

AN ASSESSMENT OF ALTERNATIVE ROUTES FOR CHINA PAKISTAN ECONOMIC CORRIDOR AND BENEFITS TO PAKISTAN

UZMA TABASSUM

Ph.D Scholar

Staff Economist/ Lecturer

Applied Economics Research Centre (AERC)

uzma.tabasum@aerc.edu.pk

MUNAZAH NAZEER

Ph.D Scholar

Corresponding Author

Applied Economics Research Centre (AERC)

munza_83@gmail.com

ABSTRACT

China Pakistan Economic Corridor (CPEC) is viewed as a big push to economic development of Pakistan. CPEC is a long route passing probably from various backward areas of relatively less developed provinces of our country. Road connectivity, establishment of industries and concentration of economic activities in the concern regions will boost both production and trade, generate both employment and investment opportunities and facilitate regional and international trade. The expected routes for China Pakistan Economic Corridor (CPEC) are in discussion both in print and visual media since long. There are three alternative routes available, the eastern, central and the western one. This research aims to evaluate the effectiveness and feasibility of alternative routes and attempt to determine which route is more beneficial and feasible for Pakistan. For this analysis a comparison has made using available research and data from Pakistan Social and Living Standards Measurement (PSLM) survey. Given the link between human development and infrastructure this research evaluates the three routes in terms of economic, social and health indicators. The discussion, fact and figures presented in this research are mostly in favor of the western route.

1.1. INTRODUCTION:

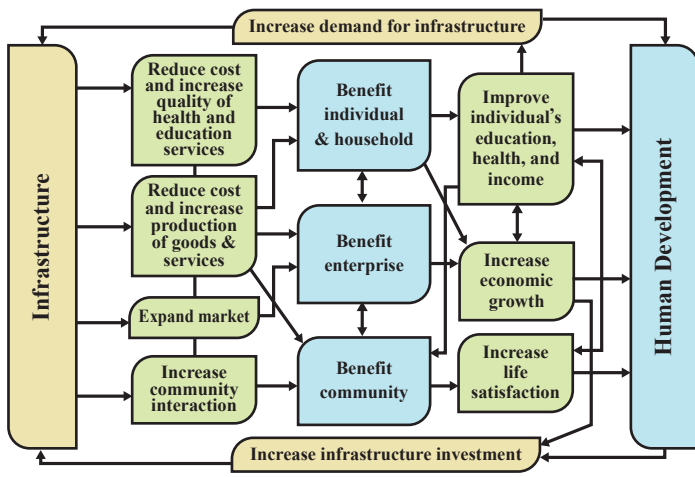
The primary role of transportation system is to provide linkages between spatially separated locations, for the industry and household sectors. These offer connections between industries and their input sources and their markets. For the households, it provides people way in to workplaces, education facilities and medical, social and recreational facilities (World Bank 1994). Thus improved transport technology and transport networks, through the effects on transport costs, accessibility and connectivity, have been major factors underpinning economic growth and opening up formerly isolated areas to people and economic activity. For economic development network is of great importance (Ministry of transport New Zealand, 2014; Owen,

1987). In this sense, the complete absence of a well-developed transport system acts as a serious constraint on growth.

Investment in human capital, through education and physical capital enhance productivities and output of nations. Transport can be seen to have noticeable role here, both explicitly through investment in transport infrastructure, vehicles, and logistics systems, increasing physical capital that increases accessibility to various regions and market for buyers and sellers. Improved infrastructure is associated with more production, trade, and spillover effects and eventually more productivity. Implicitly transportation system provides linkages between spatially separated locations that boost economic activities and pace of urbanization in these regions. There is firm consensus that the increased access to infrastructure services benefit individuals and communities. It benefits individuals and households through reducing cost and increasing quality of health and education services that further helps to improve education and health of an individual, which ultimately enhance the level of human development at local and national level. Consequently it generates changes in the socio-economic structure of these regions.

The link between infrastructure development and human development is presented in Figure-1. The direction of the flow of impact is shown from the arrow of lines; the lines with arrows at both ends indicate bi-directional effect. Infrastructure development in rural areas increase the individual welfare through improving farm and non-farm productivity that in turn raises the level of income and consumption, reduce the private cost and save time (UNICEF, 2008; Ezcurra et al. 2005; Ali and Pernia, 2004). Such effects clearly escort greater human development. Access to infrastructure not only provides direct benefits through reducing prices of manufacturing goods (Khandker et al, 2009) but also generates new opportunities indirectly; such as employment generation (Jacobs & Greaves, 2003), market expansion and integration (Bhattacharya, 2009; World Bank, 2004). A significant positive impact of infrastructure on health and education is also firmly established in the literature (Khandker et al. 2009; Levy 1996).

Figure 1: Access to infrastructure and human development



Source: Sapkota (2014)

China Pakistan Economic Corridor (CPEC) is viewed as a big push to economic development of Pakistan. CPEC is a long route passing probably from various backward areas of relatively less developed provinces of our country. Road connectivity, establishment of industries and concentration of economic activities in the concern regions will boost both production and trade, generate both employment and investment opportunities and facilitate regional and international trade. The benefits are not just confined in economic terms but in social terms as well. As a repercussion of CPEC, economic activity will start to grow across the regions on the belt. This urbanization process will change the socio-economic structure of these regions. The living standard in these regions is expected to improve accordingly and more urban regions will be transformed from the rural ground.

The expected routes for China Pakistan Economic Corridor (CPEC) are in discussion both in print and visual media since long. There are three alternative routes available, the eastern, central and the western one. The importance of the route is immense. This research aims to evaluate the effectiveness and feasibility of alternative routes and attempt to determine which route is more beneficial and feasible for Pakistan. For this analysis a comparison has made using available research and data from Pakistan Social and Living Standards Measurement (PSLM) survey. Given the link between human development and infrastructure this research evaluates the three routes in terms of economic, social and health indicators.

Precisely, this research is designed to analyse all of the three possible CPEC routes in term of their costs and benefits taking advantage of the existing research and available secondary data. Apart from presenting the existing published outcomes but also adds to the existing literature in two ways.

- o First, to compare the alternative routes this study evaluates the socio-economic indicators of the regions associated with these routes.
- o Second, for the regions along the preferred route, expected growth in these indicators were calculated using the growth of the same indicators in other urban areas of Punjab, the province experiencing relatively more infrastructure development in Pakistan.

The rest of this paper covers the beneficiaries of CPEC followed by the comparison of the three possible routes, conclusion and references at the end.

1.2. Beneficiaries of CPEC

China Pakistan Economic Corridor (CPEC) is critically important for both countries, China and Pakistan. Pakistan needs it to overcome its economic, development, social and energy problems. China needs it to expand its periphery of influence, consolidate its global presence and securing future supply routes of energy and trade goods, Ramay (2016).

The strategic location of CPEC is cortical, as it is located at the meeting point of Road Belt and Maritime Belt (Shah, 2015). It will provide opportunity to China to establish and strengthen its position in Indian Ocean. It will also help secure the energy route from Middle East and Africa, which is critical for China's future development.

Route of energy will also be shortened considerably (Bhattacharjee, 2015). It would also be easy and cost effective for China to reach the Middle East and North African Markets, among others.

About 22% of the total CPEC investment (46 billions) is dedicated to connect Kahgar city of Xinjiang (Province of China) to Gwadar, Pakistan through a road network of about 2000 km in length. This road route is of crucial importance and is one of the two necessary conditions of the corridor. The other is development of port at Gwadar. This surface transport connectivity will benefit China enormously by enhancing the usability of the Silk Route for trade and energy sourcing from Persian Gulf (BMA Capital, 2015). This also enables China to accelerate development and improve growth in Xinjiang province where a separatist movement is being faced. For China, CPEC would be a game changer as well to some extent as it would accelerate her trade and make China more cost effective by saving time as well as distance along the risk attached to them. The benefits in terms of distance and time are tabulated below.

Table 1: Expected Benefits to China in terms of Time and Distance

| CPEC & Expected Benefits to China | | |
|---|----------------------|--------------------|
| From Kashgar (4376 km away from Beijing) to the Persian Gulf | Distance (Km) | Time (Days) |
| Using CPEC Route | 2500 | 10 |
| Using Current Route | 13000 | 45 |
| Savings (Benefits) | 10500 | 35 |

Source: BMA Capital (2015)

On being more cost effective, Chinese products and services will be available at lower prices which mean more demand for them and as CPEC will open access to many regions through Indian Ocean, more trade as well. Other benefits to China, as mentioned by BMA Capital report include attractive financial returns, as all these projects are being offered on investment mode. Further, beneficiaries to CPEC would also include Chinese firms and labour as the machinery used in the infrastructure projects would be procured from China along with employing a larger number of Chinese labour on projects as well.

There is a Chesnee saying that if you want to be rich, you must first build roads, Hali et al (2015). One belt one road concept was developed by China, as part of its policy “Go Global 2001”. Pakistan is one of the beneficiaries of Chinese dream. The corridor is advantageous to both countries as it significantly shortens the length of the trade route from South West China to Middle East, Africa and Europe. A larger chunk of this investment is planned to be heavily concentrated in the energy (54%) followed by coal mining (20%) and road networks (13%). This would help Pakistan to combat with its energy crisis. As estimated by BMA Capital (2015) percentage increase in energy generation would be 90%.

Table 2: Expected Impact on Energy Generation

| Impact on Electricity Generation | |
|---|---------|
| Total Capacity Additions under Chinese Investment (MW) | 16,845 |
| Current Capacity (MW) | 22,812 |
| % Increase | 74% |
| Incremental Generation at 70% Utilization (GWh) | 103,294 |
| Current Generation (GWh) | 96,122 |
| Less: Generation on Inefficient plants (GWh) | 16,737 |
| Potential generation after completion of projects (GWh) | 182,678 |
| % increase | 90% |

Source: BMA Capital (2015)

Apart from energy generation, CPEC would bring prosperity in Pakistan for many reasons. Pakistan even after almost 70 years of independence could not establish sound connectivity across the country except in Punjab where the infrastructure is relatively much better. Balochistan is relatively the most backward province of Pakistan. The road connectivity between provinces is weak especially from Punjab and Sindh to Khyber Pakhtunkhwa (KPK) and Balochistan. In other words half of our country is somewhat disconnected from the other half. Concentration of economic activity in Balochistan and KPK is relative much lower and thus a wave of deprivation has emerged there that might be possible for insurgency especially in Balochistan along with other possible reasons. The CPEC route is determined to pass through Balochistan ending with the establishment of Gwadar port. Road connectivity, establishment of industries and concentration of economic activities in the concern regions will boost both production and trade, generate both employment and investment opportunities and facilitate regional and international trade. The benefits are not just confined in economic terms but in social terms as well. So as a repercussion of CPEC, economic activity will start to grow along the regions on the belt. This urbanization process will change the socio-economic structure of these regions. The living standard in these regions is expected to improve accordingly and more urban regions will be transformed from the rural ground. And if the alignment connects through KPK as well, both of these relatively deprived provinces would become a part of the overall economic activity and national growth. A major benefit of CPEC is establishment of an alternative sea port. Further our bond with China will become stronger facilitating us against our rival countries. Other beneficiaries of CPEC would be the countries who will be benefited by cheaper imports and trade benefits.

1.3. Comparison of Alternative Routes

The possible routes between any two points /places that are meant to be connected through a road can be compared from its construction point of view and from its socio-economic and political dimensions. Bengali (2015)'s work is the best available research on the alternative routes comparison. Bengali (2015) pointed out distance, cost and political economy as to be some of the very basic precepts before going into construction of a new road.

A road is worth constructing if it connects the desired two regions with the shortest possible distance, a transit passageway, or more preferably with the shortest feasible distance, an economic passageway. As CPEC is an economic corridor with an intention to boost economic activities along the route, it is an economic passageway rather than just a transit passage.

The cost of road construction varies with a number of things such as **Opportunity cost of land** which will be higher if the land required for road construction is being used for production and also cost loss in production as well, **Displacement cost** both social and monetary as in the above case it will be higher because productive land will relatively be more populated and both households and businesses there are to be compensated, Nature of terrain that is a higher cost will be required if extensive land levelling and construction of numerous tunnels, bridges etc. are required for road construction.

Pre-existence of part of the road will definitely save the construction cost for that part of the road but subject to the quality, width and other requirements of the existing road to match the one required for the new road, **Environmental and military consideration** may also influence the construction cost in case a diversion is required in the road alignment faced with the presence of a protected environment or a military area, **Security conditions** along the road alignment push the construction cost up by including an additional security provision cost during construction and afterwards for safe traffic flow if the area from where the road has to pass suffers from lawlessness and criminal or insurgent attacks.

Finally the political economy is also influential in deciding the road alignment because road increases connectivity among regions thus opens markets for trade (in case of CPEC both national and international) and increases access to health, education and socialization opportunities. Road bring benefits, which in case of CPEC are even larger expectedly, to those living in the area from where it pass through. This actually places the base for alternative route emergence as the benefits of this route fades away for or excludes the regions at a farther point from the route.

¹ *A transit passageway is one that qualifies for the shortest possible distance faced with the physical features on the way such as mountain or a water body etc without considering the economies of the areas in between the desired regions.*

² *An economic passageway is one that considers the economies of the areas in between the end points of the road as it aims to boost economic activity all along the route rather than just the end points.*

On comparison it was found that among the three possible routes western route is one with the shortest distance between Kashgar (China) and Gwadar (Pakistan) relatively. CPEC is meant to open economic opportunities for the region on the belt and preferably it is more beneficial if these opportunities are being introduced majorly in the rural areas. Unlike the alignment along the central and western route, more than half of the regions along the eastern route are already relatively developed. Also in terms of productivity and population density the eastern route is not preferred as it involves a higher land acquisition and dislocation cost in comparison with the other two routes. The terrain along the western and central route is hilly and arid requiring high land levelling costs in addition to a major bridge on river Indus between

Peshawar and Hasanabdal. While at the eastern route the area goes across a number of irrigation canals and thus requires construction of a number of bridges other than the one major bridge required on River Indus between Multan and Dera Ghazi Khan. There are pre-existing roads except for Gwadar to Ratodero (on central and eastern routes) and Gwadar to Khuzdar (on the western route) but the quality of the existing road is not of the quality to cater the expected heavy traffic and thus need to be re-laid. The alignment along the central and western route does not require a diversion on account of environmental or military grounds though the eastern route does as it passes through Margalla Hills (a national park) and thus a tunnel underneath is being considered. The security costs on the eastern route is however is relatively lower than the other two. As far as the political economy of the routes is concerned the central route alignment is such to pass through all the provinces and is more likely to be backed by broad political support. In contrast, the western one passes through two provinces of Pakistan while the eastern route completely by passes Khyber Pakhtunkhwa and may emerge as a new inter-provincial discord source.

Apart from comparing the three routes in terms of geographical location, Bengali (2015) also quantifies this comparison on the basis of average population density, area under cultivation and production of four major crops (wheat, rice sugar-cane and cotton). The results of this comparison are presented below.

Table 3: Economics of alternative routes

| Economies of Alternative Routes | | | |
|--|----------------------|----------------------|----------------------|
| Indicator | Central Route | Eastern Route | Western Route |
| Average population density | 156 | 264 | 98 |
| Total area under cultivation (000 ha) | 5,829 | 10,322 | 2,933 |
| Production of 4 major crops (000 tonnes) | 13,754 | 30,928 | 7,430 |

Source: Bengali (2015)

Higher population density reflects higher compensation for dislocation. Higher land acquisition and opportunity costs are associated to alignment with greater area under cultivation and higher production of major crops. The statistics presented above does not favour the eastern route and are clearly inclined towards the western route which has the lowest indicators.

Following the same three routes as defined by Bengali (2015) and using PSLM data, this research further compares the three routes using indicators for social development across the routes. The route relatively worse off as per social development indicators is considered more in need of development.

Figure 2: Alternative CPEC Road Routes



Source: Bengali (2015). 1= Central, 2= Eastern and 3= Western route.

³ **Western Route:** Gwadar - Turbat - Panjgur - Khuzdar - Kalat - Quetta - Zhob - Dera Ismail Khan -Bannu-Kohat - Peshawar - Hasanabdal and onwards to Khunjerab. **Central Route:** Gwadar - Turbat - Panjgur - Khuzdar - Ratodero - Kashmore - Rajanpur - Dera Ghazi Khan - Dera Ismail Khan - Bannu - Kohat - Peshawar - Hasanabdal and onwards. **Eastern Route:** Gwadar - Turbat - Panjgur - Khuzdar - Ratodero - Kashmore - Rajanpur - Dera Ghazi Khan - Multan - Faisalabad - Pindi Bhatian - Rawalpindi - Hasanabdal and onwards.

Six indicators of social development are used for this comparison namely population, literacy ratio, enrolment ratio, immunization ratio, proportion of sick or injured and years of schooling.

Table 4: Comparing Population on alternative routes

| Population | | | | |
|------------|---------|---------|---------|---------|
| Count | | | | |
| S. No. | Route | 2004-05 | 2010-11 | Average |
| 1 | Western | 608386 | 689319 | 648852 |
| 2 | Central | 877664 | 926558 | 902111 |
| 3 | Eastern | 1631613 | 1741774 | 1686694 |

Source: Author's calculations using PSLM

Concentration of population itself signals the existence of an on going economic activity. Usually greater population concentration is associated relatively developed regions. It would be more beneficial if the investment is made to boost economic activity in relatively less developed region. Population along the western route is lowest among other as per both the average and the year specific figures. Central route stood in the middle while population along the eastern rout is highest.

Table 5: Comparing Adult Literacy Ratio on alternative routes

| Adult Literacy Ratio | | | | |
|-----------------------------|--------------|----------------|----------------|----------------|
| 15 years and above | | | | |
| S. No. | Route | 2004-05 | 2010-11 | Average |
| 1 | Western | 0.40 | 0.45 | 0.43 |
| 2 | Central | 0.39 | 0.43 | 0.41 |
| 3 | Eastern | 0.43 | 0.48 | 0.46 |

Source: Author's calculations using PSLM

The next indicator is adult literacy ratio selected as a reflective of education along the routes. This variable was estimated using its standard definition that is the proportion of individuals aged 15 and above who can read and write with understanding. On comparing the three routes it was found that the central route is the one with the least proportion of adult literates followed by the western and eastern route respectively.

Given the narrow definition of literacy two more indicators were analyzed before jumping to any conclusion on the basis of education conditions along the routes. Hence proportion of individuals aged 4 and above who were enrolled and average years of schooling were estimated for the region on the route belts.

Table 6: Comparing Enrolment Ratio on alternative routes

| Enrolment Ratio | | | | |
|--------------------------|--------------|----------------|----------------|----------------|
| 4 years and above | | | | |
| S. No. | Route | 2004-05 | 2010-11 | Average |
| 1 | Western | 0.23 | 0.28 | 0.26 |
| 2 | Central | 0.24 | 0.30 | 0.27 |
| 3 | Eastern | 0.25 | 0.31 | 0.28 |

Source: Author's calculations using PSLM

Proportion of enrolment was found to be highest on the eastern route and least on the western one. As far as average years of schooling is concerned the outcome was actually indifferent to prefer either of the three routes as per year specific results though on average the results are only indifferent between western and central route.

Table 7: Comparing Average Years of Schooling on alternative routes

| Average Years of Schooling | | | | |
|-----------------------------------|--------------|----------------|----------------|----------------|
| S. No. | Route | 2004-05 | 2010-11 | Average |
| 1 | Western | 5 | 6 | 5 |
| 2 | Central | 5 | 6 | 5 |
| 3 | Eastern | 5 | 6 | 6 |

Source: Author's calculations using PSLM

Deteriorated health conditions are indicative of low social development. The next two indicators meant to analyze the health conditions along the possible routes. The two health indicators are proportion of children under five years of age being immunized and the proportion of individuals who got sick or injured. The next two tables present the results of these two variable for the three routes.

On average child immunization ratio was highest on the eastern route and lowest on the western route though in 2010-11 it was highest on the central one but for the western route it remained the least for both year specific and average figures.

Table 8: Comparing Child Immunization Ratio on alternative routes

| Child Immunization Ratio | | | | |
|---------------------------------|--------------|----------------|----------------|----------------|
| Children under 5 years | | | | |
| S. No. | Route | 2004-05 | 2010-11 | Average |
| 1 | Western | 0.73 | 0.93 | 0.84 |
| 2 | Central | 0.75 | 0.94 | 0.85 |
| 3 | Eastern | 0.80 | 0.93 | 0.86 |

Source: Author's calculations using PSLM

Greater proportion of sick /injured persons resembles poor provision of health facilities such as clean drinkable water, waste and sanitation management. The results for this indicator suggest that the central route suffers relatively more in this regard. But on a deeper look, it was observed that the decline in the value of this indicator from 2004-05 to 2010-11 was much lower on the western route indicating that the improvements in health on the western route was much slower than the alternative ones.

Table 9: Comparing Proportion of Sick and Injured on alternative routes

| Proportion of Sick and Injured | | | | |
|---------------------------------------|--------------|----------------|----------------|----------------|
| S. No. | Route | 2004-05 | 2010-11 | Average |
| 1 | Western | 0.076 | 0.073 | 0.075 |
| 2 | Central | 0.086 | 0.074 | 0.080 |
| 3 | Eastern | 0.078 | 0.067 | 0.072 |

Source: Author's calculations using PSLM

The discussion so far was found to be inclined relatively more towards preferring the western alignment for the China Pakistan Economic Corridor. Out of the six indicators used by this research, four were in favor of the western route, one being indifferent that was average years of schooling and the last one (literacy ratio) was favoring the central route. Most of the indicators analyzed were in favor of the western route as per both the analysis conducted on social grounds by this research and the geographical and quantitative analysis performed by Bengali (2015).

Expected Improvement in Social Indicators along the Western Route

Infrastructure development and improvement in social indicators are directly proportional to one another. With improved connectivity access to and provision of socio-economic opportunities are expected to rise as well. Concentration of economic activities begins to prosper gradually where the roads are constructed. Road connectivity leads to establishment of industries in the concern regions which in turn boost both production and trade, generate both employment and investment opportunities and facilitate regional and international trade. Thus roads lead the region on urbanization path. Usually region along the roads emerge initially as small town or urban areas and gradually gets more developed and urbanized with time. In Pakistan, investment in infrastructure is relatively much higher in Punjab. Hence the repercussions of improved infrastructure are also visible there as well. Punjab is the most developed province of Pakistan with relatively better education, health and connectivity. Hence the impact of infrastructure development on improving social indicators can be traced through growth in these indicators in Punjab.

For estimating expected improvements on account of infrastructure development along the western route on social indicators used in this research, the average growth in the same indicators was calculated for the urban areas of Punjab other than the major cities there. Major cities and other urban areas in Punjab were identified using PSLM survey data. Finally this growth was then applied on the social development indicators analyzed earlier on the western route. The results of these estimations were tabulated below in table 10.

Table 10: Expected Improvement in Indicators on the Western Route

| Economies of Alternative Routes | | | | | | |
|---|-------------------|-----------------------------|------------------------|---------------------------------|---------------------------------------|-----------------------------------|
| Indicators | Population | Adult Literacy Ratio | Enrolment Ratio | Child Immunization Ratio | Proportion of Sick and Injured | Average Years of Schooling |
| 2010-11 Values | 689319 | 0.45 | 0.276 | 0.933 | 0.073 | 6 |
| Growth Rate in Other Urban Areas of Punjab (2004-05 to 2010-11) | 16.91 | 19.46 | 3.48 | 6.14 | -4.34 | 16.67 |
| Indicator Increased by | 116568 | 0.09 | 0.010 | 0.057 | -0.003 | -0.003 |
| Expected Growth in 2019-20 | 805887 | 0.54 | 0.286 | 0.990 | 0.070 | 7 |

Source: Author's calculations using PSLM

The outcome of the results presented in the above table revealed that all the indicators considered by this research reflecting social development for the regions along the western route are expected to improve by 2019-20. Urbanization along the western route is expected to grow by 17% reaching a population of 805887 in 1019-20. Around 54% of population on the western belt would become literate by 2019-20. 2010-11 value of enrolment ratio, on average, along the western belt would rise by 0.010 units. Years of schooling in the regions on the western route would reach an average of 7 years. Immunization will be improved as well. The proportion of sick and injured would decline by 4.34% reflecting expected better health facilities along the belt.

Conclusion and Recommendation

Road connectivity is crucial for economic activity and trade to prosper. Road boost concentration of economic activities in the concern region, establish connectivity, benefit trade and increases accessibility to health, education and other economic opportunities. CPEC not only open up regional road connectivity but also sea connectivity though Gawadar port for both China and Pakistan. Road connectivity increases accessibility to various regions and market for buyers and sellers. Improved infrastructure is associated with greater level of production, trade, and spill-over effects and eventually greater productivity. However, the route it would adopt was somewhat controversial.

The discussion, fact and figures presented in this research are mostly in favor of the western route. The eastern route clearly losses its preference because of many reasons. Such as it is relatively longer, relatively more loss of productive land on account of greater area under cultivation along eastern alignment, more bridges are to be constructed etc. In fact eastern alignment is least preferred on environmental, geographic, economic and social grounds. Further the eastern route already contains three districts holding a major city as defined by PSLM namely Rawalpindi, Faisalabad and Multan. Thus, it is already more developed among the possible routes. However, the western route is more likely to be preferred on the same grounds as most of the indicators were in favor of this route.

In Pakistan, the road connectivity between provinces is weak especially from Punjab and Sindh to Khyber Pakhtunkhwa (KPK) and Balochistan. In other words half of our country is somewhat disconnected from the other half. Concentration of economic activity in Balochistan and KPK is relative much lower and thus a wave of deprivation has emerged there that might be possible for insurgency especially in Balochistan along with other possible reasons. The CPEC route is determined to pass through Balochistan ending with the establishment of Gwadar port. The benefits of CPEC are not just confined in economic terms but in social terms as well. So as a repercussion of CPEC, economic activity will start to grow along the regions on the belt. This urbanization process will change the socio-economic structure of these regions. The living standard in these regions is expected to improve accordingly and more urban regions will be transformed from the rural ground. In addition, if the alignment connects through KPK as well, both of these relatively deprived provinces would become a part of the overall economic activity and national growth. A major benefit of CPEC is establishment of an alternative sea port. Further our bond with China will become stronger and it would facilitate us against our rival countries.

Pakistan should remain focused on development of the country and make sure that provincialism should not be given the chance to hijack the development agenda by any stakeholder, including the federal government. To fully exploit the gains from CPEC, Pakistan should act rationally and selection on the route alignment should be made keeping cost effectiveness and far reaching benefits in view. CPEC provide a chance for Pakistan to re-uniting the provinces and for this Pakistan should also invest to establish connectivity to CPEC route from other provinces. Bengali (2015) suggested two such road connection one between Dera Ismail Khan-Sarghoda-Lahore to connect with the Lahore-Karachi Motorway as an attempt to establish connectivity

from KPK to Punjab and Sindh. Likewise, the other was between Khuzdar-Ratodero-Sukkur to connect with the Lahore-Karachi Motorway as an attempt to establish connectivity from Balochistan to Sindh and Punjab. As a result all provinces will get connected with one another.

Further Pakistan should pay due attention towards its strategic and geographic importance and act accordingly to reap the fruits of CPEC both in short run and in long run. Transparencies should be ensured at each level. Institutions like Council for Common Interest should be taken on board for resolving controversies attached to CPEC and its projects and most importantly, understanding Chinese needs as a investor of the project should be given due priority.

References

1. Ali, I. and Pernia, E. (2004). "Infrastructure and Poverty Reduction. What is the Connection?" ERD Policy Brief Series, Economics and Research Department Number 13, Asian Development Bank.
2. Bhattacharyay, B. N. (2009). "Demands for Infrastructure. In Bhattacharyay B. N., Kawai, M. and Rajat M. N. (Eds.) Infrastructure for Asian Connectivity Massachusetts: Edward Elgar Publishing, Inc.
3. Bengali, K. (2015) "China-Pakistan Economic Corridor and Route Controversy". [Online] Chief Minister Policy Reform Unit, Government of Balochistan. Available at: <http://cmpru.gob.pk/reports/CPEC.pdf>
4. Bhattacharjee, D. (2015) "China Pakistan Economic Corridor". SSRN Electronic Journal
5. BMA Capital (2015) "impact of China Pak Economic Corridor- A Bird's Eye View" short report of BMA Capital. www.bmacapital.com.
6. Ezcurra, R. et al (2005). "Public Capital, Regional Productivity and Spatial Spillovers." *The Annals of Regional Science* 39 (3): 471–94
7. Hali et al (2015) "One Belt and One Road on China–Pakistan Economic Corridor". [Online] available at http://issi.org.pk/wpcontent/uploads/2015/12/Shafei_Moiz_and_Tan_and_Sumera_3435_SS_41_20142015.
8. Jacobs, G. D., & Greaves, N. (2003). Transport in developing and emerging nations. *Transport Reviews*, 23(2), 133-138.
9. Khandker, S.R.; Bakht, Z. and G. B. Koolwal (2009). "The Poverty Impact of Rural Roads: Evidence from Bangladesh, "Economic Development and Cultural Change, 57, 685–722
10. Levy, H. (1996). "Morocco: Socioeconomic Influence of Rural Roads". Impact Evaluation Report, Operations Evaluation Department. Washington, DC: World Bank.

11. Ministry of Transport New Zealand Government (2014). “Contribution of transport to economic development: International literature review with New Zealand perspectives”. [Online] Available at: <http://www.transport.govt.nz/assets/Uploads/Our-Work/Documents/edt-contribution-of-transport-lit-review.pdf>
12. Owen, G. (1987). Deformation processes in unconsolidated sands. Geological Society, London, Special Publications, 29(1), 11-24.
13. Owen, W. (1987). Transportation and World Development. Baltimore: John Hopkins University Press.
14. Ramay, S. A. (2016) “ CPEC: A Chinese Dream Being Materialized Through Pakistan” [Online] available at [https://sdpi.org/publications/files/China - Pakstan - Economic - Corridor - \(Shakeel - Ahmad - Ramay\).pdf](https://sdpi.org/publications/files/China - Pakstan - Economic - Corridor - (Shakeel - Ahmad - Ramay).pdf)
15. Sapkota, J. B. (2014). Access to infrastructure and human development: Cross-country evidence. Perspectives on the Post-2015 Development Agenda. Tokyo: JICA Research Institute.
16. Shah, S. (2015) ‘China’s Xi Jinping Launches Investment Deal in Pakistan’, The Wall Street Journal, [Online]. Available at: <http://www.wsj.com/articles/chinas-xi-jinping-set-to-launch-investment-deal-in-pakistan-1429533767>.
17. World Bank (1994). “Infrastructure for Development. World Development Report: Oxford University Press.
18. World Bank. (2004). World Development Report: Making Services Work for the Poor. New York: Oxford University Press.
19. WHO and UNICEF. 2008. “A Snapshot of Drinking Water and Sanitation in Africa. WHO/UNICEF Joint Monitoring Programme for Water Supply and Sanitation.” Prepared for AMCOM as a contribution to the 11th Summit of Heads of State and Government of the African Union with special theme: “Meeting the Millennium Development Goal on Water and Sanitation.” June 30 to July 1, 2008.