

CHAPTER 3

Financial Inclusion and Its Relationship in Inclusive Economic Growth

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Summary. The purpose of this study is to discuss the relationship between financial inclusion and inclusive economic growth. Financial inclusion is the ability to gain access to relevant and affordable financial products and services applicable to their needs in transactions, payments, savings, credit, and insurance, delivered ethically and sustainably. Financial inclusion and economic growth are becoming increasingly important to national development. I will use the phenomenon of rapidly expanding financial inclusion in Asia without increasing economic growth or reducing income inequality for this study. Moreover, the impact of financial inclusion on economic development, poverty, income inequality, and financial stability is inconsistent, and there is a lack of comprehensive research. Economic development can be significantly increased through digital financial inclusion, while income disparities can be reduced and poverty can be significantly reduced based on empirical findings. The Global Index Database estimates that 50% of the adult population lacks access to formal financial services.

Keywords: economic development, financial inclusion, inclusive economic growth, poverty

1. Introduction

Access to relevant and affordable financial products and services that fulfill their needs transactions, payments, savings, credit, and insurance delivered ethically and sustainably is known as financial inclusion. National development is increasingly obsessed with understanding the link between financial inclusion and economic growth.

A transaction account allows users to store money, send payments, and receive them, an essential first step toward greater financial inclusion. The World Bank Group's Universal Financial Access 2020 endeavor is focused on ensuring that everyone worldwide can have access to a transaction account as a gateway to other financial services. Financial access makes life easier daily and supports families and businesses in setting long-term planning

and preparing for unanticipated situations. Customers are more likely to use extra financial services like financing and insurance to develop or expand their business or invest in education or health care. They can also manage risk and deal with unanticipated economic shocks as a result of becoming account holders.

A national strategy for financial inclusion has been adopted or developed in nearly half the governments that have made commitments to it since 2010. Our research demonstrates that when countries execute a national financial inclusion plan, which brings together financial regulators, telecommunications, competition, and education ministries, the pace and impact of reforms rise.

Many countries have acknowledged the importance of financial inclusion and have made it a policy priority. When countries have a healthy economic infrastructure, it is easier for them to prosper and develop economically. Financial inclusion is crucial to this process (Sarma, 2015). Different measures have been made by authorities in Asian countries to expand the number of people who have access to financial services for the first time. The relationship between financial inclusion, poverty, and income inequality has also been the topic of numerous studies, which have employed different approaches and come to different results. As with the relationship between financial inclusion and financial stability, other studies have produced conflicting results. Financial inclusion improves financial stability. According to research by Hannig and Jansen (2010), came to different conclusions about the relationship between financial inclusion and financial system stability, both of which concluded that financial inclusion had a detrimental impact on financial stability. The rise in banking services did not promote financial stability because it was not followed by a fall in borrowing prices for the lower middle class, an increase in service quality, and a lack of confidence.

For this study, the author will use the phenomenon of rapid financial inclusion growing in Asia without accompanying increases in economic growth or reductions in income inequality, as well as inconsistent findings and a lack of comprehensive research that examines the impact of financial inclusion on economic development, poverty, income inequality, and financial stability (Collard, 2007). It is anticipated that the findings of this study will aid in establishing and implementing policies that promote financial service access, which will lead to increased economic growth and reduce poverty while also distributing income more evenly.

It is possible to accomplish economic growth by relying on various economic sectors, one of which is the financial industry. One of the critical roles of the financial industry is to reduce risk, while the other three are to help save money, lower transactional costs, and promote specialization (Beck et al., 2007a). And the banking industry could offer borrowers quality financial instruments with low risk, which will speed up economic growth in the long run.

Financial inclusion and economic growth have been linked in several research. Data from Indian subnational levels to determine the effect of financial access and use in economic growth in India. They find that both have a beneficial impact on economic growth in India. Financial inclusion and communication technologies to be essential for economic development. According to Beck et al. (2007b), governments and policymakers can use access to finance as a policy instrument to boost economic growth. Increasing the availability and affordability of financial resources for all economic actors will increase economic activity and output. Data from 49 nations were used by Sarma (2015) to provide empirical evidence of a link between financial inclusion and economic development. According to the development of the financial sector has an enormous impact on economic growth. Improved banking

sector performance is vital for boosting economic growth, as evidenced by this finding. According to Law, economic progress necessitates a well-developed financial system. As a result of this research, Sarma (2015) concluded that access to banking services has a two-way causal link with economic growth, proving that financial inclusion and economic growth go hand in hand.

2. Post COVID-19

A woman wakes up in the early morning hours in a distant part of a low-income country and calls her cell phone. She's going to the local market to acquire some fresh produce, so she's taking out a modest digital loan to pay for it. During the day, she'll be selling her merchandise at her store on the outskirts of town, where she works. Customers will pay her in a variety of ways, including cash and mobile wallets. A mobile money agent at the shop next door will let her transfer the funds to her phone. With her profit in her mobile wallet, she'll be able to pay back the debt and walk away with nothing. The utility company has recently connected its payment system to the mobile money infrastructure, so she may pay for the gas she needs to cook dinner with this mobile money. This is a significant step forward in her day-to-day existence (Brune et al., 2011).

A chocolate factory machine malfunctions just weeks before the winter holiday season somewhere in the middle of a wealthy country. In the busiest period of the year, revenues will disappear if there isn't a new device. The owner scrambles to get a loan from his bank to afford to replace his broken machine. This may have spelled the end of the company a few years ago. However, he learned about an alternative lender via a mutual buddy. It took the online lender about a week to evaluate the borrower's creditworthiness, authorize the loan, and disburse the funds. Two weeks before Christmas, the machine was delivered on time and in perfect working condition. This is based on a true story that occurred in London.

There are numerous examples of how FinTech has aided financial inclusion in nations at various stages of development before the COVID-19 pandemic. Around the world, 1.7 billion individuals lack access to a bank account. In contrast, small and medium-sized businesses (SMEs) (which account for 95% of all companies) employ more than 60% of all workers, despite their inability to obtain financing. As the number of people with mobile phones and internet access increases, so do the prospects for FinTech (financial sector technical innovation).

A new opportunity has opened up for digital financial services to help financially excluded people because of the COVID-19 health issue. The "great lockdown," in which the country employed a succession of restrictive containment tactics such as lockdowns and quarantines as well as travel restrictions and other social isolation measures, was the outcome of government efforts to prevent viral spread. When it comes to reducing the distance, the growing demand for cashless and contactless transactions makes it possible for people and organizations to continue to use FinTech, particularly mobile money. Many governments have taken steps to reduce transaction fees while also increasing the amount that can be spent on digital transactions to promote the use of bitcoin (e.g., Ghana, Kenya, Myanmar, among others). These new developments may expedite the shift away from traditional financial services and toward digital ones. Because of the SARS outbreak in 2003, China has used

electronic payments and e-commerce in a digital form much more quickly than before (World Economic Forum).

Even individuals without bank accounts will be able to take advantage of tailored fiscal measures made possible by FinTech, which has already played a critical part in lowering the COVID-19's economic impact. To reach individuals and organizations more quickly and securely, FinTech reduces or eliminates the need for face-to-face interactions and cash in numerous ways. Government transfers are sent using mobile money networks in countries with limited access to banking networks. Data obtained via mobile payments allows governments to engage with informal workers outside of standard aid programs. For example, a new initiative targeting casual workers in Togo has been developed that uses mobile money and provides a top-up for female beneficiaries. Taxpayers are urged by authorities to file their forms electronically. The epidemic has hit many SMEs, including those in China, and some FinTech lenders are responding quickly to the liquidity needs of these businesses by using real-time data and online methods. Lenders who use FinTech are known as FinTech lenders. Many large and small FinTech firms offer loan repayment flexibility to borrowers who the financial crisis has harmed (e.g., India, Kenya, and United Kingdom). FinTech firms and digital banking can contribute to the expansion of e-government, but more remains to be done.

Given recent empirical findings, digital financial inclusion holds enormous promise in increasing economic development while also lowering income disparities and decreasing poverty. FinTech has made accounts, transactions, and loans more accessible to a more extensive range of people in recent years, from low-income households to small and medium-sized enterprises (SMEs). There are also opportunities in the development of digital savings, cross-border transfer solutions, and insurance (Amidžić et al., 2014). Access to credit has positive macroeconomic implications aside from improving individual prospects. According to IMF research, financial inclusion promotes growth and reduces inequality, and it has no negative impact on financial stability as long as the financial sector is effectively regulated. It also enhances macroeconomic policy efficacy, promoting growth and stability further. After the significant COVID-19 shock, these findings are critical for generating new income and employment and eliminating financial access disparities.

While the COVID-19 issue has opened up new possibilities, it has also brought to light problems that were already beginning to emerge ahead of the epidemic. For example, authorities are concerned about the dangers of financial stability posed by regulatory arbitrage, which causes economic activity to move from heavily regulated to weakly regulated. These worries are exacerbated by the potential disruption of existing business models and the ties between traditional financial institutions and loosely regulated FinTech firms. The technology itself poses hazards to banks and nonbank financial companies, such as the possibility of confidential data leaking, mainly through cyber assaults. New money laundering and terrorism finance concerns may be posed to financial service providers. Cybersecurity concerns and unethical lending practices by institutions with lax regulations, according to regulators, might undermine public confidence. During and after COVID-19, the financial technology landscape and rules may change, altering the risk-reward equation.

These dangers could be exacerbated if people lack financial and digital skills. Economic consequences may significantly impact microfinance institutions' operations and clientele, putting financial inclusion at risk. Microfinance institutions may also be straining to operate digitally during the COVID-19 situation.

As a result, a large number of FinTech firms are in their infancy and have never been through a recession, let alone the most significant global shock in decades. A crucial test of the FinTech sector's resiliency will be the COVID-19 crisis. To begin with, smaller FinTech firms will be hit harder by stricter funding conditions than larger ones. FinTech fundraising activity stagnated in the first quarter of 2020, resulting in the worst first quarter for FinTech funding since 2017, as investors drew back investments, according to preliminary data. If the lack of capital causes smaller FinTech firms to be acquired by larger ones or go out of business, the market concentration in the FinTech sector could increase shortly. As a result of the economic crisis, revenues for FinTech payment companies would decline. This is especially true in areas like hotels, restaurants, airlines, and even retail. And lastly, because many small borrowers are the ones who the current financial crisis will hit the hardest, loan quality may plummet due to FinTech lending.

3. Contemporary dilemmas of entrepreneurship

Entrepreneurs give our economy one of, if not the biggest, boosts. They don't just take the risk for the sake of the business; they do so to create jobs and enrich our society. Only when a society rewards and fosters entrepreneurial activity can it be prosperous because entrepreneurs and their actions are, in fact, the crucial component for success, prosperity, growth, and opportunity in any given economy. It's not easy being an entrepreneur; there are dangers and ups and downs to contend with. In the recent decade, entrepreneurship has grown and developed, changing the laws of entrepreneurship once more due to this growth and development. Not all entrepreneurs must indeed be equally educated, but this does not mean that they must be geniuses or have an active idea before starting a business. Instead, just like any other business owner, they must set clear objectives and goals. Universities appear to be unable to grasp the concept that preparing students with real-world experience is far more beneficial than simply teaching them business administration with a slant. However, I shall clarify what an entrepreneur is, their ideals, and their traits in this piece.

The term "motivation paralysis" refers to a state in which one feels unsure of what to do next. Having a clear idea of where you want to go might help entrepreneurs stay on track. If you're not sure about something, talk to someone who does. This may be a business coach, members of a Vistage group, or anybody else who can give you a new perspective on your work. Even while some business owners may be embarrassed to ask for help, this attitude is wrong. Nobody knows everything, and it's impossible to know everything.

Because you're so busy with the daily grind, you don't have time to consider your next move. This means you're working on your business rather than on it. Even early in the life of your company, this position is unavoidable at some point in the process. Working long hours, being short-staffed, and dealing with frequent problems like inadequate money and few professional network connections can lead to burnout. Entrepreneurs are notoriously bad at delegating duties, especially early on, but you may need to do it if you want to free up time for long-term thinking.

To expand a firm, you'll nearly always need to have money on hand. It's here that the majority of entrepreneurs hit a roadblock. While the general public views entrepreneurs as reckless riverboat gamblers who aren't afraid to take on debt in exchange for the possibility

of paying it back (and making even more). The truth is that many of them don't have the stomach (or don't believe they have the stomach) to take on additional debt. A scarcity of information frequently aggravates that issue. There are several financial possibilities available to entrepreneurs, depending on their risk appetite.

It doesn't mean you won't have disagreements with your business partners, even if they are all family members, close friends, or respected business professionals. You may be the only one in the partnership that desires rapid progress, or you may be the opposite. You may also say that there are as many differing viewpoints on what to do as partners. Whatever the case may be, you must come to some sort of agreement before you can proceed.

Things are going well, so why not take advantage of the current situation rather than obsess over how to improve things further? Although the "don't worry, be happy" mentality has merit, there are only a few instances where leaving things alone makes sense. However, the majority of the time, you must plan a few steps. To paraphrase a well-known saying, "If you're not progressing, you're going backwards." If things continue as they are, you may feel stress-free for a while. However, as soon as issues arise, your stress level will skyrocket. As a result, thinking about the next step must always be at the forefront of one's thoughts when working from a position of power.

Which of these predicaments most closely resembles your life right now? Keep in mind that your trouble may have a combination of two or more of these dilemmas. It doesn't matter what the situation is; problems won't go away on their own if they're neglected. You must have a strong sense of ownership in your company if you want it to succeed. Certain flaws can indeed be the death knell for a company, but the five problems listed above should not be on that list. These are serious issues, but they can be overcome. Just keep in mind that you're not on your own. It's not a sign of weakness to ask for aid; on the contrary, it shows strength. Admitting you need support is a sign of a strong person, and overcoming adversity makes that person even more substantial.

4. Science business: role of universities in transfer of knowledge and shaping entrepreneurship

International and national policies have been implemented during the last two decades to boost regional competitiveness, and universities have played an essential role in many of these programs. Universities are acknowledged as knowledge-intensive institutions and environments that encourage the development of human capital, innovation, and entrepreneurship when their contributions to education, advanced research, and knowledge networking are considered. To be on the safe side, universities nowadays include in their mission not only a generalized knowledge transfer but also a promotion of business thinking and entrepreneurial culture and the creation of institutions as well as venture capital, all of which contribute to the growth of regional entrepreneurial ecosystems.

The current article aims to evaluate the contribution of Greek universities to the promotion of regional entrepreneurial ecosystems, make a comparative evaluation of them and strengthen the role of Greek universities in regional entrepreneurial ecosystems by looking at the development of entrepreneurship in teaching and learning through the various actions of the innovation and entrepreneurship units of Greek universities between 2011 and 2015.

It begins with a study of entrepreneurial ecosystem theories and the role of universities in regional development. This study aims to record greek universities' innovation roles by collecting and processing data on those institutions' innovative activities, using the case of the innovation and entrepreneurship units as a case study. Third, policy ideas for the national and regional levels of government are developed based on the research findings. To put it another way, entrepreneurship is the process of turning a business idea into a viable firm.

Entrepreneurs are a valuable asset for any nation. They contribute to the economy by generating work opportunities. A non-profit organization called TiE (the indus entrepreneurs-www.tie.org) asserts that each entrepreneur generates 30 new jobs. In addition, they provide revenue for governments by enabling the introduction of new goods and services and by collecting taxes. They are responsible for propelling the country's economy forward.

However, only a tiny percentage of people create their enterprises (Imbroscio, 2013). This can be attributed to various factors, including bureaucratic roadblocks, poor infrastructure, insufficient finance, personal risks, and cultural differences. Furthermore, India's educational system is constrained by tight bounds, preparing pupils to enter traditional occupations rather than inspiring them to follow their passions. Also, according to a recent research, only 22% of would-be entrepreneurs have access to proper training. According to another survey, over 80% of students in wealthy countries learn a skill or a trade by the time they are fourteen. For all of these reasons, educational institutions play a more significant role in helping people develop their entrepreneurial skills.

Economic progress relies on social integration to discover sustainable answers to pressing global issues. The establishment of new firms and the alliance of key actors in the environment are all development processes that every society seeks a practical approach to generate. In the transfer of technology, information marketing, and regional economic growth, university-business relations (UBR) are playing an increasingly essential role. A topic that has arisen and is being discussed in the current global economic climate is universities installing research centers within firms (mainly focused on information technology) to carry out cooperative research initiatives. If the UBR can be institutionalized through partnership agreements, and if so, how might other universities or corporations in the research community imitate those connections that have been successful?

Since about fifteen years ago, the ecosystem approach to entrepreneurship has been found in international literature and policies. According to biology, an ecosystem is a collection of interdependent relationships between living and non-living species to preserve their natural balance at all times. The term "ecosystem" has been widely used in social sciences, which referred to an entrepreneurial ecosystem as the empirical environment of a company (La Porta et al., 1998). There isn't a single, commonly agreed-upon definition. The definitions are differentiated based on the many scales, research areas, and data that have been collected. Most reports emphasize the interaction and combination of institutions that establish standard cultural norms that support corporate activity, primarily through networks. There are "dynamic processes and acting persons at the local, institutional and cultural levels that stimulate and foster the emergence of new firms" (Berger et al., 2008).

More comprehensively stated that entrepreneurial ecosystem is composed of various factors that encourage the emergence and growth of creative start-ups while also encouraging new business owners and other stakeholders to take on high-risk ventures. As a result, his classification of the above characteristics is divided into three parts: material characteristics

(universities that train young entrepreneurs while also producing new knowledge), cultural factors (supportive cultures, outstanding successful businesses), and social aspects (talented human resources, successful local entrepreneurs offering consultation to young entrepreneurs, available investment capital, social networks between entrepreneurs, consultants, and working individuals that allow knowledge diffusion). Instead, they were created and replicated due to their interactions (Kuckertz, 2019). An entrepreneurial ecosystem can be thought of as nothing more than a geographic location. It comprises a variety of actors and environmental factors that work together to define a region's entrepreneurial performance. There is a wide range of stakeholders in the regional economy, including entrepreneurs, firms, universities, regulatory agencies, and local or regional governments. All of them can be productive when working together efficiently. Because they concentrate on the outside business environment, regional entrepreneurial ecosystems mirror other related local development concepts such as company clusters, industrial zones, innovation systems, and learning regions (Demirgüç-Kunt, Klapper, 2012).

5. Regional economy

Thanks to the growth of digital financial inclusion, increasing access to and availability of formal financial services has never been easier than it is now. Another significant influence on financial development and growth is economic freedom. As a result, there's a good case for looking at how financial freedom affects economic freedom. No empirical evidence exists in the literature, however, that these variables are linked. As a result, we investigate these connections. For emerging nations, we found that the interplay between ICT diffusion and economic freedom and financial development is beneficial to financial inclusion over the long term; this highlight how important it is to create an economic climate that encourages long-term economic growth. Our findings have important policy implications and necessitate a more comprehensive approach (Klapper et al., 2016).

Financial inclusion (FI) has been studied and found to be an essential driver of economic growth (Carretta et al., 2015). Formal financial services are available to everyone, including low-income people and micro-businesses, under the umbrella term "FI".

There are various advantages to having an inclusive financial system. However, 50% of the global adult population (or around 2 billion people) lack access to formal financial services, according to the Global Index Database 2017. More than 50 nations, according to the World Bank, are working on strategies and plans to make financial inclusion a reality.

A global socioeconomic challenge, financial inclusion (FI), will substantially impact developing countries because research has shown that FI is essential for growth and poverty reduction (Adegbite, Machethe, 2020). One of the leading causes for the lack of inclusive growth in emerging nations like India is the failure to attain greater financial inclusion. Emerging countries like India have had a unique and challenging time. Because of the differences in emerging economies, it's critical to examine dynamics in that setting.

Structural variables and policy-related factors have been highlighted in the research as essential drivers of FI across nations. While structural considerations mainly determine the cost of providing financial services to the general public, policy-related issues are critical in building an environment that promotes financial inclusion for the people at large. Information

and communication technology (ICT) infrastructure is a major structural component. Increased access to finance is one of the many benefits of general information and communications technology (ICT). One of the ways information and communication technology (ICT) promotes economic growth is through a comprehensive financial system.

6. Digital business strategy

Digital financial inclusion is a developing trend that makes it easier for anyone to access and use regulated financial institutions like banks and credit unions. Economic independence also has a significant impact on financial security increase in size and scope. Considering the impact of economic freedom on financial inclusion is thus a sound idea. However, there is no evidence in the literature to support the existence of links between these variables. As a result, we looked into these connections. It turns out that the interplay between ICT dissemination and economic freedom and financial development has a beneficial long-term impact on the participation of the poor in the global economy, underscoring the significance of building an economic climate that encourages long-term economic growth. The study's conclusions have important ramifications for monetary policy, and they advocate for a more comprehensive strategy (Boukhatem, 2016).

7. Future of digital business innovations

Researchers and practitioners are currently focused on digital transformation as a critical strategic issue (Bouncken et al., 2019). When viewed from a high perspective, digital transformation denotes fundamental economic and technological shifts taking place in society and across industries due to the widespread adoption of digital tools.

When viewed from a company's perspective, digital transformation is a comprehensive business transformation (Bouncken et al., 2019). For this transformation to take place, significant changes must be made across the whole organization, from the service processes and products to the operations to the leadership and structure to the company's overall business model and strategy (Bouncken et al., 2019). Mobile, social media, analytics, the internet of things, the cloud, and platforms have all contributed to changes at these levels. It is hoped that the implementation of these technologies would lead to significant improvements in the customer experience, increased operational efficiency, improved firm performance, and new value propositions.

Digital transformation can be described by four different qualities, as illustrated here: the target entity, scope, means, and intended consequence of the modification itself. First, the term "target entity" refers to the unit of analysis affected by digital transformation. Secondly, the term scope refers to the size of the changes occurring inside the unit under study. In other words, means relate to the innovations causing these shifts in the environment. The predicted outcomes of the considered modifications are represented by the expected result, the last of the four terms. Because these outcomes are always intended to benefit an organization, achieving them is a crucial objective of digital transformation.

To better understand digital transformation in businesses, it will look at it from two different angles in this thesis due to the wide range of possible target entities, scopes, means, and

intended outcomes. The first perspective focuses on companies from a variety of industries. Also assessing changes in the area of firm strategy brought about by various digital technologies, with an eye toward more extraordinary firm performance as an expected outcome.

Each of these viewpoints has specific research topics to explore. Even though digital transformation is occurring across a wide range of businesses, it may significantly impact particular industries than others. The financial services industry is one of the most vulnerable when it comes to digital transformation since it is being disrupted and even put at risk of going extinct. This industry faces several issues as part of the digital transformation (Gomber et al., 2017). Customers' changing demands for digitally savvy products and services and the entry of newborn-digital players from outside the traditional sectors that alienate financial services firms' customers are all part of the challenge. Due to these issues, financial services organizations' ability to create value is in danger (Asian Development Bank, 2014).

Financial technology (also known as FinTech) is the primary driver of the potentially life-threatening developments caused by digital transformation in the financial services business. Financial technology can be defined as any digital technology deployed to increase a financial service's efficiency, convenience, and accessibility for clients in the context of financial assistance. Financial services companies are beginning to integrate financial technology into their digital financial processes to become more digitally transformed.

8. Business informatics and digital society

The term "digital society" refers to a society that has adopted and integrated information and communication technology (ICTs) in their daily lives, including at work, school, and play. There is no precedent for the volume and speed at which digital breakthroughs are altering today's society, economy, and industry. Innumerable opportunities exist due to mobile and cloud technologies, Big Data, and the Internet of Things, which drive growth, improve citizen lives and increase efficiency in a wide range of industries, including health care, transportation, energy, agriculture, manufacturing, and public administration. They can also help policymakers make better judgments and include citizens in the governance process. The internet holds enormous potential because of its widespread use in terms of democracy, cultural diversity, and human rights like freedom of expression and access to information. We need to learn about how these changes affect people in the real world, such as how quickly they are happening and how they affect people's daily lives, and how they affect the government, science, education, etc., businesses. Computer science and business management are combined in the Business Informatics discipline to achieve this goal. To help industry managers embrace new areas of information technology in their managerial roles will help groove future computer science workers into their current and future jobs.

The workshop allows us to get together with our peers and share what we've learned with them. This course's emphasis on making decisions and making choices has shifted my focus. Understanding a company's strengths, weaknesses, opportunities, and threats is no easy feat. A SWOT analysis is performed on every organization before a decision is taken. To analyze that information, such firms need to monitor their environment for strengths, weaknesses, opportunities, and dangers.

Informatics, information technology, and management principles are all rolled into one field called business informatics. Medicine, business administration, and management all benefit from the usage of informatics. When it comes to selecting raw materials, informatics can help companies make better judgments about the quality of their raw materials, the capitalization of their human resources, and the solution of problems. Additionally, it can be applied in various other contexts, such as game theory in business. Business informatics is used to assist in learning in an organization, whether it is individual learning or organizational learning. There are two ways to communicate within a company: vertically or horizontally. Communication is essential for an organization's efficiency. It was accomplished admirably with the aid of technology. The employment of case tools and other forms of informatics aid in discovering new methods and merchandise.

One of a company's most important responsibilities is keeping records. Keeping records has two purposes: one is for future reference, and the other is for evidence. Documents need to be accurate and readily available at all times. Without the use of informatics, this could be difficult for the management. Informatics is favored over all other systems in terms of accessibility as well. Managers are responsible for arranging as a matter of course. Firms nowadays aren't just amorphous; they've also become far too complicated to grasp. As a result, the company's management has requested the services of an informatics expert. Making a decision is one of the most challenging aspects of running a business or investing in the stock market. It's not always simple to pick one option over another. In addition, decision-makers entrenched interests make it difficult for them to make choices. As a result, business informatics will be required.

Many human rights have been threatened by the growing use of information and communication technology (ICTs). These issues range from privacy concerns and the misuse of personal data to cybercrime risks and large-scale surveillance activities. They are diverse. A consequence of this is that every European citizen will have their human rights trampled upon at some point in time. With the support of international organizations like the United Nations and the European Council, LIBRe believes it is crucial to ensure human rights are protected. Also, it promoted cyberspace in the same way and intensity as in real life, despite the specific challenges posed by the increased use of digital technologies. Our team's mission is to find the optimal balance between cyber security issues and human rights observances. In the digital society, data protection, and digital rights, we conduct research that combines legal study with social analysis to build a socio-legal approach to information management that benefits the community.

9. Virtual enterprise

To survive and grow as a company in today's globalized world, companies must constantly seek new entry methods with quality products and services at competitive prices, which leads to a decrease in innovation cycles over time, constant shifts within a particular industry, and greater cooperation between companies. Because of advances in information and communications technology (ICT), businesses no longer have geographical or socio-cultural limits and operate on the worldwide market. They have also dimensional their resources on the global market. As a rule, firms are forming strategic alliances to attain a common aim.

With technological advancements, businesses are becoming a more critical link in the value chain since they help them reach their objectives while also providing various forms of profit. To get to modernity, however, the actual corporation is the stage where operations are transferred towards a global information society of the future. In light of the ongoing digitization of information and new communication channels, the virtual firm or organization web is becoming increasingly apparent (Ahamed, Mallick, 2019).

A virtual business is a short-term partnership of unaffiliated enterprises. It linked information technology to take advantage of market changes. Each partner brings a unique set of skills, knowledge, and experience to bear on the project. A virtual business dissolves when its goal is met, or a new market opportunity arises. "Virtual enterprise," according to Molina et al. (2007) is "a temporary network. In which skills, infrastructure and business processes are divided to fulfill unique market requirements." A virtual company is a network segment that may be reconfigured with its administration, productive resources, and production targets.

Any groups or companies which may decide to build their virtual community, such as a platform that allows them to share information about the members of their organization. The company may also address its customers via the internet, transforming this business into a virtual one. Suppliers-producers-customers is a typical value chain for such a virtual business. To meet the needs of both investors who want to put a product on the market with a short production cycle and low cost and organizations with manufacturing activity, the creation of virtual enterprises arose. Participants in the virtual enterprise structure can take advantage of this potential to capitalize on maximum production capacity.

While it takes physical capital to start a traditional firm, developing a virtual organization begins with an opportunity in the market and involves more resources than the company presently has in its mesh. Overall, a virtual company has the structure, operational functions, and logistics of a traditional company but appears functional. It considers the system on the "nuclei" of the virtual organization. To provide products and services, traditional businesses combine all of their functions into a single entity, which has the advantage of centralizing all resources and activities (making it easier to optimize the flow of operations). Allowing them to integrate results better, monitor activities, and meet short- and long-term goals.

There are disadvantages to conventional enterprises, such as the need for massive capital investment to integrate all activities into a single organization and internal barriers between departments. Overall, customers are more satisfied, which leads to higher costs for serving them and selling products. This necessitates the implementation of a customer relationship management system to meet their needs, both in terms of the product and service offerings' quality and a greater focus on the customer.

Outsourcing or subcontracting specific production processes can be more cost-effective than restructuring and re-engineering, which would result in additional expenses the company may not be able to afford. As a result, finding partners with whom to execute an association agreement just to take advantage of newly appearing market prospects or to materialize or integrate into a virtual company is an alternative considered.

It's important to note that virtual organizations do not herald the demise of traditional ones; instead, they represent a convergence of business processes, people, and technology that's more connected than ever before. Suppose a virtual organization is to be effective and efficient. In that case, it must make extensive use of the internet and intranet, communication

technologies (such as email and teleconferences), groupware programs, and virtual personnel with computer skills. Generally, all partners are treated equally in a virtual company. However, there may be instances where the coordinator, usually the starter, plays a significant influence in final decision-making.

10. Trade, global market, monetary economics and finance

Financial inclusion, also known as the development of economic systems, financial services, or financial products to give adults in society easier access, has piqued the interest of academics, policymakers, and regulators in recent years in emerging nations. Increasing the financial network within a country's borders is made possible by financial inclusion. Economic growth and development are predicted to increase as a result of inclusion. Financial inclusion has been identified as a formal aim by several countries (Sahay et al., 2015) to help them grow and prosper economically.

“Financial inclusion has yet to be defined definitively. The extent to which families and small businesses may access financial services such as savings, loans, payments, remittances, and insurance,” the World Bank says. Consumers are actively and effectively using formal financial services such as deposit and savings accounts, payment services, loans, and insurance because they are freely available, according to a 2011 report by the Consultative Group on Assisting the Poor (CGAP). Individuals and organizations have a propensity to use a wide range of financial services rather than the ability to acquire financial services. Individuals and firms may use these services for their commercial or personal gain, but the term “access” is used so broadly that other metrics have been used to measure it.

This research was prompted by the emergence of a practical debate that has yet to be empirically studied and the fact that financial inclusion and economic growth are intimately linked. We employ panel data and appropriate econometric methodologies instead of cross-sectional national data, as most previous research has examined the relationship between financial inclusion and economic growth. As a result, a multidimensional index of financial inclusion can be created for comparison purposes. To collect as many observations as possible, we use the three-year average of the data. As a result, we could look into the connection between financial inclusion and global economic growth. If our findings were used, policymakers, regulators, and academics would have valid and convincing data on the impact of financial inclusion on economic growth. The degree of economic progress (for developed and developing nations), as well as financial inclusion, might have an impact on the relationship, as well. As a result, the research sample is separated based on income and financial inclusion, allowing for a better understanding of the link between financial inclusion and economic growth.

11. Sustainable development of enterprises

Varied people have different interpretations of what it means to be sustainable. The attitudes and judgments associated with the concept of sustainability range from the conviction

that environmental conservation and sustainable ways of living and doing business are the essential issues facing the globe today to the belief that sustainability is a fad.

Sustainable development, as the name suggests, seeks to strike a balance between serving the needs of the present while also taking into account the requirements of future generations. It considers nature's needs while also acknowledging man's desire to contribute to the advancement of various parts of the planet. Another essential aspect of sustainable development is that it recognizes that growth and action must be inclusive and environmentally sound to reduce poverty and bring about shared prosperity for the entire global population. Using resources efficiently while preparing precisely for the achievement of immediate and long-term goals for people, the earth, and future generations is the purpose of sustainable development. Sustainable development is now required not only for human existence but also for protecting humanity's future.

To be sustainable, one must conserve energy and resources over the long term rather than continually depleting them to meet the moment's demands. Urbanization degrades the environment because industries continue to exploit natural resources incessantly. New technologies, businesses, and the environment must be created while harming nothing to achieve sustainable growth. Environmental degradation caused by rising population, economic development, and deforestation has put human life in jeopardy. As the number of automobiles and industries grows, pollution from greenhouse gases like carbon dioxide and methane wreaks havoc on the planet's climate. As a result of the increased emissions of greenhouse gases, ice caps worldwide have begun to melt, causing the sea level to rise. Sustainably developing a country requires action from both the government and the people.

By focusing on sustainable development, we can make the world a better place now while not compromising the opportunities for future generations. First and foremost, we must protect our planet's numerous natural ecosystems, all of which must be unbalanced for humanity to survive. The business sector has begun to recognize the possibility presented by the sustainability business case. Achieving success by improving the quality of human existence while remaining within the environmental carrying capacity. Businesses of all sizes have realized that they can take the lead in social and ecological issues.

Global Business Council for sustainable development states that sustainability is about filling the needs of people today without sacrificing the ability of future generations to meet their own needs. The fact is that company leaders swiftly realize that long-term workplace regulations can give their companies a competitive edge in the twenty-first century, regardless of personal convictions. As a result of this study, we hope to learn why businesses are increasingly committing themselves to sustainability strategies, their main implementation challenges, and what role human resources may play in their firms' journeys towards sustainable goals.

Environmental, social, and economic challenges have been surfacing in business and society for decades. Only recently have these challenges gained widespread public attention. People's well-being is at the center of the social component. Human inequality, social injustice, and poverty are immoral, and we have an ethical duty to do something about it. Initiatives like promoting peace, equal access to social services, eradicating extreme poverty and eliminating discrimination in the workplace fall under this pillar.

All sorts of energy and resource expenses may be reduced, pushing Western civilization to get more involved in sustainability. Because it's a widely utilized part of the workplace, companies can see right away how much money they've saved, which drives them to keep cutting costs. When it comes to its brand and reputation, it will show customers that it is environmentally conscious and accountable for its actions. This will affect its bottom line, but it will also encourage its stakeholders to establish a deeper relationship. In addition to increasing profitability and sales growth, the company's brand and reputation will be maintained. Sustainability is a business idea that encourages positive changes in the company's economy, environment, and society. To be a commercial priority, sustainability must have a business case. Greenpeace and its ilk, known for their outlandish claims about sustainable, social, and good governance practices, have a 25% stock value advantage over their less sustainable counterparts. It should be taken with a grain of salt because there is a compelling business case for these organizations to act responsibly toward the planet and its people.

12. Conclusion

In emerging nations, academia, policymakers, and regulators have stepped up efforts to foster financial inclusion by developing economic systems, financial services, or financial products for adults. Financial inclusion allows countries to expand their financial networks within their borders. It is predicted that inclusion will increase economic growth and development. Several countries have identified financial inclusion as a formal goal for growth and prosperity. Defining financial inclusion definitively is still a work in progress. Savings, loans, payments, remittances, and insurance are all financial services that are available to families and small businesses. Financial inclusion and economic growth are intimately related, which has led to this empirical study, which addresses a practical debate that has not been empirically studied. Because most previous research on financial inclusion and economic growth has used cross-sectional national data, we relied on panel data and appropriate econometric methods. Consequently, financial inclusion can be assessed on multiple dimensions and a multidimensional index developed.

Reference

- Adegbite O.O., Machethe C.L., 2020. *Bridging the financial inclusion gender gap in small-holder agriculture in Nigeria: An untapped potential for sustainable development*. "World Development", vol. 127, 104755, <https://doi.org/10.1016/j.worlddev.2019.104755>.
- Ahamed M.M., Mallick S.K., 2019. *Is financial inclusion good for bank stability? International evidence*. "Journal of Economic Behavior & Organization", vol. 157, pp. 403–427, <https://doi.org/10.1016/j.jebo.2017.07.027>.
- Amidžić G., Massara A., Mialou A., 2014. *Assessing Countries' Financial Inclusion Standing: A New Composite Index*. IMF Working Paper Series, No. WP/14/36, <https://www.imf.org/external/pubs/ft/wp/2014/wp1436.pdf>.

- Asian Development Bank, 2014. *Financial Inclusion in Asia. Country Surveys*. Institute Working Paper, <https://www.adb.org/sites/default/files/publication/159308/adbi-financial-inclusion-asia.pdf>.
- Beck T., Demirgüç-Kunt A., Levine R., 2007a. *Finance, inequality, and the poor*. “Journal of Economic Growth”, vol. 12(1), pp. 27–49, <https://doi.org/10.1007/s10887-007-9010-6>.
- Beck T., Demirgüç-Kunt A., Martinez P.M., 2007b. *Reaching out: Access to and use of banking services across countries*. “Journal of Financial Economics”, vol. 85(1), pp. 234–266, <https://doi.org/10.1016/j.jfineco.2006.07.002>.
- Berger A.N., Klapper L.F., Turk-Ariss R., 2008. *Bank competition and financial stability*. “Journal of Financial Services Research”, vol. 35(2), pp. 99–118, <https://doi.org/10.1007/s10693-008-0050-7>.
- Boukhatem J., 2016. *Assessing the direct effect of financial development on poverty reduction in a panel of low- and middle-income countries*. “Research in International Business and Finance”, vol. 37, pp. 214–230, <https://doi.org/10.1016/j.ribaf.2015.11.008>.
- Bouncken R.B., Kraus S., Roig-Tierno N., 2019. *Knowledge- and innovation-based business models for future growth: digitalized business models and portfolio considerations*. “Review of Managerial Science”, vol. 15(1), <https://doi.org/10.1007/s11846-019-00366-z>.
- Brune L., Giné X., Goldberg J., Yang D., 2011. *Commitments to Save: A Field Experiment in Rural Malawi*. Policy Research Working Papers. The World Bank, <https://doi.org/10.1596/1813-9450-5748>.
- Carretta A., Farina V., Fiordelisi F., Schwizer P., Stentella Lopes F.S., 2015. *Don't stand so close to me: The role of supervisory style in banking stability*. “Journal of Banking & Finance”, vol. 52, pp. 180–188, <https://doi.org/10.1016/j.jbankfin.2014.09.015>.
- Collard S., 2007. *Toward financial inclusion in the UK: Progress and challenges*. “Public Money & Management”, vol. 27(1), pp. 13–20, <https://doi.org/10.1111/j.1467-9302.2007.00550.x>.
- Demirgüç-Kunt A., Klapper L., 2012. *Measuring Financial Inclusion: The Global Findex Database*. Policy Research Working Paper Series, No. 6025. World Bank, Washington, DC, <https://openknowledge.worldbank.org/handle/10986/6042>.
- Gomber P., Koch J.-A., Siering M., 2017. *Digital Finance and FinTech: Current research and future research directions*. “Journal of Business Economics”, vol. 87(5), pp. 537–580, <https://doi.org/10.1007/s11573-017-0852-x>.
- Hannig A., Jansen S., 2010. *Financial inclusion and financial stability: Current policy issues*. ADBI Working Paper No. 259, Asian Development Bank Institute, Tokyo.
- Imbroscio D., 2013. *From redistribution to ownership: Toward an alternative urban policy for America's cities*. “Urban Affairs Review”, vol. 49(6), pp. 787–820, <https://doi.org/10.1177/1078087413495362>.
- Klapper L., El-Zoghbi M., Hess J., 2016. *Achieving the sustainable development goals. The role of financial inclusion*, https://www.cgap.org/sites/default/files/Working-Paper-Achieving-Sustainable-Development-Goals-Apr-2016_0.pdf [23.06.2016].
- Kuckertz A., 2019. *Let's take the entrepreneurial ecosystem metaphor seriously!* “Journal of Business Venturing Insights”, vol. 11, e00124, <https://doi.org/10.1016/j.jbvi.2019.e00124>.
- La Porta R., Lopez-de-Silanes F., Shleifer A., Vishny R.W., 1998. *Law and finance*. “Journal of Political Economy”, vol. 106(6), pp. 1113–1155, <https://doi.org/10.1086/250042>.

- Molina A., Velandia M., Galeano N., 2007. *Virtual enterprise brokerage: a structure-driven strategy to achieve build to order supply chains*. “International Journal of Production Research”, vol. 45(17), pp. 3853–3880, <https://doi.org/10.1080/00207540600818161>.
- Sahay R., Čihák M., N'Diaye P., Barajas A., Mitra S., Kyobe A., Mooi Y.N., Yousefi R., 2015. *Financial Inclusion: Can it Meet Multiple Macroeconomic Goals?* IMF Staff Discussion Notes 15/17.
- Sarma M., 2015. *Measuring financial inclusion*. “Economics Bulletin”, vol. 35(1), pp. 604–611. <http://www.accessecon.com/Pubs/EB/2015/Volume35/EB-15-V35-I1-P64.pdf> [12.09.2023].