Enhancement of Efficacy and Efficiency in Delivery of Physiotherapy Service in Adolescent Idiopathic Scoliosis

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Introduction
Adolescent idiopathic scoliosis is a major spinal disorder managed in Duchess of Kent Children's Hospital. Physiotherapy plays an important role in the conservative management. Patients are usually allocated to different therapists; undergo individual assessment and management, with subsequent follow-up according to individual condition.

Objectives
To streamline the present work on scoliosis outpatients and to improve the efficiency of the service management in physiotherapy department.

Methodology
Patients were triaged into two groups according to the requirement of bracing. Class was arranged for patients without need of bracing due to (1) mild deformity although skeletal immature (2) almost reaching skeletal maturity. Scoliosis class was arranged within one month from the date of patient's referral and no more than 8 patients were recruited in one session. Their relatives were encouraged to participate actively with the patients. First session of the class started with educational talk which introduced general concepts and management of idiopathic scoliosis, aiming to facilitate the communication between the patients, relatives and clinical staff; it helped to minimize misunderstanding and worries, encourage active participation of the patients and relatives. Important of exercises was explained. Practical session was included to introduce the exercise program with pamphlet provided. Patients’ condition and exercise performance were reviewed in the subsequent F/U session 2 months after. Then patients would be discharged with home exercise program.

Result
Results: The new scoliosis class started since July 2012. Thirty-four patients had been attended with age from 10 to 18 (mean:13.7). There were 73.5% females and 26.5% males. From the patients' questionnaire, 88.9% patients agreed that both the
talk and exercises were useful. Patients agreed to have benefit on ‘reduction of worry and fear’, ‘understanding of medical terms’, ‘building communication channel’, and ‘enabling active participation of parent and patient’ with 44.4%, 55.6%, 33.3% and 55.6% respectively. Patients agreed to have benefit on ‘maintaining spine flexibility’, ‘strengthening back muscles’, ‘enhancing back muscle control and coordination’ and ‘preventing back pain’ with 66.7%, 66.7%, 77.8% and 44.4% respectively. Conclusion: Scoliosis class could be an effective and efficient way in management for the idiopathic patients