COMPARATIVE ADVANTAGE OF INDONESIA WITH COMPETITIVE COUNTRIES FOR EXPORTING OF WORLD SPICES

Herdiana Anggrasari¹, Wahyu Adhi Saputro^{2*}

¹Tribhuwana Tunggadewi University, Malang, Indonesia
²Agribusiness Program Studi, Duta Bangsa University, Surakarta, Indonesia

Correspondence email: wahyuadhi@udb.ac.id

Article Information

Submitted: June 19th, 2021 Accepted: June 30th, 2021

Keywords :

Competitiveness; Export; Indonesia' Spices

Abstract

Exports are an important component in the economy. The higher the export performance, the greater the positive impact. Indonesia is one of the producers of spices and is included in the 5 largest spice producing countries in the world so that it has great opportunities and potential to be developed. This study aims to determine the comparison of Indonesia's comparative advantage with competing countries for world spice exports. This study uses the basic analytical descriptive method. The data used in this research is secondary data. Secondary data in this study include data on area area, production, productivity from FAO (fao.org) and data on exports and imports from UN Comtrade (comtrade.un.org). Based on the results of the research, it can be seen that Indonesia is still in the top 4 position in the world spice commodity exporter. When viewed from the acreage and production of spices, Indonesia is still in the top rank, especially in the commodities of cinnamon, cloves and nutmeg. In the international market, it can be seen that the percentage of the market share for Indonesian spices is in fourth place.

INTRODUCTION

One of the spice producers is Indonesia. The country is included in the five largest spice producing countries in the world. Cultivated commodities include cloves, nutmeg, pepper, cinnamon and vanilla. This thing can actually be used much possible and opportunities with great potential to be developed. In the future period of time, of course, the market demand for spices will increase along with the unstoppable growth. Increasing population economy, health records, expensive substitutes and synthesis products will also have an impact on environmental sustainability. The rate of demand for the commodity of spices each year increased by 10.38% each year. This shows that the spice commodity has a prospective market and plays an important role in the international market (Anggrasari, 2021).

Integration between several countries is formed from the basic concept of needs between two or more countries. This can be both an obstacle and a bridge to the economic integration that occurs. Local economies must come together and form partnerships to promote trade and development. With a good regional economy, of course, it will also encourage a good country's economy (Akhmadi, 2017). Greene (2013) also states that the total trade (exports and imports) of state income, land population, market and geographic

openness. Indonesia has the advantage of demographics that support the growth of the spice commodity so that this has become an advantage for the country. The socio-economic development of a country must also be supported by the strong capital it has. The country's strong economic development will be balanced with strong institutional qualities so that indicators of economic results can be seen from the relationship between social capital (Haile & Whakeshum, 2020).

The Indonesian agricultural sector is a priority sector for the development of national economic development. The role of the Indonesian agricultural sector for the economy is a contributor to Gross Domestic Product (GDP), a source of foreign exchange, a provider of food for individuals or industrial raw materials and as a source of food security (Ervani, 2018). Several Indonesian agricultural commodities have a fairly good export role in the world, including European countries. The spice commodity has long been a mainstay of Indonesian exports to the world. Exports are an important component in the economy. The higher the export performance, the greater the positive impact (Nurhayati, Hartoyo, & Mulatsih, 2019). Therefore, the export of commodities needs maintained and increased in value in order to balance the trade balance (Benesova, I., Maitah, M., Smutka, L., Tomsik, K., & Ishchukova, 2017).

The Indonesian spices commodity is one of the plantation sub-sector commodities

with big opportunity the international market (Zuhdi, Rahmadona, & Maulana, 2020). As a spice producer, Indonesia has opportunity to become a world spice exporter. However, when competing countries appeared, the old producers had to strengthen the competitiveness of their products (Sa'diyah & Darwanto, 2020). Lakner et al. (2018) revealed that since the 1960s, the quantity of global spice trade has increased exponentially, The value of the international trade in spices has increased 41 times which indicates a slightly higher rate of increase in the overall food trade. Based on the results of the analysis from 2000 to 2017, the average ISP value of Indonesian spices is positive. This shows that the domestic supply is greater than the demand. However, the value of Indonesian ISPs continues to decline due to the average rate of increase in exports of Indonesian spices commodities per year of 8.07%, while the average rate of increase in imports of Indonesian spices commodities per year is 92.54%. The high rate of imports of Indonesian spices, one of which is due to the sharp increase imports of clove commodities (Anggrasari & Mulyo, 2019).

Economic distance is one of the factors that influence the level of exports. This also affects transportation costs which are usually charged to importing countries as well as additional costs such as communication costs. Another thing that needs to be considered is the tariffs that lead to an increase in export prices. The rates referred to are excise, taxes,

import duties or taxes that are imposed on products exported to countries of destination for inter-country trading. The export share is based on the export performance of a country along with the country's trade patterns. Measuring exports can be determined from the export value of the country's commodities compared to the value of world exports (Beaudreau, 2011). The existence of tariffs has a negative effect on exports (Kis-Katos, K., & Sparrow, 2015). Of course this is also considered by exporting countries for the spice commodity such as Indonesia. Basically, Indonesian spice commodities have a comparative advantage when viewed from the **RCA** calculation. comparative advantage is quite strong in trading on the European Union market (Laursen, 2015). The RSCA index value for Indonesian spices until 2018 has a positive value except for the ginger commodity (Shohibul, 2013). Based on this description, this study aims to compare Indonesia's comparative advantage with competing countries for world spice exports.

RESEARCH METHOD

This research uses the basic analytical descriptive method. This research method focuses on solving actual problems in the present so as to provide a systematic picture of a fact and the characteristics of the object or subject

accurately. The data used in this study is secondary data, namely data obtained based on the results of literature studies of various archives and statistical data from related agencies. Secondary data in this study include data on area area, production, productivity from FAO (fao.org) and data on exports and imports from UN Comtrade (comtrade.un.org). The limited researched commodity based on the Harmonized Commodity Description and Coding System (HS) code sourced from UNComtrade (2019) includes codes 0904 (pepper, chili, capsicum), 0905 (vanilla), 0906 (cinnamon), 0907 (cloves), 0908 (nutmeg, awing, cardamom), and 0910 (biopharmaca) for spices with data spanning 2000-2017.

RESULTS AND DISCUSSION

World Spice Exporting Countries

The top three exporting countries for specific spices or groups of spices are occupied by producing countries with tropical climates. The main spice exporters China, Madagascar, are Indonesia and India while Guatemala, Brazil, Vietnam and Sri Lanka are exporters whose trade value varies each year, and fluctuates around US \$ 2.5 billion (FAO, 2015). In table 1, it can be seen that several countries exporting world spice commodities in 2000 and 2017.

Table 1. World Spice Commodity Exporters, 2000 and 2017							
2000			2017				
Country	Export (US\$)	% World Export	Country	Export (US\$)	% World Export		
China	390.234.998	13,22	Viet Nam	1.544.582.142	16,83		
India	317.138.661	10,74	India	1.381.663.798	15,06		
Viet Nam	212.068.308	7,18	China	946.791.367	10,32		
Indonesia	197.279.884	6,68	Indonesia	774.461.043	8,44		
Germany	137.436.000	4,65	Madagascar	574.738.870	6,26		
Netherlands	135.262.760	4,58	Netherlands	384.696.274	4,19		
Dunia	2.952.895.535	100,00	Dunia	9.176.698.632	100,00		

Table 1. World Spice Commodity Exporters, 2000 and 2017

With abundant production, Indonesia, India, Vietnam, China and Madagascar have made these countries the main exporters of spice commodities in the international market. In 2000 and 2017 the countries of China, India, Vietnam and Indonesia were always in the top four in the supply of spice commodities in the international market. These countries are always active in exporting spices on the international market.

In 2000, Madagascar was not included in the main exporter of spices, but then Madagascar became a new competitor in the international market. This can be seen in 2017 the country of Madagascar was able to control the market by 6.26% in the world. This shows that Madagascar can become a new competitor for spices in the international market.

Comparison of the Comparative Advantages of the Top Exporting Countries of the Spice Commodities of the World

The comparative advantage of Indonesia's spice commodities with competing countries can be viewed in terms of land ownership

area, total production, and level of productivity.

In terms of acreage and production in 2017, Indonesia ranks first in the commodity of cinnamon, cloves and nutmeg but in terms of productivity, Indonesia is still low, which is in third place with a productivity level of 0.83 tonnes / ha in cinnamon, 0, 23 tonnes / ha for cloves, and 0.19 tonnes / ha for nutmeg. China and Madagascar have better productivity levels of cinnamon and cloves than Indonesia. India and Madagascar have better nutmeg productivity compared to Indonesia.

India has the largest area of pepper and the largest production in nutmeg. Although the area of Indian nutmeg is still less competitive with Indonesia, India's nutmeg productivity is better than Indonesia so that India can outperform Indonesia's nutmeg production. Madagascar has an advantage in vanilla and ginger with the largest area of land and production among other spice exporting countries

Table 2. Comparison of the Comparative Advantages of Spice Commodities in the World Main Exporting Countries in 2017

Commodities	Vietnam	India	China	Indonesia	Madagackar
Pepper					-
Area (ha)	132.000	181.978	18.436	11.382	93.507
Production (ton)	72.000	87.029	35.389	6.425	252.576
Productivity (ton/ha)	0,55	0,48	1,92	0,56	2,70
Vanilla					
Area (ha)	-	-	5.774	15.203	73.171
Production (ton)	-	-	662	2.402	3.227
Productivity (ton/ha)	-	-	0,11	0,16	0,04
Cinnamon					
Area (ha)	102.059	-	42.412	105.530	1.620
Production (ton)	37.126	-	79.486	87.130	2.811
Productivity (ton/ha)	0,36	-	1,87	0,83	1,74
Clove					
Area (ha)	-	-	938	548,091	59,966
Production (ton)	-	-	1.305	123,773	19,677
Productivity (ton/ha)	-	-	1,39	0,23	0,33
Nutmeg					
Area (ha)	-	108.000	-	180.205	16
Production (ton)	-	43.000	-	34.385	16
Productivity (ton/ha)	-	0,40	-	0,19	1,00
Ginger					
Area (ha)	-	10.556	53.515	34	168.000
Production (ton)	-	216.587	583.126	118	1.070.000
Productivity (ton/ha)	-	20,52	10,90	3,47	6,37

When viewed as a whole, Indonesia has a comparative advantage in terms of area size, however the productivity of Indonesian spices is still low because it cannot compete with its competing countries. Therefore, Indonesia needs to make technological innovations in order to increase its productivity.

Comparison of the Market Share of the World's Top Exporting Countries of Spice Commodities in the International Market

Figure 1 shows the average comparison of the export share of each country in the international market from the percentage of total consumption of spices around the world for 18 years (2000-2017). In the international market, the percentage of the market share for Indonesian spices is fourth. In 2017, the market share for Indonesian spices was 6.3%. Meanwhile, in 2000, the share of the Indonesian spices commodity reached 13.15%. This indicates a 52.11% decline in market share with an average annual decline in market share of 1.77%.

India is a country that has the largest market share of spices in the international market with an average of 12.15%. India has had a positive market share growth rate for 18 years, namely 51.89% with an annual increase in market share of 3.36%. India's market share in 2017 was 13.91%.

China ranks second with an average market share for the spices commodity of 10.93%. The growth rate of China's market share for 18 years was 64.60% with an annual increase in market share of 4.40%.

Of the ASEAN countries, Vietnam is Indonesia's competitor with a 9.34% market share for the spice commodity. Vietnam's market share has an increasing trend with a market share growth rate of 91.52% with an annual increase in market share of 5.28%. In 2000 the market share for Vietnamese spices was 6.28%, then in 2017 it increased to 12.06%. Madagascar and the Netherlands are ranked fifth and sixth with an average market share of

4.51% and 4.37%. Madagascar has the largest market share growth rate compared to other countries, namely 105.34% with an annual increase in market share of 12.34%. In 2000 the market share of Madagascar's spice commodities was only 4.37%, then increased in 2017 to 8.98%. Meanwhile. the Netherlands declining market share trend with a decline rate of 19.04% for 18 years with an average annual decline rate of 0.54%. In 2000 the market share of the Dutch spices commodity was 4.54% and in 2017 it was 3.68%. In Figure 2, you can see the growth in the market share of the world's main exporter of spices in 2000-2017.

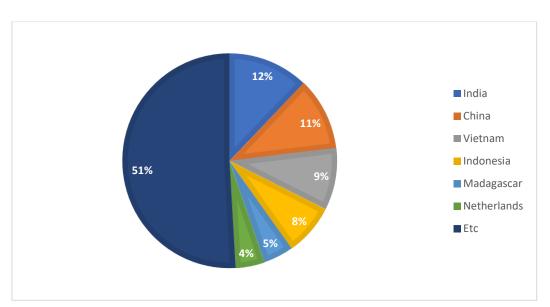


Figure 1. Average Market Share of the World Main Exporting Spices 2000-2017 Source: Secondary data analysis (UNCOMTRADE, 2019)

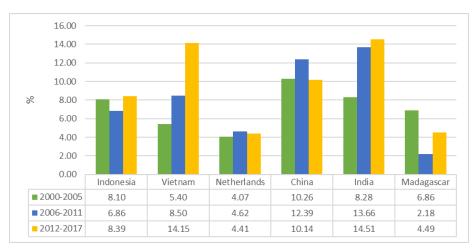


Figure 2. Growth of the Market Share of the World Top Exporting Countries for the Spice Commodities 2000-2017

In Figure 2 it can be seen that only Vietnam and India have the growth in market share of the spices commodity which has increased for 18 years in 3 periods. Overall, Vietnam competes with India for the largest market share of spices in the international market. Indonesia, China and Madagascar have fluctuating market shares, while the Netherlands has a more stable market share. This means that the Netherlands can maintain its market share.

Comparison of the Trade Balance of the World's Main Exporting Countries of the Spice Commodities

The trade balance for the world's main exporting countries' spices for 18 years (2000-2017) has an average surplus value. The highest average surpus was owned by China with a surplus value of US \$ 541.07 million, followed by Vietnam US \$ 530.51 million, India US \$ 482.64 million, Indonesia US \$ 341.62 million, Madagascar 226.30 million US \$, and the Netherlands 7.37 million US \$. Each country has a trade balance value for spices which tends to increase or increase every year.

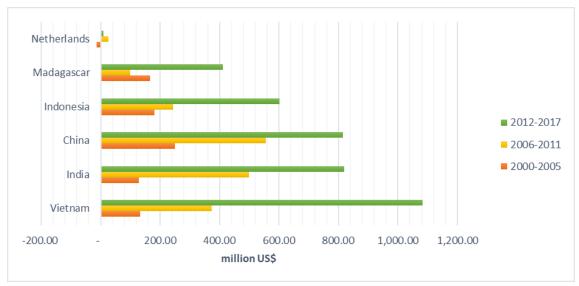


Figure 3. Comparison of the trade balance for the world's main exporting countries of spices 2000-2017

This shows that the world demand for spices still provides good potential and opportunities in the international market. The growth rate of the surplus spices of Vietnam, India, China, Indonesia, Madagascar, and the Netherlands for 18 consecutive years was 669.79%; 394.87%; 640.34%; 87.11%; 796.07%; and 325; 55%, while the growth rate of surplus in spices commodities per year was 15.77% per year, 14.65% per year, 14.32% per year, 33.83% per year, 29.22% per year, year, and 160.88% per year.

Comparison of the Prices of Spices for the Commodities of the Spices of the Main Exporting Countries of the World

The price of spices for each country varies. There are countries that have commodity prices with high value, but there are also countries that have lower commodity prices compared to other countries. Some spice exporting countries are also spice producing countries, so there are some spice products that are not sold in processed products so that the price of these commodities is lower. For higher commodity prices, this could be because the spice products have been processed so that they have added value. One country that has quite high commodity prices for spices is the Netherlands. The Netherlands is not a country that produces or produces its own spice products, but the Netherlands is a reexporter of spice commodities so that the Netherlands buys fresh spice products or semi-finished products at low prices then processes them and provides added value so that the price of Dutch spices commodities high in quite international market. Comparison of the prices of several spice commodities

between exporting countries can be seen in Figures 4 to 9.

Figure 4 shows that the price of pepper has an increasing trend in each period for 18 years (2000-2017). This can be seen from the development of pepper prices in each exporting country of the spice commodity on the international market. In the period 2000-2005 and 2006-2011, the price of Dutch pepper had the highest value compared to the price of pepper in other countries. In the 2012-2017 period, the price of Dutch pepper was not much different from that of Vietnam, which had the highest value. This is because the Netherlands is a re-export country so that the price of pepper sold by the Netherlands has additional costs due to processing, storage, and so on. The price of Dutch pepper has an increasing trend for 18 years with a growth rate of 44.82% with an annual increase in the price of pepper of 4.25%.

The price of Vietnamese pepper is in second place with an average price of pepper for 18 years, namely 4.20 US \$ / kg. The price of Vietnamese pepper has an increasing trend for 18 years with a growth rate of 29.84% and an annual increase in pepper prices of 0.21%. Meanwhile, Indonesia occupies the third position with an average price of pepper of 4.41 US \$ / kg. The price of Indonesian pepper has an increasing trend for 18 years with a growth rate of 61.56% with an annual increase in pepper prices of 7.02%. The price of Indonesian pepper reached 9.25 US \$ / kg in 2014.

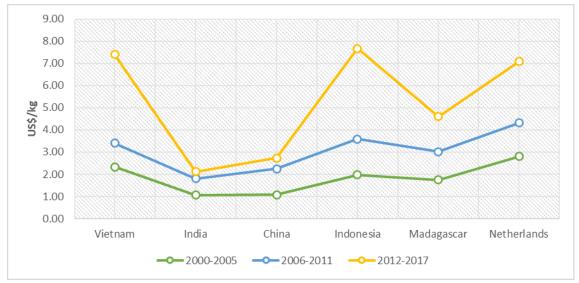


Figure 4. Comparison of Pepper Prices of the World Main Exporting Countries in 2000-2017

Source: Secondary data analysis (UNCOMTRADE, 2019)

The development of Indonesian pepper prices in the domestic market actually follows the development of pepper prices in foreign markets because Indonesian pepper is mainly used for export. However, Indonesia as one of the main pepper producing countries in the world has not been able to influence world market prices or act as a price leader, so it does not have a good bargaining position in international trade. So far, Indonesia is still a price taker in determining the price of pepper on the world market (Niviati, 2015). In addition, the price of pepper is also influenced by the supply or production of pepper. According to Fazaria et. al. (2016) fluctuating Indonesian pepper prices are thought to be the result of the fluctuating price of pepper in the international market. The world price of pepper thus affects the price of pepper in the domestic market.

Madagascar and China are in fourth and fifth place with an average price of pepper, namely 4.73 US \$ / kg and 2.02 US \$ / kg with a growth rate of pepper prices for 18 years of 47.86% and 225.62%. The growth in the price of Chinese pepper compared to other countries. Meanwhile, India has the lowest pepper price with an average pepper price of 1.66 US \$ / kg with a pepper price growth rate of 9.45% with

an annual increase in pepper price of 4.9% per year.

When viewed as a whole, the price of pepper in the international market for exporters of spices has a price trend that tends to increase. This shows that pepper has good prospects for farmers. For vanilla commodity, prices fluctuate greatly and there is a huge imbalance of prices from one country to another.

The price of vanilla tends to be more volatile than the price of pepper. The price of vanilla per kg is more expensive than the price of pepper. China and Vietnam have higher prices for vanilla than the prices for vanilla from India, Madagascar Indonesia, and Netherlands. In Figure 5, it can be seen that in each period only the vanilla prices India, Madagascar, and Netherlands experienced an increase even though the prices for vanilla in these three countries were not high. For 18 years India has had a vanilla price growth rate of 607.16% with an annual increase in vanilla price of 20.01%. Madagascar has a vanilla price growth rate of 112.60% with an annual increase in vanilla price of 6.23% and the Netherlands has a vanilla price growth rate of 418.82% with an annual increase in vanilla price of 4.25%.

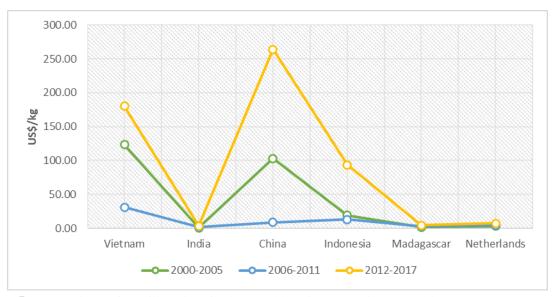


Figure 5. Comparison of Vanilla Prices in the World Major Exporting Countries 2000-2017 Source: Secondary data analysis (UNCOMTRADE, 2019)

The price of vanilla in Vietnam, China and Indonesia has fluctuated every period. If we look at the average rate of increase in the price of vanilla in China and Indonesia, it has increased every 26.01% and 58.28%. year by Meanwhile, Vietnam experienced an annual price decline of 12.58%. In Indonesia, the price of vanilla is determined by the quality of the vanilla fruit being sold. Prices on the world market influence the high and low price of vanilla among farmers. So that world vanilla price fluctuations will later affect price changes among farmers. The increasing price of vanilla in Indonesia is because the world market is starting to see the vanilla market originating from Indonesia (Chandrayani, P. M. W., & Natha, 2017).

If the price of vanilla is compared to the price of cinnamon, there is quite a difference in the price. A comparison of the price of cinnamon in the world's spice exporting countries can be seen in Figure 6.

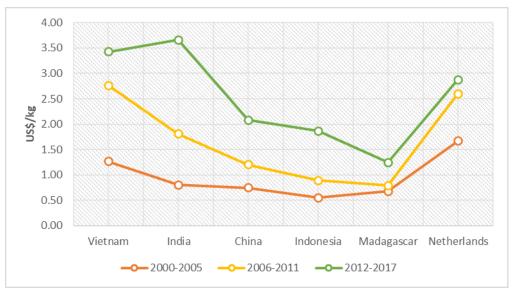


Figure 6. Comparison of the Prices of Cinnamon in the Main Exporting Countries in the World 2000-2017

On average, the one with the highest price of cinnamon was Vietnam 2.48 US \$ / kg, followed by the Netherlands 2.38 US \$, India 2.09 US \$ / kg, China 1.34 US \$ / kg, Indonesia 1.10 US \$ / kg, and Madagascar 0.91 US \$ / kg. For 18 years, the growth rate of Indonesian cinnamon prices is in second place after India with a growth rate of 377.52% and an annual growth rate of 10.91%. In 2000 the price of Indonesian cinnamon was 0.61 US \$ / kg, then in 2017 the price of cinnamon increased to 2.93 US \$ / kg.

India has the largest cinnamon price growth rate, namely 1,431.81% with an annual growth rate of 20%. In 2000 the price of Indian cinnamon was 0.28 US \$

/ kg, then in 2017 it was 4.24 US \$ / kg. From these data it can be seen that in 2000 the price of Indian cinnamon was lower than that of Indonesia, however India succeeded in increasing the price of cinnamon to exceed the price of Indonesian cinnamon.

If viewed partially, the price of cinnamon has an increasing trend in all countries. This shows that cinnamon has good prospects for cultivation by farmers. Apart from cinnamon, there are cloves which also have an upward trend in prices. In Figure 7, you can see the comparison of clove prices among exporting countries for spices on the international market during 2000-2017.

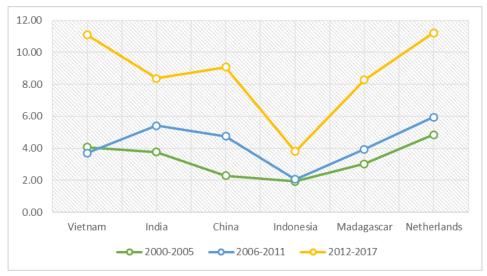


Figure 7. Comparison of Clove Prices for Major World Exporting Countries 2000-2017 Source: Secondary data analysis (UNCOMTRADE, 2019)

The price of cloves has an increasing trend for 18 years (2000-2017). This can be seen from the development of clove prices in each of the world's clove exporting countries which have a positive growth rate. In each period it can be seen that the price of Dutch cloves has the highest position compared to the price of cloves in other countries, with an average of 7.34 US \$ / kg. The annual rate of increase in Dutch clove prices is 8.56%.

The average annual growth rate of Indonesian cloves is 8.72%. China, India, and Madagascar also had a good rate of increase in clove prices each year, sequentially, namely 13.41%; 14.99%; and 10.15%. Meanwhile, Vietnam has an annual growth rate that tends to decrease by 8.84%. The decline was due to the

frequent fluctuating or fluctuating prices of Vietnamese cloves.

The price of cloves when compared to the price of nutmeg has a lower value. In Figure 8, we can see the comparison of Indonesia's nutmeg prices with its competing countries. The price of nutmeg has an increasing trend during the period 2000-2017. This can be seen from the development of the nutmeg price in each country which tends to increase in each period. In the 2000-2005 period, Madagascar's nutmeg price was the highest compared to other countries' nutmeg prices, namely 8.73 US \$ / kg. However, in the following period the Chinese nutmeg price was superior to the Madagascar nutmeg price with a price of 15.71 US \$ / kg in the 2006-2011 period and 40.32 US \$ / kg in the 2012-2017 period.

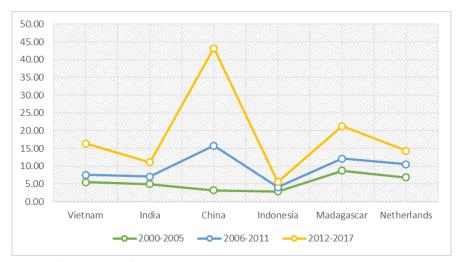


Figure 8. Comparison of the Prices of Nutmeg in the Main Exporting Countries in the World 2000-2017 Source: Secondary data analysis (UNCOMTRADE, 2019)

When viewed from the growth rate of nutmeg prices for 18 years, the most rapid growth in the price of nutmeg is China with a growth rate of 2,032.86% with an average annual growth rate of 20.10%. The average annual rate of increase in the price of Indonesian nutmeg is 2.17%. India, the Netherlands, and Madagascar also have good annual increment rates of cinnamon, namely 5.48%; 4.28%; and 14.26%. Meanwhile, the growth rate of Indian nutmeg has decreased annually by 4.81%.

The price of biopharmaca has an increasing trend for 18 years (2000-2017). This can be seen from the development of biopharmaca prices in each of the world's biopharmaca exporting countries. In each period it can be seen that the price of Madagascar's biopharmaca is the highest compared to the biopharmaceutical prices of other countries. The growth rate Madagascar's biopharmaceutical prices is 35.13% for 18 with an annual increase biopharmaceutical prices of 11.50%.

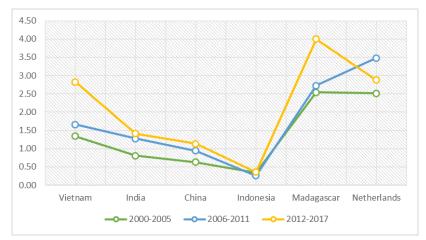


Figure 9. Comparison of Biopharmaca Prices for Major World Exporting Countries 2000-2017 Source: Secondary data analysis (UNCOMTRADE, 2019)

China and Indonesia are the countries with the lowest biopharmaceutical prices when compared to other exporting countries. However, the rate of increase in the price of Indonesian biopharmaca each year is still positive with an average increase of 26.72% per year. Vietnam, China, and India also had a good rate of increase in biopharmaca prices each year, sequentially, namely 8.16%; 15.27%; and 6.06%. Meanwhile, the Netherlands has a downward trend in biopharmaca prices by 2.94% per year.

Comparison of the Contribution of the Exports of Spices to the Top Exporting Countries of the World

In Figure 10, you can see the comparison of the export contribution of the world's main exporters of spices from 2000 to 2017 to all export commodities of each country. Madagascar has the highest export contribution of spices among other countries with an average export contribution value for 18 years of 15.33%. In 2017, the export contribution

of Madagascar's spices, compared to all commodities, was 33.27%. The growth rate of Madagascar's export contribution was 171.58% for 18 years. This shows that the commodity of spices for Madagascar is an important export commodity.

Vietnam as the largest exporter of spices, only contributed 0.70% to total exports for an average of 18 years with a tendency for the export contribution to tend to decline by 43.67%. The average contribution of Indonesia's exports for 18 years was 0.33% with a decrease in the contribution of exports by 23.00%. The export contribution of China's spices also decreased by a value of 20.83%. The average export contribution of Chinese spices for 18 years was 0.05%. India also experienced a decline of 4.05% with an average export contribution of 0.38%. Meanwhile, the contribution of Dutch exports to the spice commodity has increased by 49.18% for 18 years with an average export share of 0.05%.

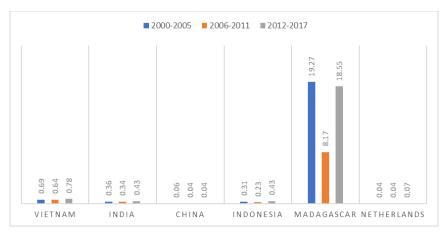


Figure 10. Comparison of the Contribution of the Spices Exports of the World Main Exporting Countries 2000-2017 Source: Secondary data analysis (UNCOMTRADE, 2019)

CONCLUSION

Based on the results of the research, it can be seen that Indonesia is still in the top 4 position in the world spice commodity exporter. When viewed from the acreage and production of spices, Indonesia is still in the top rank, especially in the commodities cinnamon, cloves and nutmeg. In the international market, it can be seen that the percentage of the market share for Indonesian spices is in fourth place. Each country has a trade balance value for spices which tends to increase or increase every year. This shows that the world demand for spices still provides good potential and opportunities in the international market. The price of spices commodities at any time and in each country, of course, varies. Indonesia must be able to emulate the Netherlands, which produce quite can good commodity spices. Indonesia actually taken steps to maintain the price of spices to remain stable, for example, the price of pepper has followed world developments, but in fact Indonesia has not been able to influence world pepper prices due to several factors such as fluctuations in world prices which tend to develop. Indonesia should maintain the growth in the market share of the spices commodity for at least the next 3 periods. This is intended so that Indonesia can compete with competing countries in Asia, such as Vietnam and India. This of course cannot be separated from the trend of Indonesia's market share which must be more stable than usual.

REFERENCES

- Akhmadi, H. (2017). Assessment the Impact of ASEAN Free Trade Area (AFTA) on Exports of Indonesian Agricultural Commodity. AGRARIS: Journal of Agribusiness and Rural Development Research, 3(1).
 - https://doi.org/10.18196/agr.3139
- Anggrasari, H. (2021). Keunggulan Komparatif dan Kompetitif Rempah-Rempah Indonesia di Pasar Internasional. 14(1), 9–19.
- Anggrasari, H., & Mulyo, J. H. (2019). The Trade Of Indonesian Spice Comodities In International Market. *Agro Ekonomi*, 30(1). https://doi.org/10.22146/ae.41665
- Beaudreau, B. C. (2011). Vertical comparative advantage. *International Trade Journal*, 25(3), 305–348.
- Benesova, I., Maitah, M., Smutka, L., Tomsik, K., & Ishchukova, N. (2017). Perspectives of the Russian Agricultural Exports in terms of Comparative Advantage. Agricultural Economics (Czech Republic). *AGRICECON*, 63(7), 318–330.
- Chandrayani, P. M. W., & Natha, K. S. (2017). Pengaruh Harga, Kurs Dollar Amerika Serikat Dan Produksi Terhadap Ekspor Vanili Di Provinsi Bali Tahun 1991-2013. *E-Jurnal EP Unad*, *53*(9), 1689–1699.
- Ervani, E. (2018). Export and Import Performance of Indonesia'S

- Agriculture Sector. *Journal Agrica*, 6(2), 68–77.
- Greene, W. (2013). Export Potential for U.S. Advanced Technology Goods to India Using a Gravity Model Approach. Office of Economics U.S. International Trade Commission.
- Haile, M. A., & Whakeshum, S. T. (2020). Economic Intuition to Social Capital: Household Evidence from Jimma Zone, South-West Ethiopia. AGRARIS: Journal of Agribusiness and Rural Development Research, 6(1). https://doi.org/10.18196/agr.6192
- Kis-Katos, K., & Sparrow, R. (2015). Poverty, labor markets and trade liberalization in Indonesia. *Journal of Development Economics*, 117, 94–106.
- Lakner, Zoltán, Erzsébet Szabó, Viktória Szűcs, and A. S. (2018). Network and Vulnerability Analysis of International Spice Trade. *Food Control*, 83, 141–146.
- Laursen, K. (2015). Revealed comparative advantage and the alternatives as measures of international specialization. *Eurasian Business Review*, 5(1), 99–115.
- Niviati, L. N. &. (2015). Outlook Lada

- (Komoditas Pertanian subsektor Perkebunan).
- Nurhayati, E., Hartoyo, S., & Mulatsih, S. (2019). Analisis Pengembangan Ekspor Pala, Lawang, dan Kapulaga Indonesia. Jurnal Ekonomi Dan Pembangunan 173-190. Indonesia, *19*(2), https://doi.org/10.21002/jepi.v19i2 .847
- Sa'diyah, P. F. I., & Darwanto, D. H. (2020). Indonesian Cinnamon Competitiveness and Competitor Countries in International Market. *AGRARIS: Journal of Agribusiness and Rural Development Research*, 6(2).
 - https://doi.org/10.18196/agr.6295
- A. Shohibul, (2013).Revealed Comparative Advantage Measure: ASEAN-China Trade Flows. of**Economics** Journal and Development, Sustainable 4(7),136–145.
- Zuhdi, F., Rahmadona, L., & Maulana, A. S. (2020). DAYA SAING EKSPOR REMPAH INDONESIA KE EUROPEAN UNION-15 EXPORT COMPETITIVENESS OF INDONESIAN SPICES TO EUROPEAN UNION-15. 15(21), 139–152.