

Productivity Analysis and Disparities of Agricultural and Industrial Development in Riau Province

Syafril Basri * Taryono Ufira Isbah Rita Yani Iyan
Lecturer, Faculty of Economic and Bussiness, University of Riau,
Campus Binawidya KM.12,5 Simpang baru, Tampan, Pekanbaru, Riau, Indonesia, 28296

Abstract

The agricultural sector is a business field that plays an important role in driving the economy of the community in Riau Province. The productivity of the population working in the agricultural and industrial sectors needs to be improved by not ignoring the balance between sectors. Based on these conditions, the objectives of this study are (1) Analyzing the productivity development of the Agriculture and Industry Sector in the Regency / City area in Riau Province. (2) Determine the level of productivity disparity in the agriculture and industry sectors between regency/city areas in Riau Province. The results of this study indicate that areas in Riau Province with low productivity of people working in the agricultural sector are Rokan Hulu, Dumai, Pekanbaru, and Indragiri Hulu. The medium categories are Rokan Hilir, Bengkalis, Kampar and Indragiri Hilir. The high category is in the districts of Kuantan Singingi, Pelalawan, Siak, and Kepulauan Meranti. While the productivity of the population who work in the industrial sector with a high category is Kuantan Singingi Regency. The medium categories are the districts of Kampar, Rokan Hilir, Dumai, Bengkalis, Siak, Pelalawan, and Indragiri Hulu. The lower categories are Rokan Hulu, Pekanbaru, Meranti Archipelago, and Indragiri Hilir. The level of inequality of productivity of the population working in the agricultural sector between regencies/cities in Riau Province is included in the low category with a trend of inequality that continues to decline. In 2008 the level of productivity inequality of the population working in the agricultural sector in Riau Province was 0.286 points and in 2018 it was 0.196 points. The level of inequality of productivity of the population working in the industrial sector in Riau Province during the period 2008-2018 is still in the medium category with a trend of inequality that continues to decline. In 2008 it was 0.493 points and in 2018 it was 0.314 points.

Keywords: Productivity development, productivity disparity, agriculture and industry sectors between regencies and cities in Riau Province.

DOI: 10.7176/JESD/10-22-15

Publication date: November 30th 2019

1. Intoduction

Almost every country in accelerating its economic development seeks to direct its economic activities from the primary sector to the secondary sector. The agricultural sector is the primary sector which is still the main economic sector or the primary source of income of households, which supports most of the population in Riau Province, but the added value is relatively low so that it needs to be encouraged to structurally changes to industry-dominated economies. In 2010 agricultural sector contributions by 23.46% and industrial sector contributions by 24.07%. The contributions of industrial and agricultural sectors tend to decline until 2013 and tend to increase until the year 2017. The industrial sector increased to 25.37% and the agricultural sector increased to 23.54% and in 2018 tends to decrease relatively compared to the previous year. Darojah's review (2012) gave the idea that the inclusion of the industry will have an impact on the social and economic shift of the society, especially economic and revenue activities. Market systems that tend to be imperfect between regions and limited infrastructure availability can also encourage the disparity of sectoral development between regions.





Fig. 1. The contribution of agriculture and industrial sector to the economy of Riau Province year 2010-2018 (source: BPS Riau)

The agricultural sector in Riau Province is the most open sector of working opportunity, on average every year the sector is able to provide jobs as many as one million people. In 2008 the agricultural sector provided a working opportunity of 1,013,565 people and the trend was likely to increase, wherein 2018 it became as many as 1,140,824 people or an average of each year grew by 1.19%.

The industrial sector in providing a working opportunity in Riau Province has not been as many as the job opportunity provided by the agricultural sector, but the growth of working opportunities provided by the industry annually grow higher than the agricultural sector. In 2008 the industrial sector was able to absorb the working opportunity of 108,469 people with an average of every year grew by 7.18%, in 2018 it increased to a lot of 217,092 people. Potential and different resources between the agriculture and industrial sectors in each regency/city in Riau Province that can cause labor productivity is also different. Therefore, if these conditions continue to occur, it is feared that this will lead to sectoral imbalances between regions.

Based on the explanation above, based on the background of the issue, the researchers formulate the research problem as to how the productivity of the agricultural and industrial sectors in the regencies/cities in Riau Province and How the level of productivity disparity of agricultural and industrial sectors between the regencies/cities in Riau Province. The purpose of this research is to obtain an overview of the productivity of the agricultural and industrial sectors between the regencies/cities in Riau Province. The purpose of research that is to be achieved is to analyze the development of productivity of the agriculture and industrial sector in the Regency/city region in Riau Province and know the level of productivity disparity of agricultural and industrial sectors Between the regencies/cities in Riau Province.

2. Library Research

2.1 Agricultural and Industrial Sector Productivity

The output value generated from economic activity is commonly known as Gross Regional Domestic Product (Indonesian: Produk Domestik Regional Bruto, PDRB) resulting from the use of capital and labor production factors. BPS Riau, (2017) works is an economic activity done by someone with the intention of gaining or helping to earn income or profit, at least 1 hour (not interrupted) a week ago. These activities include unpaid worker activities that assist in an economist's effort/activity. The ratio between the PDRB and the working population indicates the level of output generated per worker or the productivity of the population working.

2.2 Development disparity

The aim of economic development is not only to achieve high economic growth but also to be qualified. Thus, the target and development targets become not only for increased income but also must be able to provide broader access to society. Some of the major driving factors of high-quality, economic growth include sufficient and sustainable human capital investment and the mastery of the use of technology. In addition, there must be a synergy between the role and the social capital potential. The impact of quality economic growth is obtaining economic development results that benefit the welfare of the entire community, the transformation of a society that is shackled in a backward (vicious circle) to be able to lead to a "more advanced" society (Prasetyo, 2008).

2.3 Methods of research analysis

a. Location and Research Period

The location of research analysis of productivity and disparity of agricultural and industrial development in Riau Province is covering 12 regencies. The time required to carry out this research activity for 4



months.

b. Data Types and Sources

The type of data used in this study is secondary data. The required data that was used for analysis in this research was from the data of the PDRB agricultural and industrial sectors for all regencies/cities located in Riau Province, employment data for the agricultural and industrial sectors for the entire regencies/cities in Riau Province. The data is expected to be obtained from the publication by the Central Bureau of Statistics (Indonesian: Badan Pusat Statistik, BPS), the institution or agency that is related to the data needs in this study.

c. Data Collection and Processing Techniques

Secondary Data is collected with direct and indirect techniques. The need for secondary data that can be accessed online is collected/downloaded over the internet. While the need for secondary data is not available online, the data collection techniques by contacting the office/agency/agency/institution that publishes the record. The collected data was then compiled according to the indicators and criteria used in this study. The compiled data was arranged based on analytical needs in the form of time series and cross-action data. Furthermore, the data was presented in the form of frequency distribution of tables and graphs so that it can be analyzed for the specified central value and the tendency of data.

d. Data Analysis Techniques

In accordance with the purpose of research analysis will be conducted to determine the level of productivity of the population working in the agriculture and industrial sector with the following formulations:

$$sector \ i \ productivity = \frac{sector \ i \ PDRB}{Population \ Working \ in \ Sector \ i}$$

The amount of productivity of the population working in the agriculture and industrial sectors of each regency/city in Riau Province will be used as the basis for analyzing the level of disparity of the agricultural and industrial sectors. Later, to know the level of development disparity in the agriculture and industrial sectors between the regency/city in Riau Province, formulations of the Williamson index modified according to the purpose of research is used, (Ekwarso, et al., 2016):

$$Williamson~Index = \frac{\sqrt{(Yr - Yi)x\frac{fi}{n}}}{Yr}$$

Where:

Yr = Sector i average productivity in Riau Province

Y = Sector i productivity in regency/city

fi = Number of the population working in sector i in i regency/city

n = Total population working in sector i in Riau Province

3. Research Results

Agricultural and industrial sector productivity in the regency/city in Riau Province

3.1 Gross Regional Domestic Product of Agricultural Sector

The agricultural sector is a business field that plays an important role in moving the social economy in Riau Province. In 2018 agricultural sector contributions to Riau economy around 22.44%. The value of PDRB produced by the agricultural sector of all regencies/cities in Riau Province in 2018 reached Rp.169,901.66 billion. Indragiri Hilir is a region in Riau Province that contributes the largest contribution to the establishment of the PDRB agricultural sector in Riau Province which reaches Rp.26,968.13 billion or 15.87%. The second-largest contribution in the PDRB agricultural sector in Riau Province by regency/city is donated by Rokan Hilir Regency amounting to Rp.23,397.45 billion or 13.77%. The third-largest contribution in the PDRB agricultural sector in Riau Province by regency/city is donated by Kampar Regency amounting to Rp.20,318.35 billion or 11.96%.

The value of the PDRB agricultural sector every regency/city compared with the value of all PDRB agricultural sector generated regency/city, then obtained the contribution of the agricultural sector of each regency/city to agriculture in Riau Province. The conditions of production factors used as inputs in the agricultural sector with different capacities and qualities in each region make the ability of agricultural sector to grow and develop between regencies/cities in Riau Province have different contributions. During the period of 2008-2018 regions that contributed to the agricultural sector have increased among other Bengkalis, Siak, Rokan Hilir, Pelalawan, Meranti Islands, Pekanbaru, and Dumai. In addition to these regions, the agricultural sector contributed to the decline of the PDRB agricultural sector of Riau Province.



3.2 Gross Regional Domestic Product of Industrial Sector

The value of production of goods and services of the industrial sector produced by all regencies/cities in Riau Province each year continues to show improvement. In 2008 its value reached Rp.51,266.27 billion and continued to increase until the year 2018 to Rp.186,392.77 billion or the average grew by 13.78%. Based on the regions in Riau Province there are 3 regions that play an important role in the establishment of industrial sector PDRB namely Siak Regency, Pelalawan and Pekanbaru. In 2018, PDRB contributed the industrial sector of Siak Regency to PDRB industrial sector of Riau Province for 15.70%. The second contribution is donated by Pelalawan Regency by 12.13% and the third-largest contribution donated by Kota Pekanbaru amounted to 11.46%. While the remainder donated by other regencies/cities.

The development of each regency/city in Riau Province in developing the varied industrial sectors. Some regions such as Kampar, Rokan Hulu, Rokan Hilir, and Kuantan Singingi show that the development of its industrial sector has continued to increase while other regencies tend to decline. The role of Kampar Regency industrial sector to PDRB industrial sector throughout the regency/city in Riau Province in 2008 amounted to 3.83% and increased to 9.12% in 2018. The role of the industrial sector of Rokan Hulu Regency of PDRB industrial sector throughout the regency/city in Riau Province in 2008 amounted to 3.53% and increased to 4.36% in 2018. The role of industrial sector of Rokan Hilir Regency of PDRB industrial sector throughout the regency/city in Riau Province in 2008 amounted to 5.64% and increased to 7.03% in 2018. The role of the industrial sector of Kuantan Singingi Regency towards PDRB industrial sector throughout the regency/city in Riau Province in the year 2008 amounted to 2.59% and increased to 4.61% in 2018.

3.3 Agricultural Sector Labor Absorption

The growth of economic activity in the agricultural sector in addition to providing a high return rate for investors should also be able to open a working opportunity. The level of absorption of working opportunity in the agricultural sector for each regency/city in Riau Province has different capabilities. The diversity of input factors of production used in the agricultural sector, whether capital intensive or labor-intensive will also determine the level of employment that will be realized. The agricultural sector of all regencies in Riau Province in 2008 was able to provide working opportunities of 1,013,565 people and increased to as many as 1,140,824 people in 2018 or the average grew by 1.19%. Pelalawan Regency is a region in Riau Province with the highest growth opportunity in employment, where during the period of 2008-2018 the average grew by 3.95%. The growth of the second largest agricultural sector work opportunity is the average Siak regency to grow by 3.50%.

The growth of agricultural sector working opportunity in several regencies/cities in Riau Province over the period of 2008-2018 negative growth. Indragiri Hilir Regency as the region that is the highest agricultural sector in providing the working opportunity in Riau Province is a working opportunity that has also continued to decline, wherein the year 2008 as many as 202,441 people and as many as 185,360 people in 2018 or the average grew negative by 0.88%. In addition, the regency of Indragiri Hilir other regencies that provide opportunities for agricultural sector work that experienced negative growth is the Regency of Bengkalis and Kuantan Singingi Regency. In 2008 the agricultural sector in Bengkalis regency was able to absorb working opportunity of 124,008 people and decreased to as many as 77,087 people in 2018 or grew negative by 4.64%. The agricultural sector of Kuantan Singingi Regency in 2008 was able to absorb working opportunity of 81,971 people and dropped to as many as 77,087 people in 2018 or the average of each year grew negative by 0.19%.

3.4 Industrial Sector Labor Absorption

The work opportunity of the industrial sector in Riau Province over a period of 2008-2018 average growth of 7.18%. In 2008 the number of working opportunities in the industrial sector as much as 108,469 people and continue to increase until the year 2014 to as many as 163,491 people. In 2015 the number of working opportunities available in the industrial sector in Riau Province was relatively decreased compared with the previous year to as many as 152,471 people. Nevertheless, in 2017 the working opportunity of the industry was again increased to 182,472 people as well as 2018 increased to as many as 217,092 people.

The most working opportunity in Riau Province in 2008 was in Indragiri Hilir regency as many as 23,940 people followed Pekanbaru city as many as 17,789 people. While the regency/city in Riau Province with the number of working opportunities the lowest industrial sector is Kuantan Singingi Regency as much as 2,323 people. In 2018 the most industrial sector working opportunity in Riau Province was in Pekanbaru city as many as 34,748 people, followed by Siak Regency 31,387 people. While the lowest industrial labor absorption sector is in the regency of Meranti archipelago as many as 7,549 people.

The average working opportunity of industrial sectors at the regency/city level in Riau Province during the period 2008-2018 grew positively except for Indragiri Hilir regency. During the last ten years, the average working opportunity in Indragiri Hilir grew negative by 1.38% so that the number of working opportunities in the industrial sector of 23,940 people in 2008 continued to decrease and as many as 20,841 2018. Regency/city whose industrial sector working opportunity grow below the growth of the working opportunity of the industrial sector Riau



Province is the average Bengkalis regency, which grows at 4.29%, the average Kampar Regency grew by 5.57%, The average of Rokan Hilir regency grew by 5.34%, the average Meranti Islands regency grew by 4.51%, and the average city of Pekanbaru grew by 6.92%.

3.5 Agricultural Sector Labor Productivity

Labor productivity of the agricultural sector in Riau Province calculated by comparing the PDRB agricultural sector on the basis of the prevailing price with the number of working opportunities realized the average of each year grew by 11.22%. Thus, the productivity of agricultural sector increased from Rp.51.18 million in 2008 increase by Rp.148.26 million in 2018. In 2008 regions in Riau Province with the largest manpower productivity is Siak regency with the productivity of the agricultural sector of Rp.85 million and the regions with the lowest agricultural sector productivity are Kota Pekanbaru amounting to Rp.12.36 Million. In 2018 there has been a shift in labor productivity in the regency/city. The highest labor productivity by regency/city in Riau Province is the regency of Meranti archipelago amounting to Rp.207.40 million and the productivity of the lowest agricultural sector is Pekanbaru City amounting to Rp.81.28 million.

Most of the labor productivity of the agricultural sector in regency/city grows below the average of Riau Province. The regencies/cities with the growth of labor productivity under Riau is Siak Regency for 8.54%, Kampar Regency amounted to 10.00%, Rokan Hulu Regency by 8.23%, Rokan Hilir Regency of 10.50%, Pelalawan regency amounted to 10.13%, The regency of Indragiri Hulu is 6.31%, Kuantan Singingi Regency amounted to 9.53%, and the average Meranti archipelago regency grew by 10.97%. Except for the regency/city in the province of Riau on average the productivity of its workforce in the regency/city grows above the growth of working opportunity in Riau Province is the city of Pekanbaru labor productivity of the average agricultural sector grew by 19.95% and the regency of Bengkalis the average productivity of the agricultural sector grew by 15.29%.

Based on the approach of the thematic map, it is known that the regions with the productivity of population working in the agricultural sector in the low Riau Province areRokan Hulu, Dumai, Pekanbaru, and Indragiri Hulu. The regions in Riau Province with the level of productivity of the population that works in the agricultural sector with moderate level is Rokan Hilir, Bengkalis, Kampar and Indragiri Hilir. While the regions in Riau Province with the level of productivity of the population that worked in the high agricultural sector are in Kuantan Singingi Regency, Pelalawan, Siak, and Meranti Islands.

3.6 Industrial Sectors Labor Productivity

Labor productivity of industrial sectors in Riau Province continues to show improvement. In 2008 the average of every resident working in the industrial Sector can produce gross Regional domestic product (PDRB) on the basis of the prevailing price of Rp.548.50 million and increased to Rp.929.03 million In 2018 or the average year grew by 5.41%. Seen according to regency/city in Riau Province, people working in the industrial sector with the highest productivity level in 2008 in the regency of Pelalawan of Rp.988.50 million and Indragiri Hilir is the lowest of Rp.190.49 million. In 2018 the regencies with the productivity of the population which works the highest in industrial sector areKuantan Singingi Regency amounting to Rp.1,708.95 million and the lowest is Rokan Hulu regency amounting to Rp.364.39 million. Based on the data showed there has been shifting productivity of the population working Industrial sector in each regency/city in Riau Province for the last ten years.

The growth of the productivity of the population working in the industrial Sector by regency/city Supreme is the average Kampar Regency grew by 17.56% and the lowest is Rokan Hulu regency which grows negative of 1.06%. Some regencies that grow under the Riau Province region the average Bengkalis grow at 5.14%, the average Siak regency grew by 1.75%, the average Pelalawan regency grew by 1.91%, Indragiri Hulu regency on average Grew by 1.09%, the average Meranti Island regency grew by 5.23%, the average city of Dumai grew by 4.71%. Regions with the growth of industrial Sector gross Regional domestic product (PDRB) faster than working population growth tend to have Population productivity Work is steadily increasing otherwise the regions with the growing gross Regional domestic product (PDRB) industrial sector is slower than the working population growth tends to Have the productivity of The working population declining.

The level of productivity of the population working in the industrial sector According to the regency/city region in Riau Province using the thematic map approach is grouped into high, medium, and low. The regency region in Riau Province with the level of productivity of the population that worked on the high industrial sector is the regency Kuantan Singingi. The regencies/cities with the level of productivity of the population working with medium categories region Kampar Regency, Rokan Hilir, Dumai, Bengkalis, Siak, Pelalawan, and Indragiri Hulu. While the regencies/cities with the level of productivity of the population working in the industrial sector with low categories areRokan Hulu, Pekanbaru, the Islands Meranti, and Indragiri Hilir.

The level of productivity of agricultural and industrial sectors among the regencies/city in Riau Province.



3.7 Agricultural Sector Productivity Disparity

Based on the productivity data of the population working on the agricultural sector in each regency/city by using the Williamson index approach, the level of disparity can be discovered. The calculation results show that the level of productivity of the population working in the agricultural sector between regencies in Riau Province is included in the low category with the trend of disparity that continues to decline. In 2008 the level of the population productivity that worked in the agricultural sector in Riau Province amounted to 0.286 points and in 2018 of 0.196 points. The development of the population productivity that works from 2008 to the year 2018 fluctuates. The disparity of the working population tends to increase to the year 2009 increased to 0.302 points, 2012 and 2013 respectively for 0.277 points and 0.272 points, and in the year 2015 increases of 0.249 points.

3.8 Industrial Sector Productivity Disparity

The level of productivity of the population working in Riau Province in the industrial sector tends to be higher than in the agricultural sector. The level of productivity of the population working in the industrial sector in Riau Province during the period of 2008-2018 is still in the category of medium with a trend of disparity that continues to decline. In 2008 the level of population productivity that worked in the industrial sector in Riau Province amounted to 0.493 points and tends to increase until the year 2011 to be at 0.556 points. In 2012 the level of population productivity that worked in the industrial sector amounted to 0.471 points and again increased until the year 2014 to 0.582 points. Then until the year 2018 tends to decline to 0.314 points.

4 Conclusions and Suggestions

4.1 Conclusion

- 1. The regions in Riau Province with the productivity of the population working on the agricultural sector with low categories region Rokan Hulu, Dumai, Pekanbaru, and Indragiri Hulu. Medium categories regions are Rokan Hilir, Bengkalis, Kampar and Indragiri Hilir. The high category regions are in Kuantan Singingi Regency, Pelalawan, Siak, and Meranti Archipelago. While the productivity of the population working in the high category is Kuantan Singingi Regency. Medium category regions are Kampar Regency, Rokan Hilir, Dumai, Bengkalis, Siak, Pelalawan, and Indragiri Hulu. The low categories regions are Rokan Hulu, Pekanbaru, Meranti Archipelago, and Indragiri Hilir.
- 2. The level of productivity of the population working in the agricultural sector among the regencies in Riau Province belongs to the low category with the trend of disparity that continues to decline. In 2008 the level of the population productivity that worked in the agricultural sector in Riau Province amounted to 0.286 points and in 2018 of 0.196 points. The level of productivity of the population working in the industrial sector in Riau Province during the period of 2008-2018 is still in the category of medium with a trend of disparity that continues to decline. In 2008, 0.493 points and 2018 were about 0.314 points.

4.2 Suggestions

- 1. The regions with the three major contributions to the PDRB agricultural sector areIndragiri Hilir, Rokan Hilir, and Kampar. While in the industrial sector is the regency Siak, Pelalawan, and Pekanbaru. But the region is generally the productivity of the population that works still in the medium category. Therefore, it is necessary to improve the skills and training of human resources as well as the implementation of appropriate agricultural and industrial technologies to increase the productivity of both agriculture and industry.
- 2. The level of productivity of the population that works in both agriculture and Industrial Sectors that tend to differ in the regency/city region in Riau Province can increase the disparity. Therefore, the priority of increasing labor productivity in both the agricultural and industrial sectors needs to be given to regencies/cities with a relatively low population productivity rate.

References

Bappenas (2019) EVALUASI PARUH WAKTU RPJMN 2015-2019.

BPS Riau (2017) Keadaan Angkatan Kerja Provinsi Riau Agustus 2017. Pekanbaru.

Darojah, U. (2012) 'Journal of Educational Social Studies', Journal of Educational Social Studies, 1(2), pp. 78–83.

Ekwarso, H., Taryono and Isyandi (2016) 'Analisis Ketimpangan Pembangunan Antar Wilayah Kecamatan Di Kota Dumai', Jurnal Sosial Ekonomi Pembangunan, VII(19 November 2016), pp. 1–16.

Fatimah, A. (2014) 'Implementasi Upah Berbasis Produktivitas', Tinjauan Ekonomi dan Keuangan, 4(5), pp. 12-13.

Harieswantini, R., Hariadi, S. and Muksin (2017) 'Analisis Produktivitas dan Pendapatan Tenaga Kerja Peyadap Karet di Kabupaten Jember', JSEP, 10(1 Maret 2017), pp. 55–64.

Jonathan Haughton, Shahidur R. Khandker (2012) Pedoman Tentang Kemiskinan dan Ketimpangan (Handbook



- on Poverty & Inequality Penerbit Salemba Empat The World Bank
- Lestari, E. P. (2007) 'Disparitas Efisiensi Teknis Antar Sub Sektor Dalam Industri Manufaktur Di Indonesia, Aplikasi Data Envelopment Analysis', Jurnal Organisasi dan Manjemen, 3(1), pp. 10–26.
- Mauliddiyah, A. (2014) 'Analisis Disparitas Regional Dan Pertumbuhan Ekonomi (Studi Kasus Di Kota Batu Tahun 2002-2012)', JESP, 6(2 November 2014), pp. 156–163.
- Nihayah, D. M. (2010) 'Penentu Upah Regional: Tenaga Kerja Terdidik (Skilled Labor) Dan Tidak Terdidik (Unskilled Labor) Di Indonesia', JEJAK, 3(1), pp. 28–39.
- Oktavia, A., Zulfanetti and Yulmardi (2017) 'Analisis produktivitas tenaga kerja sektor pertanian di Sumatera', 12(2), pp. 49–56.
- Prasetyia, F, 2011. Rekonstruksi Sistem Fiskal Nasional Dalam Bingkai Konstitusi. Journal of Indonesian Applied Economics. Vol. 5 No. 2 Oktober 2011, Hlm. 141-156
- Prasetyo, E.P., 2008. The Quality Of Growth: Peran Teknologi Dan Investasi Human Capital Sebagai Pemacu Pertumbuhan Ekonomi Berkualitas. Jurnal Ekonomi dan Kebijakan (JEJAK), Volume 1, Nomor 1, September 2008. Hlm. 18-31.
- Ratnaningtyas, S. and Purwana, W. (2011) 'Perbandingan Pendapatan dan Produktivitas Tenaga Kerja Rumah Tangga Petani Pedesaan dan Perkotaan: Suatu Kasus pada Agro Ekoisistem Lahan Basah Berbasis Padi Sawah di Kecamatan Tarongong Kaler Kabupaten Garut', Sosiohumaniora, 13(3 November 2011), pp. 251–262
- Syafrizal, 2018. Analisa Ekonomi Regional dan Penerapannya di Indonesia, CETAKAN KE -1 Rajawali Pers 2018 PT RajaGrafindo Persada DEPOK
- Taryono and Ekwarso, H. (2012) 'Analisis Pengeluaran Dan Distribusi Pendapatan Penduduk Kabupaten / Kota Di Provinsi Riau', Jurnal Sosial Ekonomi Pembangunan, II(5), pp. 113–129.
- Sasana, H. 2009. Analisis Dampak Pertumbuhan Ekonomi, Kesenjangan Antar Daerah Dan Tenaga Kerja Terserap Terhadap Kesejahteraan Di Kabupaten/Kota Provinsi Jawa Tengah Dalam Era Desentralisasi Fiskal. Jurnal Bisnis dan Ekonomi (JBE), Maret 2009, Hlm. 50 69 Vol. 16, No.1 ISSN: 1412-3126
- Wahyudi, A. 2004. Filsafat Politik Barat Dan Masalah Keadilan. Catatan Kritis Atas Pemikiran Will Kymlicka. Jurnal Filsafat, April 2004, Jilid 36, Nomor 1.
- Yanuar (2013) 'Disparitas Antar Wilayah dan Provinsi di Indonesia Sebelum dan Sesudah Otonomi Daerah', Jurnal Ekonomi, XVIII(01), pp. 97–108.