

FOOD SOVEREIGNTY TOWARDS RICE SUSTAINABILITY

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ABSTRACT

Malaysia should adhere to the WTO's policy on agrifood trade liberalization. Agrifood regulations are designed to ensure the protection of farmers and achieve food sovereignty. This research investigates and plots the evolution of agrifood laws that promote food sovereignty and trade liberalization towards rice sustainability. The qualitative study is based on the application of social jurisprudence theory and secondary data. The structure list in the current legislation is mapped to the regulations and standard operations applied in the matrix table. Malaysia's agrifood regulations are found to reinforce the WTO policy of liberalizing trade for agriculture, which undermines food sovereignty and provides inadequate protection for farmers. The interdependence of supporting sustainable agriculture and empowering small farmers is recognized by SDG2, which aims to address hunger, food security, nutrition, and climate change. The government should provide policies that improve the management of the food system to achieve food sovereignty. A review of the Control of Padi and Rice Act 1994 is necessary for creating new provisions on 'seed', which includes a provision on food sovereignty for individuals working in the rice industry. The development of people in agrifood to support their global market can be explained in another provision.

Keywords: food sovereignty, liberalization, sustainable agriculture, rice trade; agrifood regulations

INTRODUCTION

The freedom of communities, peoples, and states to freely choose their own food and agricultural policy is known as “food sovereignty.” Supporters of the idea believe that by bolstering smallholder agriculture, it will significantly reduce hunger and poverty on a global scale (Beuchelt, T. D., & Virchow, D., 2012). A person needs access to enough amounts of wholesome food to develop physically, psychologically, and intellectually as well as to live a dignified life. Thus, “adequate level of food” is what we mean when we talk about human rights.

The human right to adequate food is part of Article 25 of the Universal Declaration of Human Rights 1948 and Article 11(2) of the International Covenant on Economics, Social and Cultural (ICESCR). Since 1976, the Convention has been in effect, with more than 161 states ratifying it. This means that each country is obliged to comply with its citizen's food rights. Malaysia's position towards ICESCR has not been signed or ratified. Malaysia also had to realize food self-sufficiency and finally food sovereignty if it is to fulfill its people's right to eat.

According to Matthews A. (2012), the protection of domestic production

capacity is an essential element in a country's food security strategy. Countries are concerned that a reduction in agricultural protection would negatively affect the large rural population, which still experiences the highest incidence of poverty and often has limited access to alternative employment opportunities. Market instability and sudden increases in imports have also led to an unexpected negative impact on the trading activities of poor producers whose vulnerable livelihoods are at risk.

In 1995, Malaysia became a World Trade Organization (WTO) member and began implementing an Agreement on Agriculture (AOA) which included the opening of import markets for Malaysian products, as well as reducing and removal of subsidies in agriculture inputs such as fertilizers, pesticides, and seeds. As a result of Malaysia's accession to the World Trade Organization, Malaysian trade liberalization is taking place. As a result of membership in the World Trade Organization, Malaysia is to be able to provide for any WTO policies that concern agriculture within its laws and regulations. In order, to liberalize trade in the agriculture sector, Malaysia must retain a WTO policy. One of the key objectives in developing regulations on agriculture is achieving food sovereignty and protecting farmers (Divanbeigi, R., & Saliola, F., 2016). Achieving food sovereignty and safeguarding farmers are two important goals in the development of agricultural rules.

The Control of Padi and Rice Act 1994 (Act 522) on the regulation of will be a staple of rice. The government took the action of dissolving the Lembaga Padi dan Beras Negara Act 1971 (Act 47) which was established through an Act of Parliament that was the Lembaga Padi dan Beras Negara (Successor Companies) Act 1994 (Act 523). In order, to adapt the policy of trade liberalization in the food sector as

defined by the WTO, it was necessary to establish both substantive and institutional aspects of Acts 522 and 523. For Malaysia, this condition creates certain problems from the perspective of its sovereignty. This circumstance poses certain issues for Malaysia in terms of its sovereignty.

One party should not be excluded from international trade when it participates internationally and accedes to the World Trade Organization, but in doing so has to protect its national sovereignty and society's well-being, including farmers' rights. In ensuring the agricultural sector remains competitive, the government has introduced fertilizer subsidy schemes to farmers. The objectives of this scheme are to help ease the burden of farmers as well as to optimize agricultural yields, especially for the paddy, rubber and oil palm sectors, (Asmar et al. 2021, p.46).

The rising level of imports and the growing trade deficit can have a negative impact on countries' exchange rates from an economic point of view (Mendoza, 1995). Exports will be encouraged by a weaker domestic currency and imports will become more expensive; however, the strong national currency would hamper exports and make imports cheaper.

Malaysia is one of the world's largest trading countries, with most goods subject to low tariffs (Dardak, 2020 p.64). It can be considered as an attempt to achieve a balance between the objectives of enhancing production in order, to improve food security and guaranteeing that foodstuffs are easily available for consumers, by reducing import duties on basic foods. In view, of the fact that rice is regarded as a valuable commodity with strategic importance, Malaysia takes more action than any other country in the market for rice with protection under special exclusion listing. When it comes to our nation's food security, rice is a crucial product. However, for the purpose of this

study of concept of food sovereignty, rice is referred to enhance the sustainability in agrifood sector.

Malaysia is one of the trading nations with the lowest tariffs on the majority of goods. Low tariffs on imports of basic foods can be seen as an effort to strike a balance between the goals of boosting production to improve food security and ensuring that food is accessible to consumers at reasonable rates. The Malaysian government intervenes more in the market for rice than it does in other commodity markets because rice is thought to be a commodity with strategic importance.

Fatah, F. A., & Cramon-Taubadel, S. V. (2017, p. 33) referring to some of the policy measures for rice include a monopoly on imports, controlled prices for rice in the wholesale, retail, and milling markets, price support, fertilizer subsidies, the provision of drainage and irrigation infrastructure, encouraging innovation, and public investments in research and development.

A number of points need to be taken into account in the context of the liberalization of trade in the agricultural sector in Malaysia (Dardak, 2020), namely: Malaysia is to achieve food sovereignty (Rais, 2022) in the country because of the conditions of trade liberalization, which led to Malaysia becoming a net importer of rice (Rajamoorthy, Y., & Munusamy, S., 2015). The business interests of farmers' rights are marginalized when dealing openly with imported rice, or in other words they are openly confronted with larger capital owners. Therefore, this study will further map the problems related to the Control of Padi and Rice Act 1994 especially in relation to the interests of farmers' rights and on a broader and urgent scale related to the sovereignty of food Malaysia as a nation.

This article aims to map out the relationship of agrifood regulation in Malaysia with the reality of trade liberalization related to the state of food sovereignty and the protection of farmers' rights, will be seen whether the existing agrifood regulations, providing space alignment on farmers' rights or simply in favor of trade liberalization mechanisms and WTO regulations. Research methods used, discussion of agricultural regulatory matters relating to food sovereignty, liberalization of trade and protection of farmer rights are described in the study.

According to the National Agrofood Policy 2.0, DAN 2.0 (2021), a healthy agrifood industry for long-term growth prioritizes not only economic contribution and social well-being but also environmental issues, according to National Agrofood Policy 2.0, DAN 2.0 (2021). According to Nor, M. et al. (2018), the long-term advantages include: (1) raising the standard of life for farmers and society; (2) meeting fundamental demands for food and fiber; (3) being commercially viable; and (4) enhancing environmental quality and the resource basis upon which agriculture depends.

If the element is neglected during industrialization, there is a likelihood of environmental degradation, including air pollution, habitat degradation and, biodiversity concerns, due to agricultural practices that are detrimental to the environment (DAN 2.0, 2021 p.7). Consequently, it is essential to regulate agricultural activities in a manner that minimizes the adverse effects on the environment, at a sustainable level.

To enhance the environmental component of the agrifood sector, firstly, the Sustainable Development Goals (SDGs) indicator and will also be used to evaluate the sector. The United Nations has identified one of the key strategic axes of the SDG to ensure sustainable consumption

and production patterns, which is to halve global per capita food waste at retail level and consumption, while reducing food loss throughout the production and supply chain, including post-harvest losses by half by 2030, DAN 2.0 (2021, p.88)

Second, the regulatory and legal deficiencies indicator. Although cultivation has been carried out for decades, some high-value crops (HVC) are still produced on a relatively small scale and are not regulated through law or regulation. For example, the cultivation of non-commercial paddy in the residential environment is not a practice allowed by local authorities. The obscurity of the local authority rules for using land in landscaped spaces with paddy crops is also not the norm for farmers in Malaysia (DAN 2.0, 2021 p.60). The situation is different from countries such as India (S. Viswanath and P. A. Lubina, 2017 p. 103) whose land use and space are dominated by paddy crops that can also be seen as a landscape decoration. The possibility of paddy cultivation is still synonymous with soil needs such as 'fields' and water irrigation.

Perhaps paddy crop residues such as husks can cause pollution and health problems due to the absence of regulations to regulate the cultivation of paddy in the environment of the residential area compared to food crops such as vegetables, fruit trees, cassava, yam and flowers referred to as urban farming. Singapore (TLL, 2016) is among the countries that began to implement urban agriculture including rice cultivation through the cooperation of the Temasek Foundation to meet food security needs. Referring to the Urban Community Garden Policy, DKKB (2020) published by the Ministry of Housing and Local Government in 2020 does not include rice crops as a type of crop that can be grown in urban community garden areas. Appropriate legislation is essential to drive the growth of the industry while balancing the impact on the environment and communities.

Perhaps, as regards achieving self-sufficiency in rice production, at approximately 65-70% of domestic consumption, the Malaysian position on food security is widely translated, Arshad, F.M. et al., (2011). However, the liberalization of trade in the agrifood industry resulted in farmers having less rights because of the increased access to imported food products.

EVOLUTION OF AGRICULTURE TRADE REGULATIONS

Following the establishment of the WTO, allied nations established international economic organizations to address the gaps in international trade policy. First, the initiative seeks to create a reciprocal trade agreement that requires reciprocally reduced tariffs in trade. Trade tariff reduction marked the beginning of trade liberalization. In 1994, the General Agreement on Tariffs and Trade (GATT) was established, serving as framework for creating governmental regulation that would liberalize trade. According to Anghie, A. (2007), the intergovernmental nature of GATT trade negotiations is based on the belief that an open trading system is more efficient than one that protects, and that countries will effective and efficient systems will benefit from free competition.

GATT has been strengthened through negotiation during its development. The implementation of the Uruguay Round of Multilateral Trade Negotiations (MTN) which resulted in the formation of the WTO as an official intergovernmental organization that did not exist before. WTO regulations are responsible for managing trade in goods, and trade related copyright. The AOA, which is part of the WTO agreement, involves multilateral cooperation in agriculture. Its objective was to reform the agriculture trade policy and establish a market-based, agricultural trading system.

WTO AOA advocates for the World Bank to impose non-tariff restrictions and requires developing nations to decrease the average price of agricultural products by 24%. It was implemented over a period of six years and is still implemented by developing countries under their 10-year term. The restriction on price tariff binding means that the member country places a cap on the maximum market price. The charged price must fall within the range of zero to hundred.

The AOA applications call on the Malaysian government to increase to imported products and decrease subsidies for agricultural inputs like fertilizers, pesticides, and seeds. Besides, the rice price cap of at 40% on cost in freight (CIF) import price and an AOA-based schedule. Malaysia agreed to liberalized access to rice entry with a minimum quota 92,000 metric tons per year before 2008 (Caballero-Anthony, M., et al., 2007). The import duties for rice imports are 20 percent under the ASEAN Free Trade Area (AFTA) Joint Effective Priority Tariff Agreement (CEPT) and 40 percent under the WTO AOA. With the quota, the priority level of tariffs (preferential tariffs) sets a maximum of 40%. The reducing tariff rate at 20% for rice enter into force in 2010 after the signed of The ASEAN Trade in Goods Agreement (ATIGA) 2009 (ATIGA, 2020).

Back to history, since the impact of AOA, Malaysia has only exported rice products and has also turned into a net importer of paddy and rice. Since 1995 Malaysia has opened-up a domestic market beyond the WTO allocation. In 1995-1997, and the follow-up to the Asian Financial Crisis, there were despite the absence of import tariffs, market access to imported rice was encouraged by the flexible import quotas. Imports of rice have increased steadily 167,593 metric tons in 1980 to 427,556 metric tons in 1995. Rice imports in year 2000 were worth RM500.7 million, but declined by 19 percent in 2001 due to

increased domestic rice production. Rice mainly imported from Thailand and Vietnam, with India, Pakistan, Australia, and China being the primary suppliers. Despite the need for rice imports to meet domestic consumption, Malaysia successfully exported rice in 1995 amounting to 2,430 metric tons, largely to Myanmar to meet bilateral agreements (Caballero-Anthony M., et al., 2007). Overall imports made Malaysia among the net rice importers. Thailand, Vietnam, and the United States were the main suppliers of rice imports during the period.

The liberalization of trade is still dragging along, and Malaysia is positioning its imports to meet domestic needs. The impact of the liberalization of trade in the agrifood sector is evident in the impact it has, particularly on food sovereignty. Baharumshah A.Z., (1991) noted that the producers have been shielded from lower world prices by import restrictions, and consumers have footed the bill by paying prices higher than import prices. Regulations imposed by the government have a significant impact on imports.

An estimated 1.16 million metric tons of rice were imported into Malaysia in 2021, a little reduction from the more than 1.2 million metric tons imported the year 2020. The amount of rice imported has not changed much since 2012, despite fluctuating from year to year. Vietnam (at \$237 million), India (at \$167 million), Myanmar (at \$80.7 million), Pakistan (at \$59.5 million), and Thailand (at \$36.1 million) are the main countries from which Malaysia imports rice. For Malaysia's rice imports between 2019 and 2020, India (\$113 million), Myanmar (\$48.8 million), and Pakistan (\$28.7 million) experienced the fastest growth (DOA, 2021, p.108).

The nation's self-sufficiency program is supported by Malaysia's importation of rice, which is done primarily to assure supply and price stability.

Notwithstanding the differences in consumers' diets, rice still appears to be the most sought-after carbohydrate in this country.

FOOD SOVEREIGNTY IN THE RICE TRADE

The idea of food sovereignty refers to the country's right to decide on its own the agrifood policy that secures food rights for the people, hence granting its right to decide on the agriculture system compatible with the potential of its local resources. Food sovereignty is the entitlement of individual to consume nutritious and environmentally conscious food that promotes good health, while also allowing them to establish their own agricultural practices and food sources, (Tisnanta, H. S., et al., 2015, p.4).

The purported performance of the nation's food security was impacted by trade liberalisation either directly or indirectly. It is based on the observation that the level of protection in the agricultural sector is still high enough in the majority of developed nations, while Malaysia, according to the WTO, has implemented a policy that restricts the entry of various agricultural commodities into its market. In such circumstances, the challenge of trade liberalisation is one of market inequality, which is felt by the majority of developing nations, including Malaysia.

Naturally, while competing with developed nations in a free market, developed nations' products may be less

expensive than those produced by underdeveloped nations. By the way, achieving food sovereignty within the framework of trade liberalization is undoubtedly challenging for developing nations, particularly given that their governments cannot completely function in the economics of the agri-food sector.

Three dimensions are commonly linked to the sustainability goal when discussing the function of the state in the modern economy. First, allocation function where people are the priority (in this case the product and price of rice). The government allocation of financial resources efficiently executed. Secondly, if the group that gained by moving person to compensate for the loss remains in the same position, it is considered a useful logistics function. Distribution function referring as places of logistics involves where an action is said to be useful if the group that benefited from the move to compensate the group that suffered the loss so that the group's position remains the same loss as well as before the action in question). Thirdly, stabilization function is a crucial aspect (for peace and prosperity) of the economy that relies on relies on the private sector, leading to instability and unemployment.

Table 1 shows an associated dimension of food sovereignty, food security and the National Agrofood Policy 2.0 inter-wined in definition of the function, an indicator and key features mapping from economics perspective.

TABLE 1. Understanding Food Sovereignty, Food Security, National Agrofood Policy 2.0

Food Sovereignty	Food Security	National Agrofood Policy 2.0 (DAN 2.0)
Definition	Definition	Statement
Food sovereignty is the entitlement of individuals to consume nutritious and environmentally conscious food that promotes good health, while also allowing them to establish their own	Food security is ensured by providing and economic access to sufficient, safe food for all individuals who want to maintain a healthy and active lifestyle, FAO (2006, p.1)	Prime Minister quote: This policy supports the aspiration and direction of the country's agro-food sector to be more sustainable, resilient and high-tech. It is to spur economic growth and improve the well-

Food Sovereignty	Food Security	National Agrofood Policy 2.0 (DAN 2.0)
agricultural practices and food sources, Oliver, B., Deawuo, L. A., & Rao, S. (2022, p.12)		<p>being of the people as well as prioritizing the security and nutrition of the nation's food. p.2</p> <p>Minister quote: An efficient and resilient future food system has the potential to increase revenue to food producers throughout the food chain as well as being able to provide nutritious and affordable food in line with the main thrust of the national food security framework., p.4</p> <p>Secretary General quote: This policy will be an inspiration and a motivator for the private sector and industry players to work together with the Government to spearhead the development of the agro-food sector as a competitive and modern sector, thus ensuring the success of DAN 2.0. p.6</p> <p>General statement: Agrofood as a sustainable, resilient, and high-tech sector that can drive economic growth and improve the well-being of the people as well as prioritise food security and nutrition, DAN 2.0 (2021, p.7)</p>

Indicators	Indicators	Key Features
<p>1. Food system for local</p> <ul style="list-style-type: none"> Improving access to export and import markets Improving the import and export policies of paddy Access supporting for financial assistance Able to determine guaranteed purchase price 	<p>1. Availability</p> <ul style="list-style-type: none"> Understand import and export markets Support from financing and banking Encourage investment in irrigation Improving the road networks and trade facilities Introducing soil fertility and water usage Records of annual rice production Knowledge and implementation of new practices (hybrid seeds and genetic modified) 	<p>1. Sustainability – Ecosystems that provide food and nutrition security covering economic, social and environmental aspects to future generations</p> <p>2. Resilient – Resilience to internal and external challenges arising from the economic, social and environmental environment</p> <p>3. Technology-driven – Technology-driven agro-food sector and potential scientific advances to food producers</p>
<p>2. Enhancing Knowledge and skills</p>	<p>2. Accessibility</p> <ul style="list-style-type: none"> Access to the updated information about rice production 	<p>2. Principal</p> <ul style="list-style-type: none"> Competitive and Innovative Agrofood Sector for economy development

Food Sovereignty	Food Security	National Agrofood Policy 2.0 (DAN 2.0)
<ul style="list-style-type: none"> • Developing human capital through training an expert force • Organizing various local training, such as on-job-lab testing • Strengthening the proper use of local knowledge • Applying proper technology in planting, preservation and harvesting 	<ul style="list-style-type: none"> • Increasing revenue for small-scale farmers • Access to the natural resources (land and water irrigation) • Attain food supply value chain for vulnerable people 	<ul style="list-style-type: none"> • Food Producers' Wellbeing and Inclusivity in Sector Development for social interaction • Paradigm Shift towards a Sustainable Food System in Accordance with Climate Change for environmental practices
<p>3. Control locally</p> <ul style="list-style-type: none"> • Ensuring that the voices of small-scale producers are heard by the authorities • Promoting local governance and decentralization in rural management programs • Adopting appropriate rules to reduce conflicts on land • Integrating land under rice growth 	<p>3. Utility</p> <ul style="list-style-type: none"> • Teaching the proper use of natural resources and adapting to climate change • Improving consumption patterns through a variety of educating programs <p>Encouraging food security policies to improve food patterns and cultural patterns (Family-based farming and labor, land inheritance)</p>	<p>3. Strategic Thrust</p> <ul style="list-style-type: none"> • Support Modernization and Smart Agriculture • Strengthening Domestic Market, Increasing High Demand Product and Export-Oriented Products • Developing Talent That Fulfills the Demand Industry • Improving Practices Agriculture and Sustainable Food System • Providing a Conducive Business Ecosystem and a Strong Institutional Framework
<p>4. Values for food producers</p> <ul style="list-style-type: none"> • Improving gender equality through empowerment of rural women as a basic rice farmers • Increasing Flexibility in Vulnerable population through increasing awareness • Empowering small-scale producers to participate in the policymaking 	<p>4. Quality</p> <ul style="list-style-type: none"> • Training and development new cultivation practices for rice seeds • Mechanisms to quality control Lab for monitoring progress • Accessing to the healthy and nutrition's food 	<p>Mapping from DAN 2.0 Strategic Thrust: Provide a conducive business ecosystem and a strong institutional framework</p> <p>Strategy 4:</p> <ul style="list-style-type: none"> • Streamline and strengthen Agrofood Sector Governance • Reduce potential overlap between agencies and increase the Ministry's role in industry development • Review and coordinate laws, regulations related more often in line with the current developments and trends of the industry • Regulate and increase enforcement against the use of banned chemicals and antibiotics on farms • Strengthening the handling of agricultural censuses for better record keeping of agro-food sector data

Food Sovereignty	Food Security	National Agrofood Policy 2.0 (DAN 2.0)
<p>5. The Right to food</p> <ul style="list-style-type: none"> • Pricing policies to support food production (output) • Cultural preference in food consumption instead of brand conscious generation 	<p>6. Works with nature, environment</p> <ul style="list-style-type: none"> • Strengthening the access of rice cultivation to water resources via proper scheduling • Conserving resources, including water resources management for sustainable livelihoods 	<ul style="list-style-type: none"> • Strengthening the legal framework and implementation structure of the private public partnership scheme • Creating a database and review of Non-Tariff Measures

Source: FAO (2006), Oliver, B., Deawuo, L. A., & Rao, S. (2022), DAN 2.0 (2021)

Table 1 was also displayed the integration of legal context into policy mapping, and yet the legislation parts is not explained, on how the action will take place in monitoring the implementation such as a contract between relevant parties involved, so-called how the farmers being protected, the remedies after getting involve in the producing rice as security food. The outlines of Food Sovereignty and its six indicators are shown in Table 1 such as localize the food system, enhance knowledge and skills, putting control locally, rights to food and working with nature.

When referring to Table 1 earlier, the major issues of food security and food sovereignty to be availability, accessibility, utility, and quality of food, local control and local governance issues, lack of small-scale farmers' access to financial assistance, knowledge, and information, as well as human capital and natural resources (e.g., water irrigation) and likely inappropriate

management patterns in rural areas that should be amended by innovative rural institutions. Therefore, adapting food systems will require attention to training in the proper use of natural resources especially water resources and adapting to climate change. It will also require attention to awareness of food sovereignty elements for the vulnerable and preventing future negative impacts from climate change.

Small-scale households need to be given priority in local policies through gaining access to financial aid like credit and loans for inputs (seeds, fertilizer, insecticides, etc.). The six indicators for food sovereignty were financial availability, human capital, more local control, the empowerment of food producers, access to water resources, and the pricing practises that were identified by rice farmers. From the viewpoint of rice farmers, the four key food security indicators were access to markets and training, growth in sales and supplies, expansion of technical quality labs,

and environmental and climatic extension. Agricultural programs to address food insecurity frequently ignore the opinions of regional agricultural producers or the relationship between regional agricultural production and household food insecurity. Fiscal measures could support households in meeting their nutritional demands and local farmers in selling their agricultural products while also promoting nutritional understanding among household members. Priority must be given to middle-class and lower-class socioeconomic groups, which includes most rice growers as well as communities in need. Food sovereignty indicators should be considering when promoting food security in distant and rural areas with predominantly legacy farmer communities.

TRADE LIBERALIZATION

Trade liberalization in agrofood and distribution functions can slow down the function of government in economic stabilization. The WTO trade policy for agrofood must be implemented by the Member States to bring on the capability of governments to achieve food sovereignty. The government's return to the earlier policy to force the spirit of the food system in appreciating farmers and not to deceive the consumers. Considering that the WTO members must economically represent the stakeholders benefits in achieving food sovereignty. Legislation is an instrument to support the said goal based on social engineering theories from Roscoe Pound and Tamanaha (Tamanaha, 2019).

The liberalization of international trade in the food sector and the distribution function was weakened by the stabilization function of the government economy. The WTO trade regulatory and policy framework on food that member states must accommodate has led to the government's powerlessness in achieving food sovereignty. The government needs to return to its initial policy to embody the

spirit of a food management system that empowers farmers in the country by not burdening consumers. Participation in the WTO should be followed where possible with smart and compact economical solutions in favor of local interests as well as to achieve food sovereignty. The law can be used as an instrument to support the achievement of this goal.

SOCIAL ENGINEERING THEORY

Since the legal perspective is the game changer of the rules played by WTO, this will be the barrier to avoid authority played with it. Those positive public interest considerations held on by the government stemmed from the set of theories developed by Roscoe Pound, drawing upon the following statement, Based on McManaman (2016):

“a new philosophical theory of international law could be established only by utilizing social engineering as major challenge, according to Pound. A legal philosophy that encompasses social psychology, economics, sociology, law, and politics was necessary to provide a practical evaluation of international law in relation to social goals..”

In accordance with the concept of law, the task of the law is to balance the interests of individuals with those pertaining to society, as stated by Roscoe Pound, who shares his futuristic perspectives on justice. The law's work is deemed more significant by Pound desired justice. A dispute of this kind emerges and grows. The famous Pound maintained that law is a form of social engineering.

Roscoe Pound's theory of law on social engineering suggests that the law is no longer merely a regulator of the status quo, but rather enables specific purposeful goals to be achieved. The National Agrofood Policy 2.0 has included social interest from the perspective of the public interest notion where, towards if that a conducive business ecosystem and a strong

institutional framework, with one of the action plans being to regulate and increase enforcement against the use of banned chemicals and antibiotics on farms. This is not only protecting the public health it is also ensuring the rice sustainability as the land and environment.

Tisnanta et al. (2015, p.161) illustrates the theory according to Tamanaha, the law serves as a tool for achieving certain objectives, including social welfare and maintaining monopoly rights, while also being seen as an essential component of economic activity. This theory more likely is in line with food sovereignty and SDG concerns of food for people. The instrumental views of the law means that the laws that include the rule of law, the institution of law, and the legal process are consciously scrutinized by people and groups as a tool or means to reach the end. The supply of ends that may be open and unlimited, ranging from personal (persuasion, harassment, or progress), to ideology (extending reason), to social goals such as maximizing social welfare involves people's goal (farmers rights) or seeking a balance of competing interests (producer rights).

The concept and theory of the functioning of law as a tool to achieve certain goals in the circumstances that have the above mapping, should be adopted by the government to realize an agrifood management system that can realize the achievement of food sovereignty by the government in essence amid the obligation to participate in the validation and accommodating of the WTO's policy on the relatively liberal food trade sector. Government intervention measures have never allowed agrifood management regulations to only be established to support WTO policies regardless of the state of local food producers who need support and attention. In fact, Roscoe Pound's theoretical approach in identifying the social impact behind the intervention is to

maintain the capacity of being an industrial nation that attaches importance to rice and rice manufacturing but also sees the effects of liberalization on the rights of farmers who are seen as oppressed but there are still many opportunities to gain government support through programs such as incentives and other subsidies.

Malaysia is an industrialized country with agriculture remain to support the economy. DOA (2021, p.7) reported, the agricultural sector also plays an important role with a paddy parcel area of 283,911.0 hectares and 647,859.0 hectares of paddy cultivation, a harvest area of 645,732.0 hectares. The production of rice of 2,428,893.0 metric tons was worth RM 2,771,013.95 million and rice production of 1,677,500.0 metric tons. The rice imports of 1,062,000.0 metric tons regardless the citizen per capita rice consumption is 79.0 kg/year and the 65% self-sufficiency level pressures the government to allow continuous imports. (Arshad et al. 2011, p.85)

Ideally, Malaysia's land use for our agrifood management should be able to pursue the principle of food sovereignty without having to rely on imports from other countries to rely on the free trade mechanism initiated by the WTO. But in real sense, it is not so, for example the Malaysia's rice sector still belongs to the world's net rice importer.

In year 2021, the trade of agricultural products involves export of Cereals and Cereal Preparations at RM3,866.52 million and import at RM8,808.23 million. The trade of Agricultural Machinery (including Tractors) and Parts export at RM986.72 million and import at RM1,388.56 million. Whilst the Fertilizers export at RM3,968.56 million and import at RM5,453.95 million bring to an input that suffer from an unstable balance of trade at (-RM1,485.39) million (DOA, 2021, p.110). However, the

trade balance is said to continue to increase but for the rice sector it is an insignificant level as the regulations of rice import to Malaysia is still competitive and controlled by the government. Other factors affect the value of agricultural trade due to less exports and the value of current currency.

In fact, the invasion of the sovereignty of the country's waters through fishing at sea is also seen as disrupting the ecosystem of the fishing industry which is one of the sources of food, so the provisions of international law of the sea can also be categorized as the need for the integration of food sovereignty with food security.

RELATIONSHIP BETWEEN FOOD SOVEREIGNTY AND AGRICULTURE LIBERALIZATION

This phenomenon is related to the liberalization of trade in the agrifood industry. The issue of trade liberalization deficiency commodity trade in international markets in the current era of globalization, no exception to the agrifood trade. When

the economy opened and ratifies various regional and global economic and trade, liberalization through cooperation agreements, the pressure of liberalization through the various cooperation agreements of such rules is unlikely is unlikely to ultimate undermine national interest and conflict with internal policy. In the context of the WTO agreement on cooperation related to the liberalization of trade in the food sector is the release of the Malaysian Quarantine and Inspection Services Act 2011 to regulates the border entrance of agrifood. The law pertaining to agrifood is intriguing due its potential to analyze its provisions to restore the country's spirit and purpose to provide maximum prosperity to people, as defined by Shared Prosperity Vision 2030 (WKB) and the 12th Malaysia Plan (RMKe-12), (DAN 2.0, 2021).

As several provision in the agrifood legislation should be studied and further explored in relation to efforts to achieve food sovereignty considering the interests of protection for farmer's rice seed are presented in the following Table 2.

TABLE 2. Control Of Padi And Rice Act 1994 Analyses

Regulations	Analyses
Amendment of section 29 of the Minister's right to add authorized officers to enforce and gazette a new section for the management of paddy seeds	This provision may also consider provisions in other Acts (1) Plant Quarantine Act 1976 (2) New Plant Varieties Act 2004 (3) Malaysian Quarantine and Inspection Services Act 2011
Section 4 Director General Function To propose a new Section under Part IIA Seed	It was hardly to ensure the Director General is too highly empower the action with proper gazette position. Changes of characteristic will be difficult to transparency of understanding at the operations level
Proposal to include provisions related to rice seeds; Interpretation Section 2 'farm seed save' means the practice of saving seed grown from own farm and using it to grow a subsequent crop in own farm	For some reason the government reluctant to established yet public opinion on the matters, besides, in submission of CITES notification and compliance of IPPC seed quality is considering suffice for the law to act. However, none clear interpretation to clarify the matters as currently only under Director General Order will be difficult for taking further action

<p>‘seed’ means any part of the plant, intended for planting and includes true seeds, seedlings, plantlets, vegetative parts, tissues and spores</p>	<p>towards disease caused by non-recognized seed (for rice cultivation) and improve varieties.</p>
<p>‘small-scale farmer’ means a farmer whose farming operations do not exceed the size of holding according to plant type as prescribed by the Minister</p>	<p>‘farmer’ association was explained under Farmer’s Organization Act 1973 [Act 109] can be considered</p>
<p>Part IIA Director General Functions and power towards seed (rice)</p> <ul style="list-style-type: none">(a) to determine appropriate seed quality standard(b) to regulate the seed quality, seed processing, storing, distribution or selling of controlled seed(c) to appoint seed testing laboratory and seed analyst(d) to promote seed quality assurance program(e) to collect, keep, and maintain a record of national seed industry(f) to carry out any other functions as it deemed fit to enable it to perform its functions effectively or which incidental to the performance of its functions.	<p>Operations for regulate the quality control used to have the Plant Quarantine Regulations (which also include paddy seed), however a list of functions listed is to ensure further activities related to export in future specialty rice.</p> <p>The New Plant Varieties Act 2004 is focus for new varieties registration, as of now the existing rice cultivation used 4 varieties registered, this practice should let on commercial basis, where protection for farmers rights exclusive undeniable link between the role of which subsistence farmers play in ensuring continuity of food production and food security. This provision will be benefits for specialty rice when traceability of origin recorded for future references.</p>

Source: Control of Padi and Rice Act 1994 (Act 522)

Based on the analysis of the provisions of the Control of Padi and Rice Act 1994, the agrifood sector, as set out in the Table 2, it can be said that the legislative position on agrifood strongly supports the WTO’s policy in the liberalization of trade in the food sector. The legislation on agrifood does not favor the interests of the rights of farmers because the provisions in it do not explicitly provide protection to farmers. Sections related to the protection of farmers rights tend to be focus on plant breeder rights whereby the government has funded the research of seed under Malaysian Agriculture Research Development Institute (MARDI) for development of seed and supposed the cost of seedling should be reduced accordingly.

Despite trade liberalization, there is no specific provision that governs the empowerment and development of farmers’ rights. These sections are only prioritized import policy, disregarding the farmers’ rights and thus obstructing sovereignty, independence, long-lasting, safety and

benefits in the principles of administration of food. The food sovereignty concept’s goals are not in line with the agrifood law’ protection of farmers’ rights. The agrifood regulation will boost the domestic and international markets by increasing the capacity for local production. Malaysia’s food regulations and the impact on both food sovereignty and farmers’ rights.

The government however introduced partnership of corporate sector by privatization institution namely Padi Beras Nasional Berhad (BERNAS) and lets the obligation agreement to develop the industry, it is a clash of business entity and create unfair trade for farmers right group without back support from capital and technical expertise, modern machineries and logistic. Besides, the understanding of some contractual agreement is not based on farmers themselves. How far this action will tend to create more opportunity for farmers protection explain in Figure 1.

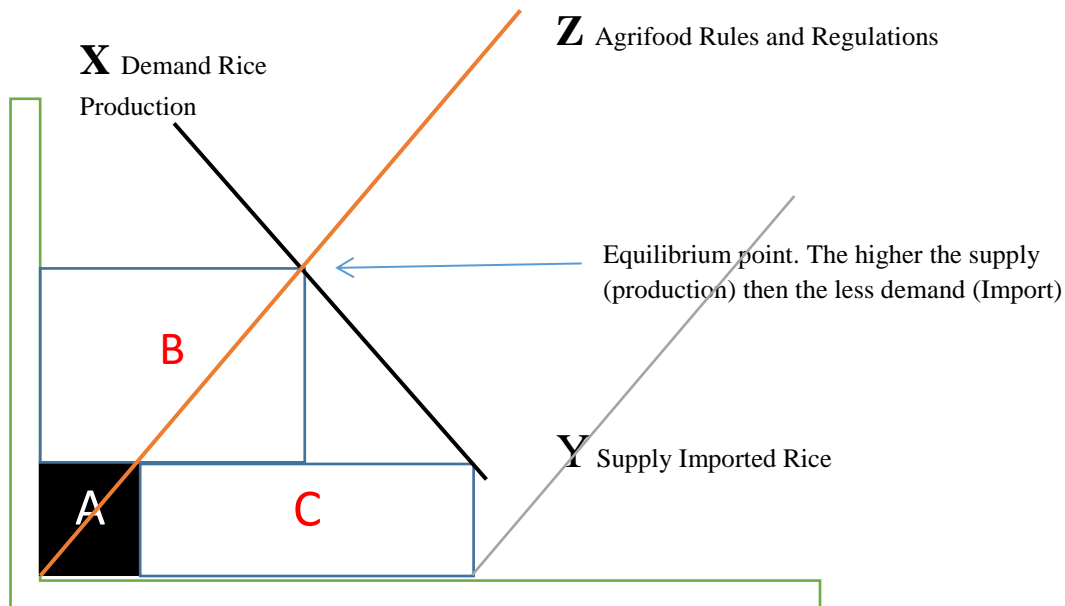


FIGURE 1. Relationship of Demand-Supply
Source: Adapted from Tisnanta et al. (2015)

Based on Figure 1, if the X and Y axes are associated with liberalization of trade and food sovereignty respectively, then the Z-axis is associated to controlling agri-food. Agrifood regulatory conditions are now characterized by the C-box, which is more aligned with trade liberalization mechanism. In contrast, box C has a B box that is designated as promoting food sovereignty through agriculture-rule. The liberalization of the food trade in relation to WTO membership and commitment to safeguarding farmers' rights and food sovereignty should be focus of agrifood regulations, rather than shifting them to box A.

The higher the commitment outlined in box A draws both box B and box C relatively, in economic theory, the continuous rise until it reaches the equilibrium point of the A and Z axes that makes it possible how government policy can influence between boxes B and C. The Figure 1 simulation uses the economic theory of supply and demand i.e. the X axis of rice production and the Y axis of rice imports, while Z is agrifood regulation. Box A represents the sovereignty of food. As more and more regulations for the purpose

of import of C box rice, then the demand for imported rice is decreasing due to the cost of the variety that needs to be adhered to. The increased production of rice Box B when the agrifood regulation space is more flexible towards the addition of regulations that protect the rights of farmers.

Both duties as a member of the WTO and the need to protect the rights of farmers and achieve food sovereignty. The way to do this is to establish policies that empower the rights of farmers with respect to the improvement and extension of agriculture to achieve food sovereignty. The Control of Padi and Rice Act 1994 should be amended, especially, creating provisions relating to the empowerment and protection of farmers' rights. It should be regulated in a separate provision on the empowerment of the guidance and protection of farmers' rights from the liberalization of the current food trade so that they can be competitive to face global competition against the agrifood sector.

RECOMMENDATION AND CONCLUSION

Food is a fundamental human need that is part of every individual's human rights. The availability of food should be consistent, secure, wholesome, affordable, and accessible to all, regardless of religion, ethical, or cultural. In order, to achieve all this, the agrifood system needs to be integrated so that will provide protection for both the producing and the food consumption, (Tisnanta et al., (2015).

The formulation of the issues and discussions above can lead to two conclusions: Firstly, the trade liberalization in the food industry has an adverse impact on Malaysia's food sovereignty. The mechanism of trade liberalization in the food sector, which requires the government compulsion to open a wide range of imported food products through trade liberalization weakens the farmers' position and disrupts domestic food production, potentially increasing the dependence on imported foods. This situation poses challenges to the attainment of food sovereignty. The WTO's policy in the field of food trade liberalization must be accommodated by member states has led to the government's inability to realize food sovereignty, especially in developing countries like Malaysia.

Secondly, the Control of Padi and Rice Act of 1994 strongly supports the WTO's policy in the liberalization of trade in the food industry. The amendment of Act 522 in 2022 however only included power on the part of the government and did not favor the interests of the rights of the farmers as the provisions therein tended to be counter-productive to the empowerment and protection of the rights of the small farmer. Any provision related to the protection of farmers' rights are expressed only in the role of the Director General. The absence of a specific provision regarding farmers' rights regulating is significant in

managing their competitiveness with trade liberalization.

The agrifood legislation including the Plant Quarantine Act 1976 and the Malaysian Quarantine and Inspection Services Act 2011 are not intended to be socially engineered to empower and protect the rights of farmers, but rather as an instrument to legitimize the WTO's trade liberalization strategy in Malaysia. The New Plant Varieties Act 2004 gives the exclusive rights of the registrar of intellectual property of paddy which does not directly care about the rights of the registered party, the farmer is burdened with the need to purchase certain rice seeds to be planted. In fact, the distributors appointed to manage rice seeds are limited to companies appointed through government tender contracts. This situation does not encourage the sovereignty of food. Among the popular rice varieties grown for seasonal paddy include varieties namely MR297, MR220 CL2, and MR219 (DOA, 2021, p.10). These varieties are too small (at least 40s varieties) to have segmentation like rice exporter countries Thailand and India with more than 100 varieties of rice cultivation.

Some of the recommendations given in relation to the discussion in this study are: First, Malaysia may learn the challenges from Indonesia. The adoption of Law No. 18 Year 2012 of Food in respect to traditional farmers' concerns as well as the urgency and broader implications of Indonesian food sovereignty (Tisnanta, 2015). Thailand tag-lined as 'Kitchen to the World' as rice exporters adopted the Rice Seed system. Napasintuwong, O. (2018) explained that rice is one of 37 regulated plant species under the Thai Seed Act, or commonly known as the Plant Variety Act of 1975 (PVA). Unlike other regulated plant species for which importation of seeds for commercial purposes can be requested on a case-by-case basis, importation of rice seeds for commercial

purposes has never been permitted to ensure rice sustainability.

Second, this study focuses on following the WTO's guidelines and practices to align with the interests of local farmers in pursuit of achieve food sovereignty. To achieve food sovereignty, the government must to provide policies that strengthen the agrifood management system. The law should be utilized as means to facilitate this objective. Roscoe Pound's approach attracted the attention of social engineering in producing more thought-provoking considerations of the target group people, namely farmers. Third, the Section's provision on the empowerment and protection of farmers' rights should be clarified by amending the Control of Padi and Rice Act 1994. It is advisable to include a separate provision on the development and empowerment of farmers' rights in the food industry to ensure competitiveness in global competition and towards sustainable development.

Rice farming is a traditional, heavily protected, and subsidized industry. On a purely economic basis, Malaysia should not grow rice for profit. This venture is simply too expensive. The business's productivity per worker is far from dreadful. According to Najim, M.M.M. et al. (2007, p.1), it is impossible for local rice to compete in the global market. Local production costs for a similar grade of white rice at Ringgit Malaysian (RM1700; US Dollar = RM4.70) per ton, compared with the foreign cost. The noble objective of eliminating poverty with less than two hectares per farmer is simply unattainable. A whole network of subsidies and agencies has been built around the paddy industry to keep farmers above the poverty line, a social obligation of the Malaysian government.

Long-term food systems are not attracted to government agricultural support initiatives. All of us are fed by food systems, which are essential to achieving the SDGs,

but they must be transformed to meet modern needs. A crucial first step in resolving this is to implement agricultural support measures. In the reality, the way we now support farmers is keeping us from attaining the SDGs.

The discussion of fiscal aid for the general economy is only briefly touched aimed is confined to price incentives and public policy initiatives that are intended to benefits agricultural producers but not small-scale farmers. Repurposing refers to increasing financing for other activities that are regarded sustainable and equitable while decreasing funding for specific activities that are unsustainable refer to removing ecologically detrimental subsidies; such as the incentives for the adoption of sustainable land management practices, UNEP/FAO (2021).

The substitution of unproductive or harmful support with the support that is intended to increase productivity, lessen adverse environmental effects, and produce better results for health and equity. Its increased investment in public goods and services for agriculture, mitigation to address any short-term negative implications, repurpose to support COVID-19 recovery economy, involve all actors in the food systems with transparency and sensitivity and a historic opportunity, but not without strong backing from governments, and leverage urgent action towards marketing of food sovereignty acceptance are just a few of its key objectives.

Since Malaysia neither signed nor ratified the ICESCR, should the matters to be discussed in future studies.

ACKNOWLEDGEMENT

The publication of this article is funded partly by Public Service Department of Malaysia.

CONFLICT OF INTEREST

All authors have no conflicts of interest.

AUTHORS' CONTRIBUTION

Rubiah MA., Haniff A., and Sayuti H. contributed to the design and implementation of the research, to the analysis of the results discussion and to the writing of the manuscript.

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