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# Impact of Covid-19 Pandemic on the Net Profit and its Principal Determinants of Nepalese Commercial Banks

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#### Abstract

COVID-19's influence on net profit and its main variables, such as net interest income, fee and commission revenue, and total operating income of Nepalese commercial banks, is explored. It also aims to determine the relationship between variables as well as the shortand long-term effects of interest income, fee and commission revenue, and operating income on commercial banks' net profit. The panel data of 27 commercial banks from 2011 (fiscal year 2010/11) to 2020 (fiscal year 2019/20) are examined and collected from the Nepal Rastra Bank's Banks Supervision Reports. The descriptive statistics, correlation analysis, panel unit root testing, and panel autoregressive distributed lag (ARDL) model are all employed. Net interest income and net profit (0.901), fee and commission income and net profit (0.823), and total operating income and net profit (0.823) all have a strong positive connection (0.800). The COVID-19 outbreak hurts commercial banks' net profits in both the short and long term. However, the research produced some disputed findings. For example, consider the long-term negative impact of total operating profit on commercial bank net profit and the short-term negative impact of net interest income on commercial bank net profit. It is suggested to decrease unneeded expenditures that may be cut without disrupting the banking business to enhance profit. The importance of ebanking might be stressed to slow the rapid decline in bank profit and other earnings. This

JOURNAL OF MANAGEMENT, VOL. 5(1), 2022, FOM, MMCD article is unique because the researcher is not affected by other researchers' tools, methodologies, and findings.

*Keywords*: operational income, performance, depositors, panel ARDL model, real estate revenue

JEL classification: G<sub>01</sub>, G<sub>17</sub>, G<sub>29</sub>.

#### Introduction

Commercial banks are financial entities that take deposits from consumers and provide financial services to them. It offers a variety of loans and primary financial products for profit. Net interest income (NII), net fee and commission income (NFCI), net operational income (NOI), net trading income (NTI), and other income all contribute to a commercial bank's net profit. Net interest income (NII) is a financial performance metric that shows the difference between the revenue earned by a bank's interest-bearing assets and the expenditures connected with paying interest on its interest-bearing obligations.

Net interest income (NII) = Interest received from borrowers – Interest paid to the depositors. The net interest income is the excess revenue generated from the interest earned over the interest paid out on deposits (Staikouras & Wood, 2002).

Net operating income (NOI) measures the profitability of an income-producing property before any financing or tax charges are deducted. NOI is calculated by subtracting all revenue from the property from all reasonably required operating expenditures. To determine net operating income, we must deduct operating expenditures from the property's revenue.

Net operating income (NOI) = Real estate revenue (RR) – Operating Expenses (OE).

Rental income, parking fees, service charges, vending machines, laundry machines, and so on all contribute to real estate revenue. The net operating income (NOI) is used to calculate the capitalization rate of a property, commonly known as the return on investment (ROI) in real estate. NOI is calculated by deducting gross income from the property's revenue. Property taxes, maintenance and repair fees, insurance, utilities, license costs, and other expenditures such as accounting, attorneys, and advertising are all examples of operating expenses. Net operational income (NOI) gauges a property's capacity to create a positive cash flow from operations in this respect.

NOI = Gross operating income – operating expenses.

Net trading income (NTI) is the total of all revenue and costs coming from changes in the fair values of financial assets and liabilities. Net operating income is defined as the total realized gains, unrealized mark-to-market gains, fees, and interest income generated by trading activities, net of interest expenses, transaction fees, and commissions for the period specified according to International financial reporting standards (IFRS). Because it is incredibly susceptible to fluctuations in financial market circumstances, net trading income is an essential but volatile source of income for commercial banks (Giglio et al., 2021).

Net fee and commission revenue are essential components in a competitive financial market. Fee and commission revenue contributes significantly to the growth of banking and financial organizations (Not referenced 2016). Non-sufficient money fees, overdraft charges, late costs, overdraft fees, wire transfer fees, monthly service charges, and other fees and commissions are examples of fee and commission revenue. The bank earns fees and commissions from a variety of services provided to its clients. Fee and commission income comprises cash transaction fees and fund transfer fees, which are promoted when services are delivered. Fee and commission expenses consist of cash operation settlement fees and fees paid to the external managers, which are recognized as expenses as the services are rendered.

Net profit (NP) remains after all expenses and costs have been subtracted from revenue. Net income or net profit helps investors determine a company's overall profitability, reflecting how effectively a company has been managed.

Net profit = Total revenue- Total expenses

Or, Net profit = Gross profit- operating expenses-Other business expenses- Taxes-Interest on debt + other income

After the 1918 flu pandemic, the new coronavirus disease (COVID-19) became the sixth recorded pandemic. The coronavirus was discovered in the Chinese city of Wuhan in December 2019 and has since spread internationally (Liu et al., 2020). Based on a phylogenetic study, the coronavirus was formally called severe acute respiratory syndrome coronavirus 2 (SARS-Cov-2). The SARS-Cov-2 virus of the COVID-19 pandemic has wiped out the whole earth. It has harmed every area of human life (Platto et al., 2012).

The present COVID-19 epidemic has already proved to be one of the world's worst crises in recent times, with far-reaching consequences for several sectors of the global economy. The banking industry has been hit the worst by the economic catastrophe

caused by the COVID -19 pandemic. One of the most prominent consequences is a financial crime (Wronka, 2021). The coronavirus sickness has harmed people's economic and social lives. One of the most severe indirect consequences has been significant interruptions in the delivery and usage of everyday services, such as essential health and nutrition services (Unicef, 2021). This pandemic has affected thousands of people who are either sick or killed due to the spread of this disease (Haleen & Javaid, 2020).

From March 24 until July 21, 2020, the Nepalese government declared a statewide lockdown, limiting domestic and international travel, border closures, and nonessential services (Sharma et al., 2021). The countrywide lockdown of certain months in 2020 and 2021 curtailed socio-economic activity throughout the country, with very few services running during the period. The complex and long-term effects of lockdown have been discovered in society, and many individuals have lost their jobs, businesses, and other healthcare benefits. It disrupted the supply chain, forced the closure of numerous informal and small companies, and pushed more vulnerable people into poverty (UNDP, 2020). The tourist sector was heavily damaged in Nepal, where it plummeted below 10%, resulting in the loss of almost 13000 jobs for trekkers and guides. The COVID-19 Crisis threatens 1.6 to 2 million employments, accounting for 80.8 percent of all informal sector jobs in the country (UNDP, 2020).

COVID-19 is the biggest threat to human civilization in the modern era. It has influenced all aspects of human life. It pushed individuals to stay at home and do nothing. It reduces economic activity and harms the general public's social, physical, and mental well-being. It is also to blame for growing mental stress. As with other industries, the coronavirus illness pandemic has significantly impacted the banking and finance sectors. COVID -19 influences the real economy and, eventually, the financial industry. People's sources of income have shrunk to naught. Because of the dread of COVID-19, economic activity has been curtailed in addition to the lockdown time. People are unwilling to invest in new businesses; manufacturers have reduced their production capacity since there is no revenue from the general public for demanding goods and services. The market's demand for consumption of postpondable items has drastically reduced. The need for commercial bank loans has fallen. Customers are unable to make payments on bank interest or loan installments. People, particularly those afflicted by COVID-19, are driven to spend their earnings on health. There is no suitable working environment. People have died due to COVID -19; they have lost acquaintances, relatives, neighbors, and even family members. People are not mentally equipped to labour or invest under these conditions. The myth about COVID-19 is far worse than the fact.

The purpose of this article is to ascertain the influence of net interest income, net fee and commission revenue, and total operational income on the net profit of Nepalese commercial banks. It also intends to investigate the impact of COVID-19 on commercial banks' net profit and its primary factors.

The remainder of the article is organized as follows: Section 2 summarizes the theoretical and relevant types of literature. Section 3 is on research technique. Section 4 discusses empirical findings, while Section 5 discusses the study's conclusion, policy implications, and limitations.

## Literature Review

There are various studies about the preliminary impact of COVID-19 on banking and financial institutions. Most of the studies are related to the effects of the COVID -19 pandemic on the banking sector's profitability during the lockdown period. Some relevant literature is reviewed in this section.

The signalling theory states that bank management sends distinctive signals that future expectancy is promising by increasing capital (Berger, 1995; Trujillo- ponce, 2012). The risk-return hypothesis predicts that the relationship between capital and profitability will be negative (Deitrich & Wanzenrid, 2009; Ommeren, 2011; Saona, 2011, Sgarma & Gounder, 2012). Various causes increase risk in the banking sector. COVID-19 has also created risk and uncertainty on the net banking profit. The uncertainty theory of profit is also equally applicable in the banking sector. Knight's theory of profit believed that profit is a reward for uncertainty-bearing, not risk-bearing. The non-insurable risk or non-calculable risk creates uncertainty in the business (Hicks, 1931). The person or institution who can play with uncertainty can earn profit. COVID-19 pandemic is also a non-insurable risk for banking and financial institutions. Alshatti (2016) measured the bank profitability elements as returns on assets and the return on equity. The result indicates that the variable of capital adequacy ratio, capital, and leverage positively affects bank profitability.

Sugiharto, Azimkulovich, and Misdiyono (2021) observed the impact of the COVID-19 pandemic on the financial preference of Sharia commercial banks of Indonesia. They found a negative impact on bank profit and capital, but financial preference was not entirely and equally affected by the COVID-19 pandemic. Three out of seven of the bank's financial performance measures were not affected by the pandemic. These include the bank's assets' growth rate, capital adequacy ratio, and Operating efficiency ratio.

Beck and Keil (2021) identified a decrease in the volume and the average amount of loans of commercial banks. A survey of Barua and Barua (2021) found a fall in riskweighted assets value, capital adequacy ratio, and interest income. Sutrisno, Panuntum, and Adistri (2020) found that the return on equity, net operating margin, and financial to deposit of Sharia banks in Indonesia were affected by the COVID -19 pandemic. But Capital adequacy ratio, non-performing finance, return on assets remain unchanged.

Alish et al. (2020) investigated the performance of the banking sector during the COVID-19 crisis. Overall, the findings indicate that banks are expected to play a part in the crisis, and the countercyclical lending position has put financial institutions under substantial strain. The preliminary mild negative impact on banking and financial institutions' overall financial performance. Korzeb and Niedziolla (2020) highlighted the most vulnerable economic situation of commercial banks in Poland due to the COVID-19 crisis.

Karna (2020) investigated the economic impact of COVID-19 in Nepal. The researcher discovered COVID-19's negative consequences in banking and financial organizations, just as he did in other industries. In the fiscal year 2019/20, the earnings of the country's commercial banks fell by a stunning Rs. 8.68 billion. According to the unaudited financial statements of the country's 27 commercial banks, they generated a profit of Rs. 54.31 billion in the fiscal year 2019/20, compared to a profit of Rs. Sixty-three billion in the previous fiscal year 2018/19. Commercial banks have seen a decline in profit because of the devastating impact of the COVID-19 epidemic on the economy. Financial transactions have fallen like never before, despite banks providing services throughout the shutdown. During the COVID-19 epidemic, no new businesses were started, but an existing business failed to pay its loan payment and interest. The banks were either unable to distribute new loans or to reclaim current debts and interest.

The influence of COVID-19 on bank profitability is the subject of all of this research. The majority of investigations look into the impact of Covid-19 on the bank, financial institutions, and financial statements. Few research has been conducted on the impact of the coronavirus crisis on Nepalese commercial banks' net profit and profitability. The effects of covid-19 on net profit and its main variables in Nepalese commercial banks are investigated in this study. As a result, it is argued that there is a significant research gap between past studies and this one.

# **Materials and Methods**

**Research Design** 

This study is based on a descriptive and exploratory research design. The panel data of twenty-seven commercial banks are analysed to derive the conclusion. The panel data is analysed to observe the impact of COVID-19 on net profit and its principal determinants like net interest income, net fee and commission income, and total operating income, of Nepalese commercial banks.

# Source of Data

The secondary data of twenty-seven commercial banks of Nepal are used. The secondary data are taken from the Bank Supervision Report of Nepal Rastra Bank (NRB). Total of 135 observations are included taking five years of data from 2016 (Fiscal year 2015/16) to 2020 (Fiscal year 2019/20) of each commercial bank of Nepal.

## Variable Specification

Net profit, net fee and commission income, net interest income, net operating income, and net trading income are taken as the variable of the study. The net profit of commercial banks is taken as a dependent variable, and the rest are taken as independent variables. The net profit of commercial banks depends upon net interest income, net fee and commission income, net trading income, and net operating income. COVID-19 pandemic is taken as a dummy variable.

#### **Model Specification**

The framework of the Cobb-Douglas production function is used to establish the relationship between dependent and independent variables.

The Cobb- Douglas Production function  $(Y_t) = AK^{\alpha}L^{\beta}$  (1)

In this equation, Yt is the actual output, and L and K are labour and capital inputs. A,  $\alpha$ , and  $\beta$  are positive parameters where  $\alpha > 0$ ,  $\beta > 0$  and A>0. In the cobb-Douglas production function,  $\alpha$ , and  $\beta$  are capital and labour output elasticities, respectively. The sum of  $\alpha$  and  $\beta$  is always one, i.e.,  $\alpha + \beta = 1$ . The equation tells that output depends directly on L and K, and that part of the output that L and K cannot explain is explained by A, the 'residual,' often called technical change. The higher the value of A, the higher the output is affected by other factors besides labour and capital.

The net profit of commercial banks depends upon net interest income, net fee and commission income, and net operating income. In this sense,

$$NP = f(NII, FCI, OI)$$
(2)

NP stands for the net profit of commercial banks, NII stands for net interest income, NFCI indicates net fee and commission income, and NOI stands from net operating income. After converting variables in log form, the model can be specified as:

## LNNP- f (LNNII, LNFCI, LNOI)

(3)

The basic panel data model can be specified as:

 $Y_{it} = \alpha + \beta_1 X_{it} + \mu_{it} \tag{4}$ 

Where, i represents various entities included in the analysis, t= time period, Yit= is dependent variables which is observed for all cross-sections (i= 1.2, 3 ....n), over time t (t=1,2,3,....n). Xit is the independent variable of variable entities over a time t, and  $\mu$ it is the error term. After introducing the dependent and independent variables of this study, equation (4) can be written as:

$$LNNP_{it} = \alpha + \beta_1 LNNII_{it} + \beta_2 LNFCI_{it} + \beta_3 LNOI_{it} + \mu_{it}$$
(5)

LNNP<sub>it</sub> indicates the net profit of commercial banks of Nepal over time t. LNNIII<sub>it</sub> shows the interest income, and LNNCFI<sub>it</sub> is the combined income obtained from fee and commission income by Nepal's commercial banks. And LNNOI<sub>it</sub> respectively The  $\alpha$  stands for intercept, and  $\beta_1$ ,  $\beta_2$ , and  $\beta_3$ , represent the coefficients of the corresponding variables, present the speed at which the dependent variable may adjust to long-run equilibrium (Athanasoglou, Brissimis, et al., 2008)

#### **ARDL Model Specification**

The ARDL co-integration approach is used whether the underlying variables are of order I(0), I(1), or a mix of both, however, it cannot be used when the underlying variables are of order I(2) (Nkoro & Uko, 2016). Pesaran and Shin (1999) and Pesaran et al. (1997, 2001) employed the autoregressive distributed lag (ARDL) co-integration approach to investigate the short- and long-run connection between dependent and independent variables. To explore the short-run and long-run co-integration correlations between determinants, the panel ARDL approach was chosen. The manufacturing function of the panel ARDL is shown below. The ARDL co-integration approach is used whether the underlying variables are of order I(0), I(1), or a mix of both, however, it cannot be used when the underlying variables are of order I(2) (Nkoro & Uko, 2016). Pesaran and Shin (1999) and Pesaran et al. (1997, 2001) employed the autoregressive distributed lag (ARDL) co-integration approach to investigate the short- and long-run connection between dependent and independent variables. To explore the short- and long-run co-integration correlations between determinants, the panel ARDL approach was chosen. The manufacturing function of the panel ARDL is shown below (Aristei & Martelli, 2014). JOURNAL OF MANAGEMENT, VOL. 5(1), 2022, FOM, MMCD  $Y_{it} = \alpha_{it} + \sum_{i=1}^{k} \alpha_{it} Y_{j,t-i} + \mu_{it}$ (6)

Expressing all variables of this study in natural logarithms, the following ARDL model is specified:

 $\Delta \text{LNNP}_{it} = \beta_0 + \Sigma_{i=1}^k \beta_{ij} \Delta \text{LNNP}_{j,t-i} + \Sigma_{i=0}^k \beta_{2j} \Delta \text{LNNII}_{j,t-i} + \Sigma_{i=0}^k \beta_{3j} \Delta \text{LNFCI}_{j,t-i} + \Sigma_{i=1}^n \beta_{4j} \Delta \text{LNOI}_{j,t-i} + \alpha_1 \text{LNNP}_{j,t-1} + \alpha_2 \text{LNNII}_{j,t-1} + \alpha_3 \text{LNFCI}_{j,t-1} + \alpha_4 \text{LNOI}_{j,t-1} + \mu_{it}$ (7)

In equation 7,  $\beta_0$  is the drift component  $\beta_1$ ,  $\beta_2$ ,  $\beta_3$ , and  $\beta_4$  are the short-run dynamics of the model.  $\alpha_1$ ,  $\alpha_2$ ,  $\alpha_3$ , and  $\alpha_4$  are the long-run coefficients of respective variables. Similarly, i=1, 2, ..... n is the commercial bank index, t=1, 2.....n is the time index and  $\mu_{it}$  is a random disturbance term.

#### **Results and Discussion**

#### **Descriptive Statistics**

The descriptive statistics show the condition of the variables used in this study's lowest and maximum values, mean, median, standard deviation, moments, and kurtosis. It's calculated using the variables' log-transformed values. Net interest income has the smallest standard deviation of all the variables. As a result, its mean value is more representative than others. Net interest income has a coefficient of variation of 11.26 percent. It shows that net interest revenue from Nepal's 27 commercial banks is steadier than other sources of income. Similarly, among the other variables, the coefficient of variation of variation of combined revenue from fee and commission is the largest (i.e. 21.32 percent). The descriptive statistics of variables are listed in table 1.

#### Table 1

Variable s	Maximu m	Minimu m	Standar d deviatio n	Coefficien t of Variation	Mea n	Media n	Observatio n
LNNP	8.58	0.00	1.20	17.88	6.71	7.01	269

**Outcomes of Descriptive Statistics of Variables** 

LNNII	9.23	3.74	0.85	11.26	7.55	7.64	269	
LNFCI	7.82	0.00	1.16	21.32	5.44	5.59	269	
LNOI	9.33	0.00	0.95	12.23	7.77	7.94	269	

Note. Author's calculation by using EViews11, 2021.

#### **Correlation Analysis between Variables**

Correlation analysis measures the degree of association ship between variables. The correlation coefficient between net profit and net interest income is 0.901. So, there is a high degree of positive correlation between net profit and net interest income of commercial banks of Nepal. The same type of relationship is observed between the net profit and net fee and commission income and net profit and net operating income of commercial banks of Nepal. Table 2 represents the various correlation coefficients between the concerned variables.

## Table 2

Correlation Coefficients Between Concerned Variables

Variables	LNNP	LNNII	LNNFCI	LNNOI
LNNP	1.000	0.901	0.823	0.800
LNNII	0.901	1.000	0.884	0.879
LNNFCI	0.823	0.884	1.000	0.822
LNNOI	0.800	0.879	0.822	1.000

# **Panel Unit Root Testing**

The panel unit root test checks whether the data is predictable or not. Unit root testing indicates whether the time series data are stationary or non-stationary. The unit root test is the test for determining whether the mean, variance, and covariance of time series are independent of time or not. Stationary tests allow identifying whether time-based data is static or not. The non-static data cannot give any conclusion. The outcomes of Panel unit root testing are shown in table 3.

# Table 3

# JOURNAL OF MANAGEMENT, VOL. 5(1), 2022, FOM, MMCD *Outcomes of Panel Unit Root Testing*

Methods	LNNP		LNNII		LNNFCI		LNNOI	
	Level	First differen ce	Level	First differe nce	Level	First differe nce	level	First difference
Levin, Lin & Chu	(-17.7)	(-11.8)	(-4.8)	(-14.4)	(-1.7)	(-11.9)	(-8.11)	(-14.6)
	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
Im, Pesaran, Shin-wat	(-5.54)	(-6.77)	(2.9)	(-6.9)	(3.75)	(-4.93)	(-0.11)	(-7.9)
	0.00	0.00	0.99	0.00	0.99	0.00	0.45	0.00
ADF Fisher Chi-square	(128.4)	(155.1)	(36.3)	(159.4)	(22.04)	(124.0)	(66.9)	(167.8)
	0.00	0.00	0.97	0.00	1.00	0.00	0.11	0.00
PP-Fisher Chi-Square	(132.7)	(219.4)	(40.6)	(230.3)	(43.3)	(163.8)	(78.7)	(181.03)
	0.00	0.00	0.91	0.00	0.85	0.00	0.015	0.00

Note. Authors calculation by using EViews11, 2021.

\*Figures in parenthesis are the value of t- statistics.

The net profit data is steady at the first difference, according to the panel unit root test summary. After the initial difference, most panel unit root testing techniques reveal that panel data of interest income, commission, fee, discount income, and net operating income are stable. Individual intercepts are used to determine if data is stationary or non-stationary. Under the premise of a certain intercept, net profit is stationary at the level, and net interest income, joint income from fee and commission, and net operating income are stationary after the first difference. As a result, we may utilize the data to anticipate or do an effective study on the variables in question. Under this condition, the panel ARDL model can be utilized.

# Panel Autoregressive Distributed Lag (ARDL) Model

The ARDL panel assesses not only the influence of independent factors on dependent variables but also the lag value. An autoregressive impact occurs when the net profit of one year influences the profit of the following year. The COVID-19 epidemic has slowed the country's economic activity, but the severity of the effect varies according to the nature of the producing sector. In addition to net profit, net interest income, fee and

# JOURNAL OF MANAGEMENT, VOL. 5(1), 2022, FOM, MMCD commission revenue, total operational income, and a dummy variable are investigated. It shows the impact of the COVID-19 epidemic on Nepalese commercial banks' net profit and the factors that influence it. Net profit is stationary at level I(0), and the rest are stationary after the first difference I(1). So, the panel ARDL model is utilized. The outcomes of the panel ARDL model are listed in table 4.

# Table 4

Outcomes of Panel ARDL Model Dependent Variable: D(LNNP) Method: ARDL Sample: 2012M01 2020M01 Included observations: 242 Maximum dependent lags: 1 (Automatic selection)

Model selection method: Akaike info criterion (AIC)

Dynamic regressors (1 lag, automatic): LNNII LNFCI LNOI DUMMY

Number of models evaluated: 1

Selected Model: ARDL (1, 1, 1, 1, 1)

Note: final equation sample is more significant than selection sample

Variable	Coefficient	Std. Error	t-Statistic	Prob.*					
	Long Run Equation								
LNNII	1.572	0.113	13.959	0.000					
LNFCI	0.035	0.019	1.878	0.063					
LNOI	-0.473	0.120	-3.935	0.0002					
DUMMY	-0.203	0.014	-14.549	0.000					
Short Run Equation									
COINTEQ01	-0.796	0.154	-5.169	0.000					
D (LNNII)	-1.314	0.608	-2.159	0.033					
D (LNFCI)	-0.208	0.166	-1.251	0.214					
D (LNOI)	2.080	0.696	2.988	0.004					
D(DUMMY)	-0.182	0.113	-1.609	0.011					
С	-1.229	0.216	-5.677	0.000					

\*Note. p-values and any subsequent tests do not account for model selection.

There are two kinds of equations in table 4, long-run and short-run equations. Net interest income is crucial in explaining net profit, according to the long-run equation. The probability value is 0.00, which is less than 0.05; the t-statistics absolute value is more than 2 (i.e. 13.95), and the long-run coefficient is positive. As a result, net interest revenue has a long-term favorable effect on the net profit of Nepalese commercial banks. Similarly, the combined fee and commission revenue have a positive influence on net profit, but the effect is minor because the p-value is 0.0632, which is more than 5% or 0.05. Operating income has a p-value of 0.0002, which is less than 0.05. As a result, operational income has an impact on commercial banks' net profit, although the coefficient is negative. As a

JOURNAL OF MANAGEMENT, VOL. 5(1), 2022, FOM, MMCD 5 result, the outcome is problematic because net profit is generally dependent on net operating income. The COVID-19 pandemic dummy variable is large, however, the impact on commercial banks' net profit in Nepal is not. The COVID-19 epidemic, on the other hand, maybe over soon.

The panel ARDL model's short-run equation reveals that operating income has a positive and considerable influence on commercial banks' net profit in Nepal. Net interest income and fee and commission revenue negatively affect net profit in the short term. It's also a contentious and shaky conclusion. However, the COVID-19 epidemic has had a considerable and detrimental influence on Nepalese commercial banks' net profit.

The COVID-19 epidemic has a detrimental influence on Nepalese commercial banks' net profit in the short and long term. The correlation study (Table 2) reveals that net interest income and net profit, joint income from fee and commission revenue and net profit, and total operating income and net profit have a high degree of positive association. We can draw a link between this and the COVID-19 epidemic from this. In this sense, the COVID-19 epidemic has a detrimental influence on Nepalese commercial banks' net profit, net interest income, fee and commission income, and total operating income.

#### **Conclusion, Policy implications and limitations**

From 2011 through 2020 (2010/11 to 2019/20), the combined fee and commission revenue are more unpredictable, although net interest income is more constant than other factors. All 27 commercial banks in Nepal have a strong positive association between net interest income and net profit, fee and commission revenue and net profit, and operating income and net profit. The impact of the COVID-19 epidemic on commercial banks' net profit in Nepal is unfavourable in the short and long term. The COVID-19 epidemic in Nepal has reduced net profit, net interest income, fee and commission income, and operational income.

The COVID-19 pandemic appears to have a detrimental influence on net profit and its main drivers. It is difficult to eliminate a pandemic via human effort. As a result, making recommendations to policymakers is challenging. To enhance profit, it is suggested to decrease unneeded expenditures that may be cut without disrupting the banking business. The importance of the e-banking process might be stressed to prevent banks from experiencing a sudden drop in profit and other revenues.

This research is based on panel data from 27 Nepalese commercial banks. It covers each bank's statistics for the last 10 years if there isn't one. Net profit, net interest income, fee and commission revenue, and total operating income are the only four

# JOURNAL OF MANAGEMENT, VOL. 5(1), 2022, FOM, MMCD variables. The influence of the COVID-19 pandemic on net profit and its main variables in Nepalese commercial banks is studied using a dummy variable. The result is reached using panel descriptive statistics, correlation analysis, panel unit root testing, and the panel ARDL model. As a result, further research is needed, which will include more data, independent variables, tools, and approaches.

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