

SSC Subcommittee Project/Collaborative Project

- Name of the Project: **STANDARDIZATION OF METHODS FOR PERFORMING THE CLOT WAVE FORM ANALYSIS**
- Person responsible (Chair / Principal Investigator): Dr. Midori Shima (Japan)
- Members: Dr. Sukesh Nair (India)
 Dr. Jecko Thachil (UK)
 Dr. Alok Srivastava (India)
- Aim / Mandate of the project: The mandate of the project will be to propose methodology that may be considered to be the recommended way to perform the clot wave form analysis so as to bring standardization in studies performed using this method and the literature.
- Methodology: Several variations of the method to perform the clot wave form analysis exist in the literature with regard to reagents, instrument and interpretation. The project members will review published literature and data on file in their own laboratories on this test, correlate with available clinical data and propose a method that will then be considered the recommended way to perform and interpret this test. The test performed in this way may then be assessed for applications in different conditions by other laboratories in the world.
- Year of starting: Dec 2009
- Annual report of project: In this project, we firstly started to collect and to review any report using clot waveform analysis (WA). The technique was originally developed with MDA-II system (Organon Teknica). However, since MDA-II instrument is no more available, we searched possibility of WA with various currently available clotting machines. Several major instruments have capability of WA and to measure quantitative parameters such as coagulation velocity and coagulation acceleration like MDA-II. We focused on CS2000 i (Sysmex) and tried to apply to WA and compared with MDA-II in the plasma samples of hemophilia A through the computer processing the raw data by standard software. We confirmed that qualitative assessment of clotting function by waveform can be performed by other instruments. Furthermore, measurement of parameter, especially maximum coagulation velocity (Min1), maximum coagulation acceleration (Min2) , reflected FVIII activity, and bleeding severity to some extent. Therefore, clot WA may be useful for evaluation of global clotting function and this may be applicable to many institutions around the world.
- Year of completion (expected): 2011