Risk Mitigation of Cattle Livestock in Indonesia: Problematic in Insurance Scheme

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Abstract: The number of local cattle in Indonesia is not sufficient for national needs. As a result, the price of beef in the market is increasing from year to year. The problem of import quota of beef is actually can be overcome if Indonesia is able to realize food self-sufficiency in the livestock sector. Ministry of Agriculture issued a policy emphasized on increasing the amount of credit disbursement for farmers and ranchers. In addition to lending, the Government of Indonesia launched insurance products based on Crop Insurance and Livestock Insurance. In this paper constrained by two issues, the first is whether the regulation on the risks borne by Cattle Livestock Insurance has provided protection for cattle ranchers in Indonesia. The second problem is how the Cattle Livestock Insurance Model Regulation based on the principle of benefit to achieve self-sufficiency in food. Appropriate arrangements related to livestock insurance should focus on protecting farmers from losses due to crop failure, and food sufficiency for the Indonesian community. Legal uncertainty related to the acquisition of losses from farmers who have followed the livestock insurance program will actually bring harm to farmers and for the entire people of Indonesia.

1 INTRODUCTION

Beef consumption in Indonesia is still relatively low compares to the neighboring countries such as Singapore and Malaysia. According to the 2015 data, the average need of beef is 2.2 kilograms per capita per year (Dyah, 2015). That number is still categorized as low considering the 255 million population of Indonesia. Even though beef consumption is low, but the needs are still high. According to the 2015 data, the need for beef is 653,000 tons or equivalent with 3,657,000 cattle. Meanwhile, the local cattlemen can only produce 406,000 tons of beef or equivalent to 1,318,000 cattle (Dyah, 2015). Therefore, there is still 1.5 million of cattle deficiency per year. As the result, the price of beef is rising from year to year.

To anticipate the deficiency of beef stock and to repress its price in market, the government imported beef from various countries such as America, Australia, India, and others. The government's decision to import cattle gave the excess to the establishment of cattle import quota. Importers then compete to seize the biggest quota with using illegal actions. In 2011, the issue of cattle import rose to the surface again. That cattle import scandal has dragged some party officials, representative members, and cattle importers (Tempo.co, 2013). The import quota became an issue again when the Justice of Constitutional Court, Patrialis Akbar, was presumed to be bribed regarding the case verdict number 129/PUU-XIII/2015 on the judicial review of Law No. 41 year 2014 about Animal Husbandry and Health (Pratiwi, 2017).

The problem of import quota actually can be resolve only if Indonesia is self-sufficient in livestock sector especially regarding the cattle. Low technological capability in the field of cattle is the problem faced by Indonesian cattlemen. Therefore, the productivity of cattle cannot be maximized. Due to the low technological capability, cattle breeding management cannot produce qualified cattle for proper cutting. Other than that, diseases that attack cattle cause a big loss for the cattlemen and the venture capital becomes the problem to be able to rise again (Sitanggang, 2015).

The Ministry of Agriculture through Directorate General of Animal Husbandry and Health tried to

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increase the productivity by making cooperation with Financial Service Authority (OJK). This cooperation developed Program AKSI Pangan which in one of its policies emphasized on increasing the amount of credit for farmers and breeders also to launch the insurance based on Crop Insurance and Livestock Insurance known as Asuransi Usaha Tanam Padi (AUTP) and Asuransi Usaha Ternak Sapi (AUTS) (Sidik, 2017). These programs were launched in 2016 and still become the priority in 2017.

Asuransi Usaha Ternak Sapi or Cattle Business Insurance (hereinafter AUTS) is accordance with the mandate of Law No. 19 Year 2013 about Protection and Empowerment of Farmers. This law, then, was followed up by Regulation of Minister of Agriculture No. 40/Permentan/SR.230/7/2015 about Farming Insurance Facility. Initially, there was insurance corporate consortium that offered the insurance to Indonesian cattlemen. However, since 2017, there is only P.T. Asuransi Jasindo which still offers the insurance. This is because according to Article 28 of Law No. 19 Year 2013, the state government and regional government based on its authority assign the state-owned company or regional-owned company in the field of insurance to conduct agricultural insurance (Hana, 2016).

According to the background above, the formulation of issues to be studied are: First, has the regulation about risks covered by Cattle Business Insurance (AUTS) already give protection to the Indonesian cattlemen? Second, regulation model about Cattle Business Insurance (AUTS) which based on the principle of benefits to achieve food self-sufficiency.

This research is normative (doctrinal) legal research. It means that the research relating to librarybased academic activities. This study focuses its analysis on primary and secondary legal materials that can be accessed.

The approach to the problem used in this study is the statute approach and the conceptual approach. The statute approach was chosen because this study will examine various laws and regulations relating to the problems formulated in this study. The conceptual approach will be used in this study intended to gain an understanding of the concepts, notions, doctrines, legal principles and views of scholars regarding Livestock Insurance.

2 THE RISK OF CATTLEMEN IN INDONESIA

There were 16,599,247 cattle in Indonesia in 2017. This number increased by 529,150 cattle from the previous year. In East Java itself, the population of cattle from 2017 reached 4.511.613 cattle by producing 96.917 tons of beef production. From these data, the government has a technical plan or foreseeable data of the increasing number of cattle for 2018 until 2020. The Animal Husbandry Department Office of East Java Province itself has a technical plan for the number of beef cattle for 2018 amounting to 4,657,564, then 2019 as many as 4,808,236, up to 2020 it is expected that cattle can reach 4,963,783. It is also expected to increase beef production to lead to food self-sufficiency with production of 104,369 tons in 2020 (Badan Pusat Statistik, 2017).

However, there are some problems in order to improve the quality and quantity of cattle. In addition to productivity issues, in practice, the business of beef cattle is faced with various perils and risks. There are several conditions faced by the people's beef business, namely 1) price, 2) disease, 3) feeding, 4) marketing, 5) theft, and 6) relationship with traders, with different main risks depending on the central region production. The death of cattle can be caused by several things such as death due to illness, death from childbirth, and death due to natural disasters.

Some of the largest cattle deaths are caused by the Jembrana virus. Referring to the data from the Department of Animal Husbandry and Food Security of the Province of South Sumatra, the number of Bali cattle that died due to Jembrana virus infection during 2017 was 200 cattle (Inge, 2018). In addition, residents of Muaro Jambi regency were stunned by the death of more than 500 cattle due to the same virus (Santoso, 2018). From the data compiled by the East Java Provincial Livestock Service, in 2015 to 2017 there were several cases of diseases that infected cattle. Among them are three cases of anthrax and 43 cases of brucellosis in East Java. Moreover, the Septicaemia Epizo Otica disease or snoring cow disease (Bere, 2017) is also a factor of death in cattle. The cause of the death of another cattle is death due to childbirth. Due to the inadequate care and fatigue of delivery, as many as 35 Brahman cross cattle in North Penajam Paser District, East Kalimantan, died during childbirth (Kokino, 2016). Natural disasters such as floods and volcanic eruptions also become one of the perils supporting the death of cattle. Ministry of Agriculture (Kementan) stated that the total cattle that died from the eruption of Mount Merapi has been identified to reach 1962 cattle (Sudarsono, 2010). In addition, cattle that are kept shepherd have a high likelihood of contracting parasitic diseases. The main disadvantages due to parasitic diseases are emaciation, late growth, decreased resistance to other diseases and metabolic disorders (Sudardjat, 2017).

Another peril is a cattle theft. The cattlemen associated in Cattle Association of Suka Tani in North Sangatta, East Kutai district complained that they often lose their pregnant cattle (Hazliansyah, 2012). Meanwhile, in Putat Village, Cirebon District, approximately eight cattle were stolen from its cowshed. Not only that, the death of cattle during the transfer of distribution also be a peril of its own. By mid-2015, approximately 12,000 cattle died when shipped over the sea. The cattle distributed from East Nusa Tenggara were dying because the temperature of the cargo ship is too hot. The peril happened in shipping caused a lot of risk to be borne (Iskandarsjah, 2015).

2.1 Indonesia Regulation on Cattle Insurance

The basic matters regarding livestock and health are regulated in Law No. 67 Year 1967 concerning Basic Provisions on Animal Husbandry and Animal Health. In essence, this Law regulates in several chapters namely General Provisions, Animal Husbandry, Animal Health, as well as the provisions of sanctions and transitions. The next regulation is Law No. 18 Year 2009 and its amendment of Law No. 41 Year 2014 on Animal Husbandry and Animal Health. While the regulations referring to the protection of breeders are regulated in Law no. 19 Year 2013 on the Protection and Empowerment of Farmers. Furthermore, as mandated by the law, there is Government Regulation No. 6 Year 2013 on Empowerment of Livestock Breeders.

In accordance with Article 1 number 1 of Law No. 6 Year 2013, Farmers Empowerment is all efforts made by the Government, provincial government, district / city government, and stakeholders in the field of Animal Husbandry and Animal Health to enhance the independence, facilitate and improve business, and improve the competitiveness and welfare of livestock breeders. Therefore, the government made efforts in the form of cattle business insurance to increase productivity and reduce risk by doing mitigation. AUTS is then regulated in detail on the Decree of the Minister of Agriculture No. 56 / Kpts / SR.230 / B / 06/2016 regarding the Guidance of Insurance Premium for Cattle Livestock Business Insurance. The Decree of the Minister of Agriculture regulates the basic rules and regulations in carrying out the AUTS.

2.2 Cattle Lifestock Business Insurance

According to the Cattle Business Insurance Premium Assistance Guidelines, AUTS is an agreement between an insurance company as an insurer and a farmer as an insured where by accepting insurance premiums, the insurance company will compensate farmers because cattle die due to illness, accidents and breeding, and / or loss under the terms and conditions of the Insurance Policy. Criteria that must be met by farmers to insure their cattle are cattlemen who conduct business of cattle nurseries and / or breeding or small-scale cattle breeders in accordance with the provisions of the legislation. The cattle that can be insured are female cattle in healthy condition. at least 1 (one) year old and still productive. In addition, cattle must also have identity markings such as microchips or ear-tags.

Until 2018, in East Java alone has been recorded as many as 6.678 participants of Cattle Livestock Business Insurance with the following details:

City	Number of Cattle
Jombang	295
Probolinggo	164
Ngawi	349
Tulungagung	417
Lumajang	362
Lamongan	508
Kediri	122
Mojokerto	254
Pamekasan	60
Bondowoso	13
Nganjuk	174
Malang	1.205
Probolinggo	874
Ponorogo	254
Pacitan	322
Pasuruan	320
Bojonegoro	69
Madiun	165
Sidoarjo	132
Blitar	133
Magetan	235
Batu	251

Source: East Java Animal Husbandry Department

Risks covered in the AUTS include cattle deaths due to illness, accident, and childbirth. The risk of cattle lost due to theft is also the scope of perils guaranteed by the AUTS. The coverage price for each cattle is up to 10,000,000 (ten million) rupiah. As for the amount of premiums that must be paid by farmers, is 20 percent from 2 percent of the price of cattle coverage, which is 40,000 rupiah per cattle per year. The coverage price of cattle is the nominal price of cattle acquisition without the addition of other costs agreed upon by the Insured and the Insurer. The total sum insured is the sum of the price of the entire cattle. The sum Insured is the basis for calculating the premium, and is the maximum amount of compensation. However, as for the term of coverage is 1 (one) year started since the payment of insurance premiums.

The AUTS implementation mechanism involves several agencies. In general, the implementation mechanism begins with the socialization of the Department of Animal Husbandry of the Regency / City so that it can invite the breeders / breeder groups to register themselves. Subsequently, the District / Municipal Animal Husbandry Office conducted data collection and inventory of Participant Candidate Location Candidate (CPCL) to the Provincial Animal Husbandry Department and provided the participant's temporary data to the insurance company to verify the feasibility. Cattle breeders who have been declared eligible to become AUTS insured can pay the premiums to the insurance company and then the company will issue the insurance policy certificate. Proof of payment and insurance policy certificate are then also reported to the District Animal Husbandry Department by the insurance company so the Provincial Animal Husbandry Department can issue a definitive list of participants. The list of Definitive Participants is recapitulated by the Directorate General of Animal Husbandry and Animal Health and declared as AUTS List of Participants by the Directorate General of Infrastructure and Livestock Facilities of the Ministry of Animal Husbandry. With this, the Directorate General of Infrastructure and Livestock Facilities of the Ministry of Animal Husbandry can pay the subsidized insurance premium of 80 percent of the insurance coverage of 2 percent of the insurance company.

Moreover, to file a claim, the insured breeder must have paid the premium according to the provisions, the potential death of the insured cattle, and the death of the cattle and/or loss within the coverage period. If there is a potential claim, the insured may be able to immediately notify the claimant to immediately be examined and take mitigation measures such as ordering to cut cattle or sell them immediately. The results of the acquisition / rescue will be calculated as a deduction from the number of claims that will be obtained by the insured. If the cattle are lost due to theft, then the replacement of the claim will be reduced by its own risk to a maximum of 30 percent of the insurance price. In the case of payment of claims that have been approved and verified, the implementing insurance company must pay claims up to 14 working days from the date of claim approval.

AUTS implementation is not without risk. The risk that may occur is not achieving the realization target of distribution of premium assistance because lack of understanding of farmers and objections to paying the premium that has been determined. Another risk that may be faced is less precise target of subsidized insurance premium. Therefore, in order to prevent the occurrence of these things, the preparation of detailed guidelines is needed. In addition, socialization and assistance are also needed by the cattle breeders as AUTS targets.

2.2.1 The Idea for Regulatory Model for Livestock Business Insurance

The implementation of AUTS in Indonesia is conducted by PT Asuransi Jasa Indonesia (PT Asuransi Jasindo). In accordance with the guidelines previously discussed, PT Asuransi Jasindo acts as the underwriter of the insured which is the cattlemen who enroll and pay the premium. The risks covered by PT Asuransi Jasindo in its AUTS products are only for cattle deaths due to illness, accident, and childbirth and cattle losses due to theft. The coverage of the above risks is quite narrow compared to some that offer similar countries insurance to farmers/cattlemen.

In terms of the amount of coverage provided by AUTS, the sum insured of 10 million is sufficient for one cattle with a premium cost of 40,000 per year. Prices of cattle on the market are varied depending on the type, age, and weight of the cattle. With the sum insured, cattlemen/breeder can get a calf depending on the types. For limousine-type calf sold at a price range of 8 million to 12 million for male calf and 3 million for female calf. While for PO calf that are most commonly found, are sold at prices ranging from 7 million to 11 million rupiah for males and 3 million for female calf. As for Brahman cross cattle, the calf is sold at a price range of 6 million to 9 million rupiah. For the price of semi-adult cattle closest to the coverage given is a Brahman cross type cattle that is sold at a price of 14 million rupiah (Agrobisnisinfo.com, 2018).

We compare cattle insurance in several countries such as United States, India and New Zealand regarding the coverage of protection against perils. These three countries were chosen because they were the largest meat exporters to the Indonesian market. According to Badan Pusat Statistik (BPS), in 2017, the values of imported beef from India reaches 45 thousand tons with a value of US \$ 166 million. The third largest was The United States with 14.4 thousand tons worth US \$ 55.98 million. Meanwhile New Zealand was ranked fourth with the total 13.6 thousands ton. (BPS, 2018)

In New Zealand, one of the insurance companies providing livestock insurance is FMG Advice and Insurance. The scope of risks borne by the company is wide and detailed. For the protection of livestock in open air, the risk of death is borne by several causes of death, such as death from fire, electric shock, lightning, sudden, external, and visible impact of violence, stress, explosion, shortness of breath due to smoke of fire, lightning, or explosions, hail, earthquakes, floods, objects falling from aircraft. As for the cattle that are indoors, the scope of the risk includes sudden death or theft. In addition, FMG Advice and Insurance also provides protection when livestock dies while transported and accidents occur. The death of cattle due to poisoning can also be covered by the insurance offered by FMG. The insurance company also offers the disposal of dead animal carcasses either because of illness or because of other reasons. Preventive measures such as servicing by a veterinarian to prevent cattle death also become the scope of the offered insurance facility. All risks will be borne according to market price up to the amount stated on the farmer's livestock certificate.

Similar to New Zealand, Trusted Choice insurance company in America also provide livestock insurance with a wide range of risk scopes. According to the company, the coverage of livestock insurance risks is divided into comprehensive coverage and limited coverage. Comprehensive coverage is a wide range including accidents, illnesses, and theft. While limited coverage is a scope that specifically mentions the cause of the risk to livestock including accidents due to drowning, being shot, loading and unloading, falling objects, fires, smoke, electric shock, and explosions; flood, lightning, wind, and hail; natural disasters such as earthquakes, volcanoes, and sinkholes; theft and vandalism; damage to water and heating systems; animal attacks; as well as collisions or other causes of death while transporting the cattle.

Meanwhile, in India, HDFC ERGO with its Cattle Insurance Policy product offers to bear the risk of livestock death covering the insured cattle within the geographic area specified in the policy, in case of life loss due to accident, illness, or surgery. The policy also covers livestock deaths that are insurance issues that occur outside of the geographical area during droughts, epidemics and other natural disasters.

From the example of livestock insurance companies from several countries above, there are some differences in the coverage of risks that can be borne by the insurance company. Insurance companies in New Zealand and the United States, according to the example above, provide a wide range of risks for the insured when the livestock is dying or other things that jeopardize the cattlemen. On the other hand, AUTS in Indonesia provided by PT Asuransi Jasindo only provides protection on the limited perils. PT Asuransi Jasindo only bears the risk of cattle death due to certain causes of accidents, illness and childbirth. Cattle lost due to theft will also be borne by PT Asuransi Jasindo with its own risk reduction.

Risk coverage is considered not enough considering the location of the majority of cattlemen in Indonesia with geographical conditions that allow natural disasters such as volcanoes erupt or landslides. Therefore, in order to meet the needs and attract more cattlemen, the coverage of risk protected by the company can be expanded by adding some events that pose a risk of loss to cattlemen such as erupting volcanoes or landslides. Not only that, the security of the distribution of cattle between islands must also be protected by providing a range of risks for cattle deaths due to peril of transfer or distribution.

3 CONCLUSIONS

Regulations regarding the risks in Cattle Livestock Insurance have not provided sufficient protection for cattle farmers in Indonesia. Decree of the Minister of Agriculture of the Republic of Indonesia No. 56 / Kpts / SR.230 / B / 06/2016 is made to provide basic settings and formats for running AUTS. The risks in AUTS include deaths due to illness, accidents, and childbirth. Therefore, in order to prevent the occurrence of these matters, the preparation of detailed guidelines is needed. In addition, socialization and assistance are also needed by farmers as the target of AUTS.

The risk coverage is considered in adequate given the location of the majority of cattle farmers in Indonesia with geographical conditions that allow natural disasters such as erupting mountains or landslides. Therefore, in order to meet the needs and capture more cattle breeders in the regions, the risk coverage protected by AUTS can be expanded by adding a number of events that pose a risk of loss to cattle farmers. Not only that, the safety of inter-island distribution of cattle must also be protected by providing coverage of the risk of death due to displacement or distribution.

REFERENCES

- Tempo.co, 2013. [Online] Available at: https://nasional.tempo.co/read/458101/suap-dagingpks-begini-awal-mulanya [Accessed 29 June 2018].
- Pratiwi, P. S., 2017. [Online] Available at: https://www.cnnindonesia.com/nasional/20170206124 716-12-191557/dalami-kasus-patrialis-kpk-periksapemohon-uji-materi? [Accessed 21 June 2018].
- Sitanggang, N., 2015. [Online] Available at: http://agribisnis.co.id/atasi-kendala-ternak-sapi-untukhasil-memuaskan/ [Accessed 26 June 2018].
- Sidik, F., 2017. [Online] Available at: http://finansial.bisnis.com/read/20170324/215/640046/ ojk-dorong-penyaluran-kredit-asuransi-pertanianpeternakan [Accessed 24 July 2018].
- Hana, O. D., 2016. [Online] Available at: http://finansial.bisnis.com/read/20160406/215/535045/ asuransi-ternak-sapi-tahun-ini-tanpa-konsorsium [Accessed 24 July 2018].
- Badan Pusat Statistik, 2017. *Populasi Sapi Potong menurut Provinsi, 2009-2017.* [Online] Available at: https://www.bps.go.id/linkTableDinamis/view/id/1016 [Accessed 7 August 2018].
- Sudardjat, S., 2017. *Epidemiology of Animal Diseases Vol. 1*, Jakarta: Directorate of Animal Health Development.
- Iskandarsjah, E., 2015. [Online] Available at: https://www.republika.co.id/berita/ekonomi/makro/17/ 08/02/dpd-ri/berita-dpd/15/06/24/nqg3w6-dpd-20persen-sapi-dari-dan-%20ntt-die-when-delivery [Accessed 8 August 2018].
- Agrobisnisinfo.com, 2018. [Online] Available at: http://www.agrobisnisinfo.com/2018/01/harga-sapi-2018-semua-jenis-limousin.html [Accessed 7 August 2018].
- Inge, N., 2018. [Online] Available at: www.liputan6.com: https://www.liputan6.com/regional/read/3297390/17tahun-berlalu-virus-jembrana-kembali-jangkiti-sapi-disumsel
- Santoso, B., 2018. [Online] Available at: www.liputan6.com: https://www.liputan6.com/regional/read/3230496/pulu han-sapi-di-cianjur-mati-mendadak-terserang-virusapa
- Bere, S. M., 2017. [Online] Available at: https://regional.kompas.com/read/2017/01/30/1236207 1/puluhan.sapi.mati.mendadak.diduga.terjangkit.penya kit.se
- Kokino, I., 2016. [Online] Available at: http://www.kalamanthana.com: http://www.kalamanthana.com/2016/07/09/5-persensapi-brahman-cross-penajam-mati-saat-melahirkanada-apa/

- Sudarsono, 2010. [Online] Available at: https://news.okezone.com/read/2010/11/15/340/39361 7/hampir-2000-sapi-mati-akibat-letusan-merapi
- Hazliansyah, 2012. [Online] Available at: https://www.republika.co.id/berita/nasional/umum/12/ 05/02/m3dmnm-peternak-sangata-mengeluh-seringkehilangan-sapi
- Dyah, 2015. [Online] Available at: https://www.antaranews.com/berita/527724/konsumsidaging-sapi-orang-indonesia-masih-rendah [Accessed 20 June 2018].
- BPS, 2018. [Online] Available at: https://databoks.katadata.co.id/datapublish/2018/03/22 /separuh-impor-daging-indonesia-dari-australia