UNVEILING THE MARITIME OPPORTUNITIES: ANALYSING THE BLUE ECONOMY POTENTIAL WITHIN THE FRAMEWORK OF THE CHINA-PAKISTAN ECONOMIC CORRIDOR

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Abstract

Earth is called "the blue planet "because 70% surface consists of water. The ocean is vital to the world's economy approximately 3.5 billion people depend on the ocean for the sustenance of their lives and livelihoods. Having about 1,050 km long coastline and the Exclusive Economic Zone covering about 240,000 sq. km. Pakistan is a key maritime country in the Indian Ocean. Pakistan has immense potential in the blue economy the only possibility for Pakistan to sustain its deteriorating economy is to focus on the growth of its blue economy. In this connection, the China-Pakistan Economic Corridor (CPEC) not only boosts the traditional economy of Pakistan but also can play a vital role in the growth of the blue economy. This study explores the potential of the blue economy for Pakistan from the perspective of the China-Pakistan Economic Corridor. The nature of the research is qualitative and the case study method is applied to the present study. Descriptive and exploratory approaches are applied to discover the answers to the research questions and analysis of this study will help to find out many possible findings of the Potential of the Blue economy of Pakistan in perspective of the CPEC.

Keywords: Blue economy, CPEC, Potential of blue economy, Growth of blue economy

Introduction

The ocean performs a vital function in regulating the climate and offering significant ecosystem services but a sign to the global economy. Ocean shares approximately US \$3 to \$6 trillion of world income. Similarly, over 58% of the population settles in an area of 100 kilometers of coastline, and twelve megacities are coastal. Fisheries and aquaculture shares per year approximately hundred billion US dollars, and two hundred and sixty million jobs in the world economy.

Instead of the fact that the blue economy provides the ocean chances for nations because of its comprehensive approach towards human beings, planet Earth as well environment, many states still did not focus on maritime resources. However, the United Nations has declared 2021-30 as the "Decade of Ocean Science for Sustainable Development" that focused on attempts towards a more secure future through world

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capacity building that will guarantee ocean science can completely help states in producing better circumstances for sustainable development of the Ocean.

Consequently, states across the globe are taking an interest in the exploration of their blue economy potential seeing its significance for the economy of the country. But, instead of this fact that Pakistan is a maritime state and has a 990 km long coastline divided into two portions, the Makran coast and the Sindh coast have 720 km and 270 km area respectively, still as compared to other states far behind in fully utilizing of its capabilities regarding ocean economy. From the perspective of the potential of the blue economy China-Pakistan Economic Corridor (CPEC) is estimated to be booming the maritime capabilities of Pakistan.

The Potential of Blue Economy

The concept of "blue economy" rests upon the idea presented by Gunter Pauli, who defined blue economy as "the sustainable usage of the resources without damaging the environment".¹ This phenomenon originated in 2012 at the United Nations Conference on Sustainable Development which was held in Rio de Janeiro, Brazil. In the report of The Economist, the Intelligence Unit of 2015 described the blue economy as: "the blue economy is sustainable usage of maritime resources for economic progress, better living, and employment, and marine ecosystem health".² The blue economy is completely reliant on oceans. Countries by recognizing the potential of the ocean economy are now involved in advancing it and expanding their economies to be more competitive in this age of globalization.

From the perspective of the natural asset on the planet, the ocean has many benefits for humanity. Some economic benefits are as follows.³

- It provides approximately fifteen percent of the world's protein needs.
- 90 percent of world trade is possible via the shipping sector. It provides hundreds of millions of employment, in aquaculture, shipping, fisheries, energy production, tourism, and other sectors.
- It is also the source of approximately thirty percent of the global oil and gas resources.
- Approximately four billion of the world's population depend on the sea and coastal resources for their sustenance and living.
- Small-scale fishing supplies approximately half of the global harvested seafood.

Region Main countries

Europe France ,England, Ireland , Spain

America America, Canada

Asia-Pacific New Zealand, China, Malaysia, Korea, Australia, Japan, Vietnam, Thailand, Indonesia and Philippines.

Table -1: Classification and Definition of Major Ocean Industries

Source: The ocean economic statistical system of China and understanding of the blue economy. *Journal of Ocean and Coastal Economics*, 2(2), 10.4

The blue economy is simply separated into two wider areas of industries which are centered on:

- I. Maritime Industry
- II. Marine-related Industry
- ➤ Marine Industry: It contains the main marine industries and a few of them are listed below⁵:-
 - Oil and gas industry
 - Communication and transportation
 - Shipbuilding
 - Electric power industry
 - Sea water utilization
 - Salt manufacturing industry
 - Chemical industry
 - Marine Engineering
 - Marine Biomedicine
 - Scientific research
- ➤ Marine Related Industry: This industry includes the enterprises that connect the main ocean industries. It creates resources for the Marine sector or uses the benefits of products from the way of production. A secondary type of this economy.

Coastline Economy

Coastline Economy is subcategory of the marine economy. Colgan describes the coastal economy as comprised of all economic activity in the coastal area, and therefore embodies employment, wages, and output in all of the regions described as a portion of the coastal economy .7

The Potential of Blue Economy for Pakistan

Pakistan is rich in blue resources, natural ports, and incessant sea trade has a vast shoreline. The potential blue economy of Pakistan consists of approximately a hundred billion US dollars. About coastal length Pakistan is placed 74th out of 142 coastal countries in the world with a coastline-to-area ratio of 1:36 Consists of a continental shelf having approximately 240,000 sq km area with an Exclusive Economic Zone.⁸

Sr. NoType of ZoneRange (Nautical Miles)1Extended Continental Shelf3502Adjoining Zones243Exclusive Economic Zone2004Territorial Waters12

Table - 2: Different Sea Zones of Pakistan

Source: REVISITING BLUE ECONOMY: CHALLENGES AND PROSPECTS FOR THE MARITIME SECTOR OF PAKISTAN. *Journal of Contemporary Studies*, 10(2), 16-37.9

In an era of globalization seaports and seaborne trade in Pakistan have important shares in socioeconomic development, so strengthening economic connections among countries of many regions. Likewise, Gwadar port of Pakistan appears as the best center port in the region because of its significant strategic location to invite trade from west China, Central Asia, Afghanistan, and other states owing to its nearness to the Strait of Hormuz (SoH), which is the key shipping way and connects the Persian Gulf with the Gulf of Oman and the Arabian Sea. Nowadays, Gwadar's geostrategic location allows it to watch and regulate the trade routes of oil and Sea Lines of Communications.

China-Pakistan Economic Corridor (CPEC)

A significant part of the One Belt, One Road (OBOR) initiative is The China-Pakistan Economic Corridor (CPEC) which joins Asia, Africa, and Europe with China through a trade way and is also recognized as the New Silk Road Economic Development Corridor (Wolf, 2016). The objectives of this project are to join Kashgar (an area of the city of province Xinjiang northwest area of China) to the Gwadar port in Baluchistan through a network of highways, airports, railways as well as energy pipelines to achieve the objectives of promotion of trade and tourism.¹⁰

With The China-Pakistan Economic Corridor, as per initial estimate, 46 billion dollars would be spent by China, mostly on energy plants, CPEC, industrialization, Gwadar Port, and the development of infrastructure in economically less developed regions."

China regards the China-Pakistan Economic Corridor (CPEC) as a paramount undertaking, as it effectively links with two vital economic conduits: the Silk Road

Economic Belt (SREB) and the Maritime Silk Road. The SREB holds the potential to interconnect over 68 nations, encompassing a population of approximately 4.4 billion, spanning across regions from Central Asia to South Asia, and extending further to encompass Russia, the Middle East, Europe, Southeast Asia, and more. On the other hand, the Maritime Silk Road establishes a crucial connection between the South China Sea, East Africa, the Indian Ocean, the Mediterranean, and the Red Sea, facilitating seamless maritime trade and exchanges. This strategic interweaving of economic passages underscores the intricate web of connectivity that China envisions through the CPEC, thereby accentuating its significance as a pivotal endeavor within China's broader economic and trade aspirations.¹²

The SRF (the Silk Road Fund) with US\$40bn and AIIB (The Asian Infrastructure Investment Bank) with US\$100bn prepared to offer financial help to The Belt and Road Initiative. Exim Bank, China Development Bank, Sovereign Wealth Fund, and Foreign Exchange Reserve are prepared to provide further funding to this massive initiative. Concerning domestic progress, it has been emphasized that domestic workers would acquire job chances during urbanization and infrastructure growth.

All the main cities of Pakistan like Gawadar, Badeen, and Thatta, etc. would be rebuilt and urbanized. Furthermore, a completely new market is developing for linguistics. There is an increasing necessity for translators and linguists who would be required to interpret and translate Chinese, English, Urdu, and other languages spoken in different areas of Pakistan. Moreover, a national workforce would be needed to develop the agriculture sector under China-Pakistan Economic Corridor.¹³

The expansion of fishing sectors and port yards in littoral regions would create jobs for indigenous fishermen. Likewise, new markets would be opened for its livestock industry and Pakistan might arise as the main meat exporter. Consequently, workers would be paid high wages in the growth of businesses. The cottage industry of Pakistan would be capable to contest with global markets. Small and Medium-sized Enterprises would grow by applying the innovative plans of entrepreneurs. Likewise, the service sector and development of the planning industry would also emerge in Pakistan because it will perform as one of the main centers of One Belt One Road in the shape of CPEC.¹⁴

In contrast to China, the benefits of the China-Pakistan Economic Corridor to Pakistan are more at local and seem to function at the micro level. The investment has been started from \$46 billion which raised to \$55 billion and then extended to \$62 billion.¹⁵ \$4 billion would be spent on manufacturing railway networks and motorways and \$34 billion would be used on the national grid to produce 17,000-megawatt energy. The remaining amount has been allocated for the development of the city of Gawadar, the growth of special economic zones, and the layout of fiber optic cables¹⁶

Table -3: Energy Plans under CPEC

Sr	Plans Name	MV
No	C 1. IN	
	Completed Plans	T
1.	Sahiwal Coal-fired Power Plant	1320
2.	UEP Wind Farm, Jhimpir, Thatta	100
3.	China Hub Coal Power Project, Hub Balochistan	1320
4.	Hydro China Dawood Wind Farm, Thatta and Gharo,	50
5.	Quaid-e-Azam Solar Park (Bahawalpur)	1000
6.	Coal-fired Power Plant at Port Qasim Karachi	1320
7⋅	Engro Thar Coal Power Project	660
8.	Three Gorges Second and Third Wind Power Project	100
9.	HUBCO Thar Coal Power Project (Thar Energy)	330
10.	Sachal Wind Farm Thatta, Jhimpir	50
11.	Matiari to Lahore ±660 KV HVDC Transmission Line Project	4,000 MW Evacuation Capacity
12.	Karot Hydropower Project, Punjab / AJK	720
	Under Construction Projects	
13	1320 SSRL Thar Coal Block-I 7.8 mtpa & Power Plant (2×660MW) (Shanghai Electric)	1320
14	300MW Coal-Fired Power Project at Gwadar	300
15	Suki Kinari Hydropower Project, KP	884
16	HUBCO ThalNova Thar Coal Power Project	330
	Under Consideration Plans	•
17	Western Energy (Pvt.) Ltd. Wind Power Project	50
18	Azad Pattan Hydropower Project, AJK/Punjab	700.
19	Cacho Wind Power Project	50
20	Kohala Hydropower Project, AJK	1124
21	Thar Mine Mouth Oracle Power Plant & surface mine	1320
	<u> </u>	1

Source: https://www.cpec.gov.pk/energy

Rotterdam
Calais
Paris

Three corridors planned
to pass through
northern, central and
southern Xinjiang

Central
Corridors
Tachkent
Tachkent
Tedeben
T

Figure - 1: Corridors of One Belt and one Road Initiative

Source: The China-Pakistan Economic Corridor: An Assessment of Potential Threats and Constraints.¹⁷

China Pakistan
Corridor
Leonomic
Route
Source
Leonomic
Le

Figure -2: Indo-Pacific Energy and Trade Routes.

Source: The geopolitics of the CPEC and Indian Ocean: security implication for India.¹⁸

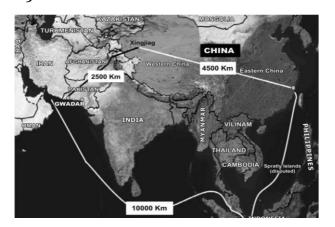


Figure -3: The shortest route from Western China to Gwadar

Source : Geo-economic imperatives of Gwadar Sea Port and Kashgar economic zone for Pakistan and China.

The important advantage of the Pakistan –China Economic Corridor to Pakistan is a greater value of Gawadar port, established as a deep sea port by Chinese stockholders.

Straits of Hormuz

Gwadar Port

Karachi

Ahmedabad

Figure-4: Gwadar port location at the mouth of Straits of Hormuz

Source: www.google.com.pk

Gawadar is located near the Strait of Hormuz which regulates 1/3rd of the traffic of world oil trade. The Gwadar Port will offer China the shortest entry route to the Indian Ocean through the Arabian Sea. China is flourishing as an industrialized state and it wants safe and easy entry to the sea for transportation. But the key industrial area has a long distance from Shanghai port and is situated approximately at 16,000 km of distance and requires 2–3 months of traveling.¹⁹

Gwadar will support China to lessen this distance and expense. Gwadar port is considered to be useful for other landlocked neighboring countries with natural resources by carrying the chance to transport their items to the port and other parts of the world.¹ It also offers economic security to China and curtails the nautical distance from Shanghai to North America by 9,000 km.²º Successful accomplishment of CPEC would minimize the trade track from China to the Gulf of Oman from 12,000 km via sea to 2,200 km via Pakistan.²¹

Economic Growth

The electricity generation projects, the local manufacturing industry will flourish with the development of CPEC projects. The planned 29 industrial parks, which comprise 21 mineral zones and 27 SEZs, would have significance for the trade and industrial sectors, and the proposed 9 km2 Gwadar SEZ would benefit livestock, agriculture, energy, and minerals industries ²²

• Completion of planned projects would resolve the issue of energy shortcomings in Pakistan. The major portion of the investment of over \$33 billion would resolve the shortage of energy with the additional amount of energy. With the shortage of energy problem resolved, Pakistan in the future will be an economic hub and will be able to create domestic jobs, and will provide an advanced infrastructure in Pakistan.²³

Furthermore, the completion of energy projects will support to eradicate poverty.²⁴ when 14 out of the 21 coal, gas, and solar energy schemes are accomplished, an extra 10,400 MW of energy will be provided. Economic progress will boost socioeconomic development and increase the living standard of the people.

- CPEC will also help to uplift the infrastructure in Pakistan that not only increases
 the per capita income but also elevate the standards of living, links remote areas
 with economic centers, and in this way will reduce progress gaps in the
 country.²⁵
- CPEC will possibly promote the tourism industry in Pakistan. Numerous tourist places are located along the CPEC way,²⁶ particularly Gilgit- Baltistan because of the famous peaks of Nanga Parbat and K2 which are the topmost climbable mountains inviting a large number of mountaineers every year.²⁷

Conclusion

This study underscores Pakistan's substantial potential in the realm of the blue economy. From the perspective of advancing this maritime-focused economy, the China-Pakistan Economic Corridor (CPEC) emerges as a pivotal avenue for Pakistan's benefit. As a prominent component of China's expansive Belt and Road Initiative, CPEC holds the promise of elevating Pakistan to an economic nucleus. This elevation is envisaged through the facilitation of regional investment from countries such as Afghanistan, Iran, Central Asian States, and India, thereby fostering enhanced economic affiliations with Pakistan. China's commitment to invest \$46 billion in the CPEC initiative is instrumental. This investment encompasses diverse sectors including solar, coal, gas, and hydropower projects, aimed at ameliorating Pakistan's energy crisis. Moreover, it also promotes the advancement of Gwadar Port, pivotal for regional connectivity, and the augmentation of infrastructure in historically underserved regions, notably Khyber Pakhtunkhwa (KPK) and Baluchistan. These efforts collectively contribute to the holistic development of Pakistan's economy, offering a promising trajectory of growth.

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