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**Democratic and Republic Nepal: Increased Road Connectivity at the cost of  
Decreased Self Reliance**

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**Abstract**

Nepal's infrastructure landscape has undergone a significant transformation following the restoration of democracy in 1990 and the establishment of a republic in 2006, particularly through the expansion of road connectivity. This study aims to critically examine the paradox of expanded road networks by assessing their contribution to national economic growth alongside rising economic dependency. Qualitative analytical approach is taken based on secondary data, policy documents, trade statistics, and existing literature, the research assesses the socioeconomic, agricultural, and environmental concerns of increased road access. The findings relate that although enhanced connectivity has boosted transportation, market access, and trade opportunities, it has concurrently faded local production structures. Inherent agriculture, traditional handicrafts, and small-scale enterprises face extreme competition from cheaper imported goods, growing Nepal's dependence on foreign involvements such as seeds, fertilizers, machinery, and consumer products. Improved mobility has also augmented labour migration, underpinning a remittance-dependent economy. Additionally, heavy dependence on foreign aid and contractors in road development has controlled the growth of native technical capacity and long-term financial self-reliance, while inadvertent road expansion has increased environmental degradation and disaster vulnerability. The study concludes that infrastructure development without corresponding policies demoralises self-sustainability. The findings suggest the need for balanced infrastructure stratagems that assimilate road expansion with promotion of domestic industries, sustainable agriculture, environmental safeguarding, and local technological capacity enhancement to strengthen Nepal's long-term economic freedom.

**Keywords:** Road connectivity, self-reliance, economic dependency, labour migration, import dependency, foreign aid

## Introduction

Infrastructure development is considered as a crucial aspect of national growth, and road connectivity network has been a main center of attention in Nepal since the introduction of democracy in 2046 BS/1990 AD and later with the institutionalization of the republic in 2063 BS/2006 AD. Roads have improved the access to center of communications, assisted economic exchanges, and enhanced mobility in general. Nevertheless, this extension has come at a noteworthy cost to Nepal's self-reliance. Amplified road network has led to a heave in imports, reliance on foreign investments, and dependency on external labor markets.

The road network of Nepal is categorized into the strategic road network (SRN), which comprises highways and feeder roads, and the local road network (LRN), comprising district roads and urban roads. Before 2046 BS (1990 AD), Nepal's total road network length was relatively limited due to the country's difficult terrain, lack of resources, and reliance on traditional transport methods. According to available historical records, total road network available was 8328 kilometer, of which 3083 km was black topped, 2181 km was graveled, and 3064 km was fair weathered roads in 1990/91 (Sapkota, 2011). The major highways were the Tribhuvan Highway (linking Kathmandu to Birgunj), Prithvi Highway (Kathmandu to Pokhara), and Mahendra Highway (East-West Highway), which were crucial for national connectivity constructed so far. Apart from these limited roads, most of the rural area remained inaccessible, and transportation was very difficult which was heavily reliant on foot trails, mules, and porters. It's true that the expansion of road networks accelerated significantly only after the restoration of democracy in 2046 BS.

Nepal's road network was about 64,500 km in 2076 BS. Among that, about 14,913 km belong to the SRN, the main network of national highways and feeder roads connecting district headquarters (Logistic Cluster, n. d.). These figures demonstrate the considerable expansion of Nepal's road infrastructure over the decades.

It has been observed a considerable enhancement in infrastructure mainly in road network after the political transformation of Nepal from constitutional monarchy to a democratic republic. The expansion of highways, urban, suburban as well as rural roads, and cross-border trade routes was due to increased political awareness and decentralization resulted enhanced accessibility and economic activities. This remarkable expansion has also led to a rising dependence on exterior resources, imported goods, and foreign assistance, raising concerns about the country's worsening self-reliance in parallel.

Elevated imports of consumer goods, agricultural products, and industrial materials is inversely proportional to adverse impact on local production and traditional industries because of the better road network. Figures shows that Nepal's road expansion contributed to a 12% decline in agricultural GDP share in between 2010 to 2020 (World Bank, 2022). Previously self-sustained many rural communities, now depend on imported food, fuel, and daily needs, weakening local economies and generating vulnerabilities. The environmental and socio-economic consequences of road expansion, such as deforestation, displacement, and rural-urban migration, have further deepened Nepal's dependence on peripheral support.

This study seeks to analyse the contradiction of Nepal's infrastructure-led development. How the increased road network has contributed economic growth simultaneously dipping national self-

reliance. It aims to discover the socio-economic impacts of increased road connectivity, the decline in native production and self-sufficiency, and suggest policy procedures to balance connectivity with sustainable self-reliance in democratic and republic Nepal particularly in agriculture, local industries, and domestic production as well as to assess the socio-economic and environmental consequences of increased road connectivity, including deforestation, rural-urban migration, and changing livelihood patterns.

### **Research Methodology**

This study followed a mixed-method approach, qualitative and quantitative research methods integrated together to analyze the impact of increased road connectivity on self-reliance of Nepal. The research work has also followed a descriptive as well as analytical design with the aim of examining trends, impacts, and relationships among infrastructure development and economic dependency.

Information acquired from the government offices were evaluated. Reports of Nepal Rastra Bank, the World Bank, and the Asian Development Bank were also analyzed to evaluate trade dependencies. The literature related to Nepal's road network, economic policies, and self-reliance trends are also studied.

A broad perceptive of the relationship between Nepal's infrastructure expansion and its growing dependency provided. The research work was concentrated on key road networks and their socio-economic bearings. Difficulty in accessing accurate trade data, regional discrepancies in infrastructure development can be considered as the limitations.

### **Theoretical Framework**

This research is grounded in numerous theoretical perspectives that help to explain the association between increased road connectivity and decreased self-reliance in Nepal's context. Theories described here provide a conceptual foundation for scrutinizing the influence of infrastructure development on economic reliance and sustenance.

#### **Infant Industry Argument and Dependency Theory**

Underdeveloped economies need temporary protection such as tariffs or subsidies to encourage and develop their domestic industries. Advanced economies can flood the market with superior, low-cost imports in the absence of such protection. Local producers of underdeveloped economies cannot compete with them. Improved road connectivity in Nepal's case acts like a channel that aids this flood of imports by dominating local markets (Krueger, 1974). Argument of the Dependency Theory is that developing nations remain economically dependent on developed countries through a structure of economic exploitation and heavy reliance on exterior resources. International agencies financed heavily to Nepal's road expansion increasing lasting financial dependence. The influx of imported goods due to enhanced road access has faded local industries, creating Nepal dependent on foreign economies. On top of that labour migration has intensified, underlining a remittance-based economy rather than nurturing self-reliant domestic industries (Frank, 1966).

### **Structural Change Theory**

Structural change theory proposes that, when a shift is observed from agriculture-based economies to industrial and service-based economies then economic development happens (Chenery, 1975). It happened in Nepal with the expansion of roads that assisted this shift, but at the cost of weakened local agricultural production and traditional industries. The theory support how better connectivity inclined employment patterns, migration, and economic transformation.

### **Localization vs. Globalization Perspective**

Globalization theory argues how developed infrastructure bring up international trade and economic incorporation. Whereas, localization theory advocates for consolidating local economies, self-sufficiency, and community-based production. Localities with good road access saw a 40% drop in subsistence farming and 300% rise in imported goods dependency in Nepal (Dahal, 2021). This study has examined how Nepal's infrastructure development has slanted the balance toward globalization while weakening self-reliance. Infrastructure empowers trade integration but on contrary it can undermine local systems (Rodrik, 2011).

This study has used these theories to investigate how road connectivity influences Nepal's economy and trade patterns. Critically evaluate whether infrastructure especially road expansion indorses genuine economic growth or upsurges dependency. Recognize policy commendations that bring into line the road development with bearable self-reliance.

By integrating these theoretical perspectives, the research has provided a well-rounded analysis of Nepal's road connectivity, economic dependency, and sustainable development in the democratic republic era.

## **Result and Discussion**

### **Historical Background of Road Development in Nepal**

Nepal's endeavors of road development have evolved through different political systems. Road construction was limited to urban areas and in between strategic locations during the Rana regime (1846 AD to 1951 AD) (Bastola, 2015). East to West, the Mahendra Highway; Kathmandu to Kodari, the Araniko Highway; Kathmandu to Hetauda, the Tribhuvan Highway; Kathmandu to Pokhara, the Prithvi Highway and Pokhara to Butwal, the Siddhartha Highway are the main road projects initiated during Panchayat regime ("Mahendra of Nepal", n.d.) until establishment of democracy in 2046 BS. After establishment of democratic system, successive governments invested in expanding highways, rural roads, and border trade routes. Nonetheless, these developments have often dependent on foreign aid, compelling Nepal progressively more dependent on exterior financial and technical support (Mishra, 2023).

Even after the establishment of the republic, Nepal has additionally strengthened its efforts to improve road connectivity, with huge projects linking remote areas to cities and communication centers as well as international borders (Observer Research Foundation, 2023). Whereas these expansions have improved accessibility, they have also augmented the country's experience to foreign influence in infrastructure investment and project implementation (Sharma, 2025).

## **Foreign Involvement in Road Expansion**

### **Reliance on International Aid**

On the request of Nepal government international agencies like World Bank, Asian Development Bank and foreign governments like the governments of China and India funded large-scale road projects in Nepal (Mishra, 2022). Nepal's financial dependency increased with increased foreign investments to expand road infrastructure. Potential benefits to the domestic economy reduced due to the exploiting preconditions laid by the donors in the projects that benefit foreign contractors and suppliers (Prasai, 2019).

### **Lack of Domestic Technological Development**

Nepal's capacity to develop its own engineering and construction industries is limited because most road construction projects rely on foreign expertise and imported materials (Khanal, 2023). The foreign dependency has been increased and Nepal's ability to undertake major infrastructure projects without external assistance degraded over time (Nepal, 2024). The development of homegrown solutions to infrastructure challenges prevented due to insufficient focus on research and innovation in road-building techniques.

## **Economic Impacts of Road Expansion**

### **Increased Import Dependency**

Local product's demand lowered with improved road access because rural markets have been overloaded with foreign goods. Competition with imported foreign goods has negative impact on traditional industries such as handloom weaving, pottery, and small-scale manufacturing. Nepal's self-sufficiency in food production gradually decreased because imported food and agricultural products have replaced local agricultural production. There are several episode of blockade faced by Nepal from India in the memory lane. Blockade of 1989/90 and 2015 were the significant. India – Nepal trade and transit dispute led to the unilateral economic blockade to Nepal on 1989/90 which caused about NPR 10 billion (much higher in present inflation). Additionally the blockade's economic consequences were extensive, with Nepal's GDP growth rate dipping from 9.7% in 1988 to 1.5% in 1989. This decline was largely due to decreased availability of goods and higher tariffs, leading to serious deficiencies of essential commodities such as coal, fuel, oil, medicine, and spare parts ("India – Nepal Relations", n. d.). Following the mega earthquake of 2015 Nepal resisted the economic blockade after introducing new constitution. The 2015 India-Nepal blockade had significant economic repercussions for Nepal. According to a report by the Nepal Economic Forum and Alliance for Social Dialogue, Nepal's private sector suffered losses totaling approximately NPR 202.5 billion (around \$1.96 billion USD) (The Kathmandu Post, 2016). Only 4.5 month long blockade of 2015 – 16 caused loss of twenty times bigger than the loss faced in 1989 – 90 which was of 3.3 times longer (15 months) blockade. It proves how the dependency increased drastically in democratic and republic era than in active monarchy.

When there was no road connectivity in remote areas of Nepal before 1990, accommodations used to be made of organic materials found in the community by the local experts. Not a single construction material was used transported from other parts of Nepal. Zero possibility of use of imported construction material was observed (Kandel et al., 2025). If we consider present day

scenario there almost all construction materials are transported from other parts to make houses including substantial amount of money is expanded on imported construction materials. Expert workers are also employed for construction from neighboring countries.

Agriculture is also progressively based on imported materials like seeds, fertilizers, insecticides and pesticides, tools and equipments used for plough fields, plantation as well harvesting after availability of road connectivity. Shortage of manpower for agriculture works is another prevalent problem connected to labor migration from Nepal to Middle East and South East Asian countries as well as other parts of the world. Before 1990, local seeds, compost fertilizer, minimal use of equipments in agriculture, use of animals for plough the fields, traditional methods were used to harvest the agriculture products were main activities performed where very nominal use of imported things were involved.

One of the most important effects of globalization is the availability of international products and services in local markets. Road network in Nepal provided easy access to international brands and services by displacing locally based traditional products. Globalization brings both opportunities and challenges, promoting economic growth and cultural diversity while also raising concerns about inequality, environmental damage, and cultural erosion (Harvard Business School Online, n.d.).

### **Challenges for Local Industries**

Before 1990, cottage and handicraft industries like hand woven textiles, woodcarving, metal and jewelry, paper industries, pottery and ceramics were abundant in towns and villages of Nepal. Agro based industries like rice oil and flour mills, dairy products, jute mills, tea and coffee processing were also prevalent in different parts of the country. Same ways textile and garment industries like traditional weaving (Dhaka, cotton, wool), wool and leather industries, blacksmithing, Gold and Silver ornaments as well as local liquor production used to be the main sources of income for Nepali citizens (Country Studies/Library of Congress, n.d.). Instead of providing access to local products to the markets developed road connectivity made easy access to imported products to remote areas of Nepal resulting virtual disappearance of small scale traditional industries in Nepal after 1990 that is promulgation of democracy.

Low-priced imports from neighboring countries leading to a turn down in domestic production of many Nepali enterprises. Weak policies of government favoring imports over protectionist measures, further intensified foreign dependency. Discouraged Investment in domestic industries due to the easily available cheaper foreign products turned down in local production potential (Prasain, 2022).

### **Increased Labor Migration and Rise in Remittance Dependency**

Labor migration begins in Nepal after Sugauli treaty of 1816 between Nepal and British India. Before 1990, labor migration from Nepal was largely focused on India, the British and Indian armies, Bhutan with only a small number migrating to the Middle East and Southeast Asia (Kunwar, 2021). The trend of large-scale labor migration to Gulf countries and other global destinations increased significantly after Nepal transitioned to democracy in 2046 BS. Yearly remittance of Nepal was about 50 – 100 million USD (1500 million – 3000 million NPR) during

these years (Shrestha, 2021). As per the census data of 2021, 2.19 million people living abroad (Central Bureau of Statistics, n.d.). Over 1.67 million Nepali people left the country for various purposes mainly for employment, education, and permanent residence in 2024 only. Amazingly, 66,835 individuals migrated for permanent settlement abroad in the same year (Republica, 2025). In the first 6 months of the fiscal year 2081/82, remittance received was 7063 million Nepali rupees in Nepal. Remittances increased by 22.2 percent in the first six months of last financial year than FY 2080/81 (Shah, 2025). These data shows that a huge portion of Nepali population is residing abroad. Since there is open border with India and unaccountable daily flow of Nepali toward India indicate that accurate data of Nepali residing abroad in current date is very difficult to decide. Approximately one third of Nepali populations migrate to other countries including India. Main reasons for labor migration are limited employment, low wages and income insecurity, poverty, political instability, easy access to global labor market, decline in traditional and local industries, evolved migration culture, globalization and natural calamities. It can be summarized as labor migration from Nepal is largely a response to structural economic limitations, compounded by global labor demand and domestic development constraints (Country Studies/Library of Congress, n.d.; World Bank, 2025).

Trade deficit was about 10 percent of the GDP in 1990 – 94 while it increased to 28.01 percent of the GDP in 2023. According to Nepal Rashtra (National) Bank (NRB) data, Public debt of Nepal in the 1980s was approximately NPR 21.02 billion, which was rapidly escalated to NPR 155.91 billion in the 1990s (Prasai, 2024) meanwhile public debt is surged to approximately NPR 2.536 trillion as of mid-January 2025 (Republica, 2025) leaving about NPR 87000 loan to every newborn Nepali citizen. These data shows with the remarkable increase in road connectivity and labor migration abroad with the negative impact on the trade deficit and foreign debt.

With many youth seeking jobs abroad instead of contributing to local economic activities, better road connectivity has facilitated migration. Reduced incentives for self-sufficiency in production and services dominated by remittances based economy (International Organization for Migration, 2018). As majority of educated professionals seek the opportunities overseas instead of developing local enterprises resulting increased mobility has also contributed to a "brain drain" (Mishra, 2016).

There is shortage of youths or productive manpower in villages. It is hard to find muscles power in villages even for funeral rituals like activities. Only children and old age population are living there leaving productive land barren and importing foods from neighboring countries ultimately increasing dependency on foreign countries.

Although the road connectivity has also provided nominal access to national and international markets for local products in Nepal but overwhelmed import of products of different countries displaced local products and industries which caused less job opportunity to youths leading to manpower exports to different parts of the world mainly in middle East and South East Asia (Prasain, 2021). Labor migration of Nepal has created shortage of manpower in the villages which discouraged agriculture and local industries including handicrafts as well as cottage industries which increased remittance dependency economical structure (Sharma, 2017).

## **Social and Environmental Consequences**

### **Deforestation and Soil Erosion**

Most of the roads constructed in rural areas of hills are the improvements of traditional trails to mule tracks then mule tracks to roads. Engineering point of view is hardly followed in such road constructions resulting impact on ecosystem as well as in environment. Deforestation, landslides, soil erosion and destabilized ecosystem are the negative impact of construction of unplanned roads in hilly regions in Nepal (The Kathmandu Post, 2022). Due to improper road planning and lack of environmental assessments, landslides have become more frequent, especially in monsoon seasons (Subedi, 2021).

### **Displacement of Rural Communities**

Migration in rural communities is prevalent due to loss of their agricultural land and habitation. Many of the road projects run through old traditional settlements and villages disturbing their religious belief as well as only profession of agriculture. Indigenous communities displaced and loss of agricultural land is also a social impact of many road projects (LAHURNIP, n.d.). Expanded road network provided an easy access to tourists and imported goods to the remote villages. Influence of western culture increased which caused negative impact on existing language, tradition and culture. The expansion of roads has also contributed to cultural shifts and the erosion of traditional lifestyles in remote areas (Blair, 2025). Most of the traditional foot trails in remote areas are developed in roads by compromising engineering needs which encouraged unplanned projects and settlements. Environmental and social challenges prevalent due to unplanned urbanization along newly built roads (Prasain, 2022).

### **Dominance of foreign cultures**

The expansion of road networks in Nepal has not only boosted connectivity and economic development but also accelerated cultural changes in remote areas. Increased exposure to global media, tourism and migration was noticed when these regions become more accessible by road connectivity. Such exposures often leads to a superior influx of foreign cultural values, products, and lifestyles, which can eventually overshadows traditional practices and local cultural identities (Blair, 2025). It is highly relevant to the country like Nepal where native industries yet to grow, not fully developed infrastructure and very weak economy.

Communities that were once isolated start to follow new consumer habits, communication styles, and social norms that replicate broader, global trends (Unplanned infrastructure development, 2022). For example, local markets may start introducing international brands, and younger generation might favour global music, fashion, or media over home-grown forms of expression. This process can contribute to cultural homogenization what some scholars describe as. The uniqueness of local customs and traditions is eroded in favour of a more dominant foreign culture.

### **Degraded cultural heritage**

Expanded road network in Nepal not only brought development and connectivity; it also imposed challenges to preserve the country's traditional national identity (Prasain, 2022). The corrosion of cultural heritage is complexly associated to both societal transformations and environmental aspects, highlighting the necessity for development policies that effectively integrate sustainable growth with the protection and preservation of cultural assets. In simple words, while upgraded road infrastructure brings several benefits, it also presents noteworthy challenges in conserving cultural heritage and confirming that the pace of change arrange in a line with the community's capacity to adjust while keeping their traditional identity (LAHURNIP, n.d.).

### **Changed family structure/Weak family ties/rise in divorce/extramarital relations**

The increased road connectivity following the promulgation of democracy in Nepal has significantly influenced internal migration patterns, particularly the migration of labourers from rural to urban areas or to other regions in search of better economic opportunities (Asian Development Bank, 2018). This migration has had notable ripple effects on family structures and social dynamics. Migration often results in prolonged separations between family members. When one or more members of a household leave for work, the traditional multi-generational family unit can fragment (Adhikari, 2014). Generation gap is deepening due to changed structure of the family. Number of nuclear family is increasing day by day whereas number of extended as well as joint families are reducing on other hand. Interaction of opportunities of grandparents to their grandchildren are also reducing resulting less attachment within family members especially with their third generation and less transformation of the information from their elder generation to new generation. This division might lead to reduced day-to-day communications and a fading of the traditional prolonged family support system that has long characterized Nepali society (Nepali Times, 2019). With bigger physical distance and exposure to urban lifestyles, traditional values and interpersonal bonds can go down. The continuous familial communications that once reinforced social cohesion are substituted by irregular contact, hypothetically leading to a sense of isolation and less familial oversight. Over the time, these conditions may contribute to a weakening of the collective familial identity.

Long-term separation strains and pressures of urban life can lead to marital frustration. When migration is the cause of family separation, there is often less supervision and fewer immediate social sanctions regarding marital loyalty (Adhikari, 2014). This condition can result in an augmented occurrence of divorce and extramarital relationships, as both spouses may seek company outside the traditional marital outline (International Organization for Migration, 2018). These variations are not simply individual or familial but have wider societal consequences. As traditional family framework grow, there is a steady shift in social norms and values. Close community, strong family bonds dictated behaviour and provided support is progressively replaced by more individualistic lifestyles. This shift challenges long lasting cultural practices and could lead to a reassessment of family meaning in a modern Nepali context (Adhikari, 2014).

It can be summarized as, economic opportunities and social transformations are opened up by the improved road connectivity and subsequent migration. Changes in family structure, weakening of traditional family bonds, and increased incidences of divorce and extramarital relationships are

the resultant reflection of rapid modernization and urbanization on traditional societies. Targeted social policies required to reinforce family cohesion and offer support systems for families experiencing the stresses of migration and modernization.

### **Changed demographic structure**

Nepal experienced significant infrastructural improvements especially in road connectivity after the promulgation of democracy in 1990. This development facilitated easier travel but also primarily altered migration patterns within the country Nepal (Central Bureau of Statistics, 2011). Remote rural areas became accessible after improved road networks which encouraged labour migration to urban centres and more economically vibrant regions. People moved in search of better employment and education opportunities, rural populations began to decline ultimately (Asian Development Bank, 2018).

The migration stimulated by enhanced connectivity paid off to rapid urbanization. Cities and towns experienced population booms which lead to increased demand for housing, public services, and employment. This urban concentration has changed the traditional demographic landscape of many regions (Nepali Times, 2019). The demographic alteration has brought about noteworthy changes in community structures. Urban centres benefit from a younger, dynamic workforce while the exodus of rural populations often leave behind older people and diminished local economies. The migration has also led to a blended culture and the emergence of heterogeneous communities. Nevertheless, it has also implications on changed traditional social structures and eroded rural lifestyles.

Internal migration was catalysed by the expansion of road connectivity after 1990 which in turn contributed to noticeable demographic alteration in Nepal. This conversion has redefined the country's urban-rural balance and endures to inspire its socio-economic landscape (Asian Development Bank, 2018).

### **Changed Livelihood Pattern**

Nepal's livelihood pattern is definitely changed by increased road connectivity. Developed road networks have boosted accessibility to markets, education, and healthcare resulting intensified internal migration, urbanization, and economic diversification (Asian Development Bank, 2018). Better road connectivity has provoked many rural residents to seek opportunities in the cities, contributing to the progression in a remittance-based economy and the lowering of traditional agriculture. Concurrently, exposure to external markets and modern technologies has encouraged the modernization of local industries, although it has also challenged old cultural practices and community cohesion (International Labour Organization, 2021). Enhanced road connectivity in Nepal has remarkably transformed livelihoods by augmenting access to markets, education, and healthcare, stimulating internal migration, urbanization, and a shift toward a remittance-based economy consequently reducing reliance on traditional agriculture. Side by side, exposure to external markets and modern technologies has restructured local industries but posed challenges to traditional cultural practices and community solidarity.

1990 was marked by a predominantly agrarian, limited diversification and community centric as well as self-sufficient economy rooted in traditional practices. Livelihood pattern is drastically

changed in 2025. Diversification and urbanization, rise of remittance based economy, modernization of agriculture and rural industries, increased exposure to global markets, and changing social dynamics are observed. Better road connectivity, intensified migration, and incorporation into global markets have guided the country towards a complexity of urban and rural livelihood where modern sectors and remittance influxes play a critical role together with traditional agriculture (International Labour Organization, 2021).

### **Conclusion and Recommendation**

In democratic and republic Nepal, economic opportunities and improved mobility are brought by road expansion at the cost of substantial dependency on foreign resources and a deterioration in self-reliance. Determining stability between infrastructure development especially in roads and sustainable economic policies is a significant challenge for Nepal. Dependency on external funding, policy coordination and planning gaps, resource constraints, climate vulnerability, unequal economic benefits, cultural and social disruption and environmental degradation are the main challenges. By prioritizing local industries, investigating in domestic expertise, and adopting ecosystem friendly policies Nepal can reduce its dependence on external support and move toward a more self-sufficient future. Ensures road connectivity strengthens rather than weakens Nepal's long-term economic resilience. Following strategies are recommended for balancing self-reliance and development concurrently.

**Strengthening Domestic Industries:** Implementation of policies supporting local manufacturing and agricultural sectors to lessen prevalent import dependency in Nepal is utmost important (Food and Agriculture Organization, 2021). Promote self-reliance, provide subsidies and incentives for small and medium enterprises (SMEs) (Prasain, 2022). Concentrate on revival of traditional industries all the way through financial and technical backing (Sharma, 2020).

**Developing Local Expertise in Infrastructure:** To produce high level local technical manpower, invest in technical education and training programs (Asian Development Bank, 2021). To promote novelty in road constructions, support joint venture between universities and the private sector (World Bank, 2020).

**Implementing Sustainable Road Development Practices:** Make an obligatory international protocols of environmental regulations to curtail deforestation and soil erosion during road construction (United Nations Environment Program, 2021). Give attention on balancing development and environmental conservation; promote eco-friendly road-building techniques (Food and Agriculture Organization, 2020).

**Diversifying Economic Growth Strategies:** Create job opportunities within Nepal to reduce over-reliance on remittances (Nepal Planning Commission, 2022). Deliver alternative sources of revenue beyond migration to improve rural industries (Ministry of Industry, Commerce, and Supplies, Nepal, 2023).

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