National College of Ireland

An investigation into the impact of social media networks on the Peer-to-peer lending landscape in Ireland

MSc Research Project
MSc Fintech

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MSc Project Submission Sheet

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An investigation into the impact of social media networks on the Peer-to-peer lending landscape in Ireland

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Abstract

The amount of information that can be generated from social engagements and exchanges are now a significant tool in making vital decisions in the finance domain. Traditional lending is recognized for its difficulty when it comes to requirements. And the exponential growth experienced in loan listings due to P2P lending which should serve as an alternative with less bottlenecks for businesses to access funding from individuals using systems driven by technology. It's however been noted that social media influences decisions regarding the funding of these loans which might replace existing regulatory frameworks this research gains insight on awareness and how social media inputs can be used to determine lender behaviour towards the borrower. This study then seeks to investigate what impact social media networks will have on the P2P lending system in Ireland. The study will adopt an approach including Structured questionnaires were used to obtain data from participants will provide a in Ireland to further analyse for better understanding of this lending option.

1 Introduction

The global evolution prompts several innovative methods, more businesses and entrepreneurs have sought more sophisticated means of getting their business operations and expansions funded. Over the years, the progressive growth of the financial industry has witnessed the adoption of several niche ideas across the industry while leveraging on latest technology available. The Fintech industry continues to expand and challenge the traditional system of banking in a bid to fill gaps and accommodate the dynamic nature of the business world today. With the influence of technology in the financial market, more alternative funding options such as crowdfunding, micro lending, Peer to peer lending using capital markets initiatives have come to the fore (Suryono, Purwandaria, & Budia, Peer to Peer (P2P) Lending Problems and Potential Solutions: A systematic Literature Review, 2019). The P2P lending system, which has taken the form of crowdfunding in countries like Ireland and presents a different value proposition to businesses and individuals as well.

1.1 Peer to Peer Lending

The rise experienced in the adoption of P2P lending globally plays a vital role in the Fintech space, we see its major adoption in countries like the United States, India, and China (Chen & Han, 2012) to mention a few. Despite its recent emergence, it used the same online models for the facilitation of transactions in Ireland, the scope of its influence within the country is yet to be determined hence further research being carried out in the domain. A good starter for the discussion around movement from traditional to digital, is the part the Covid-19 pandemic had to play in the decline of physical business processes and surge of online business processes across the globe, another identified reason for the acceptance of the P2P lending system could be the distrust individuals have built overtime towards the traditional banking system. Individuals with less access to banks loans due to the regulatory policies have lost faith and find it difficult to secure financial help (Saiedi, Mohammadi, Broström, & Shafi, 2020). The P2P lending system provides a flexible mode of operation which gives majority the right of access and a higher chance of securing loans.

P2P lending is described as a system used to provides convenient and efficient loans through online channels for small businesses, enterprises and organizations and investment opportunities for individuals in form of lending opportunities to the borrowers (Bachmann, et al., 2011). It simply matches and connects borrowers to lender using guidelines and criteria for safe and secure transactions. Most cases usually involve partnerships with third parties. (Basha, Elgammal, & Abuzayed, 2021). A large fraction of individuals makes use of these mediums in their business conducts and activities (Raman, Barloon, & Welch, 2012). The benefits of the P2P lending system cannot be overemphasized as they outweigh the disadvantages. However, for a robust and trustworthy for the implementation of risks mitigation factors, these social network, digital identities, creditworthiness are valid indicators of today's social capital that give insight on a lenders qualification for the issuance of a loan in the P2P system (Daowd, et al., 2021).

1.2 Peer to Peer Lending Platforms

In the peer-to-peer lending system, the platform through which the transactions are conducted is essential. The lending platform ensures that individuals and businesses are provided with the ease and flexibility of acquiring funds with minimal risks (Eun & Rosenkranz, 2020). However, these platforms differ from country to country given the nature of regulatory policies adopted. We have quite an array of different P2P platforms worldwide with about 13 in the United States (Bachmann, et al., 2011). The importance of the lending platforms can be likened to the importance of the borrowers and lenders involved in the loan financing process. The P2P lending platforms get fees in return for theses facilitations regardless of how high interest rates favor the lenders which are more attractive than what's obtainable from traditional investments (Gao, Yen, & Liu, 2021). The financial global crisis and the recent COVID-19 pandemic introduced a bit of regulation using sanctions and studies show that this had a direct impact on the volume of transactions seen by the traditional lenders with a focus on SME's.

The surge experienced in the engagement of these P2P platforms rides on the back of better accessibility of lending opportunities to individuals and loans to businesses. Studies show significant growth as the USA's channels asides from the traditional channels grew from 0.3% to 1.26% with (Permana, Hidayat, & Mahardiko, 2020). These lending platforms offer the ability to access borrower credit information (Cain, 2015). The data retrieved from social networks serve part of the key factors considered in loan funding for individuals. It is noteworthy that UK had one of the first online lending platform established in 2005. However, platforms like **Linked Finance (2013) of Ireland, Lending club (2007) of the USA, Credit ease (2006) of China –** boast of being the largest and most popular P2P lending platform in their respective countries. The platform/companies operating from different countries have the same mode of operation which is leveraging on technology to connect businesses with individuals for funding, while promoting or providing Security, affordability, attractive alternative investment opportunities amongst other things for parties involved.

1.3 Importance: rationale behind research

The Irish traditional system of securing loans from banks became increasingly difficult due to the harsh economic realities and the resultant effects of the global economic crisis of the early 2000s. Besides the economic pitfalls in recent years across Europe, there is also the question of long waiting times for loan approval (at least 8 weeks), complex to navigate and high interest rates. In Ireland, loans have been essential to the growth of SMEs (Small and Medium Enterprises), however, the aforementioned factors, including the high credit scores at 30%, have made it difficult to get loans. These conditions with loan acquisition led to the introduction of innovative and alternative ways to loan funding. One of such new methods is the P2P lending system, a type of crowdfunding which seeks to connect individuals and businesses to lenders using online platforms. The P2P system, unlike the traditional banking system, is perceived to be fast, more reliable, and efficient considering the non-involvement of banks.

However, the traditional banking system remains a source of loan funding despite the introduction of the P2P lending system in Ireland. With its introduction to the financial markets in 2013, the online P2P lending system is still relatively new in Ireland, which provides the need for studies focusing on the Irish P2P lending landscape as an alternative to already existing lending models, it investigates how it can or can't be influenced by factors generated from social networks.

1.4 Research question

The research question will focus on uncovering "what factors motivate individuals(lenders) decision to fund borrowers(businesses) on Peer to peer(P2P) lending platforms?"

1.5 Objectives of the study

1. The study would measure Irish participants knowledge and familiarity of the lending system
2. Understanding the perception of individuals in Ireland when it comes to P2P lending systems
3. The study will identify the factors motivating P2P lending from the lenders view in Ireland

1.6 Outline of the Study

Chapter 2: This chapter looked at past related research to the study, that has been conducted regarding Lending, P2P, and social media

Chapter 3: This chapter discusses the method and analysis technique that were be adopted during the data collection process.

Chapter 4: This chapter discusses the analysis in-depth and results from techniques deployed on the data collected and the research

Chapter 5: Conclusion and brief discussion on findings/future potential research.

2 Related Work

P2P lending, also known as crowdlending, is one of the most widespread types of alternative finance models in Europe and across the world. As of 2019, the global P2P market stood at $67.93 billion (Devarajan & Sasidharan, 2020). Microbusinesses are essential to the growth of global economies in the world and the P2P lending system provides an alternative means of funding for these types of businesses. Research has shown that individuals make lending decisions based on factors such as information provided and the implications of loan outcomes. In this case, potential lenders including investors and businesses are screened using their online portfolio to ascertain the viability and legitimacy of information provided that qualifies them for loan funding (Saiedi, Mohammadi, Broström, & Shafi, 2020). Another factor in the P2P lending system is trustworthiness. In accessing loan funding via several platforms in the P2P system, the trustworthiness of lenders and borrowers must be assessed.

The global economic crisis experienced in 2008 led to a breakdown of trust in traditional banking systems. However, the P2P lending system offers a conservative and more transparent approach that yield returns with minimal risks (Basha, Elgammal, & Abuzayed, 2021). Investigating the systems mode of operation, limitations, risks and motivators without ruling out the influence of social media factors is important (Gao, Yen, & Liu, 2021), as most transactions are done online.

2.1 Awareness of the P2P Lending System

In many parts of the world, the P2P lending system has grown to become one of the most common means of monetary transactions. In Ireland, individuals and businesses have embraced the benefits of the lending system to secure funding for the growth of their businesses. While it is regarded as a growing market within the scope of the financial landscape in Ireland, there is a need to develop stringent regulatory frameworks to ensure transparency, accountability, and sustainability (Zhao, et al., 2017). Individuals and organizations are slowly embracing the model of the P2P lending system with its low interest rates and high profit yield for investors. The requirements for securing a loan are less stringent compared to the traditional banks in Ireland. Initially, the P2P lending market came under scrutiny and remained relatively small due to the uncertainties surrounding the regulations that made for seamless transactions and ensured loan repayments.

Although large corporate investors are likely to inject funds into the P2P lending system to stand a chance of earning higher returns, there is the danger that this may lead to a market crash. However, adopting a more conservative approach in the lending system has seen individual investors earn profits. In Ireland, some attractive features of the P2P lending system involve low risk, high returns (10-15%) and a secure platform to carry out transactions. Ireland might be a growing market in the P2P landscape compared to the rest of the world, especially countries like UK, USA, China and India, there are indicators that show the numerous advantages the lending system offers individuals and businesses in Ireland.

2.2 Perception of Lenders in the P2P Lending System

The loan funding process involves two parties (the lender and borrower) the facilitation of these transactions is impossible without both parties (Basha, Elgammal, & Abuzayed, 2021). However, in this context, it's safe to say P2P lending is the same with traditional financial institutions. Except that, the P2P system takes a slightly different approach in obtaining information (Basha, Elgammal, & Abuzayed, 2021). The focus here however is the lender who is also seen as an investor for returns. The Borrower, which can be a business acquire funding by listings their funding opportunities on the P2P lending platforms. In P2P lending, borrowers see a channel perceived to be seamless in obtaining loans under better conditions. For lenders, it is seen as an investment model that provides them with financial risk coupled with the credit score ratings of the funded loans (Bachmann, et al., 2011).

2.3 Factors influencing the P2P Lending System

Due to how flexible and less stringent P2P lending is in comparison to traditional methods, businesses can secure loans faster compared to the long waiting times experienced using other channels (Kollenda, 2022). Also, there are no complex documentation processes in the P2P lending system. Individuals are encouraged to go after these alternative means of funding because there is less risk exposure compared to the volatility of financial institutions (Rosavina, Rahadi, Kitri, Nuraeni, & Mayangsari, 2019). Another motivation users have for using the P2P lending platform is the ease at which borrower and lenders are connected, enabling lenders screen the businesses for loan eligibility and choose their funding preferences. It means financial institutions do not need to act as intermediaries between the borrowers and lenders (Dinga, Huanga, Lib, & Mengb, 2019).

Another motivation to use the P2P lending system is the low interest rates on loans acquired. Unlike the traditional banking system where interest rates on loans and investments are high for the average individual or SMEs, the P2P lending system ensures interest rates are repayable and commensurate with the loan acquired (Yang, Wang, Ding, & Hahn, 2016). However, the interest rates are more competitive compared to the rates offered by traditional banks. The interest rates are calculated based on the borrowers' credit score and this helps to reduce loan default rates on the part of the borrower and ensure the transaction is profitable to the lender. Studies have shown that investors who are conservative in their approach to business investments are attracted to the P2P lending system due to its low risk and high returns (Yan, Lv, & Hu, 2018; Dietricha & Wernlia, 2019). Financial institutions use credit scores to predict likelihood to default, social media profiles and network to check eligibility (Chen & Han, 2012; Gavurova, Dujcak, Kovac, & Kotásková, 2018).

2.4 Peer to Peer lending System in Other Countries

Literature reviewed shows that P2P lending system in China and the United State are the two most dominant forces in the P2P market followed by the United Kingdom (Xu, Su, & Celler, 2021). Other countries such as Korea, Australia, Sweden Bulgaria, India, Germany, and Israel also offer loan funding and investment opportunities through various lending platforms (Devarajan & Sasidharan, 2020). The last decade saw online lending volume increase by over $100 billion, it has also been projected to surpass $ 1 trillion by the end of 2025 (Huang, 2018). The UK accounts for majority of the P2P lending across Europe as it holds on to the larger market share, for the region. As at 2016, the UK accounted for a total volume of 1.23 billion pounds which represented its online alternative finance figures. Financial reports have also shown that the P2P lending system is regarded as a viable alternative to the traditional banking system when it comes to securing loans for SMEs in the UK (Xu, Su, & Celler, 2021).

Despite the rapid growth of the P2P lending system in the UK, a regulatory body, the UK Financial Conduct Authority (FCA) oversees functions that control financial institutions. On the contrary, the Irish government is still working on developing a more restrictive approach that ensures that the P2P lending is duly maximized for businesses and individuals. Similarly, both the UK and Irish P2P lending system both have lower operating costs compared to the traditional financial institutions. This allows SMEs obtain loans easily with low interest rates (Xu, Su, & Celler, 2021).
However, there is the issue of loan default that arises for lenders when borrowers hide their bad history of loan repayment. Though lenders are likely to earn high returns through providing funds to others, there is a likelihood that borrowers may default in the repayment of the loans despite the information provided during profile screening of intended borrowers. It has been identified as one of the biggest and direct risk to lenders in the P2P lending system (Ruiqiong & Junwen, An Overview Study on P2P Lending, 2014).

The Chinese P2P system, unlike Ireland, has witnessed massive growth and expansion in its operations to become the biggest in the world. In China about 2388 Peer to Peer platforms existed as of January 2017, with a transaction volume of roughly USD 67 billion, it was four times bigger than what was recorded then in the US and double of that in the UK at the time.(Huang, 2018). However, some issues have arisen in recent years that compelled the government to establish regulatory procedures for online lending. These changes include restriction on business models that can be admitted on the platform, the registration requirements, custodian requirements, lending limits and information disclosure. These changes have led to a collaboration between online lending platforms and the traditional banking systems (Huang, 2018).

China retains a more pragmatic and conservative approach in dealing with firms and entrepreneurs who wish to use P2P platforms which has been beneficial to the exponential growth rate witnessed across the nation (Chen & Han, 2012). On the other hand, the UK has a more stringent approach using regulatory bodies that aim to mitigate the risk associated with P2P lending and create an exit strategy for customers in case there is a crash in the system. While China undergoes a reshuffling of the market to integrate traditional banking systems, the UK has an independent regulatory body (Peer-to-Peer Finance Association) that vets the information of individuals and firms and screen the eligibility of borrowers who qualify for loan fundings (Yan, Lv, & Hu, 2018).

In addition to the self-regulating body, the Financial Conduct Authority (FCA) has full control of managing and supervising online transactions involving the P2P lending system. However, the full control and access the FCA wields in the UK is contrary to what is obtainable in the United States. The Securities and Exchange Commission (SEC), A federal regulatory body oversees supervising the online lending system in the US. Unlike the UK, the US does not place restrictions on lending to any business model. The two largest online lending platforms in the US are Prosper and Lending Club. These platforms serve as a bridge between borrowers and lenders and do more than just serve as an exchange platform to screen information from parties involved in the transaction process like other lending platforms in other countries (Huang, 2018).

3 Research Methodology

This research work started with a proposal, which was approved in May 2022, from which the research project commenced till August 2022. Primary data obtained was done by administering digital questionnaires using google forms, targeted at respondents residing in Ireland who were between the ages of 18 and 50, who have heard about or come across peer-to-peer lending. The questionnaires were structured to gather individual respondent’s demographic information alongside factors that motivate and influence the respondent's perception about peer-to-peer lending while identifying factors that might influence individuals' choice to make use of peer-to-peer lending platforms.

3.1 Sample Size

The questionnaires were deployed using various methods including but not limited to Fintech social media groups in Ireland. In total, analysis was caried out on a total sample size of 86 people from these channels. At the early stages of data gathering, the techniques were tested using first 30 reliable respondents. The small respondent size is noted down as a limitation to the study, as individuals were hesitant to take part in the survey, quite a number would have been motivated if a reward was attached, however that was beyond the scope of the work done. Other reasons included privacy concerns as people weren't comfortable sharing some of their personal information, which the survey required, and privacy risk was a major concern. The sampling technique used here was convenience sampling as the study didn't need stringent requirements asides from age and residency in Ireland.

3.2 Scales and Measurements

The survey was divided into 5 sections, Respondents demographic profile. Respondent's demographic profile section captured age, education, gender, occupation, monthly income amongst others to make inference to the other factors. A Likert scale with five levels was used ranging from (1) strongly disagree to (5) strongly agree. For all other sections apart from the first section. To get the best outcome for the research, questions were structured to prevent respondents from bias, ensuring respondents give their true honest opinions on the open and close ended questions asked.

4 Design Specification

4.1 Statistical techniques used to analyse data

Data was collected and analyzed with proven statistical techniques from past research, with a track record of yielding reliable results. The approach taken in the collation of data for the study involved the use of primary and secondary sources. For the secondary sources of data documents like peer reviewed scholarly articles, conference papers & journals by notable and established scholars within the domain were referenced.

The knowledge discovery in databases popularly known as **KDD** was adopted in the systematic processing and delivery of the analysis conducted for the study.

4.2 The Data Clean-up process

This was mostly conducted on the primary data and involved proper pre-processing of the data before use. For better results, Instances of duplicate, missing and unnecessary data had to be treated by expunging or renaming variables to make the data gathered easier to work with, to achieve reliable results when the statistical techniques adopted were applied for the analysis

4.3 Descriptive and Inferential Statistics

Data gathered was worked on using this statistical approach to gain a better understanding of the results from the questionnaires issued, it provided an easier method to shed light on the raw data gathered as few assumptions are made from summaries on the key findings from the data gathered. Ambiguity is reduced and a few hidden areas that might have been ignored ordinarily are uncovered. The visual aids and representations in form of graphs, charts, tables amongst other forms of representations which were extracted help in presenting information for further research at a glance, however, it is noted that conclusions were not made from this portion of the work.

This section of the research focuses on better ways to provide visual representations of the respondents, segmenting them by their demographic characteristics like age, gender, education, County, and salary. On the other hand, inferential statistics were carried out to deduce further values for measuring certain criteria like the relevant averages and how far off from the mean some important variables were(variance) which give an idea of the perception of most respondents, tools like the mean and standard deviation were extracted in the study to make inference to important variables .

4.4 Cronbach Alpha Test

As part of the study, the duty to test reliability of data gathered was key, the Cronbach alpha test was one of the major tests for reliability focusing on the latent variables. The reason for its adoption was to determine whether there was any internal consistency amongst variables that were categorized together. The results range in numbers between 0 and 1, 0 being the worst outcome and 1 being the best outcome for reliability, the range measures and describe the extent to which the variables tested relate to prove validity for further analysis. It was also used to prove reliability using the set metrics and tests the level of accuracy that assists with whether the factors being considered meet the requirements to be grouped together under a factor.

4.5 Cramer's V

Is used to determine the strength of association between two categorical or nominal variables in a dataset. Usually used on cross grouped variables with the indicators showing no association between the variables considered or an association between the variables considered. It will be used here on most demographic variables checking if there's an association with the class and the individual's willingness to issue loans in form of investments using P2P lending platforms.

4.6 Exploratory and confirmatory Factor Analysis

The factor analysis was used to focus on the variables that really mattered as far as the study is concerned, streamlining all variables by categorizing them into factors based on relationship. While factor analysis groups these variables interrelated to each other into groups. while identifying groups that are highly correlated it also identifies variables that might have been assumed closely correlated but vary far from the groups that are less strongly correlated. on the other hand, the confirmatory factor analysis was carried out to only reconfirm what the exploratory factor analysis already uncovered, with a better and neater plotted diagram of associate factors.

4.7 Handling Ethical Issues

Ethical issues faced were mostly from the collection of primary data, via the use of the electronic google forms, the data gathered was stored in and safely kept encrypted drive which could only be accessed by myself and my supervisor and won't be used for anything other than what it was gathered for. Consent of all respondents regarding their legal age and willingness to participate in the survey was sought and easily understandable statements pertaining to how participants will help achieve the objectives laid out for the study were clearly stated. Necessary approvals from the relevant departments and faculties of NCI were obtained and it is important to point out that the questionnaire did not involve sharing of people's personal information, as no confidential information was needed to carry out this research.

5 Implementation

According to past work on peer-to-peer lending, a few patterns have been recognized which birthed certain factors that influence the domain greatly in its adoption. The evaluation here focuses richly on the perspective of the lender, itemizing factors that influence individuals who are also known as lenders to invest or fund loans displayed or listed by the borrowers also known as the businesses on these P2P lending platforms. The objective of the research which we identify above, and the respondents' answers were critically analysed using proven techniques to come up with the findings of this research

5.1 Awareness of P2P lending in Ireland

The descriptive statistics carried out on the variables which were perceived to influence individuals decisions were illustrated using the data collected from individuals showing how most of the respondents heard of P2P lending, the stats gathered indicates that the higher percentage of respondents

17.2% have never heard of P2P lending via any of the listed mediums which is rather unfortunate and indicates that more work needs to be done in the area of awareness, while the most effective medium has been from friends with 12.04% respondents claiming that they heard from friends followed by social media which represents 8% of the respondents. Table 1 below measure how many know or don't know people who heard about P2P lending in Ireland, while Table 2 shows that a larger portion of the respondents have no experience with P2P, which is represented in Satisfying the objective of the study to measure Irish participants knowledge and familiarity of the lending system.

Table 1: Summary of respondents that know people with P2P knowledge

Responses	Females	Male
Maybe	11	9
No	9	21
Yes	12	24

Table 2: Summary of respondents with P2P experience

Experience	Frequency	Percentage
Yes	23	27
No	56	65
Maybe	7	8

5.2 Descriptive statistics

The analysis conducted included a visual representation of the demographic information of the respondents, further dividing the population of the study into their different categories based on gender, marital status, age group and county's they reside from Table 4 below we can see that there were more male participants than female, with a larger number of respondents residing in county Dublin, are master's degree holders and mostly single. Different relationships and factors are drawn from these stats, we could assume that the people more interested in responding to the P2P lending survey were the male than the female, single than married and people within the age bracket of 25-34. However, after the survey was finished it was discovered that the number of respondents divided by most demographics especially county was not high enough to give an analysis.

Table 3: Summary of respondents that are motivated to use P2P lending due to current bank interest rate

Bank interest rates	Frequency	Percentage
Yes	42	49
No	17	20
Maybe	27	31

Table 4: Summary of respondents by gender

Gender	Frequency	Percentage
Male	54	63
Female	32	37

Table 5: Summary of respondents by age group

Age group	Frequency	Percentage

18-24	13	15
25-34	67	78
35-44	6	7

Table 6: Summary of respondents based on their marital status

Marital status	Frequency	Percentage
Single	72	84
Married	11	13
Other	3	3

Table 7:Summary of respondents by county

County	Frequency	Percentage
Dublin	62	72
Cork	7	8
Kildare	3	4
Limerick	3	4
Louth	2	2
Others	9	10

Table 8: Summary of respondents by level of education

Education	Frequency	Percentage
Second level	1	1
Diploma	3	4
Bachelors	18	21
Masters	60	70
Ph.D.	3	3
Other	1	1

5.3 Mean

The mean values of various variables were retrieved as part of observations to better discuss results using averages of variables that are perceived to have some form of effect on individuals' reasons for lending on these platforms. The table below shows average values between the same range on all the variables. This can be attributed to the lack of robust data to cover vast different opinions on the variables provided. An area for improvement would be a diverse and robust data set for better results.

Table 9: Questions/Renamed variables & Mean values Likert scale (1)= strongly disagree - (5) =strongly disagree

	Questions(Renamed Variable)	Mean values
1	Using the scale below, rate the P2P lending system in terms of speed?(**Speed)**	**3.116279**
2	Using the scale below, rate the security of the P2P lending system?(**Security)**	**3.023256**

3	Using the scale below, rate the ease of use experienced using P2P lending method?(**Ease.of.use)**	**3.174419**
4	Using the scale below, how accessible are the borrowers loan listings(lending opportunities) on P2P lending platforms you know?(**Accessibility)**	**3.186047**
5	Using the scale below, how attractive are the interest rates offered on p2p lending platforms in comparison with that of conventional investments?(**Attractiveness)**	**3.104651**
6	To what extent do you think the borrowers Creditworthiness influences your decision to fund a loan opportunity on a P2P lending platform?(**Creditworthiness)**	**3.77907**
7	To what extent do you think a borrower's loan Default rate influences your decision to fund a loan opportunity on a P2P lending platform?(**Default.rate)**	**3.755814**
8	To what extent do you think the ability to set your preferred interest rate for lending to borrowers, influences the use of a P2P lending platforms?(**Interest.rate.1)**	**3.511628**
9	To what extent do you think the user experience and interface of the P2P lending platform or app, influences your decision to use the P2P lending system?**(UI.UX)**	**3.604651**
10	To what extent do you think the interest rate offered by the borrower, influences your decision to fund their loan opportunity on the P2P lending platform?**(Interest.rate.2)**	**3.55814**
11	To what extent do you think multiple loan requests by a particular borrower within short intervals, influences your decision to fund their project or	**3.627907**
	business?**(Multiple.loan.requests)**	
12	Please rate how active you are on social media?**(SM1)**	**3.732558**
13	To what extent do you think social media influences lending success or failure in the P2P lending system?**(SM2)**	**3.174419**

5.4 Cramer's V

The statistical test used to examine the degree of association between variables here was the Cramer's V. The demographic variables were used to measure if an association exists with a few key variables like awareness, ease of use and attractiveness of certain things like interest rates are motivators for the usage of P2P lending in Ireland. Satisfying the objective of the study the perception of individuals in Ireland when it comes to P2P lending systems.

Table 10: Cramer's V Scale

Phi & Cramer's	Interpretation
>**0.25**	Very strong
>**0.15**	Strong
>**0.10**	Moderate
>**0.05**	Weak
>**0**	No or very weak

Table 11: Cramer's V results

Income and Attractive interest rates	
Test	**Score**
Cramer's V	0.207
Education and Ease of use	
Test	**Score**

Cramer's V	0.2431
Gender and Ease of use	
Test	**Score**
Cramer's V	0.1806
County and Awareness	
Test	**Score**
Cramer's V	0.4323
Income and bank interest rates	
Test	**Score**
Cramer's V	0.3687

The results in the table above reveal that there are important association between the paired variables as the value of the Cramer's V for the respective tests indicates (X2=0.207, X2=0.243, X2=0.1806 while p>0.15 is n), (X2=0.4323 and X2=0.3687 while p>0.25 is n). This indicates that the choice to invest in P2P lending opportunities is strongly connected to income bracket of the individual, level of education and gender have a strong association with how easy it is to use these platforms, while the county a respondent is form has a very strong association with their awareness of P2P lending and the income of respondents have a strong association with the current interests rates offered by banks, which might be motivators for investing or lending on P2P platforms.

5.5 Cronbach alpha

The reliability of the data gathered was tested using the Cronbach Alpha reliability test. It uses a scale to prove validity or reliability of data, stating that results of at least 0.6 and above prove data reliability. On the other hand, results below 0.6 are considered unreliable. From the table below we can see the combined Cronbach alpha results of 0.85 which indicates the data gathered was reliable Alpha value on the selected data for the analysis is showing to be 0.85, which is above 0.6. Therefore, the data which has been gathered is reliable for further analysis

Table 12: Cronbach Alpha test result

Factor	Cronbach alpha	No of Items	Combined factors
Knowledge &Awareness	0.86	2	
Non-Functional	0.82	5	**0.85**
Functional	0.9	6	
Social media	0.78	4	

5.6 KMO test

Kaiser-Meyer-Olkin, Bartlett test were used to identify the first set of variables needed for further analysis. They were 13 in number all the way down from 40 as the remaining 27 did not pass the cut off for both tests to be considered valid for used factor analysis. The KMO test measures validity with marks over(0.50) as acceptable. While anything less becomes unacceptable. On the other hand, The Bartlett test works the opposite as values less than (0.50) are accepted and vice versa.

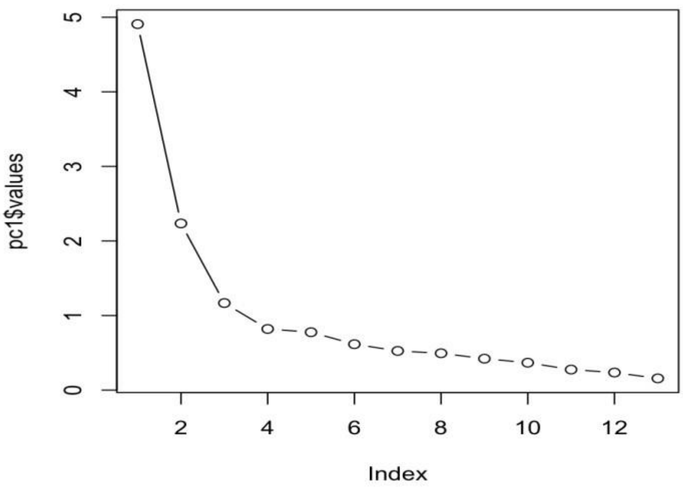
Table 13: Results used to identify KMO and Bartlett's test

K.M.O	**0.82**
Bartlett's test Chi-Square	493.654
Df	78
Sig	2.22e-16

5.7 Scree Plot

The scree plot was used to determine the number of factors to be consider in conducting the factor analysis. It can be argued using the plot below that due to the steepness of the curve at point 4, coming from the left, the chart indicates that 3 factors exist for the factor analysis. The eigen values extracted in Table indicate that 3 out of the factors (MR'S) are above 1. And according to the kaiser rule any eigen value higher than 1 should be considered as a factor. In the test conducted out of 5 factors, only 3 qualified for the stated criteria. And those three were extracted as factors for the factor analysis.

Figure 1-Scree plot of Eigenvalues



5.8 Exploratory Factor Analysis

The use of exploratory factor analysis to identify factors that can be categorized into a certain variable in form of a factor. The use of exploratory factor analysis would be adopted as this meets the assumption for its use to uncover the set of underlying variables from the collection of observed variables of the dataset that is relative. The table below shows out of 6 variables, 3 factors was extracted based on eigenvalues greater than 1.The main purpose of using factor analysis is to reduce a large amount of data into groups and according to kaiser rules specifies that values that can be considered a factor must have values greater than 1.

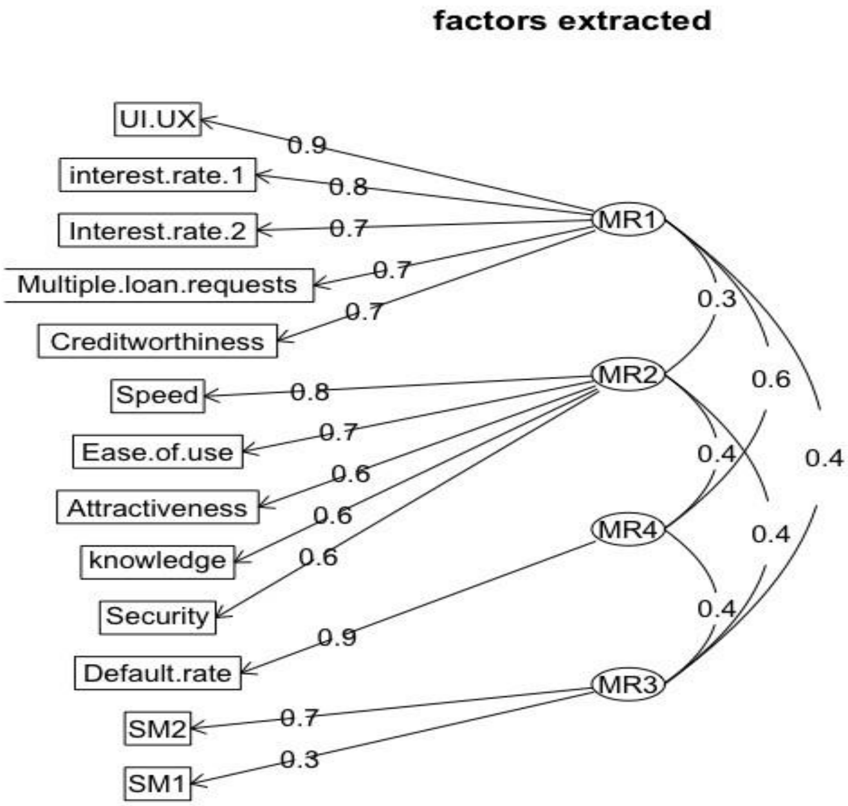
Table 14: Extracted SS loadings using Kaiser's rule

Factors	**Eigen values**	**Variance %**	**Cumulative %**
1(MR1)	3.14	0.24	0.24
2(MR2)	2.29	0.18	0.42
3(MR4)	1.21	0.09	0.51

Table 15:Table showing breakdown of factor components and scores

Variables	Factor 1(MR1)	Factor 2(MR2)	Factor 3(MR4)	Factor 4(MR3)
UI/UX	0.9			
INTEREST RATE 1	0.8			
CREDITWORTHINESS	0.7			
MULTIPLE LOAN REQUESTS	0.7			
INTEREST RATE 2	0.7			
SPEED		0.8		
EASE OF USE		0.7		
ATTRACTIVENESS		0.6		
SECURITY		0.6		
KNOWLEDGED		0.6		
DEFAULT RATE			0.9	
SM1				0.3
SM2				0.7

Figure 2: EFA Model



Rotation Method: Promax

6 Evaluation

Based on past research, tests and analysis conducted, we see the components of the factors being associated by function. The findings from the exploratory factor analysis model in figure 2 indicates that the variables listed were divided into system functional and non-functional attributes. Functional attributes referring to what the system should do which is serve as a channel to link borrowers and lenders for funding opportunities and alternative investment opportunities respectively. The variables that enable the system to be a medium for lending and investing, like the UI/UX, interest rate information, data supplied on multiple loan requests, creditworthiness and default rate are the functional variables while the non-functional attributes like speed, ease of use, attractiveness, and security are closely associated or related showing what theses P2P lending systems should be, expectations are that P2P lending should be fast, secure and easy to use which define the nonfunctional variables discovered by the analysis conducted. The studies further show that social media as a factor influences lending success or failure to a good degree, which we find interesting, as the other social media variable which measures the degree of its usage had no significant impact on the choice for lenders to make use of the P2P lending medium. The results from the analysis could have been better illustrated using the factor analysis with mixed data (FAMD) to include other type opinions asides from the ones extracted from Likert scale questions in the questionnaire, conducting interviews with experts within the domain to get their opinions to include in the analysis would have been better for the experiment as results. The use of test hypothesis could have been adopted using proven theory which could have involved the deployment of CFA-confirmatory factor analysis to confirm the validity of the existing test hypothesis considered for the study. The adopted structure produced satisfactory results however, these few discoveries are used to critique if the methods deployed are 100% satisfactory

7 Conclusion and Future work

7.1 Conclusion

The landscape of P2P lending in Ireland and most countries where it is adopted follows a crowdfunding model where the peers involved are individuals and businesses, individuals being the lenders and businesses being the borrowers, it follows this approach as an alternative form of investment for individuals and a source of funding for borrowers and there exists a relationship between most of the demographic variables (Age, Gender, Monthly Income and Education) and the choice to make use of the medium, the larger portion of respondents are within the mid generation and have a better reach to the medium than the other age classes. Majorly master's degree holders have experience and are aware or knowledgeable of the medium with an analysis leaning towards the males than females in its adoption From the study, it is understood that the attributes with close load values were classed as factors and a further classification between factors is illustrated to prove a mediocre inter relationship between the factors, a little inference can be made on associations as MR1&2, MR1&4, MR2&3, MR2&4, MR1&3 and MR4&3 have a not so significant relationship. The main aim of this research was to determine factors that motivate individuals(lenders) to invest in or lend to borrowers using the P2P medium. We can conclude that the factors considered including social media impact motivation for lenders to explore the P2P lending option. More work needs to be done around awareness and knowledge, as a significant number within Ireland don't know about the medium, this research work will contribute to existing research on key motivating factors for the adoption of this medium by lenders as an alternative medium for investments in the light of the current returns on traditional investment vehicles.

7.2 Limitations

The ultimate limitation experienced during the study was time, the study had a defined 12-week period, and this affected the reach in terms of the number of respondents to gather data from as the snowballing approach still returned with a slow response rate from qualified respondents, the time factor also affected further findings as our research couldn't cover other perspectives of stakeholders involved asides from the lender. The choice of techniques and tests used for analysis were pre assumed as a detailed comparison between techniques couldn't be carried out due to. Time constraints to know which best suits the data considered for the research. However, we were able to make up for the gap here using examples from past research. Computational power could also be mentioned as a limitation here as the processing power available was little compared to what would have been preferred, other areas uncovered that could have been investigated are discussed in the future work. Also, availability of ready-made data from the existing P2P lending companies would have been good information

7.3 Future work

During the research, other areas for further findings and developments were uncovered, as this work of research examined the issues from the lender's perspective, However, various additional works can be performed on the intention to examine issues from the borrower's perspective. In addition future work can be carried out to examine the robustness of the regulatory framework to the independent variables that are addressed in the current study, it is possible to integrate several other significant factors on a larger population size, including a vast number of respondents across counties in Ireland as the study was largely limited to respondents in Dublin and interviews with professionals ,participants and stakeholders to get better insight and opinions on the industry in Ireland should be conducted, this will assist with building machine learning models that could better predict the factors that influence the choice of its usage and other growth metrics within the domain.

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