Fostering Innovative Behaviour Among Millennial Workers

Maria Grace Herlina*
Sari Apriza
Randy Hadipoespito

Senior Lecturer, Management Department
BINUS Business School Undergraduate Program
Bina Nusantara University
Jakarta, Indonesia 11480
*Corresponding author: herlina01@binus.edu
sapriza@binus.edu
randy_hadipoespito@binus.edu

Nabila Ailsa Rachmadianti
Senior Student, Management Department
BINUS Business School Undergraduate Program
Bina Nusantara University
Jakarta, Indonesia 11480
nabila.rachmadianti@binus.ac.id

Abstract

Generation Y is the digital generation, having grown up with cell phones, computer games, instant communication, and social networking. They are naturally optimistic, realistic, global-aware, and welcoming. They are goal-oriented, entrepreneurial, and seek solutions at work. They have personal social media accounts, which can also provide opportunities to learn new things and make discoveries. It is ambidexterity which means an individual learning activity. The study investigates the role of ambidexterity and social media experience in developing innovative behaviors among millennial workers in Greater Jakarta using convenience sampling. The Rasch Model and Structural Equation Modeling (SEM) were employed. According to the Rasch Model Analysis, Millennial workers with higher ambidexterity display much more innovative behavior. At the same time, the Structural Equation Modeling (SEM) reveals that ambidexterity has a higher significant impact on innovative behavior than social media learning.

Keywords
ambidexterity, social media, social learning, innovative behavior, millennial workers

1. Introduction

Millennials are another name for Generation Y. By 2025; they will account for three-quarters of the worldwide workforce. They come from a time of demographic upheaval, so they are entering the workforce alongside older generations and are more at ease with technology and computers. They adapt to communication technology more easily (Islam et al., 2011; Reza & Sarraf, 2019; Simic, 2019).

On the other hand, Generation Y is the digital generation, having grown up with cell phones and computer games and familiar with immediate communication and social networking. They are naturally optimistic, realistic, globally aware, and inclusive. They are goal-oriented, entrepreneurial, and seek answers in the workplace. They have personal accountability and a need for feedback. Millennials are collaborative and work well in today's empowered workplace as long as there are enough challenges and opportunities to keep them interested (Islam et al., 2011; Saileela & Thiruchanuru, 2018; Simic, 2019; Statnickë et al., 2019; Stevanin et al., 2020; Toro et al., 2019; Veingerl Čič & Šarotar Žižek, 2017; Whitney Gibson et al., 2009).
Many businesses have discovered the advantages of using social media. Strategic objectives and competitive advantages may be achieved using some of these tools. As a result, it helps them connect with their consumers, improve their products, and generate new ideas (Bala et al., 2019; Mansour & Al-Najjar, 2018).

Numerous advantages have resulted from the widespread use of social media platforms like Facebook and Twitter. They allows anyone to study more, explore more, and connect with others, whether they're acquiring new skills or working or socializing (Purnama Ratri & Andangsari, 2021). Social media provide the ease and speed with which content can be disseminated. It is including the high level of user involvement, the widespread visibility of actions, the instantaneous nature of content availability, and social network links being created. In conclusion, social media technology has some distinct advantages over traditional means of content dissemination (Christina et al., 2021; Khalik et al., 2021). Using social media may also help learning new things and come up with fresh ideas, which can lead to better performance. For a corporation, business innovation may have a substantial influence on its success. Business innovation may help businesses gain a competitive advantage over their competitors (Moy et al., 2020).

Employees in fast-growing companies are increasingly using innovative behaviors to measure performance. People who want to be innovators need to form strong bonds with their co-workers. These connections provide innovators the inspiration, knowledge, tools, and assistance they need to create, promote, and put into practice creative ideas (Wang et al., 2015). As a consequence, innovation has become an integral part of the everyday operations of business organizations (Khan & Khan, 2018; Ogulin et al., 2020).

Knowledge is a collection of experiences, facts, beliefs, and systematic attitudes that may be used to evaluate new data and experiences. Tacit or explicit knowledge is exchanged between employees in order to create new knowledge (Hussein et al., 2019; Mohajan, 2019; Si Xue, 2017). In today's technology-driven world, knowledge exchange and innovation are often seen as vital competitive characteristics. It has a profound effect on an employee's ability to survive, perform well, and adapt (Ali et al., 2017).

Learning to be ambidextrous is a personal experience that may be cultivated through time. Employee ambidexterity develops when workers engage in both explorative and exploitative activities (Alghamdi, 2018). Learning from mistakes is an important part of the process of exploring new ideas, finding, and producing new possibilities. When it comes to being explorative, it's just attempting something new. To be successful in exploitation, one must have the skills necessary to identify an opportunity, formulate a strategy, and put the strategy into action (Peng et al., 2019; Rosing & Zacher, 2017).

Ambidexterity makes it possible for people's skills, knowledge, abilities, ideas, and commitments to become valuable assets since it is a knowledge-based activity. Organizational methods, strategies, formal knowledge, human abilities, and experiences are increasingly vital assets in knowledge-based organization. Knowledge-based activities enable the interchange of data, information, knowledge, wisdom, and the development of value (Stevanin et al., 2020).

Employees' use of social media has been examined by some academics as a means of encouraging innovation (Mardi et al., 2018). Ambidexterity is improved using social technology, both directly and indirectly, according to these studies. Organizations that use social media to communicate, share and participate in corporate discussions develop a new organizational competence, according to Huang (Gunawan et al., 2018). Since social networks and their consequences encourage knowledge sharing, it develops innovative work behaviour. Another research of social involvement in mobile social media learning was carried out by Helmi (Norman et al., 2015). Using social media is an essential new channel for innovation, according to He and Wang's study (Quan et al., 2021). Employee input and comments may be easily accessed through it. Using social media, another researcher studied the effect of workers' knowledge sharing on their innovation behaviour (Ali et al., 2017).

1.1 Objectives
This study intends to contribute to existing studies on innovative behavior, specifically among millennial employees. There is only little research is being undertaken using the Rasch Model Analysis and Structural Equation Modelling (SEM). Other research contributions are the researchers identifying the influential independent variables of innovative behavior. Those are ambidexterity and social media learning.
2. Literature Review

2.1 Social Media Experience
The term "social media" refers to several forms of online social networking and communication. Evans (Mansour & Al-Najjar, 2018) stated that social media is a venue for exchanging ideas, experiences, and information to make better and more informed decisions. In this way, users are able to build networks and communities and ultimately reach a larger audience ((Mansour & Al-Najjar, 2018)). Different forms of social media are readily accessible. Some of the most well-known ones include YouTube, Facebook, Twitter, Instagram, Line, Facebook Messenger, WhatsApp, and Facebook (Mita et al., 2019; Moy et al., 2020).

2.2 Ambidexterity
A state of ambidexterity exists when both exploration and exploitation are accomplished simultaneously (Alghamdi, 2018; Rosing & Zacher, 2017; Zhang et al., 2019). Various scholars claim it may manifest itself at the group, team, or individual levels. When compared to exploitation, which is focused with execution, performance, refinement, selection, implementation, and risk avoidance, exploration focuses on search, discovery, and risk-taking (Alghamdi, 2018; Rosing & Zacher, 2017; Zhang et al., 2019). Synergies may be created via individual ambidexterity in both exploration and exploitation. Empirical research suggests that ambidexterity positively affects organizational responsiveness and efficiency (Mu et al., 2020; Papachroni & Heracleous, 2020; Schnellbächer & Heidenreich, 2020; Tuan Trong et al., 2018; Zhang et al., 2019).

2.3 Innovative Behavior
An innovation is the intentional adoption and implementation of a new concept, technique, product, or process within a certain position, group, or organization with the purpose of generating considerable value for the person, the group, the organization, or society at large (den Hartog et al., 2020; Sung & Kim, 2021).

The three components of an individual's innovative behaviour are: (1) a willingness to take risks, (2) the ability to generate new ideas, and (3) the want to innovate. Two more elements of a creative company are its ability to provide resources (money, time, and talent) and incentives (relational and transactional rewards, human resource management practices/processes) (Fischer et al., 2019; Hussein et al., 2019; Sung & Kim, 2021).

This research aims to identify the influential variables that significantly impact innovative behaviour among millennial workers with the hypotheses:

Hypothesis 1: Millennial workers with greater ambidexterity will exhibit more innovative behaviour, with significant differences.

Hypothesis 2: Ambidexterity has a significant direct impact on innovative behaviour.

Hypothesis 3: Social media learning has a significant direct impact on innovative behaviour.

3. Methods
The study explores the impact of ambidexterity through social media experience in fostering innovative behaviors among millennial workers in Greater Jakarta. This study used a quantitative design to conduct empirical research. All items were graded on a five-point Likert scale, one indicating strongly disagree and five indicating strongly agree. The questions used to measure ambidexterity (X₁) were adapted from (Mardi et al., 2018; Mu et al., 2020; Papachroni & Heracleous, 2020; Schnellbächer & Heidenreich, 2020), consisting of 11 indicators. Social media learning (X₂) adapted from (Bala et al., 2019; Mansour & Al-Najjar, 2018; Moy et al., 2020; Norman et al., 2015), composed of 10 indicators. Further, for variable Y, namely innovative behavior, adapted from the work of (Di Fabio & Saklofske, 2019; Ko et al., 2018; Nguyen et al., 2019; Sanchez-Gomez & Breso, 2019; Sung & Kim, 2021), consisting of 9 indicators.

The research hypotheses of this study were obtained through Structural Equation Modelling (SEM) with SmartPLS software version 3.2.9 and Rasch Model Analysis with WINSTEPS Version 5.2.1.0. Rasch Model is also used to run the validity test, reliability test of the research instruments, and to examine the research hypotheses. Additionally, Rasch Model Analysis can help reduce the number of biased responses on self-report questionnaires (Boone et al., 2014; Miftahuddin et al., 2020; Sumintono, 2014).
The reliability of the research instrument indicates that all responses are excellent (0.75, 0.81, and 0.83). It implies that the respondents understood the questionnaire items. The research instrument items are good and excellent (0.68, 0.93, and 0.96). The instruments have a strong Cronbach alpha (0.83, 0.85, 0.89). It implies good correlations between the items and the respondents' responses (Boone et al., 2014; Miftahuddin et al., 2020; Sumintono, 2014). (Table 1).

<table>
<thead>
<tr>
<th>Research Variables</th>
<th>Alpha Cronbach</th>
<th>Item Reliability</th>
<th>Person Reliability</th>
<th>Item Validity</th>
</tr>
</thead>
<tbody>
<tr>
<td>Ambidexterity</td>
<td>0.89</td>
<td>0.68</td>
<td>0.83</td>
<td>11 items – accepted</td>
</tr>
<tr>
<td>Innovative Behaviour</td>
<td>0.83</td>
<td>0.93</td>
<td>0.75</td>
<td>Nine items – accepted</td>
</tr>
<tr>
<td>Social Media Experience</td>
<td>0.85</td>
<td>0.96</td>
<td>0.81</td>
<td>Ten items - accepted</td>
</tr>
</tbody>
</table>

Source: Primary Data, 2021

4. Data Collection
The research took approximately six months to complete the study and conducted in Greater Jakarta. The data were collected from the millennial workers in 2021 using a personal questionnaire and convenience sampling. This convenience sampling is the type of sampling method with the unlimited population (Razzaq et al., 2019).

The study successfully collected the primary data from 154 millennial workers, yet only 119 responses can be examined further. Rasch Model Analysis, specifically Person Measure Analysis used to filter for the responses' bias of the self-report questionnaires, (Boone et al., 2014; Miftahuddin et al., 2020; Sumintono, 2014).

There is 63% male with the female for 37%. The age of the millennial workers is 85% between twenty to thirty years old and 15% above thirty years old. 60% are diploma holders in their education, and 40% are bachelor's graduates. The tenure of the millennials workers is 80% less than two years and 20% more than two years. They are officers (60%), and 40% are supervisors and managers. They are from investment business (3%), e-Commerce (8%), consultant business (20%), banking (8%), advertising (8%), software business (8%), and transportation (6%), and others (39%).

5. Results and Discussion
The results show that the innovative work behavior of millennials workers has different levels of ambidexterity. This finding is in line with the research conducted by (Zacher et al., 2016), who said that low innovative work behavior could be due to an imbalance of exploration and exploitation activities in learning. In addition, this study also supports the results of (Caniëls et al., 2017; Caniëls & Veld, 2019). The research found that employees who were able to engage with the same high levels of exploration and exploitation could achieve high innovative work behaviors. On the other hand, employees with the same low level of exploration and exploitation will have low innovative work behavior. The relationship between these two variables is also supported by the research (Pertusa-Ortega et al., 2020), who found that employees who carried out a balance of exploration and exploitation activities could produce higher innovative work than employees who did perform the same amount of work.

<table>
<thead>
<tr>
<th>Code</th>
<th>Innovative Behavior</th>
<th>Probability Value</th>
</tr>
</thead>
<tbody>
<tr>
<td>All millenials</td>
<td>3.13 logit</td>
<td>0.000</td>
</tr>
<tr>
<td>T (high ambidexterity)</td>
<td>4.04 logit</td>
<td></td>
</tr>
<tr>
<td>R (low ambidexterity)</td>
<td>2.22 logit</td>
<td></td>
</tr>
</tbody>
</table>

Table 1 Mean Measure Hypothesis Testing
Table 2 above shows a significant difference between high ambidexterity and low ambidexterity on innovative work behavior. According to the Rasch Model Analysis, millennial workers with high ambidexterity are higher in their innovative behavior (4.04 logit > 3.13 logit). On the contrary, those who are low in ambidexterity are lower in their innovative behavior (2.22 logit < 3.13 logit).

The test results above show that hypothesis (H1) is accepted. Since the significant value is 0.000 < 0.05, which indicates a significant difference in innovative work behavior between millennials workers with high ambidexterity and low work behavior. The results of this hypothesis complement the findings of previous research, which showed a relationship between ambidexterity and employee innovative work behavior. In addition, this finding is in line with the research conducted by (Khurram & Shahzadi, 2020), which found a significant relationship between ambidexterity and innovative work behavior.

The second analysis is The Structural Equation Modeling (SEM) with SmartPLS software version 3.2.9 is used to run the collected data for hypotheses testing. The output path coefficient, as shown in Table 3, is to see the direct effect (Direct Effect) of each independent variable (exogenous) on the dependent variable (endogenous).

<table>
<thead>
<tr>
<th></th>
<th>Original Sample (O)</th>
<th>Sample Mean (M)</th>
<th>Standard Deviation (STDEV)</th>
<th>T Statistics (O/STDEV)</th>
<th>ρ Values</th>
</tr>
</thead>
<tbody>
<tr>
<td>X1 → Y</td>
<td>0.433</td>
<td>0.418</td>
<td>0.127</td>
<td>3.417</td>
<td>0.001</td>
</tr>
<tr>
<td>X2 → Y</td>
<td>0.386</td>
<td>0.401</td>
<td>0.113</td>
<td>3.424</td>
<td>0.001</td>
</tr>
</tbody>
</table>

The coefficient for the ambidexterity (X1) variable on innovative behavior (Y) is 0.433. It means a positive influence on ambidexterity (X1) on innovative behavior (Y). It interprets that the better the ambidexterity (X1) value, the more innovative behavior (Y). An increase in one unit of ambidexterity (X1) will increase innovative behavior (Y) by 43.3%. Based on calculations using bootstrap or resampling, where the test results for the estimated coefficient of ambidexterity (X1) on innovative behavior (Y), the bootstrap results are 0.418 with the at-count value of 3.417, the p-value is 0.001 < 0.05. It proves that H2 is acceptable. It means a significant direct influence of ambidexterity (X1) on innovative behavior (Y) is statistically proven.

The coefficient for the social media learning (X2) variable on innovative behavior (Y) is 0.386. It means that there is a positive effect of social media learning (X2) on innovative behavior (Y). It explains that the better the social media learning (X2) value, the more innovative behavior (Y) will increase even more. An increase in one unit of social media learning (X2) will increase innovative behavior (Y) by 38.6%. Based on calculations using bootstrap or resampling, where the test results of the estimated coefficient of social media learning (X2) on innovative behavior (Y) bootstrap results are 0.401 with a t value of 3.424, the p-value is 0.001 < 0.05. It also concludes that H3 is also acceptable. It means a significant direct effect of social media learning (X2) on innovative behavior (Y) is statistically proven.

According to statistical findings, ambidexterity and social media learning experience have a considerable influence on creative behavior. It suggests that ambidexterity and social media learning experience might help millennial professionals become more innovative. These results confirm prior studies on ambidexterity in the rise of social media on innovative behavior by (Mardi et al., 2018), (Gunawan et al., 2018), (Norman et al., 2015), (Quan et al., 2021), and (Ali et al., 2017). The statistical study also shows ambidexterity has a higher substantial influence on innovative behavior. It means that millennial employees are willing to learn new things and put what they currently know into practice via social media learning experiences. The results indicate that exploratory and exploitative activities have a considerable impact on inventive behavior. It lends credence to the research of (Quan et al., 2021) on the influence of ambidexterity on the creative behavior of millennial employees.

According to the findings of this study, the spirit of discovering new things (exploration) and deepening current knowledge (exploitation) is the driving force behind innovative behavior among millennial professionals. It implies that social media learning without an exploratory and exploitative mindset has a reduced impact on innovative behavior. Because millennials are entrepreneurial and seek answers in the workplace, firms should provide the most
possibilities for them to continue learning new things or enhancing current knowledge, whether through digital-based learning or traditional training programs.

6. Conclusion
Social media can also provide an opportunity to gain new knowledge and innovations, thereby improving performance. Business innovation may be the prominence that has a big impact on a company's performance. Businesses can benefit from innovation by offering a variety of items that set them apart from competitors, so increasing their financial success.

Ambidexterity is one of the individual learning-based activities. Employee ambidexterity develops when employees engage in both explorative and exploitative behaviour. Exploring involves looking for alternatives, discovering, producing, experimenting with new possibilities, finishing tasks, and learning from mistakes. At the same time, employing the process of selecting, introducing, enhancing, and refining existing certainties. At the same time, exploitation is based on one's experience, formulating a strategy, and putting the plan into action.

The Rash Model Analysis shows that Millennial workers with greater ambidexterity will exhibit more innovative behavior, with significant differences. The Structural Equation Modeling (SEM) analysis also reveals that ambidexterity has a greater significant impact on innovative behavior. It implies that millennials workers are eager to learn new things and apply what they already know through social media learning experiences.

The study has certain drawbacks. It is better to examine the impact of ambidexterity and social media learning on creative behavior to ensure that social media is an essential tool for developing innovative behavior among millennial workers. It may also be beneficial to include additional organizational characteristics such as leadership and corporate culture.

References


Rosing, K., and Zacher, H., Individual ambidexterity: the duality of exploration and exploitation and its relationship


Biographies

Dr. Maria Grace Herlina, S.Sos., MM is a Senior Faculty Member in the Management Department of Bina Nusantara Business School. She also works as the Deputy Head of the Management Program. Her love of teaching has encouraged her to devote her expertise and experiences to improving the next generation for many years by teaching, studying, and producing scientific publications. She has done various local and international studies, and she has published multiple scientific articles in international journals that are Scopus indexed. Human resource management, organizational behavior, entrepreneurial behavior, and knowledge management behavior are among her knowledge areas.

Sari Apriza, S.Pd., MM is a faculty member for the undergraduate program in the Department of Management at Bina Nusantara Business School. She also serves as Human Capital for Yayasan Bina Nusantara. Her passion for teaching has inspired her to dedicate her knowledge and experience in human capital management to the younger generation through years of teaching, researching and writing scientific articles of human and management development.

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Dicky Hida Syahchari, ST., MM.,Ph.D., is a Senior Faculty Member of the Bina Nusantara Business School Undergraduate Program in Management Department. He also works as a Business Development Management and E-Business Management Subject Content Coordinator. He's been a lecturer for about 13 years. He concentrated his efforts on innovation management, knowledge management, and company development. He has conducted numerous local and international investigations, and he has published numerous scholarly articles in Scopus-indexed international journals. His knowledge areas include business development management, innovation, and knowledge management.

Nabila Ailsa Rachradianti is a Senior student of the Bina Nusantara Business School Undergraduate Program in Management Department.