonged hospitalisation, and hence another burden.

Since ancient times, human societies have been trying to help insane people, especially for those with disturbed behaviour, by whatever methods they thought worth trying. Asylums were set up as places of sanctuary, with good will and in the hope that most mentally ill patients would recover by staying there, given time and care. However, just by removing patients away from environmental stress might not be an appropriate means of facilitating recovery. Rather, it could be viewed as a kind of marginalisation (away from the community) to maintain social order, rather to manage the patient's mental disorder.

Mankind kept on seeking physical means, so-called "somatic therapies" to help those with disturbed minds, or to control their disturbed behaviour. Some treatments for insanity were certainly barbaric by today's standard — the swinging chair caused severe vertigo, hydrotherapy using cold and hot water alternately for "bringing them back to their senses", and insulin coma therapy to knock them out for a while. Regarding "success" emanating from the physical treatment of psychosis, Wagner-Jauregg and Moniz must be mentioned. They won the Nobel Prize in 1927 and 1949 respectively, for their discovery of malaria therapy and leucotomy. These methods nonetheless became obsolete a decade later. Electroconvulsive therapy (ECT) was first used by psychiatrists to treat SMI in 1937, much earlier than any antipsychotic drugs.[2] It is still an effective treatment today for some psychiatric disorders. Cerletti and Bini were nominated for a Nobel Prize because of their revolutionary idea to apply electricity to induce seizures (rather than chemicals). Today, our understanding of ECT is still very limited despite decades of practice. The role of ECT in treating schizophrenia has diminished. In the last issue of the Journal, Chung et al[3] described their local experience of searching for a right 'dosage' of ECT energy in Chinese patients. Over the past decade, the number of ECTs per capita in Hong Kong has become far smaller than that in western countries.[4]

It was only until the advent of the "wonder drug", chlorpromazine in 1952, that more psychotic patients could become "sane" enough to be released from their asylums.[5] Different types of phenothiazines and other neuroleptics were quickly added to psychiatric armamentarium. Far more of the latter types of agents became available to doctors than antibiotics, although both drug categories first appeared in the 1950s. Nevertheless, there was a deterioration in the physical and mental health of many psychotic patients after their discharge from asylums in the 1960s. This was partly due to the rapid closing down of mental hospitals in the 1960s, in the belief that miraculous antipsychotic drugs were now available. Less-disorganised speech and behaviour, after attenuation of psychotic symptoms, lead to the inference that patients could live on their own in the community. In the West, radical humanistic movements advocated demolition of mental hospitals, without taking into account of patients' cognitive deficits, which contributed to their unhealthy living conditions, poor self-care, and impaired quality of life (QoL). Ironically, the humanitarian motive brought forth more physical ill health, destitution, homelessness, and imprisonment. Moreover, as the review by Lee[6] points out, second-generation antipsychotic drugs serially invented since the 1990s have turned out to have similar effectiveness as the more traditional agents. Thus, it seems that these novel medications are not a breakthrough in terms of improving neurocognition and overall functioning. Indeed, up to 30% of patients with schizophrenia are still refractory to antipsychotic drugs in terms of their positive symptoms.[1] Other approaches are therefore vital for the betterment of these patients with SMI, while they await the advent of another "wonder" drug.

Full recovery from psychiatric disorders is desirable but often unrealistic, especially for SMI. Improved QoL should be an important goal in our management plan and in designing our model for service delivery. In the 1970s, Stein and Test[7] demonstrated that assertive outreach directed to closely followed-up discharged patients with SMI by case managers in the community resulted in less re-hospitalisations as well as more patient satisfaction. This could be accomplished without additional financial resources, as less hospital beds were needed. What factors in the process could be responsible for such improved QoL? Osman et al[8] reported that QoL of patients with schizophrenia and major mood disorder in the community was related to the respective subject's employment status and compliance with psychotropic drug treatment. More and more evidence now shows that case management for SMI is cost-effective. Case managers, who know their patients well, could plan,

© 2010 Hong Kong College of Psychiatrists

implement, coordinate, monitor, and evaluate options and the services required to meet any patient's particular health needs. Case managers offer psychosocial interventions, which include cognitive-behavioural therapy for psychosis, social skills and vocational training, and family work to decrease carers' distress and expressed emotion. Success depends on a trusting relationship between the patient and case manager. Continuity of care from discharge onwards by the same staff member, and a high staff-to-patient ratio facilitate sound engagement and good rapport. Many inpatients are grateful for occasional visits even by layperson volunteers who will listen and talk to them. Despite their severe impairment in social cognition, patients still appreciate such continual care from health care workers, so long as it is sincere and allows ample time.

There is no obvious baptism of anti-psychiatry or de-institutionalisation movements in Hong Kong. However, the number of psychiatric beds per population has gradually decreased since 1990s; in 1985 the figure was 0.70 / 1,000 inhabitants and fell to 0.64 / 1,000 inhabitants in 2007.[9] Regrettably, this trend did not parallel any blossoming of community psychiatric services. A team of 3 community psychiatric nurses (CPN) was first formed in 1982 in Kwai Chung Hospital to provide outreach nursing care for patients with SMI and a propensity to violence. Establishment of this new service was obviously in response to the tragic massacre in a kindergarten by a long-defaulting patient.[10] It was only in 1994 that 3 community psychiatric teams (each comprising psychiatrists, social workers, occupational therapists, and CPN) were formed in Hong Kong. Though a decade has passed, our outreach teams still cannot be regarded as offering an assertive, case management–based community service, because of their low staff-to-patient ratio (around 1:70). Thus, basic tasks, like tracing defaulting patients, monitoring medication adherence and early signs of relapse, crisis interventions for full-blown relapses, and provision of support to families, are overwhelming. Besides, coordinating appropriate social resources to fit the psychosocial needs of individual patients, and helping them overcome their deficits in handling different social demands in a metropolitan city like Hong Kong are labour-intensive activities. Nonetheless, these services are pivotal to maintain the comfort level of such patients outside mental hospitals. A study by Wong et al[11] evaluated case management by social workers in 2 local halfway houses, and showed that the experimental groups endured less re-hospitalisations and fewer days as inpatients than control groups. Although this was a small study, it was local and can serve to advise the Hong Kong SAR Government to follow global trends, by injecting more resources into community psychiatric services. More local studies to vindicate the cost-effectiveness of case management in the setting of Hong Kong are awaited.

An announcement in the 2009-2010 policy address[12] of the Hong Kong SAR Government appears to signal a change in mental health policies. It mentions strengthening the support for people with SMI in the community, by adopting the case management approach starting in 3 out of 18 districts, and was supposed to be a customised and intensive programme. This policy may be expected to achieve a much more acceptable staff-to-patient ratio in the years to come. The policy address also mentioned extension of the existing Integrated Community Centre for Mental Wellness from 1 to all districts. Hopefully, the current situation with fragmented community programmes, like Community Link (ComLink), Community Care (ComCare) and Community Mental Health Intervention Project (CoMHIP) will become integrated or more coordinated at least. By this means, these centres should then be able to serve our patients better. Certainly, difficulties are waiting for us just round the corner. For example, there is a shortage of CPN, suitably trained paramedical personnel such as occupational therapists and social workers who could become case managers. There may be skill mix issues among case managers from different professional backgrounds.

Dr Dicky WS Chung, MBChB, MSocSc, MRCPsych, FHKCPsych, FHKAM (Psychiatry)
Email: chungws@ha.org.hk
Chief of Service and Consultant, Department of Psychiatry, Alice Ho Miu Ling Nethersole Hospital, Tai Po Hospital, and North District Hospital, Hong Kong, China.

References

1. Jones PB, Buckley PF. Schizophrenia. Philadelphia: Churchill Livingstone/Elsevier; 2006.
2. Taylor S. Electroconvulsive therapy: a review of history, patient selection, technique, and medication management. South Med J 2007;100:494-8.
3. Chung JP, Yim PH, Dunn EL. Clinical and treatment characteristics of Chinese patients undergoing electroconvulsive therapy in an acute psychiatric unit in Hong Kong. Hong Kong J Psychiatry 2009;19:150-4.
4. Chung KF. Electroconvulsive therapy in Hong Kong: rates of use, indications, and outcome. J ECT 2003;19:98-102.
5. Andreasen NC. The broken brain — the biological revolution in psychiatry. New York, Perennial Library; 1985.
6. Lee E. Clinical antipsychotic trials of intervention effectiveness in schizophrenia: selective review on clinical outcomes. Hong Kong J Psychiatry 2009;19:26-9.
7. Stein LI, Test MA. Alternative to mental hospital treatment. I. Conceptual model, treatment program, and clinical evaluation. Arch Gen Psychiatry 1980;37:392-7.
8. Osman CB, Badli MM, Ainsah O, Suthahar A, Salmi R, Azlinawati NM, et al. The comparison of quality of life among patients with schizophrenia and major mood disorder in remission in Hospital Universiti Kebangsaan Malaysia, Kuala Lumpur. Hong Kong J Psychiatry 2009;19:4-10.
9. Annual report 2007-2008. Hospital Authority, Hong Kong SAR website: http://www.ha.org.hk/visitor/ha_visitor_index.asp?content_id=141312&lang=ENG. Accessed 21 Feb 2010.
10. Lo WH. A century (1885 to 1985) of development of psychiatric services in Hong Kong — with special reference to personal experience. Hong Kong J Psychiatry 2003;13:21-9.
11. Wong DF, Yeung MP, Ching CK. Evaluating a case management model for people with severe mental illness in Hong Kong: a preliminary study. Hong Kong J Psychiatry 2009;19:11-7.
12. 2009-10 Policy Address. HKSAR Government website: http://www.policyaddress.gov.hk/09-10/index.html. Accessed 21 Feb 2010.