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Research economic development of Kurdistan Region through the telescope of diversification oil

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Abstract--The main objective of this research paper is to study the economic development of the Kurdistan region through the telescope of diversification from Oil dependent economy to a self-sufficient economy in different aspects includes mainly the agriculture sector. It also suggests the best model for shifting Kurdistan from an oil economy to an agriculture-driven economy. Diversification of economic variables for inclusive and integrated development is a challenge for many developing nations across the globe. A stable linkage is needed among the different sectors of the economy for diversification of the economy. The integration of different economic sectors by pooling their resources provides a new inventive approach to diversification. Every monotonous economy lastly has some saturation point of their carrying capacity so the best solution is to diversify the means of production despite the overexploitation of the single resource. Sustainability is the need of the present. We have to use our resources judiciously.

Keywords--Agriculture economy, Integration, Agriculture-Finance, Diversification, Development economy.

1 Introduction

The Kurdistan Region includes parts of the three governorates of Erbil, Sulemani, and Duhok. It fringes Syria toward the west, Iran toward the east, and Turkey toward the north, lying where fruitful fields meet the Zagros Mountains. It is navigated by the Sirwan River and the Tigris and its tributaries. The mountains of the Kurdistan Region have a normal stature of around 2,400 meters, ascending to 3,000– 3,300 meters in spots. The most noteworthy pinnacle, Halgurd, is close to the outskirts with Iran and measures 3,660 meters. The most elevated mountain edges contain the main forestland in the Region. The climate of the Kurdistan is favorable for agriculture. This area has the 5 rivers for irrigation and the varied

topography and associated rainfall regimes have created three basic micro-climatic zones; high rainfall (700-1100 mm), medium rainfall (400-700 mm), and low rainfall (under 400 mm). In terms of production; the high-rainfall zone contains mainly fruit orchards, wheat occupies most of the medium-rainfall zone, and barley is the main crop in the low-rainfall zone. Winter wheat and barley are planted in the autumn (October-November) and harvested in the late spring (April-June) following the rainfall pattern. Kurdistan is an autonomous province in Iraq which is heavily dependent on the oil sector for its major part of revenue. On the other hand, it is ignoring the agriculture sector which has great potential to earn heavy revenue for the country. Even after the fertile land of Kurdistan, it is importing agricultural products from neighboring countries. Today, the three large areas of Kurdistan are full of neighboring countries' products. The percentage of foreign products in every food market is more visible than domestic products. Milk products, meats or fruits, and vegetables are mostly imported from Iran and Turkey, its main reason is that there is no effective policy in the agriculture sector and the focus of the policymakers is on crude oil revenues. An adequate environment for agriculture will prove to be a milestone in making this sector financially prosperous by transforming the oil dependence of this province into diversity. Financing remains a thistle in the side of those gatherings looking to additionally create horticulture in Kurdistan. In this manner, reserves that could be better spent on ventures are rather spent on imports to fulfill expanding requests.

2 Research Methodology

The present study is agriculture-oriented about economic development in the Kurdistan region. This study is based on the survey method using the structure of the questionnaire and physical ground survey of the market. The results were found using the percentage analysis method. *Data Collection:*

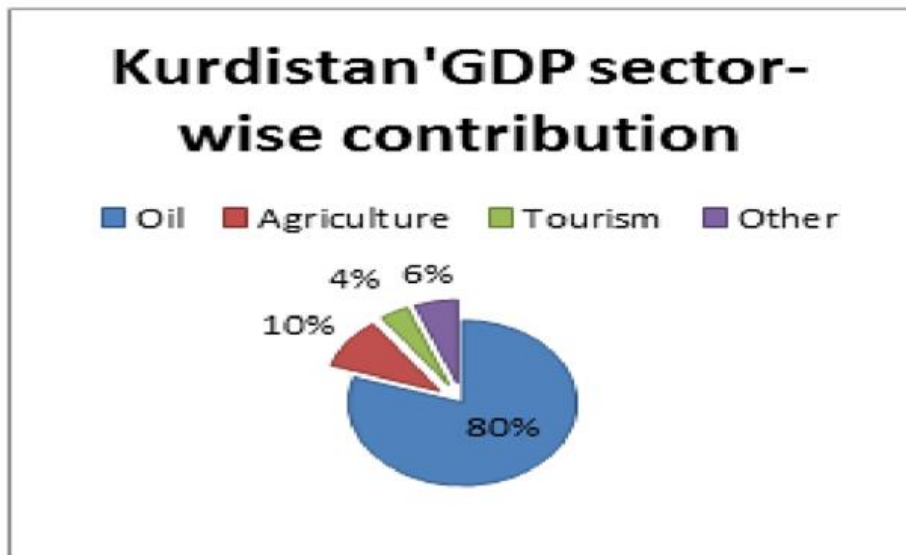
- 1) *Primary Data:* For collection of data, the researcher used a structure questionnaire data. This was distributed to 50 respondents across the study area.
- 2) *Secondary Data:* The secondary data been gathered from internet, Journals, reports, Government offices.

2.1 The Economy of Kurdistan Can Be Divided Into Three Sectors

Primary sector: Crude oil is the primary source of income of this region; this sector contributes approximately 80% of the GDP of this region, which is the main source of the government's income. But this sector is depending upon the central government policies. Even the volatility in the prices of crude oil can affect the revenue of this sector.

Secondary sector: Agriculture is assuming the second significant job in the Kurdistan economy. As of now, this division contributes roughly 10% of the GDP of this district. This speaks to a low commitment and implies that assets are inadequately differentiated in the KRG. In this regard, a decrease in the agrarian area adversely affected the economy. The agribusiness segment in the Kurdistan Region has seen significant change as of late and in this way can assume a noticeable job in supporting the development of the neighborhood economy.

Tertiary Sector: It includes tourism, Industry, Real estate, Services, and others. This sector is divided into major sub-sectors of business, but yet these sub-sectors are running in a crocodile speedway of development. These sub-sectors of Kurdistan's economy needs more infrastructural requirement so they can play a crucial role in the area of development. Kurdistan's GDP of all three sector can be understood by this figure.



GDP Sector-Wise Data (Source: Invest in Group 2013)
Figure 1. Kurdistan's

2.2 Diversification of Kurdistan's Economy

Diversification Economy = Developing non-oil segments and bringing down oil money related reliance

(i.e., Export diversification, government income, and financial base); and making a feasible non-oil present-day economy (Agriculture economy) that can support a moderately abnormal state of salary. (5) Another Relevance of Diversification:

- 1) To lessen or minimize the spread risk
- 2) To advance monetary improvement
- 3) To constrain the effect of vacillations in the oil cost and amount created
- 4) To make openings for work for a quickly developing neighbourhood work drive

2.3 Importance of Diversification for Kurdistan

The oil part isn't making adequate occupations specifically. Oil costs/income change broadly, oil dispersion can't bolster rising expectations for everyday comforts. The flimsiness of oil income affects the general development rates (basically through changes in government spending), monetary and outer position, and business. The greater parts of individuals in the Kurdistan Region

are monetarily reliant on the administration, which is itself subject to oil salary. In the same way as other oil-based economies, the area's monetary blasts and busts are vigorously affected by the oil part. Because of this system, where is the Kurdistan region economy heading within a reasonable time-frame? Open Sector, On one hand, adjusting incomes and costs for the Kurdistan Regional Government (KRG) is subject to oil costs and the rate of fare. On the other, it is controlled by open spending and the rate of getting. Even though the KRG's ability to send out oil will step by step increment, it does not influence the worldwide cost of unrefined, while the lift in oil creation won't really convert into essentially better monetary conditions throughout the following couple of years. As of late Kurdistan is experiencing money related emergency, Apart from monetary emergency, Global oil costs have fallen by more than 50 percent since mid-2014. This comprises a noteworthy hit to the Iraqi and Kurdistan Regional Government (KRG) treasuries as oil rents represent more than 90 percent of state salary. Then again, weights on the Iraqi treasury have expanded enormously because of the expenses related to indicting the war against the Islamic State of Iraq and the Levant (ISIL), statistic weights from inside uprooted individuals (IDPs) and outcasts, and an enlarged open segment. To put it plainly, both Iraq and the KRG are unequipped for adjusting their financial plans. To address this, the Iraqi bureaucratic and Kurdish local governments require a mix of both transient answers for manage the quick fall in income and longer-term auxiliary changes to plan for the following blast and bust cycle. The KRG's open borrowings of more than \$15 billion are higher than its yearly salary and these have not been spent on gainful ventures. The greater part of the KRG's financial plan is designated to paying \$700 million worth of month to month pay rates. The quantity of open workers is evaluated to be an uncommon 1,350,000. The facts confirm that these pay rates animate interest for products and ventures, empowering regular business in the district. In any case, inefficient open uses basically infuse more money into the economy, expanding inflationary weights on imported buyer products. Neighborhood creation is barely helped by this pattern. Merchandise and enterprises created in the Kurdistan area can barely rival better, less expensive imported remote items and administrations. This is notable, before 2003 Kurdistan was prosperous through its agriculture sector. Now the dependency of the oil sector should be diversified in agriculture so that government budget insufficiency can be compensated and the people's dependency on the government's budget can be diversified in the agriculture sector.

3 Challenges in Diversification

The non-oil sector was obliged by extremely constrained agrarian innovation and local work, absence of qualified labor, high lack of education rate, and a moderately little market measure. The test of financial diversification for asset-rich nations is troublesome and disputable, notwithstanding for a nation standing up to this test during an era of kind household and local security conditions. For Iraq, distressed by fearmongering at home, overflows from the local clash, the inheritance of war and endorses, and political vulnerability, the test is exponentially progressively significant. This note recommends that notwithstanding the overwhelming obstructions, Iraq can and should plan and dispatch an expansion procedure containing clear approach needs for activity

over a 3 to multi-year time frame. Obviously, this technique will assume that correlative moves are being made in related spaces to enhance resident security, give equity, and make employments – the three mainstays of the harmony building standards illustrated in the World Development Report (WDR) 2011.

3.1 Potential for Becoming Economic Developed Area in the Middle East Region (Agriculture Economy)

Kurdistan is a region of immense potential. This region is brimming with numerous regular assets in the Middle East and additionally, this region has been shielded from the difficulties of psychological oppression as a result of Kurds' convictions in harmony. There is colossal potential for economic improvement in this little area which can leave nations like Dubai and Oman, as well. In terms of natural resources, this small province is more financially richer than other areas of Iraq. Even, when the entire Middle East region was suffering from the outbreak of terrorism during 2014, at that time it was able to keep itself stable by fighting the challenges of terrorism. The security forces of this province played an important role in eradicating ISIS in collaboration with the Iraqi army, which has led to confidence in the stability of the province in the international community. Despite the immense potential, this sector has been backward in economic strategies, which has a dispute with the federal government. If this autonomous province will resolve its internal disputes through dialogue with the federal government and do more focus on the implementation of relevant economic strategies, Then It can be the best economic growth example for all. For the future, the Region can call as the "Green place that is known for Iraq and the Middle East" A phenomenal variety of grains and vegetables have characteristic been created in Kurdistan, with wheat and grain among the most notable. Regardless, in light of the methodologies of the Past daily schedule in Baghdad, agriculture in the Kurdistan Region was confined for improvement. Despite the way that the agriculturists working in the Kurdistan Region have essential experience, they have been confined concerning their use of current procedures. The Government sees the earnestness of this issue and has quite recently begun creating methodologies to execute change.

Division of Total Land and Cultivated Land

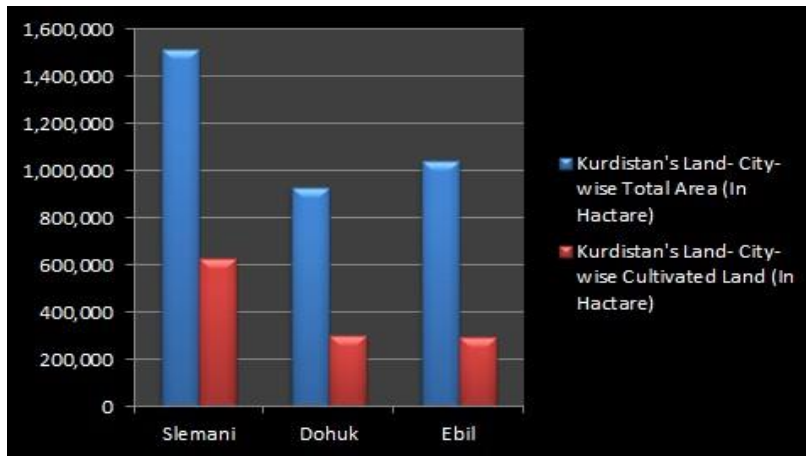


Figure 2. Division of Kurdistan’s Total Land and Cultivated Land (Source- KRG 2014)

Figure 2. Shows about the Kurdistan region’s division of land, which is highly suited for agriculture as it boasts large areas of arable land and fertile soil.

Future Trends of Employment in Agriculture Sector in Kurdistan (Figure3)

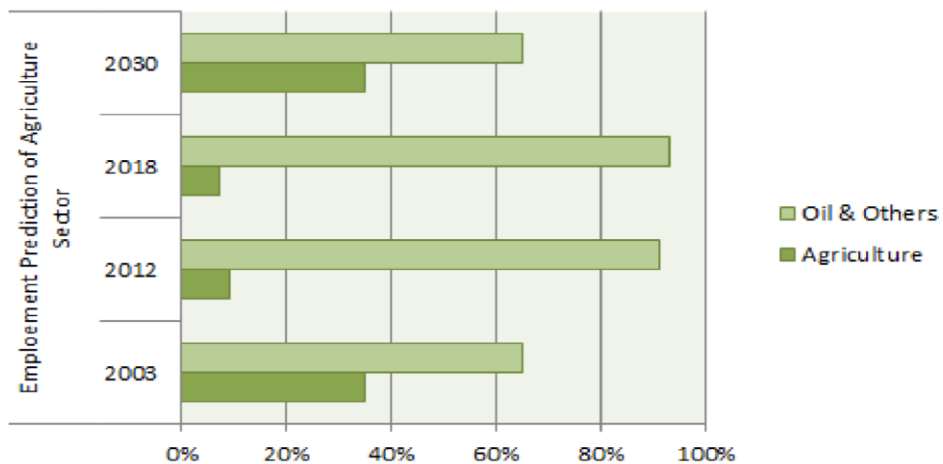


Figure 3 Sector-Wise Employment Trends (Source- Ministry of KRG 2013)

(Fig.3) shows that in 2003, around 35% of the number of occupants in the Kurdistan Region relied upon cultivating as their wellspring of occupation. In any case, by 2012, that rate had dropped to 9% due to the nonappearance of fruitful methodologies. But after diversification picture of employment can be changed by 2030. Analysis of Primary Data (Structured Questionnaire): For a collection of primary data following questions asked by the researcher from respondents.

Table 1
Agriculture Background of the Respondents

Are you from agriculture background?		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	Yes	80	80	80	80
	No	20	20	20	100.0
	Total	100.0	100.0	100.0	

Table 1.1
Farmer in the Family of the Respondents

If yes, is there any farmer in your family?		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	Yes	100	100	100	100.0
	No	0	0	0	100.0
	Total	100.0	100.0	100.0	

Table 1.2
Agriculture Field Experience of the Respondents

If yes, for how many years you are in this sector?		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	0-3 Years	12.5	12.5	12.5	12.5
	3-5 Years	30	30	30	42.5
	5-10 Years	42.5	42.5	42.5	85.0
	10&above	15	15	15	100.0
	Total		100.0	100.0	

Table 2
Agriculture Role in Economic Development of the Kurdistan

Do you think agriculture can play major role in economic development of the Kurdistan		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	Yes	100	100	100	100.0
	No	0	0	0	100.0
	Total	100.0	100.0	100.0	

Table 2.1
Major Role Is Been Played By the Agriculture in the Economic Development

If yes, what major role is been played by the agriculture in the economic development:		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	Employment Generation	6	6	6	6.0
	Increase in GDP& Government revenue	6	6	6	12.0
	Diversify development	8	8	8	20.0
	All of the above	80	80	80	100.0
	Total	100.0	100.0	100.0	

Table 3
Product of the Respondents

Do you produce more than one product?		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	Yes	77.5	77.5	77.5	77.5
	No	22.5	22.5	22.5	100.0
	Total	100.0	100.0	100.0	

Table 3.1
Types of Products of the Respondents

If yes, which types of products you are producing:		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	Vegetables &Fruits	37.5	37.5	37.5	37.5
	Millet/Wheat/Maze/Barley	37.5	37.5	37.5	75.0
	Poultry	17.5	17.5	17.5	92.5
	All of the above	7.5	7.5	7.5	100.0
	Total	100.0	100.0	100.0	

Table 4
Government of Kurdistan Helps in Agriculture

Does the Government of Kurdistan helps in agriculture?		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	Yes	75	75	75	75.0
	No	25	25	25	100.0
	Total	100.0	100.0	100.0	

Table 4.1
Helping Hand of the Government

If yes, what help you is getting?		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	Subsidy	100.0	100.0	100.0	100.0
	Technical	0	0	0	0
	Infrastructural	0	0	0	0
	Others	0	0	0	100.0
	Total	100.0	100.0	100.0	

Table 5
Government Promote Various Crops According To Climate Conditions

Does the Government of Kurdistan promote various target crops according to climate conditions?		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	Yes	20	20	20	20
	No	80	80	80	100.0
	Total	100.0	100.0	100.0	

Table 6
Role of Agriculture in the Kurdistan Economy

Do you agree that in future the agriculture sector will play a primary role in the Kurdistan economy?		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	Yes	100	100	100	100.0
	No	0	0	0	100.0
	Total	100.0	100.0	100.0	

Table 7
Agriculture Produce Can Satisfy the Needs of the Kurdistan

Do you think, through diversify development of Kurdistan in future; the agriculture produce can satisfy the needs of the Kurdistan in Total?		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	Yes	100	100	100	100.0
	No	0	0	0	100.0
	Total	100.0	100.0	100.0	

Table 8
FDI in Agriculture Can Increase GDP through Agro-Technology

Do you agree that FDI in agriculture can increase GDP through agro-technology?		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	Yes	84	84	84	84
	No	16	16	16	100.0
	Total	100.0	100.0	100.0	

Table 9
Insurance Eliminates the Risk in Agriculture and Promotes For Further Export

If Insurance is provided, do you think it eliminates the risk in agriculture and promotes for further export of your products?		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	Yes	100	100	100	100.0
	No	0	0	0	100.0
	Total	100.0	100.0	100.0	

3.2 Findings

- 1) Table 1 describes the agricultural background of the respondents where the majority of 80% are from the same. Out of the 80% of respondents (Table 1.2) all are the farmers as shown in (table 1.1). As mentioned in table 1.3, the finding shows that 42.5% of respondents have more than 5-10 years of experience in agriculture.
- 2) Table 2 shows that all the respondents have agreed that Agriculture can play a major role in the economic development of Kurdistan in the future as an employment generation, increase in GDP, Increase in Government revenue and diversify development(table 2.1).
- 3) From the table 3, it is found that only 22.5% respondents' produce one product and the rest concentrate on more than one product, where vegetables and fruits and millets play a vital role of 75.0% of cumulative percentage, and a minimum of 17.5% are producing poultry(Table 3.1).
- 4) From Tables 4 and 4.1, it is inferred that the majority of 75% are getting help from the government of Kurdistan as subsidies.
- 5) According to table 5, instead of helping the farmers by giving subsidies, the majority of 80% of respondents feel that the govt. does not promote for various crops according to the climate conditions
- 6) Table 6 shows the respondents who have totally agreed that the Agro-sector will play a primary role in the future and it can satisfy the total needs of Kurdistan, according to the respondents (Table 7).
- 7) From table 8, it is found that all respondents have agreed that the FDI in agriculture can increase the GDP through the use of Agro-technology.

- 8) Finally, all the respondents were totally agreed that if insurance would be provided it can eliminate all the risks and also promote the products for exporting (Table 9).

4 Suggestions and Improvements

To make 20% of the respondents (Table 3) to produce more than one diversified products, the govt. of Kurdistan has to concentrate them by providing more information regarding the necessity of the produce and by giving more financial assistance. After percentage analysis through primary data and observation made from secondary data, the following suggestions have been made:

- 1) Measures to be taken for the increase of production in the farming of poultry as only 17.5% of the farmers who are indulged in it.
- 2) To concentrate on 25% of the respondents who are not aware of the govt. help in agriculture, the government has to conduct awareness programs regarding their support.
- 3) For the 16% of the respondents who do not believe in FDI in agriculture could increase the GDP through agro-technology, the government of Kurdistan can motivate the farmers in neglecting the information by providing insurance as it eliminates the risk in production.

5 Conclusion

Currently, the Kurdistan region is facing a financial crisis is due to the economic dependence on the oil sector. The government of this region is financially dependent on Iraq's federal budget allocation to Kurdistan. From 2014, the fluctuation in oil prices and terrorism threats did affect the revenue of the government. Insufficiency of budget did stop the crucial development projects of this area. At present, the Agriculture sector contribution to GDP is only 10%, but this sector has the potential to grow very fast. This is notable that this sector has the potential to become the primary sector in the mere future. Even the regional government has made the policies to make it possible but due to inadequacy of funds and technology constraints are the major problem for achieving it. The diversification of the oil economy to agriculture needs some more efforts for planned Investment policies. If these proposed models are adopted with some modifications according to needs then, this sector can drastically change the picture of the Kurdistan economy.

References

- Acharya, A. (2009). *Targeting Terrorist Financing: international cooperation and new regimes*. Routledge.
- Adshead, S. (2004). *T'ang China: the rise of the East in world history*. Springer.
- Allinson, J. (2015). *The struggle for the state in Jordan: The social origins of alliances in the Middle East*. Bloomsbury Publishing.
- Anderson, B. R. O. G. (1998). *The spectre of comparisons: Nationalism, Southeast Asia, and the world*. Verso.
- Armstrong, H. F. (1957). *Lebanon, Jordan and Iraq: Report on United States Foreign Assistance Programs (No. 2)*. US Government Printing Office.

- Bakir, V. (2010). *Sousveillance, media and strategic political communication: Iraq, USA, UK*. A&C Black.
- Barrett, R. C. (2009). *The Arabian Gulf and Security Policy: The Past as Present, the Present as Future* (No. JSOU-09-4). JOINT SPECIAL OPERATIONS UNIV HURLBURT FIELD FL.
- Beeston, A. F. L., & Ashtiany, J. (1992). *Modern Arabic Literature* (Vol. 3). Cambridge University Press.
- Bowlus, J. V. (2017). A crude marriage: Iraq, Turkey, and the Kirkuk–Ceyhan oil pipeline. *Middle Eastern Studies*, 53(5), 724-746.
- Brzezinski, Z., Scowcroft, B., & Ignatius, D. (2009). *America and the world: conversations on the future of American foreign policy*. Basic Books.
- Caloz-Tschopp, M. C. (2010). Scientific diasporas, migration and development. A perspective from philosophy and political theory. *Scientific diasporas as development partners. Skilled migrants from Colombia, India and South Africa in Switzerland: Empirical evidence and policy responses*, 21-136.
- Choueiri, Y. M. (2010). *Islamic Fundamentalism 3rd Edition: The Story of Islamist Movements*. A&C Black.
- Connor, W. F. (1969). Myths of hemispheric, continental, regional, and state unity. *Political Science Quarterly*, 84(4), 555-582.
- De Montbrial, T. (2013). *Action and reaction in the world system: The dynamics of economic and political power*. UBC Press.
- Determann, J. M. (2018). *Space Science and the Arab World: Astronauts, Observatories and Nationalism in the Middle East*. Bloomsbury Publishing.
- Dixit, S. (2019). From Oil to Agriculture: A Diversification of Kurdistan's Economic Policies.
- Emenius, C. (2012). Livelihood and transition to certified cacao production in the Peruvian Amazonas.
- Fletcher, R., & Chikweche, T. (2012). Future directions in international marketing: the decade ahead. *Strategic International Marketing: An Advanced Perspective*, 259-287.
- Gattinara, P. C. (2016). *The Politics of Migration in Italy: Perspectives on local debates and party competition*. Routledge.
- Gaudin, T. (2008). The world in 2025: A challenge to reason. *Brussels: European Commission DG Research (<http://2100.org/World2025.pdf>)*.
- Gilder, G. (2012). *The Israel Test: Why the World's Most Beseiged State is a Beacon of Freedom and Hope for the World Economy*. Encounter Books.
- Gorostiaga, X. (1993). Latin America in the New World Order. *Global Visions. Beyond the New World Order*.
- Hedican, E. (2012). *Social anthropology: Canadian perspectives on culture and society*. Canadian Scholars' Press.
- Kegley, C. W., & Raymond, G. A. (2011). *The global future: A brief introduction to world politics*. Cengage Learning.
- Mountjoy, S. (2005). *The Tigris & Euphrates River [ie Rivers]*. Infobase Publishing.
- Pollak, J., & Schubert, S. R. (2017, April). The EU's South-Eastern Corridor: Lifeline or Pipedream?. In *Turkey as an Energy Hub?* (pp. 67-80). Nomos Verlagsgesellschaft mbH & Co. KG.
- Powell, K. L., & De Leon, P. (2019). DC Office: Legislative accomplishments_101st Congress.
- Prescott, J. R. V. (2014). *The geography of state policies*. Routledge.

- Roth, S. (2019). Humanitarian NGOs. *Routledge Handbook of NGOs and International Relations*, 267282.
- Samadov, N. (2017). *The Impact Of Turkish-Israeli Relations On Turkey's Relations With Arab States* (Doctoral dissertation, Istanbul Aydin University Institute Of Social Sciences).
- Talbott, S. (2009). *The Great Experiment: The Story of Ancient Empires, Modern States, and the Quest for a Global Nation*. Simon and Schuster.
- Tow, D. H. (2006). *The Future of Life: Meta-Evolution: A Unified Theory of Evolution*. Future of Life: Meta-Evolut.
- Yuval-Davis, N., Wemyss, G., & Cassidy, K. (2019). *Bordering*. John Wiley & Sons.