



NEPAL  
ECONOMIC  
FORUM

# nefport

**MACROECONOMICS FOR A GREENER ECONOMY**

**DOCKING NEPAL'S ECONOMIC ANALYSIS**

ISSUE 45 | JULY 2021

50

**SPECIAL SECTION:**  
**MACROECONOMICS FOR A GREENER ECONOMY**

# DECARBONIZATION AND ENERGY TRANSITION: A CASE FOR NEPALI MIGRANTS

**Shraddha Gautam**

Part of the advisory board at Nepal Economic Forum

**Scott Preston**

Freelance Journalist and Researcher.

Climate change presents Nepal with a double-edged problem. The country stands to be disproportionately impacted by the effects of rising temperatures, such as melting glaciers and increased weather variability. Renewed global momentum surrounding the Paris Climate Accord may be Nepal's best chance at limiting the worst effects of climate change. However, an international push to decarbonize energy markets may also have consequences for Nepal's fiscal stability.

The fiscal stability is underwritten by remittances from labor migrants, which have long been an important source of supplemental income for Nepali families. Nearly 56% of the total households in Nepal are direct beneficiaries of cross-border remittance.<sup>128</sup> These inflows are also crucial to the functioning of the economy at large, contributing 63.6% to the nation's foreign reserves in Fiscal Year (FY) '20.<sup>129</sup> According to the World Bank, the Gross Domestic Product (GDP) could drop 3% for every 10% decline in remittances.<sup>130</sup>

Fueled by hydrocarbon resources, the rentier economies of the Gulf Cooperation Council (GCC) in the Arabian Peninsula have grown to become the largest employers of Nepal's expatriates, accounting for over three-fourths of the country's migrant

workers.<sup>131</sup> This concentration of labor ties Nepal's economy to the fortunes of the Gulf region, leaving it exposed to the booms and busts of oil and gas markets. In recent years, structural shifts in the hydrocarbon sector have given rise to a number of gloomy economic forecasts for GCC countries, which are expected to have long term implications for Nepal.

In recent years, falling oil prices have curtailed Nepali migration to the Arabian Gulf. An oil price crash in 2014 led to a sharp drop in remittances from GCC countries to developing countries. At the same time, global remittances from oil producing countries fell markedly too. It is thought that millions of foreign laborers in the Gulf were impacted,<sup>132</sup> and while remittance flow to Nepal has officially increased, this could be due to migrants' increased use of formal channels.<sup>133</sup>

Increasing the Nationally Determined Contributions (NDCs) of the Paris Climate Accords, through which countries pledge to decarbonize their energy mix, could accelerate economic decline in the Arabian Gulf. This is foreshadowed by the fact that some of the GCC's largest oil importers have set ambitious climate targets. At the Leaders' Summit on Climate in April 2021, the United States (US) president, Joe Biden, announced a

new goal of halving greenhouse gas emissions by 2030.<sup>134</sup> In the US, petroleum imports from the Gulf have already fallen by a staggering 13.46% over a span of two decades.<sup>135</sup> Likewise, China's plans<sup>136</sup> to reach carbon neutrality and become a "global powerhouse of electrification" by 2030 will mean a move away from fuel dependency, creating significant economic shock waves in the global energy trade.<sup>137</sup>

According to the consulting giant McKenzie, capping the temperature rise at 1.5 degrees Celsius, i.e., keeping global temperature below 2 degrees Celsius above pre-industrial levels, could cut demand for oil 70% by 2050.<sup>138</sup> This would mean oil demand could peak as early as 2023. Other estimates have placed peak oil demand in 2029<sup>139</sup> or 2040.<sup>140</sup> The United Nations points out that current NDCs are insufficient in limiting warming as set by the Accords,<sup>141</sup> with at least a 66% chance of achieving the carbon target.<sup>142</sup> But a range of additional factors stand to place downward pressure on hydrocarbon markets. Expanded production capacity from shale deposits in North America, China's growing interest in shale investments, the falling cost of renewables and increased energy efficiency also pose risks to Gulf economies.<sup>143</sup> Given these substantial challenges, the

International Monetary Fund has recently warned that GCC countries could deplete their reserves as early as 2034 without substantial reforms.<sup>144</sup>

In a region where the oil sector accounts for 70% of total revenues, governments are keen to diversify their income streams. The GCC countries have put forward plans to transition away from oil dependency, foster robust small and medium enterprises' growth, and to create digital-age knowledge economies; however, they share common hindrances. These include overregulated private sectors dependent on government funding tied to petrodollars, clientelism, and a poorly educated labor force accustomed to public sector employment.<sup>145</sup>

So far, efforts to diversify GCC economies have been slow to materialize in practice. Nader Kabbani and Nejla Ben Mimoune of the left-leaning think tank, The Brookings Institute, write that Gulf states "have been more apt to pursue

partial reforms that provide the illusion of economic diversification but, in reality, continue to rely to a large extent on revenues from oil and gas."<sup>146</sup>

Diversification initiatives are likely to see some success, and oil and natural gas will continue to play a role in the energy mix of many large countries. These realities can help cushion potential declines in Nepali remittances. The United Arab Emirates (UAE), which accounts for the largest share of Nepali migrants, is far less exposed to hydrocarbon market declines than its neighbors, with 35% of its budget financed by the oil industry.<sup>147</sup> Yet in Saudi Arabia, the GCC's second largest employer of Nepalis, where the oil sector accounts for 87% of the budget, ambitious plans for private sector growth have been slow to materialize.<sup>148</sup>

These struggles and the long-term trajectory of oil demand, indicate that Nepal's remittance base from the Gulf could be set to shrink.

Climate change has real consequences for Nepal, and a move towards decarbonization should be welcomed. In the short- and medium-term, economic diversification initiatives in the GCC may help offset employment losses from the decline of the hydrocarbon sector. However, Nepal should manage the challenges that the global energy transition is set to bring to its remittance-dependent economy. In the long run, an exodus of low-skilled and semi-skilled migrants from the Gulf will leave Nepal with two policy options: one, upskilling through better use of its existing programs such as the Council for Technical Education and Vocational Training, and two, planning a roadmap to strategically absorb returnee migrants into its domestic labor force by creating robust economic growth. While the former will enable migrants to better adapt to changing global skill demand, the latter will help channel returnee migrants to productive sectors.

# ENDNOTES

1. "UML, Maoist Centre revived following SC verdict", Khabar Hub, March 8, 2021. <https://english.khabarhub.com/2021/08/168541/>.
2. "Supreme Court refuses to review its verdict to revive UML and Maoist Centre", myRepublica, April 1, 2021. <https://myrepublica.nagariknetwork.com/news/supreme-court-refuses-to-review-its-verdict-to-revive-uml-and-maoist-Centre/>.
3. "Govt decides to prorogue ongoing house session from today", My Republica, April 19, 2021. <https://myrepublica.nagariknetwork.com/news/govt-decides-to-prorogue-ongoing-house-session-from-today/>.
4. "House is reinstated, but neither government nor opposition has faith in", The Kathmandu Post, March 16, 2021. <https://kathmandupost.com/national/2021/03/16/house-is-reinstated-but-neither-government-nor-opposition-has-faith-in-it>.
5. "Maoist Centre Decides to Withdraw Support to Govt", The Rising Nepal, May 5, 2021. <https://risingnepaldaily.com/nation/maoist-centre-decides-to-withdraw-support-to-govt>.
6. "Nepal Prime Minister Oli loses vote of confidence in Parliament", The Kathmandu Post, May 11, 2021. <https://kathmandupost.com/politics/2021/05/11/nepal-prime-minister-oli-loses-vote-of-confidence-in-parliament>.
7. "KP Oli sworn in as Prime Minister; repeats old cabinet", Khabar Hub, May 14, 2021. <https://english.khabarhub.com/2021/14/183931/>.
8. "In a midnight drama, Nepal President dissolves House and calls polls for November 12 and 19", The Kathmandu Post, May 22, 2021. <https://kathmandupost.com/politics/2021/05/22/president-dissolves-house-calls-snap-polls-for-november-12-and-19>.
9. "Policies And Programs In Bagmati Province: From Digital Province To Tunnel Road", Himal Sanchar, June 10, 2021. <https://himalsanchar.com/policies-and-programs-in-bagmati-province-from-digital-province-to-tunnel-road/>.
10. "Gandaki Province to confer 'Corona Frontier Excellent Service Award", English Khabarhub, June 22, 2021. <https://english.khabarhub.com/2021/22/192395/>.
11. "Lumbini State Government unveils Policies & Programs", Investpaper, June 9, 2021. <https://www.investpaper.com/news/lumbini-state-government-unveils-policies-programs/>.
12. "Plans and Programs of Provinces of Nepal for FY 2021/22", Nepal Economic Forum, June 14, 2021. <https://nepaleconomicforum.org/neftake/plans-and-programs-of-provinces-of-nepal-for-fy2021-22/>.
13. "Universal basic income to be tested in Wales", BBC, May 15, 2021. Retrieved from <https://www.bbc.com/news/uk-wales-politics-57120354>.
14. "Pfizer sees robust COVID-19 vaccine demand for years, \$26 bln in 2021 sales", Reuters, May 4, 2021. Retrieved from <https://www.reuters.com/business/healthcare-pharmaceuticals/pfizer-lifts-annual-sales-forecast-covid-19-vaccine-2021-05-04/>.
15. "How this Covid wave has hurt Indian economy — falling indicators, lower growth expectations", The Print, May 14, 2021. Retrieved from <https://theprint.in/ianomics/how-this-covid-wave-has-hurt-indian-economy-falling-indicators-lower-growth-expectations/657912/>.
16. "China and EU poised to sign long-delayed investment deal", Guardian, December 29, 2020. Retrieved from <https://www.theguardian.com/world/dec/29/china-and-eu-poised-to-sign-long-delayed-investment-deal>.
17. "EU efforts to ratify China investment deal 'suspended' after sanctions", Guardian, May 4, 2021. Retrieved from <https://www.theguardian.com/world/2021/may/04/eu-suspends-ratification-of-china-investment-deal-after-sanctions>.
18. "As Israel bombards Gaza, BDS urges renewed economic pressure", Aljazeera, May 14, 2021. Retrieved from <https://www.aljazeera.com/economy/2021/5/14/bds-movement-urges-action-amid-growing-israel-palestine-violence>.
19. "OECD calls for higher inheritance tax after Covid pandemic", Guardian, May 11, 2021. Retrieved from <https://www.theguardian.com/business/2021/may/11/oecd-higher-inheritance-tax-covid-pandemic>.
20. "Sri Lanka gets emergency China loan as rupee hits record low", CNA, April 12, 2021. Retrieved from <https://www.channelnewsasia.com/news/business/sri-lanka-emergency-loan-from-china-rupee-hits-record-low-14607828>.
21. "China extends \$500 million loan to Lanka", The Hindu, April 12, 2021. Retrieved from <https://www.thehindu.com/news/international/china-extends-500-million-loan-to-lanka/article34305277.ece>.
22. "As the price of bitcoin has climbed, so has its environmental cost", The Economist, May 14, 2021. Retrieved from <https://www.economist.com/graphic-detail/2021/05/14/as-the-price-of-bitcoin-has-climbed-so-has-its-environmental-cost>.
23. "More remittance, more than remittance", Nepali Times, 13 May 2021. Retrieved from <https://www.nepalitimes.com/latest/more-remittance-more-than-remittance/>.
24. "Nepal's remittance earnings as of third quarter end grew 16.5 percent to Rs 729 billion", myRepublica, 12 May 2021. Retrieved from <https://myrepublica.nagariknetwork.com/news/nepal-s-remittance-earnings-as-of-third-quarter-end-grew-16-5-percent-to-rs-729-billion/>.
25. "Nepal's remittance earnings as of third quarter end grew 16.5 percent to Rs 729 billion", myRepublica, 12 May 2021. Retrieved from <https://myrepublica.nagariknetwork.com/news/nepal-s-remittance-earnings-as-of-third-quarter-end-grew-16-5-to-rs-729-billion/>.
26. "World Bank's Nepal Development Update 2021." Retrieved from <https://documents.worldbank.org/en/publication/documents-reports/documentdetail/332751617996242148/nepal-development-update-harnessing-export-potential-for-a-green-inclusive-and-resilient-recovery>.
27. "World Bank's Nepal Development Update 2021." Retrieved from <https://documents.worldbank.org/en/publication/documents-reports/documentdetail/332751617996242148/nepal-development-update-harnessing-export-potential-for-a-green-inclusive-and-resilient-recovery>.
28. "World Bank's Nepal Development Update 2021." Retrieved from <https://documents.worldbank.org/en/publication/documents-reports/documentdetail/332751617996242148/nepal-development-update-harnessing-export-potential-for-a-green-inclusive-and-resilient-recovery>.
29. "Federal lawmakers stress need to make country self-reliant in agriculture", The Himalayan Times, April 5, 2021. Retrieved from

[money/2021/05/09/hed-industry-department-recommends-review-to-minimum-threshold-on-foreign-investment.](#)

101. "Nepal Development Update- Harnessing Export Potential for a Green, Inclusive and Resilient Recovery", The World Bank, April 12, 2021. Retrieved from <http://documents1.worldbank.org/curated/en/332751617996242148/pdf/Nepal-Development-Update-Harnessing-Export-Potential-for-a-Green-Inclusive-and-Resilient-Recovery.pdf>.
102. "The U.S. provides additional funding support to Nepal amidst the second wave of COVID-19", US Indo-Pacific Command, May 4, 2021. Retrieved from <https://www.pacom.mil/Media/News/News-Article-View/Article/2595780/the-us-provides-additional-funding-support-to-nepal-amidst-the-second-wave-of-c/>.
103. "Oxygen ban imposed by India lifts; Two tankers of oxygen to be supplied on Saturday", Naya Patrika, May 7, 2021. Retrieved from <https://www.nayapatrikadaily.com/news-details/63795/2021-05-07?fbclid=IwAR1aAg3NIaXMzJF30wpebpC1Qq-Of1fKHiUKkEBR73iBUNQU3ExVzAT0Ww>.
104. Mohan, Geeta. "India only country to send liquid oxygen to Nepal amid COVID surge", India Today, May 19, 2021. Retrieved from <https://www.indiatoday.in/coronavirus-outbreak/story/india-only-country-to-send-liquid-oxygen-to-nepal-amid-covid-surge-1804170-2021-05-19>
105. "Focused COVID-19 Media Monitoring, Nepal", World Health Organization, Nepal, May 19, 2021. Retrieved from [https://reliefweb.int/sites/reliefweb.int/files/resources/Focused%20COVID-19\\_Media%20Monitoring\\_May%2019%2C%202021.pdf](https://reliefweb.int/sites/reliefweb.int/files/resources/Focused%20COVID-19_Media%20Monitoring_May%2019%2C%202021.pdf).
106. "China-gifted 800,000 doses of vaccine arrive in Nepal", The Kathmandu Post, March 29, 2021. Retrieved from <https://kathmandupost.com/national/2021/03/29/china-gifted-800-000-doses-of-vaccine-arrive-in-nepal>.
107. Shrestha, Prithvi Man. "Government importing 20,000 oxygen cylinders and 100 ventilators from China", The Kathmandu Post, May 5, 2021. Retrieved from <https://kathmandupost.com/national/2021/05/05/government-importing-20-000-oxygen-cylinders-and-100-ventilators-from-china>.
108. "Nepal receives China-donated oxygen cylinders", Asia&Pacific, May 11, 2021. Retrieved from [http://www.xinhuanet.com/english/asiapacific/2021-05/11/c\\_139939162.htm](http://www.xinhuanet.com/english/asiapacific/2021-05/11/c_139939162.htm).
109. "More remittance, more than remittance", Nepali Times, 13 May 2021. Retrieved from <https://www.nepalitimes.com/latest/more-remittance-more-than-remittance/>.
110. "Nepal's remittance earnings as of third quarter end grew 16.5 percent to Rs 729 billion", myRepublica, 12 May 2021. Retrieved from <https://myrepublica.nagariknetwork.com/news/nepal-s-remittance-earnings-as-of-third-quarter-end-grew-16-5-percent-to-rs-729-billion/>
111. *ibid.*
112. "Remittances rise by 8.6 per cent in first eight months", The Himalayan Times, 13 April 2021. Retrieved from <https://thehimalayantimes.com/business/remittances-rise-by-86-per-cent-in-first-eight-months>.
113. "NRB asks individuals and BFIs to exchange old Qatari Riyal notes by May 10", myRepublica, 21 April 2021. Retrieved from <https://myrepublica.nagariknetwork.com/news/nrb-asks-individuals-and-bfis-to-exchange-old-qatari-riyal-notes-by-may-10/>.
114. "NRB asks individuals and BFIs to exchange old Qatari Riyal notes by May 10", myRepublica, 21 April 2021. Retrieved from <https://myrepublica.nagariknetwork.com/news/nrb-asks-individuals-and-bfis-to-exchange-old-qatari-riyal-notes-by-may-10/>.
115. "NIBL-DWC pact", The Himalayan Times, 29 April 2021. Retrieved from <https://thehimalayantimes.com/business/nibl-dwc-pact>.
116. "Moneygram-eSewa Money Transfer Pact", The Himalayan Times, 22 April 2021. Retrieved from <https://thehimalayantimes.com/business/moneygram-esewa-money-transfer-pact>.
117. "Government approves EIA Report of Electricity Transmission Project", Khabarhub, May 18, 2021. Retrieved from <https://english.khabarhub.com/2021/18/184789/>.
118. "Scientists worry that Kathmandu is still one of the most polluted cities", Republica, May 17, 2021. Retrieved from <https://myrepublica.nagariknetwork.com/news/scientists-worry-that-kathmandu-is-still-one-of-the-most-polluted-cities/>.
119. "Air pollution not only impacts health, but can also trigger floods and landslides, study finds", The Kathmandu Post, May 9, 2021. Retrieved from <https://kathmandupost.com/climate-environment/2021/05/09/air-pollution-not-only-impacts-health-but-can-also-trigger-floods-and-landslides-study-finds>.
120. "Wildlife conservation areas report rise in illegal activities during lockdown", The Kathmandu Post, May 17, 2021. Retrieved from <https://kathmandupost.com/climate-environment/2021/05/17/wildlife-conservation-areas-report-rise-in-illegal-activities-during-lockdown>.
121. "Why Nepal is not on the list of invitees for climate summit called by Joe Biden", The Kathmandu Post, April 14, 2021. Retrieved from <https://kathmandupost.com/climate-environment/2021/04/14/why-nepal-is-not-on-the-list-of-invitees-for-climate-summit-called-by-joe-biden>
122. "Nepse told to publicize financials of listed companies", The Himalayan Times, February 19, 2021. Retrieved from <https://thehimalayantimes.com/business/nepse-told-to-publicise-financials-of-listed-companies>.
123. ILO, 2019. [Employment effects of green policies in the Philippines: Summary for Policymakers](#). ILO, Geneva.
124. ADB, 2021 (March). ["Implementing a Green Recovery in Southeast Asia"](#), ADB Brief Series, Manila, Philippines.
125. ILO 2020. [Factsheet: Green Jobs in Nepal](#). Kathmandu Office.
126. U. Narain and H. Bhammar, 2020. ["A green economic recovery for South Asia"](#), World Bank blogs, Published May 12, 2020. World Bank Group, Washington DC.
127. ILO 2020. [Factsheet: Green Jobs in Nepal](#). Kathmandu Office.
128. "Nepal Living Standards Survey 2010/11", November 2011, Central Bureau of Statistics. Retrieved from [https://cbs.gov.np/wp-content/uploads/2018/12/Statistical\\_Report\\_Vol2.pdf](https://cbs.gov.np/wp-content/uploads/2018/12/Statistical_Report_Vol2.pdf)
129. "Economic Survey 2019/20", Ministry of Finance. Retrieved from [https://mof.gov.np/uploads/document/file/Economic%20Survey%202019\\_20201125024153.pdf](https://mof.gov.np/uploads/document/file/Economic%20Survey%202019_20201125024153.pdf).
130. "Declining Remittance and its Impact on the Economy", Nepal Economic Forum, 3 November 2016. Retrieved from <https://nepaleconomicforum.org/neftake/declining-remittance-and-its-impact-on-the-economy/>.
131. "Nepal Labour Migration Report 2020", Ministry of Labour Employment and Social Security. Retrieved from <https://moless.gov.np/wp-content/uploads/2020/03/Migration-Report-2020-English.pdf>.
132. Awad, Ibrahim. "On occasion of the pandemic: Reflections on Egyptian labour migration", International Migration, 14 February 2021. Retrieved from <https://onlinelibrary.wiley.com/doi/full/10.1111/imig.12818#imig12818-bib-001>
133. Nepal sees 23 percent rise in remittance inflow despite Covid-19 pandemic", My Republica, 27 September 2020. Retrieved from <https://myrepublica.nagariknetwork.com/news/nepal-sees-23-percent-rise-in-remittance-inflow-despite-covid-19-pandemic/>.
134. "Global climate summit: US targets 50% emissions cut by 2030", Euronews, 22 April 2021. Retrieved from <https://www.euronews.com/2021/04/22/us-president-joe-biden-to-host-40-world-leaders-at-global-climate-summit>.

135. "Oil and petroleum products explained", U.S Energy Information Administration. Retrieved from <https://www.eia.gov/energyexplained/oil-and-petroleum-products/imports-and-exports.php>.
136. "Paris climate agreement", NRDC ,19 February 2021, Retrieved from <https://www.nrdc.org/stories/paris-climate-agreement-everything-you-need-know>
137. "New energy order—how clean power is fuelling geo-political changes", The Economist, 22 September 2020. Retrieved from <https://www.economist.com/podcasts/2020/09/22/new-energy-order-how-clean-power-is-fuelling-geopolitical-changes?src=scn%2Ftw%2Fte%2Fbl%2Fed%2Fmoneytalksnewenergyorderhowcleanpowerisfuelinggeopoliticalchangespodcasts>.
138. Vicky Mc Keever. "Oil could plummet to \$10 by 2050 if Paris climate goals are achieved, energy consultancy says", CNBC, 15 April 2021. Retrieved from <https://www.cnbc.com/2021/04/15/oil-could-plummet-to-10-by-2050-if-paris-climate-goals-are-achieved.html>.
139. *ibid.*
140. Nadar Kabbani and Nejla Ben Mimoune. "Economic diversification in the gulf", 31 January 2021, Brookings Retrieved from <https://www.brookings.edu/research/economic-diversification-in-the-gulf-time-to-redouble-efforts/>
141. Meredith, Sam. "What 'energy transition' Global fossil fuel use is accelerating and set to get even worse", CNBC, 14 April 2021. Retrieved from <https://www.cnbc.com/2021/04/14/climate-global-fossil-fuel-use-accelerating-and-set-to-get-even-worse.html>.
142. "Global Warming of 1.5 °C", Intergovernmental Panel on Climate Change. Retrieved from [https://www.ipcc.ch/site/assets/uploads/sites/2/2019/06/SR15\\_Full\\_Report\\_High\\_Res.pdf](https://www.ipcc.ch/site/assets/uploads/sites/2/2019/06/SR15_Full_Report_High_Res.pdf).
143. "Shale oil in China: the long journey ahead", Wood Mackenzie, 16 December 2019. Retrieved from <https://www.woodmac.com/news/opinion/shale-oil-in-china-the-long-journey-ahead/>.
144. "The Future of Oil and Fiscal Sustainability in the GCC Region" IMF Departmental Report, 6 February 2020. Retrieved from <https://www.imf.org/en/Publications/Departmental-Papers-Policy-Papers/Issues/2020/01/31/The-Future-of-Oil-and-Fiscal-Sustainability-in-the-GCC-Region-48934>.
145. "Economic diversification in the Gulf: Time to redouble efforts", Brookings, 31 January 2021. Retrieved from <https://www.brookings.edu/research/economic-diversification-in-the-gulf-time-to-redouble-efforts/>.
146. *ibid.*
147. "Impact of the oil industry crisis on the GCC and potential responses", Deloitte. Retrieved from [https://www2.deloitte.com/content/dam/Deloitte/xs/Documents/energy-resources/me\\_eri-impact%20of%20oil%20on%20GCC.pdf](https://www2.deloitte.com/content/dam/Deloitte/xs/Documents/energy-resources/me_eri-impact%20of%20oil%20on%20GCC.pdf).
148. "Best Countries for Business 2018, Saudi Arabia", Forbes. Retrieved from <https://www.forbes.com/places/saudi-arabia/?sh=1008d5744e5c>.





NEPAL  
ECONOMIC  
FORUM

P.O.Box 7025, Krishna Galli, Lalitpur - 3, Nepal

Phone: +977 1 5548400

[info@nepaleconomicforum.org](mailto:info@nepaleconomicforum.org)

[www.nepaleconomicforum.org](http://www.nepaleconomicforum.org)

