Article

Future Agendas in Finance in a Post-pandemic World: A Brief Overview

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Abstract

The COVID-19 pandemic created an environment of unprecedented shock among global economies. Prolonged lockdown across countries, national economic downturns and unexpected disruptions of demand and supply cycles created a likeliness towards a phase of slowdown that could last for an uncertain period. The current study is an attempt to investigate the possible post-pandemic implications on selected financial dimensions of an economy. Secondary data have been relied on to highlight the social and economic impact of this pandemic by drawing insights from literature that have been able to foretell or assess the impacts of likely situations of crisis. Major findings of the study are indicative towards the need of fulfilling unmet investments in preparedness against pandemics, the obvious advantages of having pandemics like COVID-19 being covered by insurance, possible long-term shifts in global spending patterns and the importance of financial markets enduring through such uncertainty. Understanding the impacts of past events that might closely parallel the COVID-19 pandemic brings out avenues of future research in this direction and a possibility of supplementing the scant literature available in this area of study.

Keywords

Bank risk, catastrophe insurance, COVID-19, financial market risk, pandemics

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Introduction

Fortunately, we are all now aware of the continuous efforts being made to combat the COVID-19 pandemic and reduce its high death toll. We are also concerned about how the crisis will ultimately affect the economy and particularly how it will affect financial markets. As of the time of writing, the ill effects of the pandemic remain active and the full extent of the catastrophe is still unknown. However, it is realistic to anticipate that the topic of pandemics and finance will garner a significant deal of interest in the very near future. Since the outbreak, there has been tremendous scientific advancement in our understanding of COVID-19. Data gathered and analysed brought to light how the body of literature on this subject evolved through time (Rinaldi et al., 2020). The initial focus of COVID-19 research was on the disease's transmission, diagnosis and testing. As a result, there has been an increase in research on the wider effects of the COVID-19 pandemic, with an emphasis on studies of human cultures, sustainability and mental health. In addition to analysing the effects of previous pandemics and epidemics, recent academic studies also unsettlingly predict catastrophic occurrences like COVID-19 and its economic repercussions. Future research topics include examining the effects of earlier occurrences that, in some respects, closely mirror COVID-19, as well as how COVID-19 may differ from those earlier events. Understanding the potential ramifications of the COVID-19 pandemic on many financial dimensions is vital since the realm of finance continues to gain relevance in so many spheres of social life (Hopwood & Miller, 1994). While it's true that there is a scarcity of literature on how the pandemic may have influenced future agendas in finance, many eminent researchers across different domains of research interest (Brodeur et al., 2021; Cachón-Zagalaz et al., 2020; Harapan et al., 2020; Koutoupis et al., 2021; Piccarozzi et al., 2021; Pokhrel & Chhetri, 2021) have recognised this as an opportunity to explore new ideas and possibilities. Thus, the relevance and need of a research attempt in this direction becomes enhanced.

This brief conceptual article sketches the minimal study on pandemics and finance that has been done so far and suggests some partial connections with other, more thoroughly researched, fields of financial economics research. By consulting a variety of literary works, a brief analysis of potential COVID-19 effects on financial markets and institutions, either directly or indirectly, is presented. The 'Introduction' section of the study introduces the topic of the research to readers; the 'Literature Review' section presents a concise discussion on the limited literature available on this topic and the 'Research Methodology and Objective' section brings to light the major objective of the research endeavour along with the methodology adopted for its implementation. The observation and findings of the study are upheld in the 'Observations and Findings' section and divided into subheads of major financial dimensions for better comprehension. The conclusions of the study along with implications and scope of future research are summarised in the 'Conclusion' section.

Literature Review

Available literature on the COVID-19 pandemic and its impact on economies' public administration and financial markets are limited in quantity and scope. However, a lot of recent research attention is being put in this direction to address various aspects of the pandemic with a view emphasising that according to national circumstances, there is variety in the scope and format of each country's response. In such circumstances, a concise yet comprehensive review of literature has been conducted to better grasp the current topic under study.

The effects of COVID-19 on finance and potential future agendas have been the subject of numerous research. According to certain studies (Iqbal & Bilal, 2021; Castellano et al., 2020), financial institutions will need to become more flexible and responsive to quick changes in market conditions. This is because the pandemic has revealed the limitations of traditional financial systems and their inability to respond quickly to crises. Other studies have focused on the role of digital technology in shaping the future of finance. For example, Obeidat et al. (2020) argue that the pandemic has accelerated the trend towards digital transformation in the financial sector, and that new technologies such as blockchain and fintech will play an increasingly important role.

Numerous studies also show that in the post-pandemic world, sustainable finance will be a crucial goal (Carannante et al., 2021; Le et al., 2021). This is due to the pandemic's emphasis on social and environmental issues, and the fact that investors are increasingly looking for companies that prioritise sustainability. Furthermore, studies have been conducted to investigate the potential influence of the pandemic on financial regulation (Caserotti et al., 2021). According to this research, authorities will need to take a more proactive approach to risk management and financial stability in order to avoid future crises. Other scholars focus on the implications of the pandemic on banking practices and services (Tabari et al., 2020; Li et al., 2021). They argue that banks will need to become more customer-centric, by offering personalised and flexible services that meet the evolving needs of consumers in a post-pandemic world. Some studies have also emphasised the need of collaboration and cooperation among various financial stakeholders (Clemente-Suárez et al., 2020; Haldane, 2020). This is because this pandemic has highlighted the global financial system's interdependence and the significance of working together to confront common concerns.

Broader patterns in accountability were exposed by the response to the COVID-19 pandemic. Public authorities adopted different accountability practises, each of which was impacted by how they tried to defend their actions to the public (Andreaus et al., 2021). However, several research asserted that several policies come with unintended consequences that will have a detrimental influence on environmental concerns, poverty, inequality and, more broadly, the global sustainability agenda (Ahrens & Ferry, 2020; Argento et al., 2020; Elkhashen et al., 2021; Heald & Hodges, 2020). In order to better comprehend the short-, medium- and long-term effects and implications of the dispersed budgetary reactions to the pandemic, as well as their connections and interdependencies, more research is required.

Most of the publications, which are primarily published in medical journals, deal with epidemiologic topics. A rising number of studies highlight key success elements and governance aspects of the pandemic (Amat et al., 2020; Liu & Saltman, 2020). The economic effects of the pandemic are being put under study by various researchers and academicians.

Little insights into financial risk and equity resilience may be gained from the scant literature addressing the pandemic's influence on the financial markets and how accounting is involved in analysing and calculating this impact. As an example, Yu et al. (2021) analyse the COVID-19's systemic risk spillover effect between countries. The results demonstrate that the nations with the most severely impacted economies served as the primary risk senders during the early phases of the pandemic. Yet, the study discovers that the impacts of risk spillover are extremely dynamic. De Vito and Gómez (2020) concentrated on the liquidity risk and provided crucial advice on how to reduce the possibility of a cash shortage. They also identified share price resiliency as a potential area for further study in this context. Bénassy-Quéré and Di Mauro (2020) provide a thorough collection of texts addressing issues such 'safeguarding businesses, employees, banks, national budgets, and sovereign debt'. Their work also further brings forward ideas for newer monetary and fiscal policy drives for addressing the impact of the current crisis on the economy, saying that for politicians to succeed, they must act quickly and break taboos. Amat et al. (2020), who have little doubt that the impending recession will have significant distributive effects, consider relief measures to lessen the economic effects of the lockdowns. According to Bozorgmehr et al. (2020), the convergence and interaction of the COVID-19 dilemma with three other global crises—the governance, economic and migratory crises—makes the situation significantly more extensive and complex. This is a challenge for both developed and developing countries. In other research, general equilibrium models are mostly used to analyse the effects of various scenarios on macroeconomic outcomes and financial markets (Mirica et al., 2020). Recent literary works point to practical measures for easing the fiscal strain on the public budget and promoting economic recovery.

Few research has considered subnational levels; most studies on the socioeconomic effects of the pandemic concentrate on the central government level. According to Spagnolo et al. (2020), this pandemic is unprecedented from the standpoint of local governmental institutions in charge of providing services. They provide a framework for negotiating COVID-19's financial implications and depend on recent polls to evaluate the reaction tactics used by local governments as they try to determine their financial standing going into the upcoming budget cycle. According to Dzigbede et al. (2020), during times of unprecedented crisis, local governments must work together for the good of the community and require financial support from the federal and state governments. They should also consider and address social and financial inequities, paying particular attention to small local governments with limited resources.

We can also draw from the results of the fiscal policies implemented following the 2008–2009 financial crisis while discussing the effects of the COVID-19 pandemic on financial markets and allied sectors (Kickert & Randma-Liiv, 2015). These, however, have once more centred primarily on the national level. Kickert and

Randma-Liiv (2015) investigated the topic of budget reduction during times of crises. Most authors think that strict regulations in some cases may be required; nonetheless, government initiatives that prioritise reassessing policy priorities and improving the effectiveness of public spending are preferable.

In conclusion, most of the available literature suggests that several agendas and trends, such as the need for agility and adaptability, digital transformation, sustainable finance, proactive regulation, customer-centric banking and stakeholder collaboration, will shape the future of finance in a post-pandemic world. As institutions seek to adapt to current challenges and construct a more robust financial system, these issues will almost certainly be essential for the future of finance.

Research Methodology and Objective

The methodology of research can be thought of as an analysis of the numerous processes a researcher takes to logically explore his research problem. It is in the form of a study blueprint that outlines the steps involved in gathering data, choosing a sample, using an instrument like a questionnaire, processing the data collected and eventually interpreting it. The current study is descriptive in nature. Thus, the methodology adopted and information collected is based on secondary data, that is, published data or data collected in past or through academic journals, relevant websites and pertinent paper presentations.

Every research study is set up to achieve specific goals. Like that, this study has been conducted to emphasise the social and economic effects of the COVID-19 pandemic by using knowledge from works of literature that have been able to predict or evaluate the effects of probable crisis circumstances. The study aims to shed light on the direct or indirect effects of the COVID-19 epidemic on financial institutions, markets and other related sectors in the field of finance.

Observations and Findings

COVID-19: Impact on the Economy

The tremendous economic costs associated with pandemics are an obvious way in which they might affect financial institutions. Many articles have been written about the costs of pandemics, including estimates for future pandemic costs as well as expenditures associated with prior pandemics like the HIV/AIDS crisis. Ex post costs of pandemics and epidemics are frequently discussed in articles on these expenses. For instance, Santaeulalia-Llopis (2008) focuses on the effect of the HIV/AIDS pandemic on development, whereas Haacker (2004) addresses the economic repercussions of the pandemic.

Many articles relevant to the COVID-19 pandemic and the crisis created out of the same have tried to estimate probable implications of ‘future pandemics and epidemics’ on the economy. Uprising costs of healthcare system, both at the public and private levels, has been a major issue of concern creating an unfavourable trickle-down effect resulting in ‘strain on health systems from not being able to concurrently

deal with more routine health issues during outbreaks; loss of employment productivity; social alienation disrupting economic activity; impact of tourism and parity; and impact on foreign direct investment' (Bloom et al., 2018).

Fan et al. (2018) have all shared their concerns in unison, indicating a consensus in their views. Recently, 'a higher investment in preparedness against severe diseases and pandemics' was noted as being unmet. According to their calculations, the 'estimated yearly losses from pandemic risk amount to roughly 500 billion US dollars, or 0.6% of global income'. The price of COVID-19 makes this so-called large amount significantly undervalued. Several other works, such as those by Yach et al. (2006), Madhav et al. (2017) and many others, also emphasise the importance of managing economic risk considering the likelihood of potential future pandemics.

Note has also been taken of papers that track the frequency of contagious disease outbreaks that have experienced 'near calls' and were successfully contained to a far lower level than they may have otherwise. Thomas et al. (2019) accounted of the recent 'deadly epidemic of the highly contagious respiratory disease Nipah in the Kerala region of India' in a subtle manner of intrigue. In this instance, public health professionals' remarkably quick response prevented a bigger global health problem. A report from the World Health Organization's Global Preparedness Monitoring Board further states that the organisation tracked 1,483 epidemic incidents in 172 countries between 2011 and 2018 which is particularly startling. The report also highlights the fact that little to no preparation is being made even though a pandemic is imminently posing a threat to the entire planet.

COVID-19: Impact on Banking and Insurance

Understandably, banks are at risk during economic downturns due to the likelihood of nonperforming loans and the potential for bank runs in the worst-case scenarios. As of now, certain studies have discovered a strong correlation between the development of HIV in underdeveloped nations and significant increases in deposit turnover. He explains this by saying that large-scale withdrawals of deposits were necessary to pay for individual treatments.

A theoretical model created by Lagoarde-Segot and Leoni (2013) demonstrates that the chance of the banking sector in a developing country collapsing rises as the combined prevalence of major pandemics rises. During epidemics, a large portion of bank and microfinance institution group lending to the poor will be subjected to pressure since the aggregate shock will exert pressure on all members of the group (Skoufias, 2003). Bank robberies may occur at rural financial institutions amid floods or crop failures (Binswanger & Rosenzweig, 1986). How COVID-19 will alter financial institution procedures is still up in the air. In general, how long will banks continue to follow a more cautious lending strategy after COVID-19? Has research been done on how banks respond to COVID-19-sized macroeconomic shocks (Bongini et al., 2019)? Literature has examined if 'black swans' have an impact on the world. COVID-19 has brought the entire world together in facing a

global challenge. As we navigate through this unprecedented time, we must consider how we can work together to address the impact of such widespread events on our communities. This includes exploring ways to ensure that we can manage the financial consequences of such catastrophes in the future. Another query is whether COVID-19 should be viewed as a 'black swan' or an unexpected occurrence with severe ramifications. 'No' appears to be the response.

It should not be viewed as completely unexpected when such a large number of academic studies, as described above, suggest that pandemics might occur and forewarn that huge economic losses might result out of the same. Further, one pandemic might lead to other epidemics that would not take much time in spreading globally.

It is obvious that pandemics like COVID-19 are preventable; hence, it is very advantageous that they are covered by insurance. The idea of such insurance is discussed by Tamura and Sawada (2009) in relation to avian flu outbreaks in Vietnam. Of course, such insurance is typically only offered to people who are financially secure, at least at the private level. Most likely, the base of the pyramid will be ignored. In the wake of major crises, Sawada and Shimizutani (2008) highlight that 'those with personal collateral quickly recover financially while those without such collateral do not'.

COVID-19: Impact on Financial Markets

Although there has not been much written about how epidemics, much alone pandemics, affect financial markets, there are some faulty analogies to be drawn from other kinds of natural calamities. Markets reacted to aviation disasters, terrorism and more recently, natural calamities like earthquakes and volcanic eruptions. While disasters involving air crashes, like as the COVID-19, have been catastrophic to the airline business globally, certain studies imply that some airlines may benefit from passengers switching carriers after air crashes. With COVID-19, which is reducing airline operations worldwide, this is unlikely to happen. COVID-19 will undoubtedly have a greater effect on some industries than others. However, COVID-19 will also have a significant impact on domestic demand in practically every nation.

Levels of spillover from other prior catastrophes have a significant impact on the degree to which past disasters' overlap sheds light on the probable impact of COVID-19 on the financial markets. Given that COVID-19 will have a global influence, it is helpful to contrast the current scenario with previous occurrences that, despite being more localised, resulted in spillovers that created more general impacts. Given that terrorist attacks are by their very nature intended to affect the public mood broadly, research on the effects of terrorist attacks on the financial markets may offer some kind of comparison.

In his article on the 'spillover effects' of terrorist strikes, Karolyi (2006) questions whether the evidence on the subject points to a widespread or 'systematic' contribution of prospective terrorism to total risk. He concludes that there is not much evidence, but there have not been many studies looking at beta or volatility

concerns in asset-pricing models. According to certain studies, market declines related to terrorist attacks are rather minor and only last for a very brief period (Brounen & Derwall, 2010). After September 11, Choudhry (2005) looked at a limited number of US companies in a range of different industries to see if this terrorist attack had an impact on a change in market betas. His conclusions were mixed. According to Hon et al. (2004), the September 11 terrorist attacks increased market correlations, with the degree of this effect differing by worldwide region. Several additional publications (Chesney et al., 2011; Choudhry, 2005; Corbet et al., 2018) give a conflicting picture of the extent to which terrorist attacks have affected changes in the nature of financial markets.

Since the 1918 influenza pandemic, COVID-19 may be a singular outcome in terms of its worldwide extent as a pandemic. However, as was already mentioned, a catastrophe of the magnitude of COVID-19 was not completely out of the question. It is fascinating to contrast the conclusion of COVID-19 with a hypothetical nuclear conflict. No one on Earth can survive a nuclear war, unless one dubiously accepts an extremely localised impact. As a result, most people believe that the prospect of nuclear war has little effect on market prices other from raising international tensions that have an economic impact. The cause does not appear to be its low probability, but rather the fact that alternative outcomes are unimportant in the case of a nonsurvivable occurrence.

According to Epstein (2019) (based on data from the US Social Security Administration), there is a 0.2% chance that a 35-year-old man in the United States will pass away in the upcoming year. Chances for a 35-year-old woman are around 0.1%. With age, these chances only very gradually rise. Even at age 50, a man only faces a 0.5% risk, and at age 50, a woman just 0.3%. What are the chances that there will be a nuclear war on a global scale in the upcoming year? We may not have enough information to make such an estimation, which is one plausible explanation. Most people believe that nuclear wars are instantly fatal because they are viewed as probability-tail events. On the other side, COVID-19 is wreaking unprecedented levels of economic havoc. However, COVID-19 is avoidable, unlike a global nuclear war and the importance of financial markets will endure. The likelihood is high that there will be a significant response on the global financial markets the next time a contagious respiratory illness suddenly appears. Surely, the pandemic scenario has set in motion future research in the domains of financial markets and tail risk.

COVID-19: Impact on Financing and Costs of Capital

Researchers will probably consider the probable long-term impact of COVID-19 on corporate funding. As was already said, COVID-19 draws attention to the potential—or even likelihood—of infectious illness outbreaks that will have a significant negative impact on domestic demand around the world. The financial markets' failure to account for the possibility of terrible tail-risk catastrophes that would be catastrophic in any case has fundamentally changed the game. The global economic harm caused by COVID-19 and similar outbreaks is

unprecedented. They can be survived, though. Now is the time to prepare for a long-term impact on capital expenses and company financing.

According to Elnahas et al. (2018), businesses in more disaster-prone regions adjust by becoming less leveraged. They explain this phenomenon through firms facing distress in disaster prone areas with respect to 'operating interruption, increased capital costs and tighter financial flexibility', which is consistent with a trade-off view of capital structure (Kraus & Litzenberger, 1973). Despite the perception that businesses have a permanent capital structure policy, they frequently react to macroeconomic shocks (Huang et al., 2018).

The COVID-19 strongly shows that equity risk was previously underpriced. Will this result in businesses using less leverage? Will equity costs fluctuate over an extremely long period of time? According to Lee and McKibbin (2004), SARS caused the national risk premium for China and Hong Kong to rise by 200 basis points. The effect of country-risk premiums on equity costs will differ depending on how exposed a firm is to different markets, but it is undeniable that an uplift of 'two percentage points in a country risk premium', which increased due to the occurrence of the COVID pandemic would translate into a higher cost of equity capital which would lead to lesser funding of pensions on a global scale. However, the findings of Lee and McKibbin (2004) about higher country risk for China and Hong Kong are predicated on the fact that these two locations were particularly at risk for SARS. However, in a true pandemic like COVID-19, the exposure is universal as opposed to localised.

COVID-19: Impact on Governments and Public

Will COVID-19 cause a long-term shift in global spending patterns? For instance, Haacker (2004) states that the HIV/AIDS crisis has permanently changed consumer behaviour. Undoubtedly, a global decline in consumer spending and domestic demand will be extremely difficult for the entire economy to handle. Do governments have a responsibility to protect citizens from the financial effects of pandemics? In situations where the private sector is unwilling to provide insurance, the public sector should play a significant role. Less concern may exist about the public sector displacing private insurance (Cummins et al., 2006). But is the issue too significant?

According to Arizala et al. (2013), only catastrophes that are exceedingly large have a negative impact on output over the long and short terms. They do point out that their findings are based on a small number of instances where violent political uprisings followed the catastrophes. How much of COVID-19's economic output's long-term impacts will be caused by a catalysing of changes in the political scenario? Is COVID-19 differing from previous natural disasters on sufficient grounds to be treated as an exception? Or should we anticipate, that economic activity will resume as it has in prior catastrophic situations?

The pandemic set into motion required changes in the healthcare and public support infrastructure. Ghesquiere and Mahul (2010), in their study, opined that managing the potentiality of natural disasters would become a tough task for

Table 1. Summary Findings and Observations.

Area of Study	Summary Observations
COVID-19: Impact on the economy	• Uprising costs of health care system, both at the public and private levels, has been a major issue of concern (Bloom et al., 2018) • A higher investment in preparedness against severe diseases and pandemics was noted as being unmet (Fan et al., 2018) • Rising importance of managing economic risk noted considering the likelihood of potential future pandemics (Madhav et al., 2017; Yach et al., 2006)
COVID-19: Impact on banking and insurance	• Bank robberies may occur at rural financial institutions amid floods or crop failures (Binswanger & Rosenzweig, 1986) • Those with personal collateral seen to quickly recover financially while those without such collateral do not (Sawada & Shimizutani, 2008) • A strong correlation between the development of HIV in underdeveloped nations and significant increases in deposit turnover • Further concern is whether catastrophes as unfortunate and widespread as COVID-19 are insurable
COVID-19: Impact on financial markets	• There have not been many studies looking at beta or volatility concerns in asset-pricing models impacted by periods of pandemic (Karolyi, 2006) • COVID-19 is avoidable, unlike a global nuclear war, and the importance of financial markets will endure (Epstein, 2019) • Pandemic scenario has set in motion future research in the domains of financial markets and tail risk
COVID-19: Impact on financing and costs of capital	• The COVID-19 strongly shows that equity risk was previously under-priced (Lee & McKibbin, 2004) • Businesses in more disaster-prone regions adjust by becoming less leveraged (Elnahas et al., 2018) • Despite the perception that businesses have a permanent capital structure policy, they frequently react to macroeconomic shocks (Huang et al., 2018)
COVID-19: Impact on governments and public	• COVID-19 may cause a long-term shift in global spending patterns (Cummins et al., 2006) • Necessary changes required in the healthcare and public support infrastructure (Arizala et al., 2013)

nations. They further put forward enhancing control and preparations for pandemics to result in greater good for public. How would COVID-19 affect societal trust is another query. There will be effects from the fact that pandemics like COVID-19 impact various age groups and economic strata in different ways. Noy (2009) notes that natural disasters have a greater impact on developing nations. Social fractionalisation, as stated by Bjrnskov (2008), erodes social trust. Reduced social trust increases transaction costs across the whole financial system

(Fukuyama, 1995). What effect this may have on the general public's acceptance of social and economic globalisation is a situation yet to be seen (Table 1).

Conclusion

The current study sought to offer an agenda for future research in finance in the post-pandemic world by delving into ideas accessible from scarce literature on analogous topics. The study further made connections and outlined impediments and opportunities for further research in this direction. As can be seen from the analysis in this article, investors, decision-makers and the general public are learning from the COVID-19 crisis that natural disasters can cause economic harm on a previously unheard-of scale. The COVID-19 pandemic is causing a direct adverse economic effect on every region across the globe. This contrasts with other events, such as a nuclear war which may take place at a global scale, which is unavoidable and hence of no meaningful consequence, or events, such as changes in the world climate, which move considerably more slowly. All sides now must accept the fact that such a phenomenon is imminently probable and likely, as has already been made clear to many. Its potential impact on issues such as capital costs, retirement planning, insurance, governments efforts in upholding financial systems, social trust and associated transaction costs, as well as political stability in countries, is yet not fully understood. Financial researchers will undoubtedly continue to debate these issues for many years to come.

Implication of the Study

The current study has significant implications for various stakeholders, including policymakers, financial institutions, investors and businesses. The study has identified impact of the pandemic on broad dimensions such as financial markets, banking and insurance, costs of capital and economy at large to name a few and the regulatory reforms within them that require immediate attention to adapt to the new normal. The study further highlights that the pandemic has accelerated the adoption of digital technologies, which have become critical for the delivery of financial services. Financial institutions and businesses need to invest in digital infrastructure and upskill their workforce to meet the changing demands of customers. The study also underscores the importance of effective risk management and regulatory frameworks to prevent the recurrence of financial crises. Policymakers must collaborate with financial institutions and other stakeholders to develop robust legal structures that promote financial stability and long-term growth. Finally, the research on future agendas in finance in a post-pandemic world offers useful insights into the problems and opportunities that lie ahead. The results of the study make a

case that stakeholders need to work together to develop innovative approaches to finance that prioritise sustainability and risk management in order to construct a more durable and equitable financial system.

Scope for Future Research

As the world begins to emerge from the pandemic, it is important to consider what the future of finance will look like in a post-pandemic world. The following are some potential areas of research that will enhance the scope of the current study in the future:

1. *Digital transformation*: The pandemic has expedited the development of digital financial technology such as internet banking, mobile payments and virtual currencies. The future of finance will almost certainly involve further digital transformation, with a greater emphasis on automation, artificial intelligence and blockchain technology.
2. *Risk management*: The pandemic has shown serious flaws in risk management strategies, notably in the area of supply chain risk. Future research could concentrate on creating more resilient risk management systems that can endure global shocks such as pandemics.
3. *Sustainability*: The pandemic has also emphasised the need for a more sustainable and socially responsible financial approach. Future study could investigate the role of finance in promoting sustainability, such as the creation of new financial products that incentivise sustainable behaviour.
4. *Financial inclusion*: The pandemic has contributed to already existing disparities, notably those connected to financial services access. Future studies could concentrate on boosting financial inclusion, particularly in emerging nations with restricted access to financial services.
5. *Regulation*: The pandemic has highlighted the significance of good regulation in ensuring the stability of the financial system. Future studies could investigate new regulatory frameworks to handle growing hazards in a fast-evolving financial world.

Overall, the future of finance in a post-pandemic world is likely to be characterised by continued digital transformation, greater emphasis on risk management, sustainability, financial inclusion and effective regulation. Further research in these areas will be essential in order to ensure a resilient and sustainable financial system that can withstand future global shocks.

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References

Ahrens, T., & Ferry, L. (2020). Financial resilience of English local government in the aftermath of COVID-19. *Journal of Public Budgeting, Accounting & Financial Management*, *32*(5), 813–823.

Amat, F., Arenas, A., Falcó-Gimeno, A., & Muñoz, J. (2020). *Pandemics meet democracy. Experimental evidence from the COVID-19 crisis in Spain*. https://osf.io/preprints/socarxiv/dkusw/

Andreaus, M., Rinaldi, L., Pesci, C., & Girardi, A. (2021). Accountability in times of exception: an exploratory study of account-giving practices during the early stages of the COVID-19 pandemic in Italy. *Journal of Public Budgeting, Accounting & Financial Management*, *33*(4), 447–467.

Argento, D., Kaarbøe, K., & Vakkuri, J. (2020). Constructing certainty through public budgeting: budgetary responses to the COVID-19 pandemic in Finland, Norway and Sweden. *Journal of Public Budgeting, Accounting & Financial Management*, *32*(5), 875–887.

Arizala, F., Cavallo, E., & Galindo, A. (2013). Financial development and TFP growth: cross-country and industry-level evidence. *Applied Financial Economics*, *23*(6), 433–448.

Bénassy-Quéré, A., & Di Mauro, B. W. (2020). *Europe in the time of COVID-19* (No. halshs-02875261).

Bjrnskov, C. (2008). Healthy and happy in Europe? On the association between happiness and life expectancy over time. *Social Science & Medicine, 66*(8):1750–1759.

Binswanger, H. P., & Rosenzweig, M. R. (1986). *Credit markets, wealth and endowments in rural south India*. Research Unit, Agriculture and Rural Development, Operational Policy Staff, World Bank.

Bloom, D. E., Cadarette, D., & Sevilla, J. (2018). Epidemics & economics. *Finance & Development*, *55*(2), 46–49.

Bongini, P., Cucinelli, D., Di Battista, M. L., & Nieri, L. (2019). Profitability shocks and recovery in time of crisis evidence from European banks. *Finance Research Letters*, *30*, 233–239.

Bozorgmehr, K., Saint, V., Kaasch, A., Stuckler, D., & Kentikelenis, A. (2020). COVID and the convergence of three crises in Europe. *The Lancet Public Health*, *5*(5), e247–e248.

Brodeur, A., Clark, A. E., Fleche, S., & Powdthavee, N. (2021). COVID-19, lockdowns and well-being: Evidence from Google Trends. *Journal of Public Economics*, *193*, 104346.

Brounen, D., & Derwall, J. (2010). The impact of terrorist attacks on international stock markets. *European Financial Management*, *16*(4), 585–598.

Cachón-Zagalaz, J., Sánchez-Zafra, M., Sanabrias-Moreno, D., González-Valero, G., Lara-Sánchez, A. J., & Zagalaz-Sánchez, M. L. (2020). Systematic review of the

literature about the effects of the COVID-19 pandemic on the lives of school children. *Frontiers in Psychology*, *11*, 569348.

Carannante, M., D'Amato, V., Fersini, P., Forte, S., & Melisi, G. (2021). Disruption of life insurance profitability in the aftermath of the COVID-19 pandemic. *Risks*, *10*(2), 40.

Caserotti, M., Girardi, P., Rubaltelli, E., Tasso, A., Lotto, L., & Gavaruzzi, T. (2021). Associations of COVID-19 risk perception with vaccine hesitancy over time for Italian residents. *Social Science & Medicine*, *272*, 113688.

Castellano, R., Cerqueti, R., & Rotundo, G. (2020). Exploring the financial risk of a temperature index: A fractional integrated approach. *Annals of Operations Research*, *284*(1), 225–242.

Chesney, M., Reshetar, G., & Karaman, M. (2011). The impact of terrorism on financial markets: An empirical study. *Journal of Banking & Finance*, *35*(2), 253–267.

Choudhry, T. (2005). Time-varying beta and the Asian financial crisis: Evidence from Malaysian and Taiwanese firms. *Pacific-Basin Finance Journal*, *13*(1), 93–118.

Clemente-Suárez, V. J., Dalamitros, A. A., Beltran-Velasco, A. I., Mielgo-Ayuso, J., & Tornero-Aguilera, J. F. (2020). Social and psychophysiological consequences of the COVID-19 pandemic: An extensive literature review. *Frontiers in Psychology*, *11*, 3077.

Corbet, S., Meegan, A., Larkin, C., Lucey, B., & Yarovaya, L. (2018). Exploring the dynamic relationships between cryptocurrencies and other financial assets. *Economics Letters*, *165*, 28–34.

Cummins, J. D., Lewis, C. M., & Wei, R. (2006). The market value impact of operational loss events for US banks and insurers. *Journal of Banking & Finance*, *30*(10), 2605–2634.

De Vito, A., & Gómez, J. P. (2020). Estimating the COVID-19 cash crunch: Global evidence and policy. *Journal of Accounting and Public Policy*, *39*(2), 106741.

Dzigbede, K. D., Gehl, S. B., & Willoughby, K. (2020). Disaster resiliency of US local governments: Insights to strengthen local response and recovery from the COVID-19 pandemic. *Public Administration Review*, *80*(4), 634–643.

Elkhashen, E., Sarhan, A., & Ejiogu, A. (2021). Budgetary responses and consequences of COVID-19: The Egyptian story. *Journal of Public Budgeting, Accounting & Financial Management*, *33*(3), 465–476.

Elnahas, A., Kim, D., & Kim, I. (2018). Natural disaster risk and corporate leverage. https://ssrn.com/abstract=3123468; http://dx.doi.org/10.2139/ssrn.3123468

Epstein, G. (2019). *The Political Economy of Central Banking: Contested Control and the Power of Finance, Selected Essays of Gerald Epstein*. Edward Elgar Publishing.

Fan, V. Y., Jamison, D. T., & Summers, L. H. (2018). Pandemic risk: How large are the expected losses? *Bulletin of the World Health Organization*, *96*(2), 129–138.

Fukuyama, F. (1995). Social capital and the global economy. *Foreign Affairs*, *74*, 89–103.

Ghesquiere, F., & Mahul, O. (2010). *Financial protection of the state against natural disasters: A primer*. [World Bank Policy Research Working Paper 5429]. https://doi.org/10.1596/1813-9450-5429

Haacker, M. (2004). HIV/AIDS: The impact on the social fabric and the economy. In S. Izquierdo & E. Cavallo (Eds), *The macroeconomics of HIV/AIDS* (pp. 41–95). Oxford University Press.

Haldane, A. (2020, November). Seizing the opportunities from digital finance [Paper presentation]. *The City UK 10th Anniversary Conference* (Vol. 18). https://www.bankofengland.co.uk/speech/2020/andy-haldane-speech-the-cityuk-national-conference-2020

Harapan, H., Itoh, N., Yufika, A., Winardi, W., Keam, S., Te, H., Megawati, D., Hayati, Z., Wagner, A. L., & Mudatsir, M. (2020). Coronavirus disease 2019 (COVID-19): A literature review. *Journal of Infection and Public Health*, *13*(5), 667–673.

Heald, D., & Hodges, R. (2020). The accounting, budgeting and fiscal impact of COVID-19 on the United Kingdom. *Journal of Public Budgeting, Accounting & Financial Management*, *32*(5), 785–795.

Hon, M. T., Strauss, J., & Yong, S. K. (2004). Contagion in financial markets after September 11: Myth or reality? *Journal of Financial Research*, *27*(1), 95–114.

Hopwood, A. G., & Miller, P. (Eds). (1994). *Accounting as social and institutional practice*, Vol. 24. Cambridge University Press.

Huang, H. H., Kerstein, J., & Wang, C. (2018). The impact of climate risk on firm performance and financing choices: An international comparison. *Journal of International Business Studies*, *49*, 633–656.

Iqbal, S., & Bilal, A. R. (2021). Energy financing in COVID-19: How public supports can benefit?. *China Finance Review International*, *12*(2), 219–240.

Karolyi, G. A. (2006). The world of cross-listings and cross-listings of the world: Challenging conventional wisdom. *Review of Finance*, *10*(1), 99–152.

Kickert, W. J., & Randma-Liiv, T. (2015). *Europe managing the crisis: The politics of fiscal consolidation*. Routledge.

Koutoupis, A., Kyriakogkonas, P., Pazarskis, M., & Davidopoulos, L. (2021). Corporate governance and COVID-19: A literature review. *Corporate Governance: The International Journal of Business in Society*, *21*(6), 969–982.

Kraus, A., & Litzenberger, R. H. (1973). A state-preference model of optimal financial leverage. *The Journal of Finance*, *28*(4), 911–922.

Lagoarde-Segot, T., & Leoni, P. L. (2013). Pandemics of the poor and banking stability. *Journal of Banking & Finance*, *37*(11), 4574–583.

Le, T. H., Do, H. X., Nguyen, D. K., & Sensoy, A. (2021). Covid-19 pandemic and tail-dependency networks of financial assets. *Finance Research Letters*, *38*, 101800.

Lee, J. W., & McKibbin, W. J. (2004). Globalization and disease: The case of SARS. *Asian Economic Papers*, *3*(1), 113–131.

Li, X., Li, B., Wei, G., Bai, L., Wei, Y., & Liang, C. (2021). Return connectedness among commodity and financial assets during the COVID-19 pandemic: Evidence from China and the US. *Resources Policy*, *73*, 102166.

Liu, Y., & Saltman, R. B. (2020). Policy lessons from early reactions to the COVID-19 virus in China. *American Journal of Public Health*, *110*(8), 1145–1148.

Madhav, N., Oppenheim, B., Gallivan, M., Mulembakani, P., Rubin, E., & Wolfe, N. (2017). *Pandemics: risks, impacts, and mitigation*. https://www.ncbi.nlm.nih.gov/books/NBK525302/

Mirica, C., Zlati, M. L., Micu, A. E., Stanciu, S., Sapira, V., & Florea, A. M. (2020). Managing the financial stress generated by the COVID-19 pandemic in the public

system. Solutions for economic restart in Romania. *Annals of Dunarea de Jos University of Galati. Fascicle I. Economics and Applied Informatics*, *26*(1), 61–67.

Noy, I. (2009). The macroeconomic consequences of disasters. *Journal of Development Economics*, *88*(2), 221–231.

Obeidat, S., Al-Tamimi, K., & Hajjat, E. (2020). The effects of intellectual capital and financial leverage on evaluating market performance. *The Journal of Asian Finance, Economics and Business*, *8*(3), 201–208.

Piccarozzi, M., Silvestri, C., & Morganti, P. (2021). COVID-19 in management studies: A systematic literature review. *Sustainability*, *13*(7), 3791.

Pokhrel, S., & Chhetri, R. (2021). A literature review on impact of COVID-19 pandemic on teaching and learning. *Higher Education for the Future*, *8*(1), 133–141.

Rinaldi, L., Cho, C. H., Lodhia, S. K., Michelon, G., & Tilt, C. A. (2020, July). Accounting in times of the COVID-19 pandemic: a forum for academic research. In *Accounting Forum* (Vol. 44, No. 3, pp. 180–183). Routledge.

Santaeulalia-Llopis, R. (2008). *Aggregate effects of AIDS on development* [Doctoral dissertation]. University of Pennsylvania.

Sawada, Y., & Shimizutani, S. (2008). How do people cope with natural disasters? Evidence from the Great Hanshin-Awaji (Kobe) earthquake in 1995. *Journal of Money, Credit and Banking*, *40*(2–3), 463–488.

Skoufias, E. (2003). Economic crises and natural disasters: Coping strategies and policy implications. *World Development*, *31*(7), 1087–1102.

Spagnolo, P., Balestro, E., Aliberti, S., Cocconcelli, E., Biondini, D., Della Casa, G., Sverzellati, N., & Maher, T. M. (2020). Pulmonary fibrosis secondary to COVID-19: A call to arms? *The Lancet Respiratory Medicine*, *8*(8), 750–752.

Tamura, S., & Sawada, Y. (2009). Consumption insurance against unforeseen epidemics: The case of avian influenza in Vietnam. *RIETI Discussion Paper Series 09-E-023*.

Tabari, P., Amini, M., Moghadami, M., & Moosavi, M. (2020). International public health responses to COVID-19 outbreak: A rapid review. *Iranian Journal of Medical Sciences*, *45*(3), 157.

Thomas, B., Chandran, P., Lilabi, M. P., George, B., Sivakumar, C. P., Jayadev, V. K., Bindu, V., Rajasi, R. S., Vijayan, B., Mohandas, A., & Hafeez, N. (2019). Nipah virus infection in Kozhikode, Kerala, South India, in 2018: Epidemiology of an outbreak of an emerging disease. *Indian Journal of Community Medicine: Official Publication of Indian Association of Preventive & Social Medicine*, *44*(4), 383.

Yach, D., Stuckler, D., & Brownell, K. D. (2006). Epidemiologic and economic consequences of the global epidemics of obesity and diabetes. *Nature Medicine*, *12*(1), 62–66.

Yu, M., Li, Z., Yu, Z., He, J., & Zhou, J. (2021). Communication related health crisis on social media: A case of COVID-19 outbreak. *Current Issues in Tourism*, *24*(19), 2699–2705.