Position Statement of The Royal College of Physicians of Thailand and The 5 Societies of Medical Specialties (Dermatology, Cardiology, Hematology, Nephrology and Neurology) on Clinical Use of Stem Cell Therapy

During the previous few decades, there has been much advance in research and technology in the field of stem cells and their therapeutic applications. Several sources of stem cells including embryonic stem cells and mesenchymal stem cells (or stem cells derived from adult tissues) have been utilized for research studies. However, to the best of medical and scientific advancement, it can be concluded that the sources of stem cells that can be obtained for clinically effective therapeutic use are only from bone marrow, peripheral blood and umbilical cord blood. Moreover, it can be used only for patients affected with a certain group of blood (hematological) diseases.

The Royal College of Physicians of Thailand; in conjunction with the Dermatological Society of Thailand, the Heart Association of Thailand under the Royal Patronage of H.M. the King, the Thai Society of Hematology, the Nephrology Society of Thailand and the Neurology Society of Thailand; shall endorse therapeutic use of stem cells in human only for the following blood diseases: leukemia, malignant lymphoma, aplastic anemia, multiple myeloma and thalassemia. Although there are clinical researches on use of stem cells in various other diseases, there is no scientifically relevant evidence to confirm that stem cell therapy is significantly effective in man for increasing longevity, delaying organ degeneration or improving quality of life of the patients over a long-term period in the following diseases / conditions: aging, degenerative diseases of internal or external organs, such as brain, heart, kidney, or others. Stem cell therapy is not recommended or included as a treatment in standard clinical practice guideline of any disease except the 5 hematologic diseases mentioned above. Moreover, inappropriate use of stem cell therapy may be harmful to patients. The patients may develop hypersensitivity reaction (allergy), clotting in the blood vessels, contamination into blood stream with impurities, foreign protein materials, chemicals,
microbial organisms, and other unpurified type of cells or, in the worst scenario, cancer-transforming cells.

Inappropriate use of stem cells in human is increasing not only in Thailand but also in many other counties worldwide. Perhaps, this is due to gap difference between patient’s hope to be cured from illnesses and the fact that current medical science and technology can not fulfill all of their wishes. It is also the gap between those who do not know about medical science and those who are supposed to explicitly know. Therapeutic use of stem cells in man is a delicate issue and may have serious consequence with respect to medical ethics, standard of clinical practice and patient’s health.

On behalf of the Royal College of Physicians of Thailand, the Dermatological Society of Thailand, the Heart Association of Thailand under the Royal Patronage of H.M. the King, the Thai Society of Hematology, the Nephrology Society of Thailand and the Neurology Society of Thailand, we declare that stem cell therapy could be endorsed for use in man only for treatment of the 5 hematologic diseases mentioned above. At the moment, it should not be used for treatment of other diseases. However, if it is intended to do so, it must be only for research purpose. The research protocol as such must be complied with good conduct on clinical research practice, be approved by ethical committee for research in human, be in accord with the rules and regulations previously declared by the Thai Medical Council. Lastly, such clinical trial must be free-of-charge at all costs to the enrolled subjects.

This Position Statement was declared on the 6th of September, 2013.

The Royal College of Physicians of Thailand.
The Dermatological Society of Thailand
The Heart Association of Thailand under the Royal Patronage of H.M. the King
The Thai Society of Hematology
The Nephrology Society of Thailand
The Neurological Society of Thailand