EXECUTIVE SUMMARY

Executive summary This document is the 1st Revision of the 10-year Forest Conservation Management Plan (FCMP) for Ulu Kalumpang - Wullersdorf Sustainable Forest Management Project (UKW SFM). The FCMP was approved on September 5th 2011 by the Director of Forestry. The revision is necessary due to the excision of part of the project area, to update information on HCV assessments, and to incorporate latest information on management activities such as forest restoration and rehabilitation, Environmental Impact Assessment and wildlife monitoring. The management goals as a conservation area and the prescribed activities in the previous approved FCMP however remain unchanged. This plan provides essential guidelines for the management of UKW SFM Project for the period of 10 year commencing from 1st January 2011 to 31st December 2020.

The UKW-SFM covers an area approximately 65,901.74 ha, comprising Ulu Kalumpang FR (50,964.00 ha); Mount Wullersdorf FR (8,857.00 ha); part of Madai Baturong FR (2,312.74 ha) and three VJRs in Kalumpang i.e. VJR107C (950 ha), VJR107D (1,950 ha) and VJR107E (868 ha). The UKW SFM is surrounded by State Park (Tawau Hills Park) and the oil palm plantations owned by private and small holder. In 2013, about 948 ha of the project area was excised to pave the way for socio economic development for the State. The excised areas are part of Ulu Kalumpang FR (228 ha) and Mount Wullersdorf FR (720 ha). Hence, the total area of UKW-SFM is now reduced to 64,953.74 ha. The management of UKW-SFM project area comes directly under the jurisdiction of the Kunak Forestry District of the Sabah Forestry Department.

Almost the entire UKW SFM project area was once predominantly categorized as mixed dipterocarp forest with small portion of the areas associated with kerangas forest and limestone vegetation. Several forest ecosystems also present in the project but in negligible coverage, i.e. lowland seasonal freshwater forest, lowland freshwater swamp forest and lower montane forest. With several series of timber harvesting in the past, the forest ecosystems are very much impacted by intensity of the extraction disturbance, subsequently producing forested landscape with mosaics of various regenerating quality.

Generally, about 19.6 % of the project area is classified as old growth forest (stratum 1) and 21.3 % as advance regenerating forest (stratum 2) that usually represented by closed canopy of various climax species. The largest portion is occupied by second growth forest which occupied about 44 % of the project area that mostly dominated by pioneer trees (stratum 3 and 4 combined). A considerable portion, about 15 % of the project area, previously encroached and planted with oil palm and fruit trees. The encroached area has been gradually and systematically restored by removing illegally planted crops and replaced with indigenous tree species.

This plan is organized into ten (10) core parts to provide a comprehensive source of information and guidance on the management of the project area. **Part 1** of this Plan is the introduction, outlining the guiding principles, policy statement and management objective. The overall goal is to manage the project area for economic, social, environmental and carbon sequestration benefits to the State. The long-term objectives include, enhancing diversity and rehabilitating key ecosystem functions; to successfully protect the project area against encroachments, illegal hunting and poaching and further encroachment; to restore and maintain the

forests for water resources and wildlife habitat; carbon sequestration through forest rehabilitation; and to be internationally recognized as a certified well-managed forest.

Part II of this Plan provides the basic information pertaining to the project area. The information includes location, climate and its physical features – geology, soils, hydrology, socio economic environment and the past management of the project area, including the performance in the first five years of the management plan (2011 – 2015). Part III on the other hand, provides the information on forest resources in UKW SFM based on satellite imagery, aerial photography and ground verification which was carried out from October 2009 to May 2010.

The environment and wildlife aspects are highlighted in **Part IV** of this plan. This includes key environmental issues that are potentially generated by various forestry activities, mitigation measures to minimize the consequent negative impact to the environment and biodiversity, monitoring of wildlife and water quality. Despite being heavily disturbed, the UKW SFM still harbor some of the iconic Sabah's wildlife, including the endangered Orang Utan, Sun Bear and Pigmy Elephant. Some of the Borneon endemic wildlife species are also found in this project area, i.e. Borneon Yellow Muntjac (Muntiacus atherodes) and Plain Pigmy Squirrel (Exiliscirius exilis). Periodic wildlife monitoring activities are recommended to determine long-term population trend of increase or decrease of wildlife species. Frequent patrolling and surveillance is also recommended to deter illegal hunting and poaching.

High Conservation Value Forests (HCVF) are in **Part V** of this plan. The evaluation conducted by a team of various biological and social experts from the Sabah Forestry Department that followed the national standards as prescribed in the HCV Toolkit for Malaysia (2009). Significant areas of HCVF were identified for HCV Categories 1.1, 1.2, 1.3, 1.4, 2, 3, 4.2. and 4.3.

The findings have emphasized the importance of setting aside the entire area for conservation with the aim to preserve the biodiversity, especially species that are unique and endemics to a particular forest type. The recommended HCV management and monitoring includes periodic patrolling and surveillance, installation of informative signboards in strategic locations, forest restoration along the boundary to provide barriers from fire from adjacent areas, and monitoring of water quality. In addition, the trend of increase or decrease of wildlife populations is also suggested to be monitored. Further study is also recommended in understanding and documenting the rich diversity of flora and fauna of UKW SFM.

Part VI is the essential part of this plan that outlines the management prescriptions of UKW SFM project area. The main objective is to ensure the maintenance and enhancement of the key ecosystem functions to safeguard environment quality particularly watershed and biodiversity. The management prescribed activities includes enhancement of forest quality through forest restoration and rehabilitation, wildlife and water quality monitoring, HVCs management and monitoring, and forest protection.

The infrastructure management is highlighted in **Part VII**. **Part VIII** prescribes the monitoring activities including reporting and management plan review. Research and Development is highlighted in **Part IX**.

The social and cultural elements are not included in this plan as they are not considered to be significant attributes of UKW SFM because the communities residing in the periphery of the project area are not depending on the forest for their livelihoods. Furthermore, there is no existence of sacred sites nor sites of significant cultural/ or spiritual values within the Reserves.

The estimated financial requirement to implement the activities particularly those that are prescribed in **Part VI** are highlighted in **Part X** of this plan. The SFD would require approximately MYR35.6 million to implement all SFM activities for a period of 10 years from 2011 to 2020. More than half of the budget is being allocated for forest restoration (50.73%) and on personnel salary and allowances (28.51%). The rest of the costs are for infrastructures and facilities development and maintenance, forest certification, forest protection including aerial surveillance, and administrative activities.