COMMENTARY

Improving Quality of Life Among Cancer Patients in Malaysia

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Abstract

There are an almost infinite number of states of health, all with differing qualities that can be affected by many factors. Each aspect of health has many components which contribute to multidimensionality. Cancer and its' related issues surrounding the treatment plan contribute to the variety of changes of quality of life of cancer patients throughout their life. The objective of this article was to provide an overview of some of the issues that can affect their quality of life and initiatives towards successful care in Malaysia by reviewing relevant reports and articles. The current strategies can be further strengthened by prevention of cancer while improving quality of service to cancer patients.

Keywords: Quality of life - cancer - health cancer service - Malaysia

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Introduction

There is no single agreed definition of health related quality of life but it is more often than not considered as existing relative to individual or cultural expectations and goals. Health –related quality of life (HRQOL) refers to "the physical, psychological, and social domains of health, seen as distinct areas that are influenced by a person's experiences, beliefs, expectations, and perceptions" (Testa and Simonson 1996). A quality of life (QOL) is determined by "The extent to which hopes and ambitions are matched by experience", "Individuals' perceptions of their position in life taken in the context of the culture and value systems where they live and in relation to their goals, expectations, standards, and concerns", "Appraisal of one's current state against some ideal" and "The things people regard as important in their lives" (Carr & Higginson, 2001).

There are an almost infinite number of states of health, all with differing qualities that ranges between extreme conditions to that of a fully healthy life. Each aspect of health has many components such as symptoms; ability to function including self-care and mobility; or depression or anxiety from an emotional aspect; and disability, in which all of these domains contribute to a multidimensionality of QOL (Testa & Simonson, 1996). A study of QOL or more correctly 'good QOL' was commented to be difficult for two reasons which is problem in defining and quantifying QOL and of comparing one individual with another (Calman, 1984).

Unaddressed spiritual needs may jeopardise healing. Religious involvement is a widespread practice that predicts successful coping with physical illness (Koenig, 2000) A decreased of QOL occurs when hopes do not meet with the experience. QOL changes with time and can vary greatly. The priorities of an individual must be realistic

and would therefore be expected to change with time and be modified by age and experience. To improve the quality of life for cancer patient therefore, it is necessary to try to narrow the gap between hopes and aspirations, and what actually happens and to conduct an "evaluation of any intervention to modify quality of life is essential" (Calman, 1984).

Since expectations regarding health and ability to cope with limitations and disability can greatly affect a person's perception of health and satisfaction with life, two people with the same health status may have very different QOL. QOL can be changed by the instant effects or the longer-term consequences of treatment. The role of quality of life in determining the net benefit of therapy for a chronic disease is illustrated in the hypothetical model (Testa & Simonson, 1996). Treatments regimens produced immediate effects on the patient's QOL for various possible reasons for instance an increase in side effects, a decrease in symptoms, or a change in lifestyle. These effects can in turn modify the patient's compliance and affect the risk of long-term complications of the disease. The decreased risk of long-term complications includes increases in the amount of time during which the patient experiences better health and well-being and therefore measuring QOL should take in consideration in relation all of these

QOL is used as an endpoint of new therapeutic strategies. QOL changes and treatment effects in a cost-effectiveness research help clinicians interprets benefits of treatment choices and assists health policy planners for in setting priorities or to justify associated increases in expenditures for health care (Testa & Simonson, 1996). QOL is a relevant end point of that treatment of fatal diseases often results in limited gains in survival or cure in major cancer diagnoses (Editorial Lancet, 1995).

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Effective prevention of infectious diseases and better nutrition has resulted in more people surviving into old age, increasing life expectancy among Malaysians to 71.7 years for men and 76.5 years for women (Poi et al., 2004; WHO, 2010). Aging population is inevitable in Malaysia in keeping pace with other developed countries. The number of Malaysians aged 60 years and above is rising steadily from 5.7% in 1990 to 6.3% in 2000 and is expected to be 9.8% in 2020 (Mafauzy, 2000). Declining of global fertility rates and falling mortality rates due to improvements in the health system contributes in aging population (Mafauzy, 2000).

If a society is faced with an ill ageing society and the 'sandwich generation' is burdened economically to support their ageing parents on top of their own growing children, then the workforce will be greatly strained (Selvaratnam et al., 2010). More burdens can be assumed in a condition where a limited number of informal carer is available in a house that lives together with an elderly that is suffering of a cancer. Social change transformed the traditional extended families into nuclear families thus the changing in family structure means reducing social support for elderly (Norzareen & Nobaya, 2010). Based on the NHMS III report, the greatest impact of functional independence in the elderly is on mobility, self care, housework and access to public places. The survey also reported higher prevalence of chronic pain in the elderly which interfered with their daily activities (NHMS III 2006). The cost of health care will increase due to the escalating burden of chronic illnesses in an ageing population.

Importance of Managing QOL in Cancer Patients

It is becoming increasingly difficult to ignore the affected cancer patient with poor quality of life who needs more attention and supportive cancer care. Generally, QOL is better without cancer but cancer is preventable by healthy behaviours such as smoking cessation, healthy eating, and regular physical activity and early detection of cancer can improve the QOL and increase likelihood of survival (Rowland et al., 2011).

Improvements in diagnostic and therapeutic techniques for malignant disease have resulted in cancer to be curable and prolongation of survival some patients with tumours that remain incurable (Liang et al., 1990) for instance an acute lymphoblastic leukemia of children (Schipper et al., 1984). Early detection, seeking proven treatment at curable stages and patients' adherence to the cancer treatments are some of the important steps in prolonging the length and QOL of cancer patients as well as reducing the cancer burden on the health care system. Malaysia is a country of multiethnic populations with different cultural and educational backgrounds, thus the evaluation of knowledge and perceptions of cancer and its treatment is necessary for a greater understanding of the causes for the late cancer stage presentations.

There are issues related to cancer that need for effective cancer management to improve the patient's QOL. For example of bone metastases, which is the secondary manifestation of cancer, can cause a wide range of symptoms and complications, such as pain, hypercalcemia, pathologic fractures, and spinal cord compression, which severely affect patients' health-related QOL (Castellano et al., 2011), bone marrow failure (Sehbai, 2008) and are a major cause of ca morbidity (Dhillon & Lyseng-Williamson, 2008). Bone metastases represent the highest tumour burden in the body, and appear to be more resistant to treatment than visceral metastases (Bagi, 2005).

Women diagnosed with breast cancer experienced very stressful life event associated with distressing symptom \$00.0 which may begin with diagnosis, continues after completion of adjuvant therapy, and may decrease QOL (Ögce & Özkan, 2008). Patients themselves need support 75.0 in QOL and demand more insight into the concomitants of their disease and its treatment. Hafslund et al. (2011) studied the changes in anxiety, depression, and HRQOL among women with false positives results of breast50.0 cancer diagnosis showed discrepancy in mental health and general health between people with false positive and negative results at six months after screening. Digital 25.0 mammography and its high resolution might increase the number of false positive results and confirm the need for good information. Efforts should be made to minimize 0 anxiety at recall and increase in depression and reduction in QOL after screening.

Treating one symptom in cancer may not necessarily improve functional aspect of cancer patient. The psychosocial intervention for cancer patients should include on principal areas of family interaction, effective stress management, and access to information (Liang et al., 1990). Priscilla in 2011 evaluated QOL in haematological cancer patients in Hospital in Kuala Lumpur, found four most prevalent symptoms that were fatigue, financial difficulties, reduced role function and reduced social function. The questionnaire measures the QOL of cancer patients by EORTC QLQ-C30 comprised of a total of 30 questions with three different scales (functioning scales, symptoms scales and a global health status scale) showed that the patients under active treatment displayed reduced physical functioning, poor appetite and fatigue compared to patients in non-active treatment which in turns all of these aspects frequently contributed to a poor quality of life. Author also reviewed other studies showing that the QOL of haematological cancer patients worsens before and after seven days of treatment in the context of their physical status, energy level and systemic symptomatology. This is followed by fluctuations in their depression level where a marked increase of depression level also leads to poor physical health status after intensive treatment.

The adverse effects of treatments and its psychological effects on patients' QOL that were wrongfully perceived as severity of side effects could be a reason for defaulting proven therapies. Cancer patients' knowledge about cancer and experiences with its treatment play an important role in long-term adherence in their disease management. Farooqui et al. (2011) explored cancer patients' experiences, knowledge on cancer and their perceptions towards conventional cancer therapies among adult cancer patients in Penang Hospital, Malaysia found

consistent findings with others. This is where fears of undesirable effects of surgery on the body and side effects due to chemotherapies were a few of the initial reasons in delays in seeking cancer. However, perceptions were reported to change after receiving treatment when effective management to reduce the risk of side effects had been experienced and support patients' preference to continue with modern therapies. Additionally, it has been found that an effective anti-emetic regimen improves cancer patients' compliance.

Filiz Ögce and Sevgi Özkan (2008) determined that worsening of functional status of breast cancer women was associated with chemotherapy where more physical and psychological discomforts were experienced. Symptoms associated with cancer worsen after chemotherapy which may also cause new symptoms such as nausea or vomiting and hair loss. The poorest functional status including inability to perform household chores, work and social activities is more associated with chemotherapies in comparison with other phases of treatment (Lee et al., 2005).

Surgery treatment in cancer patients effects QOL. Mastectomy with axillary clearance is still a mainstay treatment for breast cancer in Asia Pacific region especially for those presented with late staged operable disease (Choong et al., 2010). Win et al. (2005) showed a potentially operable lung cancer patients had a reasonable QOL compared with general lung cancer population where a lung cancer surgery had only short term negatives effects on QOL, but these effects disappeared by six months after surgery. Some clinically relevant decline in certain aspects of HRQOL can be predicted by factors known before surgery as shown by Mo"ller and Sartipy (2011) that include the extent of surgery and age. Lau Peng Choong et al. (2010) discussed about patient with breast tumour in Malaysia where authors had showed that cancer recurrent is still occurring despite of surgery and radiotherapy. Margin involvement and Stage III cancer disease were identified to be independent prognostic factors for isolated post-mastectomy loco regional recurrence. Different regions of the world might have different pattern of disease

People lives many years after diagnosis with the advances in early detection and treatment of cancer. Impact of cancer on family members, friends, and caregivers of survivors is acknowledged as part of survivorship of cancer patient. In United States of America, a majority of cancer survivors are females and aged more than 65 years because of cancer among women (for example breast or cervical cancer) usually occur at younger age, detected early and treated successfully leading to longer life expectancy than men. Among men, a considerable number of cancer survivors had prostate cancer, which is diagnosed more commonly among older men (Rowland et al., 2011).

The effects of medical treatments and programs on QOL should not be ignored simply because such effects are difficult to measure (Testa & Lenderking, 1992). Studies showed that majority of caregivers are very much unprepared for responsibility of elderly care. 63% of caregivers have no plan as to how they will pay for

their parent's care over the next five years while 62% agreed the cost of caring for a parent has impacted their ability to plan for their own financial future. About 34% spend \$300 or more per month out of pocket budget for care giving expenses, 54% sacrificed spending money on themselves to pay for care of their parents, 40% of caregivers reported paying out of pocket cost to provide care for their family members: transportation (81%), non prescription medication (71%), medical supply (51%), prescription medication (43%) and equipments (41%) (Decim, 2002). More burdens can be predicted to care for elderly diagnosed of having cancer. Number of persons living with a history of cancer is expected to increase for instance in United States of America increased from an estimated 3.0 million to 9.8 million from 1971 to 2001 and as of 2007, it was expected to increase to 11.7 million, or 3.9% of population (Rowland et al., 2011).

Informal care giving can have noneconomic consequences for the carer leading to a decline in QOL. Physical deterioration of physical health of the carer as well as social and interpersonal relationship are all the implication that faced by the caregiver in giving long term care for the elderly. A significant social implication of family care giving includes disruption of household and work routines; conflicting multiple role demands, and restrictions on social and leisure activities and emotional psychological impact of care giving namely depression and anxiety (Decima, 2002).

A study in University Kebangsaan Malaysia Medical Centre showed there is a difference between perceptions of breast cancer patients and the nurses with regards to the important information needed. A paradigm shift, with an emphasis on patients as central focus, is needed to enhance information giving sessions conducted by nurses based on perceptions of patients themselves (Lei et al 2011). Communication is thus vital between patients and provider because appropriate and accurate information assists patients to understand expected outcomes and to deal with unfamiliar experience.

Due to the incurable nature of cancer, patients suffer side effects including pain, anorexia and fatigue, which not only shorten life but also decrease the QOL. Severe bone pain may require strong narcotics or palliative radiation therapy (Coleman, 2004). The aim in these patients is to prevent skeletal complications, palliate pain, and maintain HRQOL such as improved mobility and function (Morgan & Wagstaff, 2009) and if possible, prolong survival (Bagi, 2005). Carefully titrated opioid doses are well tolerated and significantly improve the cancer patients' QOL. All opioids are considered effective in cancer pain management including for elderly (Pergolizzi et al., 2005). Effective treatment of chronic pain improves overall QOL, including maintenance of function and interaction with family and friends and pain management is a fundamental human right (Brennan et al., 2007).

Malaysia's Strategies in Improving Quality of Life among Cancer Patients

Malaysia has taken various measures to improve the QOL of cancer patients since 1990's. Among the measures

that have been done were development of National Cancer Control Program (NCCP), developments in the field of cancer research, the existence of National Cancer Registry and Non-Governmental Organisations (NGOs) involvement.

National Cancer Control Program (NCCP)

NCCP was launched in 1997 by Ministry of Health Malaysia (MOH) and integrated within existing health services at the primary, secondary and tertiary levels. It aims to reduce the incidence and mortality due to cancer and to improve the quality of life of cancer patients (Lim, 2002).

Inside NCCP, emphasis was placed on the optimum utilization of available resources, appropriate use of technology and active community participation to achieve the targeted goals. Key points include strengthening the health education and preventive measures through appropriate dissemination of cancer information to the public, screening and early diagnosis of cancer, prompt and effective cancer management, rehabilitation, palliative care and involvement of traditional and complementary medicine (Lim, 2002).

Health Education and Prevention

This strategy is aimed directly to reduce the prevalence of risk cancer through increase the public awareness and knowledge of cancer and its associated risk factors. This in turn will improve the general knowledge related to cancer and trying to avoid the risk factors involved as well as working to help cancer patients who are suffering (Lim, 2006). Among the measures taken to ensure the success of this strategy was strengthening the cancer risk factors intervention programme that promotes risk factors and lifestyles modification towards healthy lifestyles. For example is the tobacco control program, through legislation, anti-smoking campaign and quit smoking clinics (Lim, 2001). Among others is through the promotion of healthy diet, physical activity and alcohol increase at control. In addition, vaccination programme such as Hepatits B exposure prevention (1989) and HPV vaccination (2010) (Saidatul & Rohani, 2010) has been given as measures to reduce the prevalence rate of cancer. However, this all requires collaboration with other government, private agencies and NGOs.

Screening and Early Detection

Early detection improves the chances of curing cancer and is crucial in improving the chances of survival (Lim, 2002; Natilia, 2005). This will indirectly influence the QOL of cancer patient as with early detection, better QOL can be offered. In Malaysia, there are no population-based cancer screening programs before 1995. Started from 1995, government launched cancer prevention campaign and stressed breast self-examination (BSE) and yearly examination for women aged 20 years and above (Chan, 1999). And in the same year, the pap smears was extended to all women who have been or are sexually active and are aged 20-65 years (Chee et al., 2003).

Diagnosis

In Malaysia, as in other developing countries, cancers are typically diagnosed in late stages for example in Sarawak Borneo, the three commonest cancers were presented at an advanced stage in at least 70% of the cases (Tang & Devi 1996). The reasons include delay in access to public hospitals because of waiting lists, cultural beliefs, and misconceptions that lead people to prefer treatment by traditional healers (Hisham & Yip, 2004). With this advance stage, the quality of life of cancer patients is usually affected. In view of this late in diagnosis, Malaysia has taken several strategies to ensure prompt diagnosis and early treatment initiation of cancer patient, this involved to re-organise the histopathology diagnostic services into regional centres, upgrading the scope for pathology, radiology and nuclear medicine services and establishing molecular profiling for cancer genetic services.

Treatment

There is a need for effective cancer management to improve the patient's quality of life (Priscilla et al., 2011) and these involve multidisciplinary effort (Lim, 2001). Physicians must help patients to overcome the situation by offer balanced pharmacotherapy and psychotherapy support (Priscilla et al., 2011).

Nowadays, there are numerous modalities of treatment for cancer management include surgery, radiotherapy, chemotherapy, hormonal therapy, immune therapy, symptomatic and supportive therapy. In Malaysia, currently there are only a few public oncology centres such as in Kuala Lumpur Hospital (Adult Haematological Malignancies and Paediatric Oncologist), Sultan Ismail Hospital, Johor Bahru and Sarawak General Hospital. Accessible and equitable to this facilities and affordable treatment for the patient are important aspect of health care delivery for cancer patient (Lim, 2006) and thus MOH need to improve (replacing or upgrading)/ set-up new treatment and oncology centres/services.

Traditional and Complementary Medicine (TCM)

Eisenberg et al. (1993) defined Traditional and Complementary Medicine as field of health care outside or beyond the traditional, allopathic, or Western biomedical medicine. Meanwhile, Malaysia Medical Act 1971 defined as practice is other than Malaysian practice of medicine or surgery by registered medical practitioners (MOH 2001). T&CM offer cancer treatment by relieving pain and suffering through acupuncture, massage, meditation, yoga and use of herbal preparation that undergone clinical trial testing. However, up to date, there is no clear theoretical model to count the increasing use of this method, but Avina (1987) concluded that patient seek TCM due to their dissatisfaction and thought of ineffectiveness toward conventional study. Meanwhile, Molassiotis (2006) stated that other reason why people use this alternative is to avoid the severe side effect of chemotherapy.

Rehabilitation

Rehabilitation and physical activity intervention are effective tools to prevent premature mortality and improving the patient's QOL (Saggini et al., 2008). This

service aims to increase in independence and quality of life by providing services to all patients who would need and benefit from it. In Malaysia, the rehabilitation services will evolve basic services in all general and district hospitals and establish networking with health clinics but mainly of them are in private sectors such as the renowned private hospitals Ampang Puteri Specialist Hospital, Tawakkal Specialist Hospital, Damai Service Hospital, Gleneagles Medical Centre Penang, Gleneagles Intan Medical Centre and Sunway Medical Centre.

Palliative Care

Palliative Care was introduced by non-governmental organisations (NGOs) in Kuala Lumpur and Penang in 1991, by the Ministry of Health in Sabah in 1995 (Lim, 2006). Currently, there are 11 Palliative Care Units and 48 Palliative Care Teams in various hospitals in the Ministry of Health, and 17 hospice organisations (NGOs) under an umbrella organisation called the National Hospice Council that was formed in June 1998. Ministry of Health was setting-up Selayang Hospital since 2002 as a palliative centre facility and regional centre for pain control to ensure adequate use and supply of oral morphine and other appropriate treatment (Lim 2006).

One of the important modalities in palliative care is pain management. Lim (2008) reported that there are about 45,000 of cancer patient suffered with cancer pain in Malaysia. Ministry of health Malaysia (MOH) has taken an effort to overcome this with development of Clinical Practice Guideline for Management of Cancer Pain to provide evidence-based guideline to optimise pain control with minimal side effects and adverse outcome, enhance well-being and improve QOL of patients with cancer pain (MOH 2010).

Research

Research is a crucial component in winning the fight against cancer. Findings from studies on lifestyles, presentation of disease, diagnostic tests, and interventions in cancer prevention, treatment, palliation and rehabilitation are necessary to define and refine the strategy against cancer in Malaysia (Natilia, 2005). From this studies result, the quality of care and QOL of cancer patients can be improved.

In Malaysia, MOH together with universities, professional bodies, private sector and non-governmental organizations (NGOs) are looking into various issues and redefining priorities in cancer research. For examples, local cancer centres have participated in multicenter trials, such as those on novel anti-cancer drugs (Hew et al., 1996), and in studies exploring ways of decreasing the morbidity of cancer treatment, such as emesis control (Lim et al., 1994). The possible studies in the future may include investigations on herbal medicine for their anticancer properties and looking for new molecular targets for screening (Lim, 2002).

Surveillance: National Cancer Registry (NCR)

NCR (population-based) of Malaysia was established in 1987 and officially launched in 1988 to provide information on the epidemiology, diagnosis and survival

DOI:http://dx.doi.org/10.7314/APJCP.2012.13.3.1069 Improving Quality of Life Among Cancer Patients in Malaysia of cancer cases in Malaysia (Rosemawati and Sallehudin, 2001). Apart from that, the registry also enables the healthcare provider to evaluate and compare the outcome of the patient including quality of life outcome and effectiveness of the treatment (Malaysia Clinical Research Centre, 2011). This registry involves passive notification using a standard notification form issued by the Epidemiology Unit, MOH. Initial states which participate in this surveillance are Penang (1994) and Sarawak (1995).

Non-Governmental Organisations (NGOs) Involvement

NGOs are actively involved in various aspects of cancer welfare. The examples of NGOs are National Cancer Society of Malaysia, National Cancer Council (MAKNA) and Cancer Link Rotary Clubs. Among activities from this NGOs are cancer education, cancer counselling services, psychological support for cancer patients, welfare services, organization of national and international symposia, providing therapeutic facilities and setting up a half-way home for paediatric oncology patients undergoing treatment (Lim, 2001).

Challenges to Increase Quality of Life of **Cancer Patient in Malaysia**

Burden of Cancer in Malaysia

Cancer has been reported as the fourth leading cause of death in Malaysia (Malaysia Health Facts, 2010) and indeed constitutes a serious national health crisis. There were estimated to be about 27,000 cancer patients in Malaysia in 2008. Until 2008, the incidence of cancer in Malaysia is estimated to be around 32,000 new cancer cases. The standardized incidence rate is 142.9/100,000 population for both sexes. Breast cancer is the leading of the cancer origin, followed by colorectal carcinoma, lung cancer, cervical cancer and nasopharynx carcinoma (GLOBOCAN, 2008).

Human recourses

Despite growing numbers of healthcare centres and healthcare providers, Malaysia is still facing a serious shortage of human resources as the number of population is increasing and the demand for better healthcare is escalating. The number of specialists needs to be increased in order to cope with the burden of cancer in the country. Up to 2008, Malaysia only has 45 Clinical Oncologists. These mean that Malaysia needs to produce another 150-200 Clinical Oncologists to ensure the targeted doctor: population ratio of 1:100,000 is to be achieved. These numbers clearly shown that Malaysia currently facing a serious shortage of human resources to run the health program especially in the government sector and these issues should be given the top most priority to ensure more success in the implementation of any health program for cancer prevention and treatment (Lim, 2006; Rushdan, 2008).

Increasing cost of treatment

Although there have been improvements in cancer treatment, these new therapies may potentially cause

an exponential increase in the cost of cancer treatment (Lim & Azura, 2008). For example, in 2005, the total expenditure for Malaysia on all prescription drugs was about RM2 billion (Lim & Azura, 2008). Moreover, all cancer diagnostic and therapy equipment within Malaysia has been imported. There is no local production and estimated about \$65.87 million required to imports of cancer diagnostic and therapy equipment in 2004 (Natilia, 2005).

Facilities inadequacy

Up to year 2006, there were 19 centres for Radiotherapy and Oncology whereby comprising 5 government centres and 14 private centres. Apart from that, 41 hospitals in the Ministry of Health are providing chemotherapy services in addition to universities and the private sector (Lim, 2006). Furthermore, in order to decrease the burden on government centres, the government has purchased private radiotherapy services from Mount Miriam Hospital, Pantai Mutiara Medical Centre, Mahkota Medical Centre, Pantai Ayer Keroh Medical Centre, Nilai Cancer Institute, Gleneagles Oncology Centre and Sabah Medical Centre. These existing centers require upgrading from time to time with the replacement of old machines and the installation of new more technologically advanced machines (Lim, 2006).

Recommendations

QOL is one of the important aspects of health care outcome and need to be one of the priorities for healthcare providers. Malaysia has taken the right steps in realizing this. However, there are a few strategies that still can be improved and strengthen. The priorities for Malaysia may include training of more oncologists and allied health staff, upgrading and replacing aging machines in various government cancer centres and strengthening programs for palliation and consolidation of existing cancer treatment programs.

Apart from that, evaluation towards every single cancer programme should be done periodically to ensure effective and efficient health care delivery to the cancer patient. Furthermore, further studies on QOL among cancer patient, lifestyles practices, diagnostic tests, interventions in cancer prevention, treatment, palliation and rehabilitation are necessary to refine the strategy against cancer in Malaysia.

Conclusion

Cancer is a serious national health issues and could influence directly on patient's QOL. Positive measures need to be taken and implemented in relation to improving the QOL of cancer patient. Malaysia fulfils most of the health indicators standard but more comprehensive interagency collaboration needed to tackle the increasing burden of cancer more effectively and efficiently. Malaysia has to take action now before the burden of cancer significantly impacts on the economic growth of the nation.

Existing programs should best update and all

challenges must be overcome with well planned strategies. Prevention measures should also be part of these strategies which include regulatory intervention in creating a health-promoting built environment in Malaysia, lifestyle modification and control of a few common risk factors that underlie the major categories of cancer. The aging population is inevitable in Malaysia; therefore generating new challenges in health and social services. Preparation for long term care and acute care for elderly, which involved every aspects of elderly care is essential as part of comprehensive planning for quality health care services.

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