

# **Roundtable on Sustainable Palm Oil**

**New Planting Procedure**

**Summary Report of EIA, SIA and HCV Assessments**

**PT. ANDALAN SUKSES MAKMUR**

**Kumai Sub-District,**

**Kotawaringin Barat Regency, Central Kalimantan Province**

**Indonesia**

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**Summary Report of SEIA and HCV Assessments**  
**PT Andalan Sukses Makmur**  
**Kotawaringin Barat Regency, Central Kalimantan Province**

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## **1. Executive Summary**

PT Andalan Sukses Makmur (PT ASMR) which is located in the Kumai Sub-District, Kotawaringin Barat Regency – Central Kalimantan Province, is one of the palm oil plantation companies that has adopted the sustainable palm oil practices based on the RSPO New Planting Procedures which came in to force beginning 1 January 2010. As part of a sustainable palm oil management, PT ASMR has conducted the Social Environment Impact Assessment (SEIA/AMDAL), High Conservation Value (HCV) identification and Social Impact Assessment (SIA). The HCV and SIA assessment were conducted from April 2013 by Sonokeling Akreditasi Nusantara consultant; the key consultants conducting these assessments have been approved by RSPO.

The Consent License based Permitted area No 525/68/XII/2012 year 2012 was approved on 18 December 2012 area based on  $\pm 9,276.5$  ha. This year the permit area has been increased with the issuance of the Plantation Business Permit by decree No. 525/308/EK area based on  $\pm 7,000$  ha and mill capacity on 45 T/Hr dated on November 26<sup>th</sup> 2013.

The document of Social Environment Impact Assessment (SEIA/AMDAL) was approved by Environmental Body (Badan Lingkungan Hidup-BLH) of Kotawaringin Barat Regency (Surat Persetujuan Dokumen ANDAL, RKL, RPL PT. Andalan Sukses Makmur No 660/698/BLH.II/X/2013 dated on 23 October 2013) and furthermore was published the Environmental Permit (Izin Lingkungan) was approved by Head of Kotawaringin Barat Regency (Surat Keputusan Bupati Kotawaringin Barat No. 660/18/BLH/X/2013 dated on 28 October 2013). In order to fulfill the regulatory requirements of conducting social environmental impact assessment (SEIA/AMDAL), the company has also conducted and completed the High Conservation Values Identification (HCV) and Social Impact Assessment (SIA) on April 2013 by independent consultants from Sonokeling Akreditasi Nusantara.

The results of the HCV assessment by the independent consultants from Sonokeling Akreditasi Nusantara whose team members have been approved by RSPO have shown that there is no primary forest in the Permitted Area (Izin Lokasi) of PT Andalan Sukses Makmur. The vegetation cover is dominated by scrub and degraded forest. Based on The Report of Semi Detail Soil Survey Assessment by Research Department of PT BGA, indicated that there is peatland in the Permitted Area (Izin Lokasi).

Scope HCV Assessment consists of the company's permitted area No. 525/68/XII/2012 year 2012 which was approved on 18 December 2012, area based on  $\pm 9,276.5$  Ha. As for potential HCV areas, only two types of HCV were identified by Sonokeling Akreditasi Nusantara; these are HCV 1 (1.1, & 1.3) and HCV 4 (4.1), no finding of HCV 2, HCV 3, HCV 5 and HCV 6 in the the Permitted Area (Izin Lokasi) of PT Andalan Sukses Makmur (ASMR). The original HCV total area identified was  $\pm 930.83$  ha (10.03 % of the total Permitted Area PT ASMR).

The important elements for HCV 1 are the existence of population of endangered species such as *Pongo pygmaeus* and HCV 4 are related to water supply for village community and erosion.

The results of the Social Impact Assessments (SIA) have shown that the company's development of oil palm plantation and palm oil mill production has significant and positive impacts toward local livelihood and the society's social sustainability. The findings have defined how the company's business management can influence the key issues in the respective component of the social sustainability of the local community. There are described in the three basic components for society's social sustainability that influences the planning of future company's operation.

## 2. Scope of EIA, SIA and HCV Assessment

### 2.1. Organizational information / contact person

#### General Data of the Company

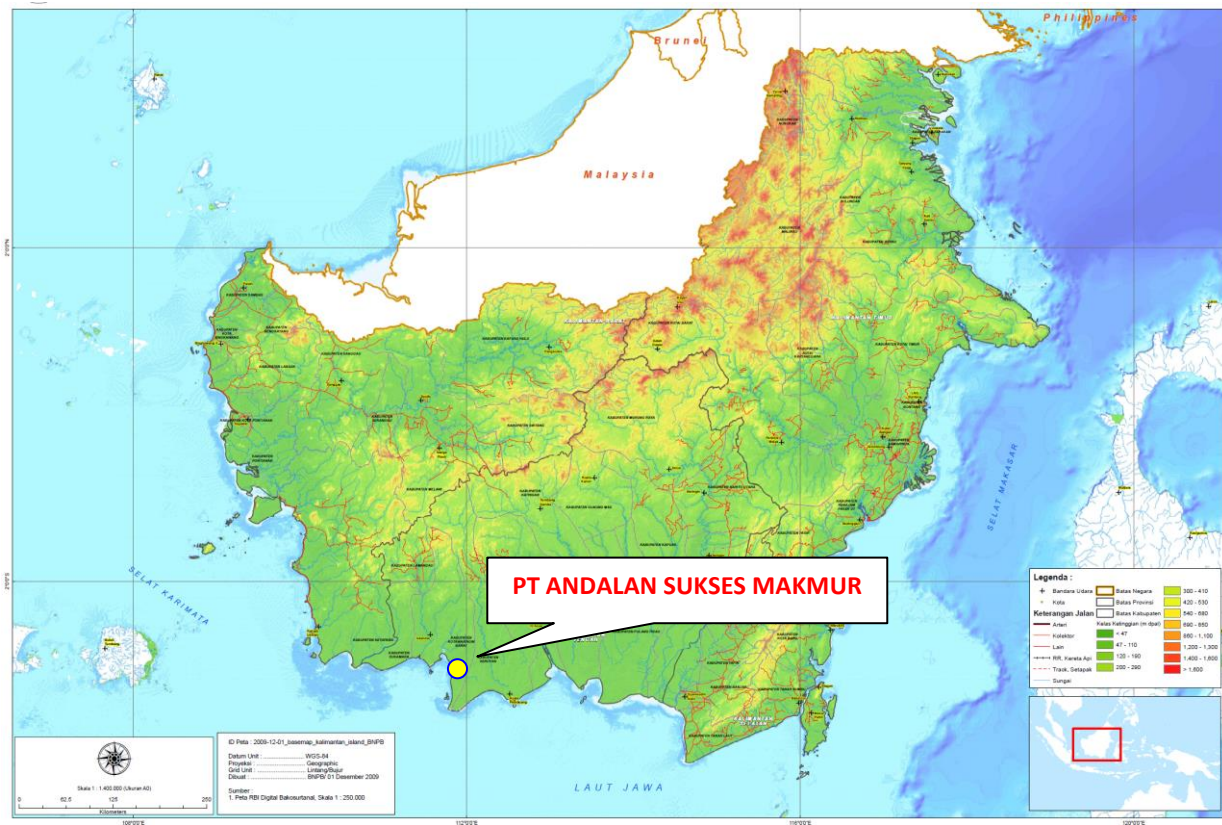
Company Name	: PT Andalan Sukses Makmur
Deed of Establishment	: Notary Tintin Surtini, SH. MH. MKn No : 46 dated on 29 June 2007
Capital Status	: Foreign Investment (Penanaman Modal Asing, PMA)
Taxpayer Notification Number	: 02.596.860.3-064.000
Company Address	: BGA Office, Melawai Street No 10, South Jakarta 12160
Type of Business	: Oil Palm Plantation & Processing
Status of Concession Land	: Consent License (Izin Prinsip) No.590/105/Pem-XI/2012, dated 21 November 2012, size ± 9,000 Ha. Permitted Area (Izin Lokasi) No.525/68/XII/2012, dated 18 December 2012, size ± 9,276.5 Ha. Plantation Business Permit (Izin Usaha Perkebunan) No. 525/308/EK dated November 26 <sup>th</sup> 2013 size 7,000 Ha.
Contact Person	: Francisca T Damanik
Geographical Location	: See Picture 1, Picture 2 and Picture 3
Surrounding Entities	: North : PT. Bumilanggeng Perdanatrada Oil Palm Plantation South : Sekonyer River and Tanjung Puting National Park West : Kumai River East : Sekonyer River and Tanjung Puting National Park

The scope of SEIA/AMDAL of PT Andalan Sukses Makmur show the local social entities within the Permitted area. The High Conservation Value assessment covers the Permitted area (Ijin Lokasi). It is also expanded into villages and other areas which are considered important to the proposed surrounding plantation area.

Figure 1. Location of PT Andalan Sukses Makmur in Indonesia

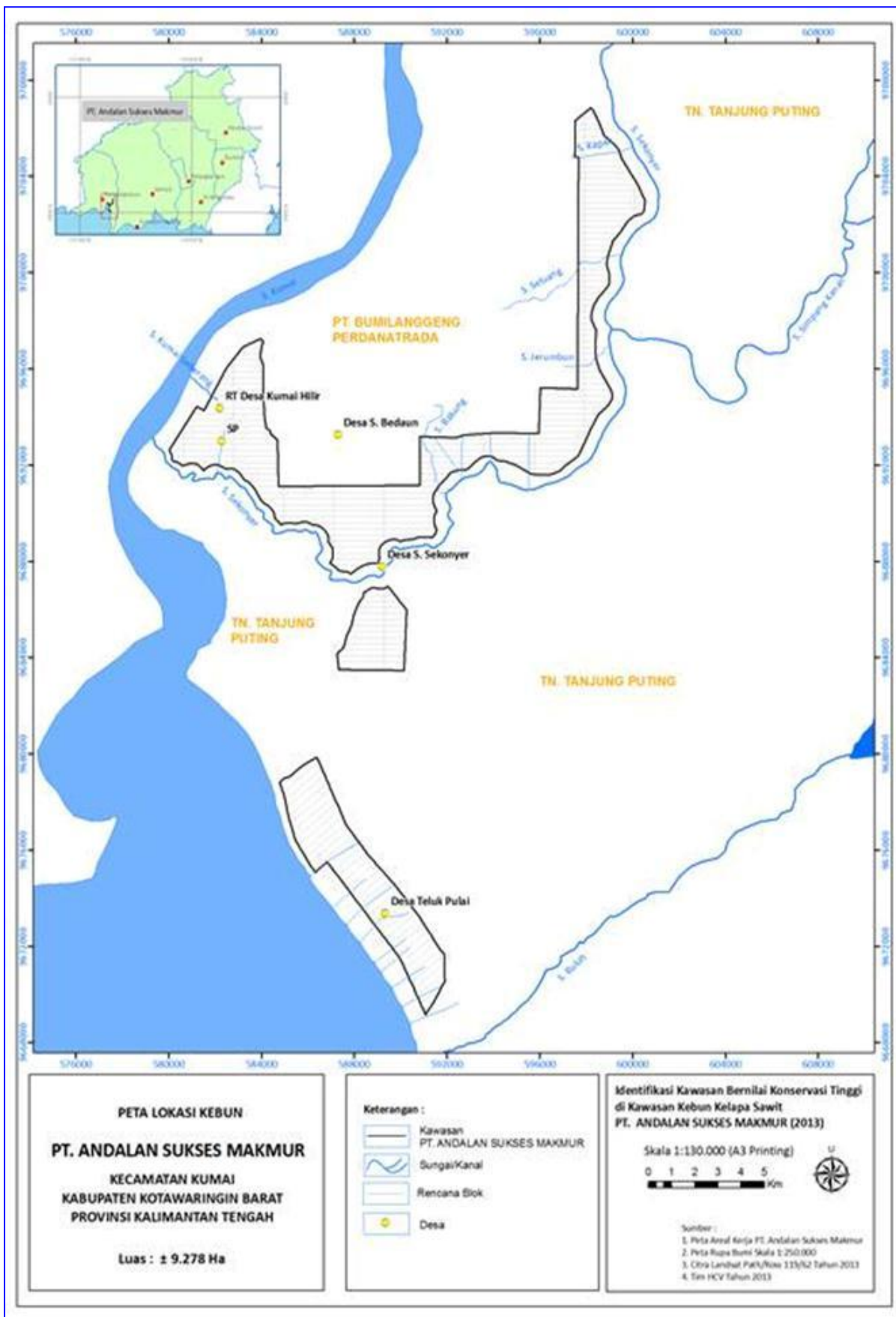


**Figure 2.** Location of PT Andalan Sukses Makmur in Kalimantan island





**Figure 3.** Location of PT Andalan Sukses Makmur in Kotawaringin Barat Regency



## 2.2. List of legal documents, regulatory permits and property deeds

The permits that have been obtained by the company are inclusive of Consent License (Izin Prinsip), Permitted Area (Ijin Lokasi), Environment Impact Assessment (AMDAL) and Environmental Permit (Izin Kelayakan Lingkungan and Izin Lingkungan) and the Plantation Business Permit (Izin Usaha Perkebunan). The followings are the list of the licenses and recommendations:

**Table 1.** Types of permits and recommendations PT Andalan Sukses Makmur

No	Licenses and recommendations	Issued by	Number	Note
1.	Deed of Establishment	Tintin Surtini, SH. MH. MKn	No : 46	Registered 29-06-2007
2.	Company Registration Number	Cooperation, UMKM and trade Agency of Jakarta Province	No. 12920-04/PM/P/1.824.271	Registered 03-09-2013
3.	Tax Registration Code Number	<b>Directorate General of Taxes,</b> Ministry of Finance	02.596.860.3-064.000	Registered 20-07-2007
4.	Consent License (Izin Prinsip)	Regent of Kotawaringin Barat (Bupati Kotawaringin Barat)	No.590/105/Pem-XI/2012 Year 2012 (size ± 9,000 Ha)	Registered 21-11-2012
5.	Permitted Area (Izin Lokasi)	Regent of Kotawaringin Barat (Bupati Kotawaringin Barat)	No.525/68/XII/2012 Year 2012 (size ± 9,276.5 Ha)	Registered 18-12-2012
6.	Environmental Permit (Persetujuan Dokumen ANDAL, RKL & RPL)	Head of BLH (BLH Kotawaringin Barat)	No. 660/698/BLH.II/X/2013	Registered 23-10-2013
7.	Environmental Permit (Izin Lingkungan)	Regent of Kotawaringin Barat (Bupati Kotawaringin Barat)	No.660/18/BLH/X/2013 size ± 9,276.5 Ha	Registered 28-10-2013
8.	Plantation Business Permit (Izin Usaha Perkebunan)	Regent of Kotawaringin Barat (Bupati Kotawaringin Barat)	No.525/308/EK (size ± 7,000 Ha)	Registered 26-11-2013

## 2.3. Area and time-plan for new plantings

The proposed new planting area by PT Andalan Sukses Makmur is in the location of the Plantation Business Permit (Izin Usaha Perkebunan) which the owners of the land have received the FPIC (free, prior and informed consent). Land development and planting of oil palm will begin in 2014 following the procedures of the RSPO New Planting Procedures (NPP).

**Table 2.** Estimation of new plantings area and time-plan for new planting PT Andalan Sukses Makmur

Potential Land	Year Planting (ha)			
	2013	2014	2015	total
± 7,300	0	± 3,000	± 4,300	7,300

Note : Total New Planting consisting of Inti and Plasma



### 3. Assessment Process and Procedures

#### 3.1 Environment Impact Assessment

The Environment Impact Assessment of PT Andalan Sukses Makmur was carried out by CV. INTERGRAHA CITRA PERSADA which is located at CV INTERGRAHA CITRA PERSADA Address : Komplek Tanjung Pura University Jl. M.H. Thamrin No. P-42 Pontianak - West Kalimantan, Telephone 0561 – 745286

The key consultants conducting these assessments have been accredited with Competency certificate and approved by The National Association Of Professional Consultants Of Indonesia.:

Table 3. Person and Expertise EIA Team Assessor in PT Andalan Sukses Makmur

Team Name	Team Composition	Specification	Competence certificate
Yudi Andrian, ST.	Team Leader	AMDAL A & B	Team Leader (KTPA)
Endang Mulyadi A.K, MSi	Sub Team Social- Culture & Community Health		Member (ATPA)
Naveri, S. Hut	Sub Team Biology		Member (ATPA)
Ir. Wawan Hermawan	Sub Team Biology		
Kiki Prio Utomo, MSc	Hydrologist		
Anwar Azazi, SE., DEA	Sub Team Social- Culture & Community Health		
Sutriswanto, SKM, M.Kes	Sub Team Social- Culture & Community Health		
Sulistiani, ST	Sub Team Physic-Chemist	AMDAL B	Member (ATPA)
Arry Kurniawan, ST	Sub Team Physic-Chemist	AMDAL A & B	

#### Assessment Methods (data sources, collection, dates, program, and visited places)

The data collection process was strongly associated with the type of data that was collected. In generally, studies will be conducted based on primary data and secondary data. Primary data obtained through observation, measurement and field interviews, and secondary data obtained from the literature collected, either from the company, or directly related institutions in the study areal. The methods that used to collect the data adjusted with components that can be studied. The used data must be accurate and reliable so that it can be used to analyze, measure and observe the environmental components which predicted will be affected and components of action plan which predicted gets significant impacts and the surrounding environment.

The data collected as:

- Physic – Chemical Components (Climate, Air Quality and Noise, Hydrology, and Soil).
- Biological Components (Vegetation, Animals, and Water Biota).
- Socio-Economic Culture Components (Demography/Population, Social, Economic, Social and Cultural).
- Environmental Health and Public Health Components (Environmental sanitation, public health level, level of public health services).

### **Methods of Significant Impact Estimation**

Determination of significant impacts intended as an estimation attempt of large and importance the environmental quality changes that caused by plantation development activities and palm oil mills of PT Andalan Sukses Makmur in Kumai District, Kotawaringin Barat Regency. Method of significant impact estimates that will happen approached by differentiating the magnitude impact and significant impacts.

#### **A. Estimation of Magnitude Impact**

Magnitude of Impact measured from the environmental quality changes. On estimates of changes in environmental quality is used formal and informal methods.

##### **1. Formal Methods**

Formal methods are used to estimate the impact of parameters which the system characteristics can be identified or estimated by using the approach of environmental threshold at national and regional levels.

##### **2. Non Formal Methods**

Non-formal method is a method that is based on the professional judgment of experts, Logical Frame Analysis and Analogy. This method is used to estimate the environmental parameters which characteristics system is difficult to identify or estimate by modeling approach such as models, socio-cultural systems.

To simplify estimates of magnitude Impact from changes in quality of the matrix filling, then used the approach of environmental quality assessment scale. Level of environmental quality assessment scale using a scale of 1-5. Based on these figures assessment, environmental quality differentiated as: excellent (5), good (4), fairly good (3), bad (2), and very poor (1). Systematically, environmental quality and assessment scale is presented in Table 3.8.

#### **B. Determination of Important Impact Characteristics**

Assessment of the important impact characteristics were done according to BAPEDAL decision Number: KEP-056 of 1994 on Guidelines Regarding Significant Impacts size. Meanwhile, in relation to the impact evaluation conducted by Important Impact scaling into two categories: important and less important. Characteristics Impact divided into two groups, negative impacts and positive impacts. Be negative if the changes / impact estimated get adverse the environmental, and is positive if the changes / impact estimated get benefit the environment.

#### **C. Methods of Important Impact Evaluation**

Important impact evaluation explored in "holistic causative" against expected environmental components that affected. For this purpose, used supporting tools such as interactions matrix. Interactions matrix between activity components and environmental component contain magnitude of Impact and Importance of Impact. This

important impact evaluation expected to study carefully and thorough to primary impact (positive / negative) and secondary impacts (positive / negative), and also other derivative impacts on the environment component and source of importance Impact from activities component.

From the study of important impacts source and important impacts hypothetical are expected can be identified the key issues that need to be managed. Results of the Important impact evaluation are also expected to assist the decision making process in the selection of an alternative plan that viable in terms of environmental aspects.

### 3.2 SIA (Social Impact Assessment)

The Social Impact Assessment of PT Andalan Sukses Makmur was carried out by Sonokeling Akreditasi Nusantara which is located at PT Sonokeling Akreditasi Nusantara Address : Komplek Sari Inten Number. 44 RT 02/RW 09, Ciomas Rahayu, Ciomas, Bogor - West Java, 16610 Telephone. 0251-7521685.

The key consultants conducting these assessments are:

Table 4. Person and Expertise SIA Team Assessor in PT Andalan Sukses Makmur

No.	Expert Name	Expertise/Position
1	Ir. Kresno Dwi Santosa, MSi	Team Leader
2	Burhanudin Gala, MA	Anthropologists
3	Janri Bungatali, MSi	Sociologists
4	Insan Kurnia, S.Hut., MSi	Social-Culture

### Assessment Methods (data sources, collection, dates, program, and visited places)

Social Impact Assessment on the ground was carried out as bellows :

#### Method of Executing the Study

Approach framework in the study of Social Impact Assessment was by learning the present existing condition in PT. Andalan Sukses Makmur, particularly the condition which was related with socio-economic condition, socio-economic impacts of the company toward the surrounding of the community, and the community's perception. Based on the existing condition, compilation and preparation were conducted for making SIA document and social management plan which contain activities that should be conducted to create ideal condition (desirable condition).

Sampling technique that is being used was purposive sampling (samples were selected on the basis of researcher's judgement which decided that those samples were the most suitable to be selected for the purpose and objectives of the research) and simple random sampling (technique of sample collection which gave the same chance for all population elements to be taken). In determining the distribution of research samples, representativeness of the samples was considered on the basis of population characteristics.

Purposive sampling was used for determining the sample villages, whereas simple random sampling was used for determining respondents which were taken from villages which became the sample. Sample villages were taken on the basis of typology / characteristics of the community, accessibility, social vulnerability and inputs from PT. Andalan Sukses

Makmur. On the basis of sampling techniques being used and inputs from the company, the villages which became the sample were village of Kampung Kumai Seberang Desa Kumai hilir, Sekonyer and Teluk Pulai villages.

Implementation in the field of Social Impact Assessment carried out by following the principles as follows:

1. Participatory : issues and information identification was conducted in a participatory mechanism. This approach used the people as subjects to use their experience for social issues mapping , shared their opinions and aspirations , as well as in designing and managing the changes that will take place
2. Multiparty ; issues and information identification was conducted through multiparty approach that involving those party both directly and indirectly give and/or receive the impact.
3. Rapid and Ex - ante ; Issues and information identification were done quickly and based on alleged (forecast ) to the change that occur rather than based on accurate factual data - as a solution to the Social Impact Assessment limitations, as well as of the time limitation.
4. Appreciative ; issues identification guided information in a positive manner, not only to determine the extent of the gap that happened, but also to explore their expectations , potential , and ideas to find solutions to the social issues that occur.
5. Social - Learning Cycle ; social impact assessment is not one linear process but more to a cycle process, which serves as a social learning processes to respond to any environmental changes

Secondary data or primary data being collected was analyzed by integrating quantitative and qualitative method. Qualitative analysis emphasizing more on description and illustration of various facts and relation between variables being found in the field. Based on description and relation between variables existing in the field, analysis was performed on (1) socio-economic condition of the farmers and community in general, in the region, and in the areas around the company sites, (2) farmer’s perception and general community’s perception toward the company, and (3) analysis of impacts (positive and negative) of the company existence toward the environment and community socio-economics. Results of those analysis were synthesized in the form of document of Social Impact Assessment of PT. Andalan Sukses Makmur.

The findings obtained from the methods above were analyzed. The baseline of the analysis was based on RSPO criteria which is relevant to sustainable social aspects. The recommendations also covered other issues which were not entailed in the RSPO criteria, in the form of ideas or aspirations as the result of the field analysis.

### 3.3 HCV Assessment

The key consultants conducting these assessments have been accredited and approved by RSPO. The team members are:

**Table 5.** The name of team members Assessor and status approval RSPO

No.	Expert Name	Expertise/Position	Status
1	Ir. Kresno Dwi Santosa, M.Si	Team Leader Socio Economic and Culture Expert	Approved by RSPO
2	Dr. Ir. Harnios Arief, M.Sc.F	Biodiversity (Fauna) Expert	Approved by RSPO
3	Dr. Ir. Rachmad Hermawan, M.Sc.F	Environmental Services Expert	Approved by RSPO
4	Kasuma Wijaya, S.Hut, M.Si	GIS Expert	
5	Mulyadi Kamad, S.Hut	Socio Economic and Culture	

No.	Expert Name	Expertise/Position	Status
		Expert	
6	Domi Suryadi	Biodiversity (Flora) Assistant Expert	
7	Ainurrahman, Amd	Biodiversity (Flora) Assistant Expert	
8	A. Rahman Hakim, S.Hut	Environmental Services Assistant Expert	
9	Hendi Kusnadi	GIS Assistant Expert	

## Assessment Methods (Data sources, data collection, dates, program, and visited places)

### Implementation Method

#### Date and Location

Identification and analysis of the HCV was carried out in the area of PT. Andalan Sukses Makmur at Kumai Sub-District (Kumai Hilir, Sekonyer and Teluk pulai Village), Kotawaringin Barat Regency - Central Kalimantan Province. The identification and analysis was held on April 2013.

#### Materials and Equipments

Materials used in the identification and analysis include are : *digital elevation model map, landsat image map, land system map/RePProt, indonesia topographical map (Rupa Bumi Indonesia map)*, forest land use map (TGHK), hydrology map, unit management administration map, IUCN red list of threatened species, The CITES Appendices, Government Regulation of Indoneisa Number 7 1999 (PP 7 1999) and materials that used in field survey are Guidance Book on Bird Life in Java, Bali, Sumatera and Kalimantan, a Field Guide to Mammals of Borneo, Payne et al., 1985, published by WWF Malaysia, Kuala Lumpur, Questioners and tally sheet.

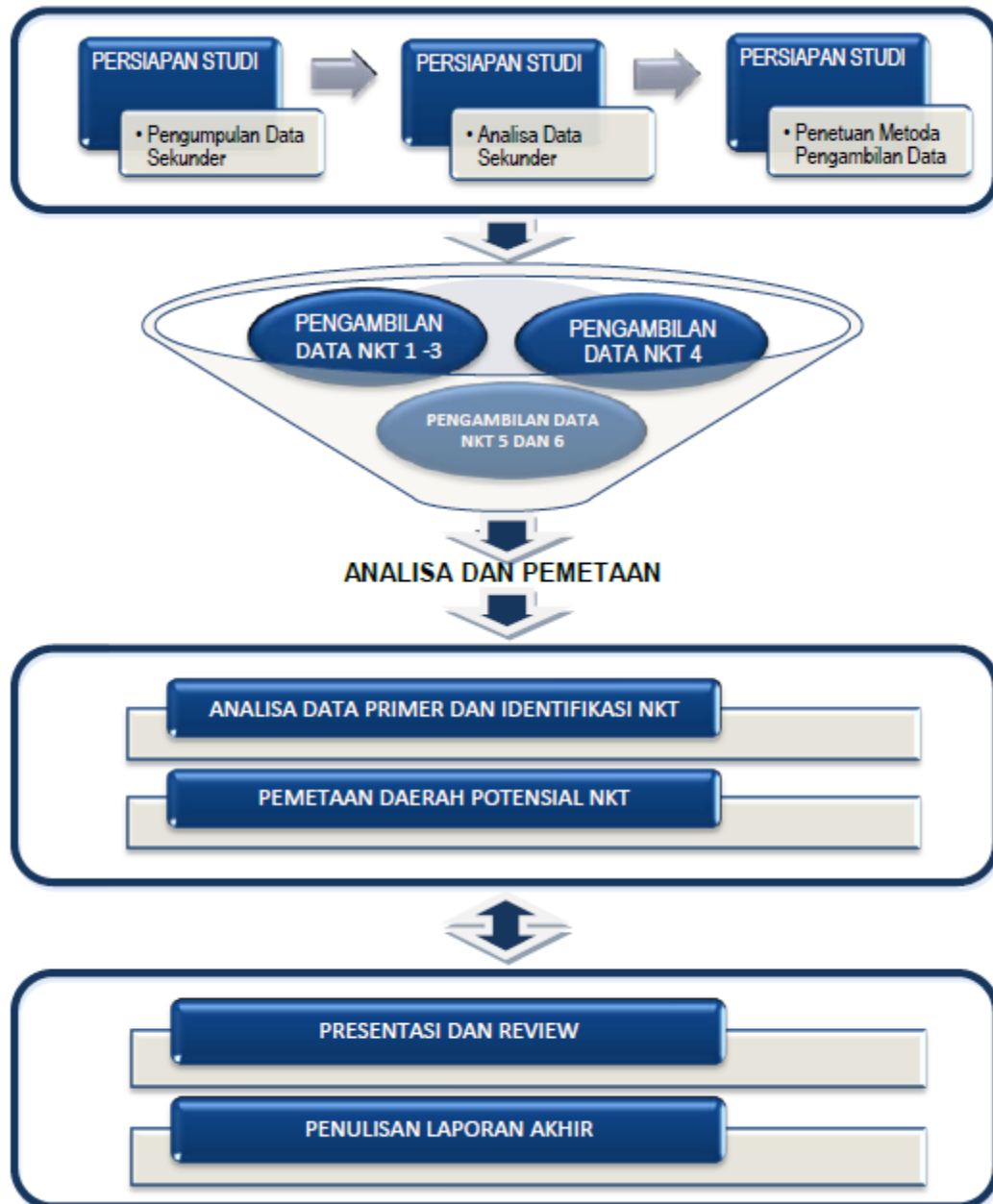
Tools used are GPS, compass (Brunton), plastic rope 50 m (marked at 2, 5, 10 and 20 m), circular/diameter gauge, camera, length gauge, binoculars, and stationeries.

#### Approach

There are 2 (two) factors that determine the success in maintaining and increasing HCV in the area of PT. Andalan Sukses Makmur, namely (1) the availability of identification and analysis documents on the existence of HCV in the area of PT Andalan Sukses Makmur since this will be used as a reference in preparing the management and monitoring plans, and (2) management documents and monitoring plans for the identified high conservation value area (HCVA) in the area of PT. Andalan Sukses Makmur, and this will be used as a reference in the management and monitoring of HCVA.

The success in the implementation of the identification and analysis activities of HCV existing in the area of PT. Andalan Sukses Makmur is determined by 2 (two) factors, namely: (1) the availability of adequate data and updated secondary and primary data, and (2) proper and systematic documentation of activities in stages. The availability of updated and reasonably sufficient data and information are greatly dependent on the activities of field surveys which are carried out systematically, adequately and well planned. In order to

conduct a well planned field survey, the review of the available documents/reports and maps and initial identification of HCV are required. Precise and systematic stages of activities to enhance the success of the identification and analysis of the existing HCV included field surveys, data processing, data analysis and synthesis, identification of HCV, analysis of HCV existence, and mapping.



Picture 5 : HCV Identification approach

## HCV Identifying Methods

The assessment covers the Permitted Area (Izin Lokasi) which has been approved as the company's project area. Assessments also expanded into the surrounding villages and other areas that were considered of relevance importance to the proposed plantation area. The field survey was conducted on April 2013.

In the process, each observation team was accompanied by the field staff from the company and local representatives who are familiar with the site. Besides field activities, the team also collected information from the local people through individual interviews, Focus Group Discussion (FGD), as well as public consultations (the list of stakeholders in the participative process is included in **Appendix 1**). At the same time, confirmation and cross checking of the findings were carried out with the local people using the technique of purposive sampling – which included the socialites and related interest parties.

The understanding and scope of HCV for the oil palm plantation sector refers to the HCVF definitions which apply to the forestry sector. The Identification of High Conservation Value in Indonesia was developed by the *Konsorsium Revisi HCV Toolkit Indonesia (2008)* - the toolkit for the revision HCV consortium. Other references such as IUCN, CITES, and other guidelines as well as the relevant laws of Indonesia were also subjects of consideration (See **Appendix 2**).

## 4. Summary of Assessment Findings

### 4.1. Environment Impact Assessment

The development of oil palm plantation and palm oil mill of PT. Andalan Sukses Makmur in the Kumai District, Kotawaringin Barat has raised the awareness of the environmental impact on the physical-chemical, biological, and social, economic, cultural and local public health, in both the positive and negative impacts. In the implementation of plantations development and Palm Oil Mill of PT. Andalan Sukses Makmur, one aspect of which is the main consideration is the preservation of the environment, in order to support the implementation of sustainable development.

EIA study of plantations activity and Palm Oil Mill of PT. Andalan Sukses Mandiri is a single EIA activity / projects. Furthermore, the scoping study of area boundary for Environmental Impact Assessment (EIA) of Oil Palm Plantation activities considering four (4) factors, namely: limit project / activity, ecological boundaries, social boundaries and administrative boundaries.

Plantation activities and Palm Oil Mill of PT. Andalan Sukses Makmur, is predicted to raise the magnitude and importance of the impact to the environment, so it needs to be explored in depth including the four phases of activity: Pre-Construction phase, Construction phase, Operational phase and Post-Operational phase.

Magnitude and importance of the impact that need attention in the EIA study of the Plantation and Palm Oil Mill of PT. Andalan Sukses Makmur at pra-construction phase, is the change in attitudes and perceptions and social unrest. At this phase the activities that will be explored is the socialization and boundary demarcation and land acquisition.

Magnitude and importance of the impact that needs attention in the construction phase is a decrease in air quality and noise levels, decrease the quality of surface water, land and forest fire potential, decreased diversity of flora, fauna species diversity decreased, increased job and business opportunities, increase incomes, changes in attitudes and perceptions as well as the decrease in public health. At this stage of activities that can be studied is the mobilization of heavy



equipment, manpower recruitment, land clearing, construction of facilities and infrastructure, seeding and planting, maintenance of immature plants, factory construction and waste water treatment plant.

Magnitude and importance of the impacts that need attention at this operation phase is the reduction of air quality and increased noise, increased job and business opportunities, increase incomes, changing attitudes and perceptions, decreased levels of public health in the study area. At this stage the activity which is analyzed is the FFB harvesting and transport, maintenance of generating plant, FFB processing, waste treatment and replanting.

Magnitude and importance impacts that need attention at the post operation phase is the reduction of air quality and increased noise, decrease of local income, changing attitudes and perceptions, and community unrest. At this phase the activity which analyzed is labor dismissals, demobilization of heavy equipment, reforestation and revegetation, and also land handover to government and community.

Changes in some aspects of the environment (abiotic, biotic, social, economic, cultural and public health) in the Kumai Sub-District, Kotawaringin Barat, due to these activities require further tightening in the utilization of available natural resources and to optimize the management and monitoring efforts integrated and all components of the integrated business and technical agency responsible.

Magnitude and importance of the impacts that will be managed and monitored in the Environmental Management Plan and Environmental Monitoring Plan based on the results of the impact evaluation are: Physical-chemical environment components include air and noise quality, surface water quality, and forest fires potential. Social culture and public health components include: social unrest, job and business opportunities, perceptions, local revenue and public health level.

Environmental management of the environmental components that experiencing fundamental change, in both the positive and negative as a effect of the Oil Palm Development plan of PT. Andalan Sukses Makmur to be carried out in terms of the three approaches, are: technological, socio-economic-cultural and institutional.

Implementation of environmental monitoring carried out by PT. Andalan Sukses Makmur. Environmental monitoring reports will be submitted annually to the government agencies and technical adviser

## 4.2. Social Impact Assessment

For developing the palm oil plantation and mill, PT Andalan Sukses Makmur guided by Plantation Bussines Permit (IUP) letter no.525/308/EK on dated 26 November 2013 with total areas of 7,000 ha and 45 MT FFB/Hr for mill process capacity.

PT ASMR located between coordinate :  $111^{\circ} 53' 16''$  BT –  $2^{\circ} 38' 41''$  LS and  $111^{\circ} 48' 59''$  BT –  $3^{\circ} 0' 41''$  LS and beetween

- North : PT. Bumilanggeng Perdanatrada Oil Palm Plantation
- South : Sekonyer River and Tanjung Puting National Park
- West : Kumai River
- East : Sekonyer River and Tanjung Puting National Park

## **COMMUNITY CHARACTERISTIC**

### **Socio-Culture**

People in the study of the villages were Muslim majority. All people live in harmonious society. Resident can practice their faith without interference or threat from any party. Religious tolerance has led to a high quality socially rich life which is going well and in harmony

Melayu and Banjar ethnic groups are dominant in the study of the villages, except in transmigration areas dominated by Javanese and Sundanese ethnics group and there are also ethnic flores. Ethnic immigrants and native around the plantation area of PT. ASMR have built up social relationships with each other since the existence of transmigration settlements.

One form of activity that have had a positive impact on the relationship between community members is a sport together. The availability of a wide range of sports facilities, especially soccer and volleyball, in addition to meet people's needs in terms of recreation and self-actualization is also an excellent means to accelerate the process of integration in society, both in the groups with similar backgrounds and of different (ethnic, religious, level of education, etc.)

### **Sosio-Economic**

The population residing in the surrounding villages of PT. ASMR in general make their livelihood from agriculture (rice farmers or farming). Another alternative livelihood is gardening, farming or fishing and shellfish, or utilizing other natural products for their own consumption or for sale

The business activities of the population around the area of PT. ASMR can be classified into two groups, namely groups of non-formal and formal. The formal sector consists of business areas such as Civil Servants (PNS), the military, and employment in a private company in nearby residential population. The informal sector is more open in the population which endeavors in agriculture, the utilization of non-timber forest products, fishing, small-scale trade and the provision of transport services

Later the business operation of the PT. ASMR and its processing plant is expected to have an impact on changes in livelihoods and communities around the plantation. Livelihoods were previously only on the utilization of non-timber forest products is expected to grow in the presence of employment opportunities and business opportunity, such as wholesale business through contracting, freight services (unloading tbs), provision of daily needs of employees (business stores or kiosks) and other business activities

### **Demography and Village Density around PT ASMR**

Kumai sub-districts has the second largest population in West Kotawaringin. As recorded in 2012 the population of districts Kumai reached 47 674 people. Downstream, the Kumai village has a population of 7.968 inhabitants or 16.71% of the total population in the District of Kumai. This amount is the largest compared with other villages.

Overall Kumai District area classified in the category that is not solid people/km<sup>2</sup> 16:32 by grouping according to Law no. 56/PRP/1960. The law divides the category density becomes less

dense (51-250 people/km<sup>2</sup>) is quite dense (251-400 people/km<sup>2</sup>) and very dense (> 400 people/km<sup>2</sup>)

**Table 6.** Population density in the surrounding villages PT ASMR

Village	Area (km <sup>2</sup> )	Total people	Density (people/km <sup>2</sup> )
Sungai Sekonyer	791	443	0.56
Teluk Pulai	478	308	0.64
Kumai Hilir	82	7968	97.17

*Sumber: BPS (2012)*

Population density in the countryside around the village oil palm plantation area of PT. ASMR is low in theory and this will not cause problems in the provision of land for housing and farming. Low population density also does not potentially cause health and safety problems, but has the potential lag on various aspects of life

Related to this, then PT. ASMR will need to pay attention to a variety of socio-economic needs of the villages around the company. Aggravating factors is due to high expectations on the implementation of the community towards Corporate Social Responsibility (CSR) to be able to meet the various needs of the community, while mitigating factors is the relatively low number of people and most of purpose is only to fulfill the basic needs such as employment opportunities, development of smallholdings , business opportunities, improving the quality of infrastructure, health care, education, infrastructure and other worship

#### **Potential Conflict of PT. ANDALAN SUKSES MAKMUR**

Identification of social issues through participatory processes with stakeholders indicate that at least there are 6 social issues or conflict potential in communities around PT ASMR which may be influential in the PT ASMR plantation development. A complete list of conflict potential issues and activity alternative solutions are presented in Table 7.

Table 7. Potential Conflict Impact Management Model Plans of Andalan Sukses Makmur

No	Potential Conflict Description	Activity Alternative	Parties Involved	Expected Results	Time Frame
1.	Road conditions between village and plantations predicted to trigger respiratory diseases or accident. Needed anticipation to avoid vertical conflict local communities and company rised.	<ul style="list-style-type: none"> <li>- Planning to supplying hydrant water for watering when dry</li> <li>- Road compacting on road with high intensity use by company.</li> <li>- Conductiing medical and assistance of public health.</li> </ul>	Company, Community, Local Government, Pukesmas and village government	<ul style="list-style-type: none"> <li>- Community participated in addressing the dust</li> <li>- Reducing the dust</li> <li>- Preventing respiratory diseases affects society</li> </ul>	- Continued
2	Boundaries between Sekonyer and Kumai Hilir villages are still a secondary forest and potentially can cause boundaries conflict	<ul style="list-style-type: none"> <li>- Legal boundary certainy between villages</li> <li>- Facilitate or mediate the boundary demarcation</li> <li>- Company must be netral</li> </ul>	Company, community leaders, BPN, local govermnet	<ul style="list-style-type: none"> <li>- The achievement of village boundaries definitively recognized all parties</li> </ul>	Beginning on land preparation
3	Plantation development realization disinformation that uncertainty will trigger an attitude of resistance, defiance and rejection of the company.	Company immediately establish communications with the community intensively to clarify information about the realization of plantation development.	Company, community and local govermnet.	<ul style="list-style-type: none"> <li>- Disinformation immediately resolved</li> <li>- Increased community confidence in the company</li> </ul>	Priority (within 1-3 months) and continued with schedule planning with communities
4	The weak bargaining position of labor due to be opening up alternative employment could lead to the fulfillment of vertical conflict between the company and the conflict between the local community with a workforce from outside the village	<ul style="list-style-type: none"> <li>- Company proactively developing educational activities /training for skill and capacity society building</li> <li>- Education/ training event packaged as part of the CSR scheme is communicated openly wtih the community.</li> </ul>	Company, Disnaker, and local government	<ul style="list-style-type: none"> <li>- Increased community knowledge and skill</li> <li>- More work opportunity for community to work in the company</li> </ul>	Will be done periodically as company needed
5.	Company Strategic approach followed to establish institutional and leadership pattern without considered to the social dynamics that occur can lead to the tension and the conflict between elite groups at the village level with the reformer movement that emerged in the village.	<ul style="list-style-type: none"> <li>- The company must develop open mechanism with the community and be neutral/fair in developing communication strategies with communities around the plantation</li> </ul>	Company, Dinkes, and local government	<ul style="list-style-type: none"> <li>- Increased community confidence in the company</li> <li>- Horizontal potential conflict resolved</li> </ul>	Priority (within 1-3 months) and continued
6.	When health services provided to the public is not programmed properly then it implies the potential to trigger social conflict to be spawned resistance and rejection of public attitudes toward the company.	<ul style="list-style-type: none"> <li>- Company to design a mechanism for public health services through CSR schemes that will large impact to the community.</li> </ul>	Company, Dinkes, and local government	<ul style="list-style-type: none"> <li>- Community will get sustainable health services</li> <li>- The company will increase the CSR mechanism of charitable towards a sustainable model</li> </ul>	Conducted regularly and continuously

## Management Strategy

To formulate management strategies and the impact of potential conflicts that exist in the surrounding area of oil palm plantation area of PT. ASMR is necessary to identify SWOT, namely the identification of various factors systematically to formulate strategies. This analysis is based on the logic that maximizes the strengths and opportunities, but at the same time can minimize the weaknesses and threats.

To overcome the negative impacts and potential conflicts are predicted, PT. ASMR will conduct two approaches impact management models, namely: (1) the impact of strategic management and (2) based on the potential impact of conflict management

Table 8. Impact of Strategic Management Model Plan of Andalan Sukses Makmur

No.	Prepared Components	Strategy and Activitiy Alternatives
1.	Land acquisition mechanism	<ul style="list-style-type: none"> <li>- Prepare a team with competent human resources in community approach</li> <li>- Prepare a land acquisition system with socio-cultural and economic condition consideration and align with the purpose of local governmetdevelopment programs</li> </ul>
2.	Plantation Management	<ul style="list-style-type: none"> <li>- Maintenance the balance of planning and implementation of the oil palm plantation development</li> <li>- Establish open communication with stakeholders, especially recipients of social impacts both positive and negative</li> <li>- Implementing management, leadership, and decision-making mechanisms effectively to build a working relationship with the entire labor intensive</li> <li>- Develop procedures on routine task and input from workers</li> <li>- Set up a system and mechanism on industrial relationship by form a labour union or others</li> </ul>
3.	Management and Labor Recruitment	<ul style="list-style-type: none"> <li>- Providing employment opportunities to the surrounding community consistently</li> <li>- Conducting education/training on employee skill, knowledge and attitude improvement as company required</li> </ul>
4.	Wages / Salaries System	<ul style="list-style-type: none"> <li>- Applying the wage system as the standard regional wage (UMR) consistently</li> <li>- Made an open communication to the workers regarding remuneration system and standard</li> <li>- Set up a standard mechanism on career and promotion of employees</li> <li>- Set up a standard mechanism an socialize welfare allowances</li> </ul>
5.	Contributing on Community Development (CSR)	<ul style="list-style-type: none"> <li>- Develop CSR mechanism with integrated schemes, sustainable, and transparent by involving the public directly from three villages</li> <li>- The company plans to continuously community development through CSR programs by forming a kind open communication forum to community participation.</li> </ul>
6.	Environmental Management	<ul style="list-style-type: none"> <li>- The company applies the principles of conservation in particular maintenance of watersheds and springs.</li> <li>- Develop a transparent mechanism to guarantee the maintenance of environment with the participation of local residents.</li> <li>- Consistent on conservation of endangered species (orangutan) around the plantation and build effective communication with relevant stakeholder</li> </ul>
7.	Socio-Economic Development	<ul style="list-style-type: none"> <li>- Committed to community development around the plantation by conducting education and training management of oil palm plantations</li> <li>- Designing mechanism of community development in an integrated manner based on local resources and needs community</li> </ul>
8.	Smallholder Plantation Development	<ul style="list-style-type: none"> <li>- Coordinate with BPN and others related agencies for spatial development plan and development of smallholdings</li> <li>- Approach the community especially through the figures to formulate a partnership scheme on plasma development</li> <li>- Made a plasa execution plan in a participatory manner by involving all relevant stakeholders</li> </ul>

## CONCLUSIONS AND RECOMMENDATIONS

### CONCLUSIONS

In the management or resolution of the conflict on the activities of PT ASMR , it should pay attention to the typology of social conflicts in the oil palm plantation contextually. Based on the actors and resources owned by the resolution of the conflict between the community plantation management, namely:

- 1 . Reclaiming land -based conflicts are resolved by a form of power / force of law through advocacy for siding with the marginalized people around the plantations (subordinated ) .
- 2 . Overcome economic disparities based conflict with other forms of economic empowerment of the community , including the Community Development (Community Development) / Corporate Social Responsibility ( CSR ) .
- 3 . Conflict -based social inequality , which is addressed by the socialization of labor recruitment mechanisms and plantation program activities and social approach .
- 4 . Conflict -based health care , which is addressed with particular care in the form of complementary infrastructures and facilities needed by the community.

### RECOMMENDATIONS

Based on study results, two (2) suggestions are recommended that should be implemented by the company, namely:

1. Companies need to integrate and synergize the effects of two management models, namely the impact of strategic management / sustainable and impact management based on a potential conflict.
2. Companies need to implement a phase / impact management measures, both strategically and based on potential conflicts

## 4.3. HCV Assessments

### Physical

Climatic conditions in Kumai is similar to other tropical areas where classified into rainy and dry seasons. Generally, the rainy season occurs in March to April and November to December, while dry season occurs on September. The duration of both of these seasons fluctuate, at times with longer dry season or a longer rainy season.

Based on DEM SRTM Data analysis and field survey observation showed of the land is flat (0-8%) area. Based on Land Systems Map (RePPProT 1987) showed that in the area of PT. ASMR oil palm plantation consists of six classes of land, namely Bawin (*Plains*), Gambut (*Swamp*), Kahayan (*Alluvial Valleys*), Kajapah (*Tidal Swamp*), Segintung (*Terraces*) and Serimbang (*Alluvial Valleys*).

The working area of PT. Andalan Sukses Makmur includes Kumai River, watershed. The rivers that crossed the area are as many as 5 rivers and creeks. The rivers are present in and around the area of PT. ASMR is influenced by tide and rising rising pushed by the tide's of Kumai river and the Java sea. In general, the water of the rivers meet the standards for local consumption needs, the workers in the plantations and oil palm crop irrigation even into the future.

## Biological

### Flora

There were 90 species found in the area of PT. ASMR, based on the results of the analysis of the plant status, there was three types including rare/protected are ; 1 kantong semar (*Nepenthes melampora*)

Only one found protected species under PP. 7 / 1999 and Apendix II CITES in consension ASMR and In addition, also in this area are found 2 plant species are included in the List of the IUCN Red List, with details: 1 species, including CR / Critically Endangered and 1 species including VU / Vulnerable ; as presented in **Table 9**.

**Table 9.** List of Plant Species Found in the Area of PT. ASMR Based on Their Status

No	Local Name	Scientific Name	Family	Habitus	Status		
					IUCN	CITES	PP 7
1	Bengaris				-	-	-
2	Putri malu	<i>Mimosa pudica</i> L.	Fabaceae	herba			
3	Talas Hutan	<i>Alocasia longiloba</i>	Aracaceae	Herba	-	-	-
4	Pakistan	<i>Equisetum</i> sp.	Equisetaceae	Herba	-	-	-
5	Kantong semar	<i>Nepenthes ampularia</i>	Nepetheaceae	Herba	-	App II	√
6	Paku rawa	<i>Nephrolepis radicans</i>	Oleandraceae	Herba	-	-	-
7	Rasau	<i>Pandanus</i> sp.	<i>Pandanaceae</i>	Herba	-	-	-
8	Sempiring	<i>Themedeia gigantia</i>	Poaceae	Herba	-	-	-
9	Rotan Sega	<i>Calamus caeius</i>	Arecaceae	Liana	-	-	-
10	Rotan tampenik	<i>Calamus</i> sp.	Arecaceae	Liana	-	-	-
11	Mikania	<i>Mikania michrantha</i>	Asteraceae	Liana	-	-	-
12	Sirih Hutan	<i>Piper miniatum</i>	Piperaceae	Liana	-	-	-
13	Jangau	<i>Salacca conferta</i>	Arecaceae	Liana	-	-	-
14	Akar kekait	<i>Uncaria sclerophylla</i>	Rubiaceae	Liana	-	-	-
15	Karamunting kodok	<i>Rhodomyrtus</i> sp.	Myrtaceae	Perdu	-	-	-
16	Karamunting	<i>Rhodomyrtus tomentosa</i>	Myrtaceae	Perdu	-	-	-
17	Nyirih Batu	<i>Xylocarpus</i> sp.	Meliaceae	Pohon	-	-	-
18	Bintangur	<i>Calophyllum grandiflorum</i>	Guttiferae	Pohon			
19	Waru	<i>Hibiscus macrophyllus</i>	Malvaceae	Pohon			
20	Rengas manuk	<i>Melanorrhoea walichii</i>	Anacardiaceae	Pohon			
21	Bakau	<i>Rhizophora mangle</i> L.	Rhizophoraceae	Pohon			
22	Sindur	<i>Sindora leiocarpa</i>	Fabaceae	Pohon			
23	Pedada	<i>Sonneratia alba</i>	Sonneratiaceae	Pohon			
24	Akasia	<i>Acacia mangium</i>	Fabaceae	Pohon	-	-	-
25	Joring hantu	<i>Adenantha ellipticum</i>	Fabaceae	Pohon	-	-	-
26	Parak	<i>Aglaia rubiginosa</i>	Meliaceae	Pohon	-	-	-
27	Medang	<i>Alceodaphne coriacea</i>	Lauraceae	Pohon	-	-	-
28	Medang kuning	<i>Alceodaphne</i> sp.	Lauraceae	Pohon	-	-	-
29	Pulai	<i>Alstonema pneumatophora</i>	Apocynaceae	Pohon	-	-	-
30	Pulai rawa	<i>Alstonia scholaris</i>	Apocynaceae	Pohon	-	-	-
31	Penaga	<i>Calophyllum sclerophyllum</i>	Clusiaceae	Pohon	-	-	-
32	Terentang	<i>Campnosperma macrophyllum</i>	Anacardiaceae	Pohon	-	-	-
33	Bedaru	<i>Cantleya corniculata</i>	Icacinaceae	Pohon	-	-	-
34	Betapai	<i>Cinnamomun partenoxylon</i>	Lauraceae	Pohon	-	-	-
35	Kelapa	<i>Cocos nicifera</i>	Arecaceae	Pohon		-	-



No	Local Name	Scientific Name	Family	Habitus	Status		
					IUCN	CITES	PP 7
36	Gerunggang	<i>Cratoxylon arborescens</i>	Clusiaceae	Pohon	-	-	-
37	Idat	<i>Cratoxylon glaucum</i>	Clusiaceae	Pohon	-	-	-
38	Mantibu	<i>Dactylocladus stenostachys</i>	Crypteroniaceae	Pohon	-	-	-
39	Asam-Asam	<i>Dictyoneura acuminata</i>	Sapindaceae	Pohon			
40	Bakunyit	<i>Diospyros polyalthioides</i>	Ebenaceae	Pohon	-	-	-
41	Jelutung	<i>Dyera costulata</i>	Apocynaceae	Pohon			
42	Pantung	<i>Dyera lowii</i>	Apocynaceae	Pohon	-	-	-
43	Jambu-jambu	<i>Eugenia cuprea</i>	Myrtaceae	Pohon	-	-	-
44	Ubar Putih	<i>Eugenia eucoxylum</i>	Myrtaceae	Pohon	-	-	-
45	Pasak bumi	<i>Eurycoma longifolia</i>	Simarubaceae	Pohon	-	-	-
46	Jamai	<i>Ficus septica</i>	Moraceae	pohon	-	-	-
47	Ketiau	<i>Ganua motleyana</i>	Sapotaceae	Pohon	-	-	-
48	Asam Kandis	<i>Garcinia rostrata</i>	Clusiaceae	Pohon	-	-	-
49	Rengas	<i>Gluta renghas</i>	Anacardiaceae	Pohon	-	-	-
50	Ramin	<i>Gonystylus bancanus</i>	Thymelaeaceae	Pohon	VU	App II	-
51	Karet	<i>Hevea brasiliensis</i>	Euphorbiaceae	Pohon	-	-	-
52	Mendarahan	<i>Knema cinerea</i>	Myristicaceae	Pohon	-	-	-
53	Kumpang	<i>Knema cinerea Warb.</i>	Myristicaceae	Pohon			
54	Kempas	<i>Koompassia malaccensis</i>	Fabaceae	Pohon	-	-	-
55	Empaning	<i>Lithocarpus cantleyanus</i>	Fagaceae	Pohon			
56	Klingkala burung	<i>Litsea roxburghii</i>	Lauraceae	pohon	-	-	-
57	Besamut	<i>Lycopodium cernuum</i>	Lycopodiaceae	Pohon	-	-	-
58	Mahang Putih	<i>Macaranga pruinosa</i>	Euphorbiaceae	Pohon	-	-	-
59	Mahang	<i>Macaranga semiglobosa</i>	Euphorbiaceae	Pohon	-	-	-
60	Pauh	<i>Maclurodendron porteri</i>	Rutaceae	Pohon	-	-	-
61	Petti	<i>Mangifera longipetiolata</i>	Anacardiaceae	Pohon	-	-	-
62	Tembaras	<i>Memecylon edule</i>	Melastomataceae	Pohon	-	-	-
63	Nyathuh	<i>Palaquium rostratum</i>	Sapotaceae	Pohon	-	-	-
64	Bentan	<i>Parastemon urophyllus</i>	Rosaceae	Pohon	-	-	-
65	Banitan	<i>Polyalthia lateriflora</i>	Annonaceae	Pohon	-	-	-
66	Kasai	<i>Pometia alnifolia</i>	Sapindaceae	Pohon	-	-	-
67	Mentanguran	<i>Rapanea umbellata</i>	Myrsinaceae	Pohon	-	-	-
68	Lewari	<i>Schima wallichii</i>	Theaceae	Pohon	-	-	-
69	Meranti Merah	<i>Shorea smithiana</i>	Dipterocarpaceae	Pohon	EN	-	-
70	Ubar Merah	<i>Syzygium leucoxylum</i>	Myrtaceae	Pohon	-	-	-
71	Galam Tikus	<i>Syzygium valdevenosum</i>	Myrtaceae	Pohon	-	-	-
72	Merang	<i>Tetramerista glabra</i>	Thymelaeaceae	Pohon	-	-	-
73	Pelawan	<i>Tristania obovata King.</i>	Myrtaceae	Pohon	-	-	-
74	Bekapas	<i>Vatica oblongifolia</i>	Dipterocarpaceae	Pohon	-	-	-
75	Halaban	<i>Vitex pubescens</i>	Verbenaceae	Pohon	-	-	-
76	Bejangkang	<i>Xylopius fusca</i>	Annonaceae	Pohon	-	-	-
77	Bruta/ Resam	<i>Gleichenia linearis</i>	leicheniaceae	Semak	-	-	-
78	Lambiding	<i>Stenochlaena palustris</i>	Blechnaceae	Semak	-	-	-
79	Rumput Piai	<i>Acrostichum aureum</i>	Polypodiaceae	Terna	-	-	-
80	Kadaka	<i>Asplenium nidus</i>	Aspleniaceae	Terna	-	-	-
81	Kacangan	<i>Canavalia sp.</i>	Fabaceae	Terna	-	-	-
82	Sungkup	<i>Garcinia forbesii King.</i>	Guttiferaceae				
83	Pekat Laki	<i>Leptaspis urceolata</i>	Poaceae				
84	Besamut	<i>Lycopodium cernuum L.</i>	Lycopodiaceae		-	-	-
85	Nipah	<i>Nypa fruticans</i>	Arecaceae				
86	Banitan Kuning	<i>Polyalthia glauca</i>	Annonaceae				
87	Papung	<i>Sandoricum einarginatum Hiern.</i>	Meliaceae				
88	bacang	<i>Mangifera foetida</i>	Anacardiaceae				
89	Parak api						
90	Simpur	<i>Dillenia excelsa</i>	Dilleniaceae				

## Wildlife

There were 118 species of wildlife found in the area of PT ASMR and grouped in 47 families that consist of Mammals 16 species (11 families), Aves 94 species (31 families) and Reptile 8 species (5 families).

There are 27 species that are protected by Government Rule No 7/1999 i.e. 9 species of mammals, 15 species of birds and 3 species of reptile. Based on CITES, there are 26 species i.e. 6 species of Appendix I, 20 species of Appendix II.

Whereas, 11 species are included in IUCN RED LIST that consist of VU/Vulnerable 7 species and EN/Endangered 4 species (see **Table 10**).

**Table 10.** Wildlife Species in the Area of PT. Andalan Sukses Makmur Based on Their Status

No	Lokal	Ilmiah	Famili	IUCN	CITES	PP no. 7
<b>Aves</b>						
1	Elang hitam	<i>Ictinaetus malayensis</i>	Accipitridae		App II	√
2	Alap-alap asia	<i>Falco tinnuculus</i>	Falconidae		App II	√
3	Alap-alap capung	<i>Microhierax tringillarius</i>	Falconidae		App II	√
4	Punai lengguak	<i>Treron curvirostra</i>	Columbidae			
5	Punai besar	<i>Treron capellei</i>	Columbidae			
6	Tekukur biasa	<i>Streptopelia chinensis</i>	Columbidae			
7	Punai bakau	<i>Treron fulvicollis</i>	Columbidae			
8	Punai Gading	<i>Treron vernans</i>	Columbidae			
9	Delimukan zamrud	<i>Chalophaps indica</i>	Columbidae			
10	Burung-madu belukar	<i>Anthreptes singalensis</i>	Nectariniidae			
11	Bubut besar	<i>Centropus sinensis</i>	Cuculidae			
12	Burung madu	<i>Anthreptes malacensis</i>	Nectariniidae			
13	Bubut alang-alang	<i>Centropus bengalensis</i>	Cuculidae			
14	Elang brontok	<i>Spizetus cirrhatus</i>	Accipitridae		App II	√
15	Wiwik lurik/ukit	<i>Cacomantis sonnerati</i>	Cuculidae			
16	Walet sarang putih	<i>Collocalia fuciphaga</i>	Apodidae			
17	Walet sarang hitam	<i>Collocalia maxima</i>	Apodidae			
18	Walet sapi	<i>Collocalia esculenta</i>	Apodidae			
19	Kepinis jarum kecil	<i>Rhapidura leucopygialis</i>	Apodidae			
20	Raja udang meninting	<i>Alcedo meninting</i>	Alcedinidae			
21	Raja udang kalung biru	<i>Alcedo euryzona</i>	Alcedinidae			
22	Pekaka emas/bekaka	<i>Pelargopsis capensis</i>	Alcedinidae			
23	Cekakak batu	<i>Lacedo pulchella</i>	Alcedinidae			
24	Cekakak sungai	<i>Todirhamphus chloris</i>	Alcedinidae			
25	Ergang kihingan/balian	<i>Annorhinus galeritus</i>	Bucerotidae		App II	
26	Kangkareng hitam	<i>Anthracoceros malayanus</i>	Bucerotidae		App II	
27	Cabak maling	<i>Caprimulgus macrurus</i>	Caprimulgidae			
28	Elang tikus	<i>Elanus caeruleus</i>	Accipitridae			
29	Kacer	<i>Copsychus saularis</i>	Muscicapidae			
30	Kareo padi*	<i>Amaurornis phoenicurus</i>	Rallidae			
31	Kecici	<i>Sitta frontalis</i>	Sittidae			
32	Perenjak	<i>Prinia familiaris</i>	Sylviidae			
33	Pipit	<i>Lonchura malacca</i>	Estrilidae			
34	Puyuh batu	<i>Coturnix chinensis</i>	Phasianidae			
35	Cipoh kacat	<i>Aegithina tipia</i>	Chloropseidae			

No	Lokal	Ilmiah	Famili	IUCN	CITES	PP no. 7
<b>Aves</b>						
36	Cipoh jantung	<i>Aegithinia viridissima</i>	Chloropseidae			
37	Cipoh kacat	<i>Aegithinia tipia</i>	Chloropseidae			
38	Cica daun kecil	<i>Chloropsis cyanopogon</i>	Chloropseidae			
39	Cica daun besar/otan daun	<i>Chloropsis sonnerati</i>	Chloropseidae			
40	Cica daun sayap biru	<i>Chloropsis cochinchinensis</i>	Chloropseidae			
41	Cucak rawa	<i>Pycnonotus zeylanicus</i>	Pycnonotidae	VU	App II	
42	Cucak kuricang/broceng	<i>Pycnonotus atriceps</i>	Pycnonotidae			
43	Cucak rumbai tungging	<i>Pycnonotus eutilotus</i>	Pycnonotidae			
44	Merbah gunung/jongjan	<i>Pycnonotus flavescens</i>	Pycnonotidae			
45	Gagak kampung	<i>Corvus macrorhynchos</i>	Corvidae			
46	Cica kopi melayu	<i>Pomatorhinus montanus</i>	Timaliidae			
47	Tepus kepala kelabu	<i>Stachyris poliocephala</i>	Timaliidae			
48	Kucica kampung/penyambung	<i>Copsychus saularis</i>	Turdidae			
49	Kucica hutan/Tinjau	<i>Copsychus</i>	Turdidae			
50	Kucica ekorkuning/kusior	<i>Trihixos pyrrhopygus</i>	Turdidae			
51	Perenjak rawa	<i>Prinia flaviventris</i>	Silviidae			
52	Sikatan hijau laut	<i>Eumyas thalassina</i>	Muscicapidae			
53	Kipasan belang	<i>Rhipidura javanica</i>	Muscicapidae			
54	Kehicap ranting	<i>Hypothymis azurea</i>	Muscicapidae			
55	Seriwang Asia	<i>Tersiphone paradisi</i>	Muscicapidae			
56	Sikatan bakau	<i>Cyornis rufigastra</i>	Muscicapidae			
57	Sikatan kerdil	<i>Muscicapella hodgsoni</i>	Muscicapidae			
58	Murai-batutarung	<i>Monticola solitarius</i>	Muscicapidae			
59	Sikatan kepala-abu	<i>Culicicapaceylonensis</i>	Muscicapidae			
60	Kerak kerbau	<i>Acridotheres javanicus</i>	Sturnidae			
61	Tiong	<i>Eurystomus orientalis</i>	Coraciidae			
62	Tiong emas/tiung	<i>Gracula religios</i>	Coraciidae		App II	
63	Burung madu polos	<i>Anthreptes simplex</i>	Nectariniidae			√
64	Burung madu rimba	<i>Hypogramma hypogrammicum</i>	Nectariniidae			√
65	Pijantung kecil	<i>Arachnothera longirostra</i>	Nectariniidae			√
66	Burung-madukelapa	<i>Anthreptesmalacensis</i>	Nectariniidae			
67	Burung-madu	<i>Aethopyga siparaja</i>	Nectariniidae			
68	Pijantungkampung	<i>Arachnotheraarrasirostris</i>	Nectariniidae			√
69	Pijantung besar	<i>Archnothera robusta</i>	Nectariniidae			√
70	Pipit benggala	<i>Amandava amandava</i>	Ploiceidae			
71	Bondol hijaubinglis	<i>Erythrura prasina</i>	Ploiceidae			
72	Bondol hijau dada merah	<i>Erythrura hyperythra</i>	Ploiceidae			
73	Bondol perutputih	<i>Lonchura leucogastra</i>	Ploiceidae			
74	Bondolkalimantan	<i>Lonchura fuscans</i>	Ploiceidae			
75	Bondol rawa	<i>Lonchura malacca</i>	Ploiceidae			
76	Burung gereja	<i>Passer montanus</i>	Ploiceidae			
77	Bangaubngtong	<i>Leptoptilos javanicus</i>	Ciconiidae	VU		√
78	Elang-lautperut-putih	<i>Haliaeetusleucogaster</i>	Accipitridae		App II	√
79	Elang rawa abuabu	<i>Cyrcus cyaneus</i>	Accipitridae		App II	√
80	Elang bondol	<i>Haliastur indus</i>	Accipitridae		App II	√
81	Gajahan besar	<i>Numenius arquata</i>	Scolopacidae	VU		
82	Gajahan timur	<i>Numenius madagascariensis</i>	Scolopacidae			
83	Trinil ekor-kelabu	<i>Tringa brevipes</i>	Scolopacidae			
84	Kuntul besar	<i>Egretta alba</i>	Ardeidae			√
85	Kuntul kecil	<i>Egretta garzetta</i>	Ardeidae			√
86	Kokokan laut	<i>Butorides striatus</i>	Ardeidae			
87	Pecuk ular-Asia	<i>Anhingamelanogaster</i>	Anhingidae			
88	Kuntul kerbau	<i>Bubulcus ibis</i>	Ardeidae			
89	Blekok sawah	<i>Ardeola speciosa</i>	Ardeidae			
90	Pergam kelabu	<i>Ducula pickeringi</i>	Columbidae	VU		
91	Kukuk beluk	<i>Strix leptogrammica</i>	Strigidae			
92	Pentis Kalimantan	<i>Prionoehilusxanthopygius</i>	Meliphagidae			
93	Sikep-maduAsia	<i>Pernis ptilorhynchus</i>	Accipitridae			
94	Pijantung tasmak	<i>Arachnotheraflavigaster</i>	Nectariniidae			

No	Lokal	Ilmiah	Famili	IUCN	CITES	PP no. 7
<b>Mammalia</b>						
1	Kijang	<i>Muntiacus athreres</i>	Cervidae			√
2	Beruang madu	<i>Helarctos malayanus</i>	Ursidae	VU	App I	√
3	Pelanduk kecil	<i>Tragulus javanicus</i>	Tragulidae			√
4	Monyet ekor panjang	<i>Macaca fascicularis</i>	Cercopithecidae		App II	
5	Lutung banggat	<i>Presbytis hosei</i>	Cercopithecidae		App II	
6	Lutung simpai	<i>Presbytis melalophos</i>	Cercopithecidae		App II	
7	Orangutan, mawas	<i>Pongo pygmaeus</i>	Pongidae	EN	App I	√
8	Landak raya	<i>Hystrix brachyura</i>	Hystriidae			√
9	Kucing kuwuk	<i>Felis bengalensis</i>	Felidae			√
10	Trenggiling, peusing	<i>Manis javanica</i>	Manidae	EN	App II	√
11	Berang-berang	<i>Lutra perspicillata</i>	Mustelidae		App II	
12	Rusa Timor	<i>Cervus timorensis</i>	Cervidae	VU		√
13	Babi hutan	<i>Sus scrofa</i>	Suidae			
14	Bekantan	<i>Nasalis larvatus</i>	Cercopithecidae	EN	App I	√
15	Tupai	<i>Sundasciurus tenuis</i>	Tupaidae			
16	Beruk	<i>Macaca nemestrina</i>	Cercopithecidae			
<b>Mammalia</b>						
1	Kobra	<i>Naja sumatrana</i>	Elapidae	EN	App I	√
2	Senyulong	<i>Tomistoma schlegelii</i>	Crocodylidae		App I	√
3	Biawak	<i>Varanus salvator</i>	Varanidae		App II	
4	Kobra	<i>Naja sp.</i>	Elapidae		App II	
5	Ular sanca	<i>Python reticulatus</i>	Pythonidae		App II	
6	King kuning	<i>Ophiophagus hannah</i>	Elapidae	VU	App II	
7	Cicak terbang	<i>Draco volans Linnaeus,</i>	Agamidae			
8	Buaya muara	<i>Crocodylus porosus</i>	Crocodylida		App I	√

### Environmental Services Aspect

Region or ecosystem that is important as a provider of Water and Flood Control for Downstream Communities.

Region or ecosystem that is found in the area of PT Andalan Sukses Makmur is lowland forest ecosystems and peat swamp forests; while the Cloud forest ecosystems, forest ridge and karst ecosystems are not found in the area.

### Important Ecosystem and Its Relationship with the various Classes of Land Based on RePPPProT

Ecosystems found in the area of PT. Andalan Sukses Makmur consists of 2 (two) types, namely lowland forest ecosystems and peat ecosystem. Land classes found in the region consists of 6 (five) types, namely Bawin (BWN), Gambut (GBT), Kahayan (KHY), Kajapah (KJP), Segitung (SGT) and Serimbang (SRM) including the threatened land systems and / or rare. However, because the condition of ecosystems has been much damaged (degraded) due to forest exploitation activities (logging) before any fields/cultivation, and forest encroachment activities (illegal logging), then some of the functions and benefits of ecosystems have degraded.

With regard to technical aspects of the management of oil palm plantations, the presence of lowland forest can be utilized as a land of oil palm cultivation. Similarly shallow peat lands, also technically can be used for oil palm cultivation.

But ecologically, particularly in peat ecosystems (with land system under GBT) will need to consider the legal aspects (relating to Regulation of the Minister of Agriculture No.14 years of 2009 and Presidential Decree No.32 of 1990 ), as well as other aspects ( Prinsip.7 RSPO).

**Regions that serves as a natural insulation to prevent the spread of forest fires and land**

Regions that serves as a natural insulation to prevent the spread of forest fires and land. In the area of PT. ASMR there is no found area that can serve as a fire breaker.

**Economy, Socio Culture of Local Community**

Administratively, oil palm plantation of PT ASMR is located in Kumai distric (Kumai Hilir, Sungai Sekonyer and Teluk Pulai Villages), Kotawaringin Barat Regency, Central Kalimantan Province. Based on the results of field observation and review of existing maps show that areas of High Conservation Value (HCVA) planned in the area of Oil Palm Plantations in the Area of PT Andalan Sukses Makmur, Central Kalimantan Province is 930.83 ha, with details as in **Table 12** and **Appendix 3**.

The identification result of HCV availability at area of palm oil plantation PT ASMR is detaily presented bellow **Table 11**.

**Table 11.** The Identification Result of HCV Availability at PT Andalan Sukses Makmur Palm Oil Plantation Area

HCV		HCV AVAILABILITY
<b>1</b>	<b>Area Has Important Biodiversity Level</b>	
1.1	Area Posses or Give Supporting Function of Biodiversity for Protected Area and/or Conservation Area	Available
1.2	Critically Endangered species	Not Available
1.3	Area Has Habitat for Viable Population of Threatened, Circumscribed or Protected Species	Available
1.4	Area Has Temporary Habitat for Species or Group of Species	Not Available
<b>2</b>	<b>Area Has Important Landscape for Naturally Ecological Dynamics</b>	
2.1	The Area of Wide Landscape which has Capacity to Maintain the Process and Dynamics of Naturally Ecology	Not Available
2.2	The Natural Area which has Two or More Ecosystem with not Fragmented Contour (Continuously)	Not Available
2.3	Area which has Representative Population of Natural Species	Not Available
<b>3</b>	<b>Area which has Rare or Threatened Ecosystem</b>	Not Available
<b>4</b>	<b>Area Provides Natural Environmental Services</b>	
4.1	Important Area or Ecosystem to Provide Water and Flood Control for Community at Downstream Area	Available
4.2	Important Area to Control Erosion and Sedimentation	Not Available
4.3	Area which Has Function as Natural Border to Avoid the Spread of Forest Fire	Not Available
<b>5</b>	<b>Natural Area which Has Important Function to Fulfill Basic Needs of Local Community</b>	Not Available
<b>6</b>	<b>Area has Important Function to Identify Traditional Culture of Local Community</b>	Not Available

### Analysis Result of the Availability of HCV

The area of palm oil plantation PT ASMR has 20 HCV Area with 930.83 ha in total area or it is about 10.03 % out of the total area of Management Unit (9.276.5 ha). The HCV Area at the area of palm oil plantation PT ASMR are presented at **Table 12**. The Map of HCV Areas at palm oil plantation PT ASMR is presented at **Appendix 3**.

**Table 12.** The HCV Area of PT Andalan Sukses Makmur Palm Oil Plantation

No	KBKT	Luas (ha)	Atribut NKT
1	Sempadan S. Seluang	15.32	1.3, 4.1
2	Sempadan S. Kapak	17.94	4.1
3	Sempadan S. Bakung	23.22	4.1
4	Sempadan S. Kumai Seberang	3.49	4.1
5	Sempadan S. Jerumbun	9.93	1.3, 4.1
6	Sempadan Kanal 4	1.63	4.1
7	Sempadan Kanal 3	0.94	4.1
8	Sempadan Kanal 2	1.41	4.1
9	Sempadan Kanal 1	1.78	4.1
10	Sempadan Kanal Trans	1.48	4.1
11	Sempadan Kanal Maru	1.17	4.1
12	Sempadan Kanal Marjan	0.87	4.1
13	Sempadan Kanal Samsuri	0.63	4.1
14	Sempadan Kanal Kamis	0.68	4.1
15	Sempadan Kanal Imin	1.67	4.1
16	Sempadan Kanal Aspawi	1.71	4.1
17	Sempadan Kanal Rambai	0.91	4.1
18	Sempadan Kanal Pulut	2.28	4.1
19	Ekosistem Nipah Mangrove	34.78	4.1
20	Areal Feeding Orangutan	809.00	1.1,1.3
<b>Jumlah</b>		<b>930.83</b>	

## Internal Responsibility

### Formal signing off by assessors and company

This document is the summary of assessment result on High Conservation Value (HCV) and Social Impact Assessment (SIA) in PT Andalan Sukses Makmur Kotawaringin Barat Regency West Kalimantan Province and has been approved by the Management of PT Andalan Sukses Makmur.

Sonokeling Akreditasi Nusantara



**sonokeling**  
akreditasi nusantara

Kresno Dwi Santosa  
Team Leader HCV & SIA  
Dated : 06<sup>th</sup> December 2013

Management  
PT Andalan Sukses Makmur,



Wedy Sulistyono  
Director  
Dated : 06<sup>th</sup> December 2013

#### Statement of acceptance of responsibility for assessment

Assessment result document on High Conservation Value (HCV) of PT Andalan Sukses Makmur by Sonokeling Akreditasi Nusantara (SAN), will be applied as one of the guidelines in managing palm oil plantation in PT Andalan Sukses Makmur

Management  
PT Andalan Sukses Makmur,














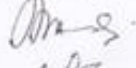




Wedy Sulistyono  
Director  
Dated : 06<sup>th</sup> December 2013





**Appendix 1** List of respondents and/or informal Focus Group Discussion (FGD) participants on site during the implementation process of social impact

ABSENSI FOCUS GROUP DISCUSSION (FGD)  
 SELASA, 16 APRIL 2013  
 DESA TELUK PULAI, KEC. KUMAI HILIR

No.	Nama	Tanda Tangan
1.	Abdurahman.	
2.	Madi.	
3.	Autheandia.	
4.	Pandi	
5.	Jamhari	
6.	YANSAH	
7.	A. Puana	
8.	Ardiansyah	
9.	MASITAH.	
10.	ABD. BAMA	
11.	CSAMSUD	
12.	NASIR	
13.	Syaini	
14.	JamthaBi	
15.	Muniri	
16.	Rugni	
17.		

VISUM KUNJUNGAN

Perkebunan Kelapa Sawit PT Andalan Sukses Makmur

NO	TANGGAL	URAIAN	DITERIMA OLEH	TTD
1	13/4 '13	FGD SIA	Kelua RT 17 MUDIPAN	
2	13/4 '13	FGD SIA	Kelua RT 18 MAKHMUR	
3	13/4 '13	FGD SIA	Kelua Rt 20 WALYAN Y.	

VISUM KUNJUNGAN

Perkebunan Kelapa Sawit PT Andalan Sukses Makmur

NO	TANGGAL	URAIAN	DITERIMA OLEH	TTD
1	14/3 '13	Kunjungan SIA	Kelua Selangur	
2	14/3 '13	Kunjungan SIA	Kelua Selangur	
3	14/3 '13	Kunjungan SIA	Kelua Selangur	
4	14/3 '13	Kunjungan SIA	Becaulat Lasehakan Selangur	
5	14/3-13	Kunjungan SIA	Selipat Sempai Selangur	
6	16/3/14	Kunjungan SIA	Kelua Teluk Alca	

**Appendix 2** List of respondents Public consultation HCV PT Andalan Sukses Makmur



**BERITA ACARA KEGIATAN**

Pada hari ini, Kamis tanggal Dua Puluh Tiga Bulan Mei Tahun Dua Ribu Tiga Belas (23/05/2013), telah dilakukan **Konsultasi Publik** hasil Identifikasi Nilai Konservasi Tinggi di Kawasan Kebun Kelapa Sawit PT Andalan Sukses Makmur, bertempat di AUL. KEC. GUMAI, Kabupaten Kotawaringin Barat, Provinsi Kalimantan Tengah yang dilaksanakan oleh PT Sonokeling Akreditasi Nusantara.

Proses ini merupakan salah satu tahap dalam Penilaian NKT sebagai bagian dari proses penyusunan identifikasi NKT di Kawasan Kebun Kelapa Sawit PT Andalan Sukses Makmur.

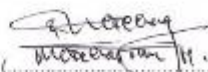
Demikian Berita Acara ini dibuat untuk dapat dipergunakan sebagaimana mestinya.

Mengetahui,

PT Sonokeling Akreditasi Nusantara

PT Andalan Sukses Makmur

  
 Ir. Kresno Dwi Santosa, M.Si  
 Direktur Utama

  
 M. H. H. H.

**DAFTAR HADIR KONSULTASI PUBLIK  
IDENTIFIKASI NILAI KONSERVASI TINGGI**

Hari Kamis Tanggal 23 Mei 2013

No	Nama	Alamat/Instansi	TTD
1	A. BAH RUOIN	Teluk Pulai	
2	AGUS BUDIANTO	ASMP	
3	Yusran	T. Pulai	
4	M. Taufik	Balai TNT	
5	Budi Setianto	Kumai Hilir	
6	ZAIEL DANI	Kumai Hilir	
7	TAUFIK	T. PULAI	

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IDENTIFIKASI NILAI KONSERVASI TINGGI

Hari Kamis Tanggal 23 Mei 2013

No	Nama	Alamat/Instansi	TTD
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16	Wahyu	Disdik Kaban	[Signature]
17	DAHER. Y.	Kumdis / Kaban Kaban	[Signature]
18	Karna	Polsek Kuma	[Signature]
19	Andi Cahayawati	Dzq Adm Pasa	[Signature]
20	HADETA Diah	Kumwil Kaban	[Signature]
21	H. Nordin Ramli	Kumwil Hilir	[Signature]
22	Said Spausudin nar.	Lurus K. Hilir	[Signature]
23	ABDUL GAFUR	SEKOLAH K. HILIR	[Signature]

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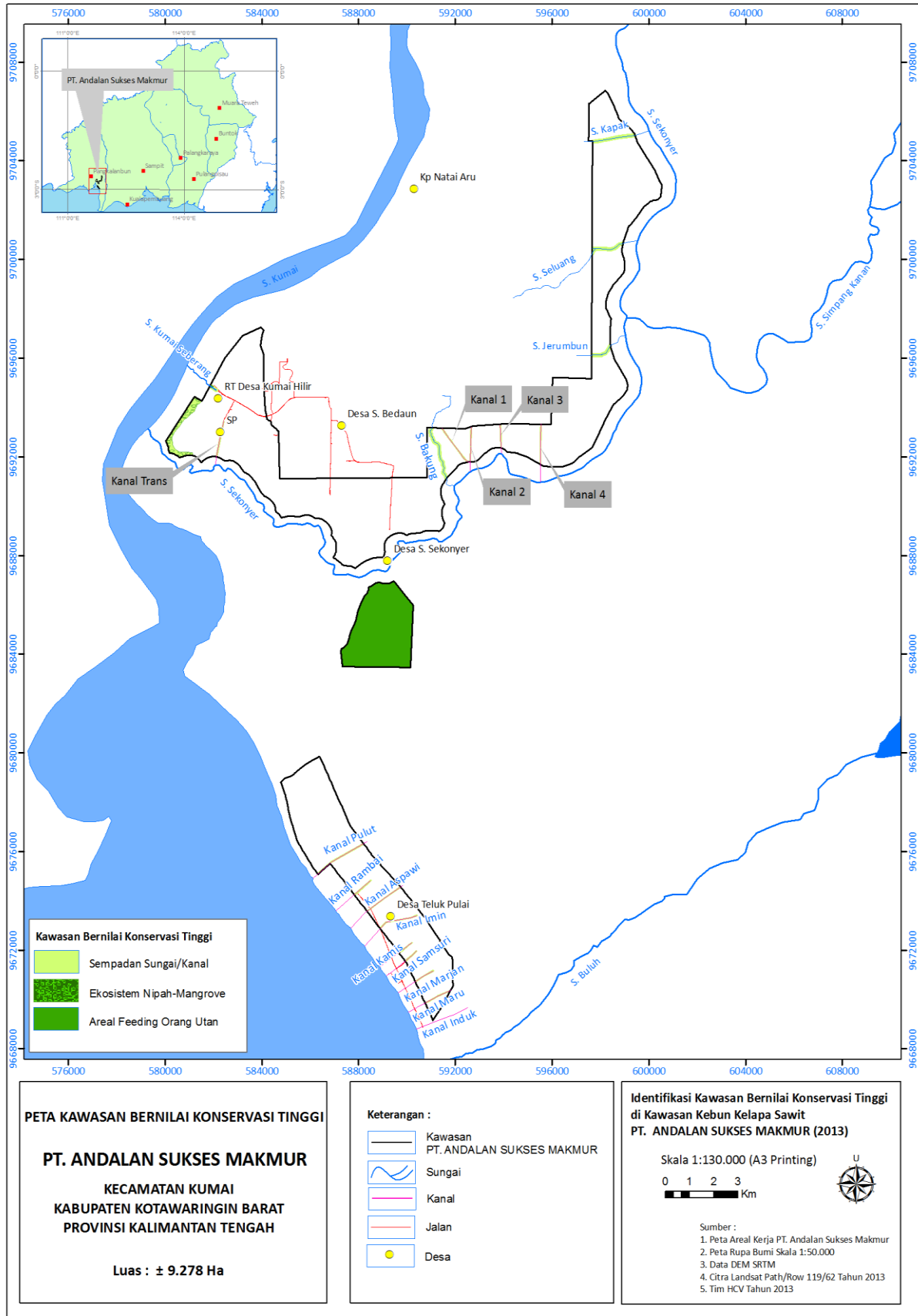
Hari Kamis Tanggal 23 Mei 2013

No	Nama	Alamat/Instansi	TTD
1	MORSAKI	Cakongor	[Signature]
2	Taufik	Sekonyer	[Signature]
3	M. Jusuf	KT. RT 01	[Signature]
4	RUSTAM	Sekonyer 1	[Signature]
5	ARSAH	Sekonyer 1	[Signature]
6	SYAHRIAN	Sekonyer 1	[Signature]
7	padle	" "	[Signature]
8	Hadmad.	Sekonyer 1	[Signature]
9	MUDIONO	K. Jabang	[Signature]
10	Zaini	K. Jabang	[Signature]
11	EDI SUSANTO	K. Sebrang	[Signature]
12	MUMONG	K. Sebrang	[Signature]
13	GATIMINAN	K. Sebrang	[Signature]
14	M. Bahruni	T. Pulau	[Signature]

**Appendix 3** List of prevailing applicable regulations and some supporting guidelines which used as references in the identification process of HCV and SIA study.

No	List / Type of Reference	Details
1.	Status of vulnerability according to the World Conservation Union (IUCN), 2009	CR : Critically Endagerd EN : Endangered VU : Vulnerable NT : Near threatened
2.	Status in terms of trade of world's wild fauna and flora (CITES), 2009	App. I : list of all plants species and animals which are prohibited to be internationally traded by any means. App. II : list of species that trading required rules to diminish the threats of extinction.
3.	RI State Legislation (Acts):	
	1931 <i>Dierenbeschermings Ordinance</i> (Wild Animals Protection Ordinance) / 1931	Wildlife protection
	1970 Decree of Minister of Agriculture, No. 421/Kpts/Um/8/1970	Wildlife protection
	1973 Decree of Minister of Agriculture, no 66/Kpts / Um / 2 / 1973	Wildlife protection
	1977 Decree of Minister of Agriculture, No. 90/Kpts/Um/2/1977	Wildlife protection
	1978 Decree of Minister of Agriculture, No. 327 / Kpts / Um/5/1978	Wildlife protection
	1979 Decree of Minister of Agriculture No. 247 / Kpts/Um/4/1979	Wildlife protection
	1980 Decree of Minister of Agriculture, No. 716 / Kpts/Um/10/1980	Wildlife protection
	1999 Government Regulation No. 7 of 1999	Wildlife protection
Government Regulation, PU 63/1993 PU	Determination width of the river riparian	
4.	Map of TGHK (Forest Land Use Agreement) and government's official documents concerning the appointment status of forest areas.	To determine the status of an area whether or not in the protected areas.

### Appendix 4. Map of HCV area PT Andalan Sukses Makmur





**Appendix 5. New Planting Plan Map of PT Andalan Sukses Makmur**

