

PUBLIC PERCEPTION ON PRIVACY AND ACCEPTANCE OF CONTACT TRACING  
APPLICATION FOR CONTROLLING THE SPREAD OF COVID-19 IN QUANG NINH, VIETNAM



A Thesis Submitted in Partial Fulfillment of the Requirements  
for the Degree of Master of Arts in Southeast Asian Studies  
Inter-Department of Southeast Asian Studies  
GRADUATE SCHOOL  
Chulalongkorn University  
Academic Year 2021  
Copyright of Chulalongkorn University

การรับรู้ความเป็นส่วนตัวและการยอมรับแอปพลิเคชันติดตามการติดต่อของสาธารณชนเพื่อควบคุม  
การแพร่กระจายของ โควิด-19 ในจังหวัดกวังนินห์, เวียดนาม



วิทยานิพนธ์นี้เป็นส่วนหนึ่งของการศึกษาตามหลักสูตรปริญญาศิลปศาสตรมหาบัณฑิต  
สาขาวิชาเอเชียตะวันออกเฉียงใต้ศึกษา สหสาขาวิชาเอเชียตะวันออกเฉียงใต้ศึกษา  
บัณฑิตวิทยาลัย จุฬาลงกรณ์มหาวิทยาลัย  
ปีการศึกษา 2564  
ลิขสิทธิ์ของจุฬาลงกรณ์มหาวิทยาลัย

Thesis Title PUBLIC PERCEPTION ON PRIVACY AND ACCEPTANCE OF  
CONTACT TRACING APPLICATION FOR CONTROLLING  
THE SPREAD OF COVID-19 IN QUANG NINH, VIETNAM  
By Mr. Hung Gia Do  
Field of Study Southeast Asian Studies  
Thesis Advisor Saikaew Thipakorn, Ph.D.

---

Accepted by the GRADUATE SCHOOL, Chulalongkorn University in Partial  
Fulfillment of the Requirement for the Master of Arts

..... Dean of the GRADUATE SCHOOL  
(Associate Professor YOOTTHANA CHUPPUNNARAT, Ph.D.)

THESIS COMMITTEE

..... Chairman  
(Associate Professor MONTIRA RATO, Ph.D.)

..... Thesis Advisor  
(Saikaew Thipakorn, Ph.D.)

..... External Examiner  
(Thanyathip Sripana, Ph.D.)

จุฬาลงกรณ์มหาวิทยาลัย  
CHULALONGKORN UNIVERSITY

หุง ซา โต้ : การรับรู้ความเป็นส่วนตัวและการยอมรับแอปพลิเคชันติดตามการติดต่อของ  
 สาธารณชนเพื่อควบคุมการแพร่กระจายของ โควิด-19 ในจังหวัดกวางนินห์, เวียดนาม.  
 ( PUBLIC PERCEPTION ON PRIVACY AND ACCEPTANCE OF CONTACT  
 TRACING APPLICATION FOR CONTROLLING THE SPREAD OF COVID-19 IN  
 QUANG NINH, VIETNAM) อ.ที่ปรึกษาหลัก : ทรายแก้ว ทิพากร

ตั้งแต่ข้อมูลส่วนบุคคลได้กลายเป็นทรัพยากรที่มีค่าในยุคดิจิทัล ความกังวลของผู้คนในเรื่องความเป็นส่วนตัวกลายเป็นเรื่องละเอียดอ่อนและมีความสำคัญมากขึ้นในหมู่คนหนุ่มสาวเวียดนาม อย่างไรก็ตาม เมื่อรัฐบาลเปิดตัวแอปพลิเคชันติดตามการติดต่อ (Bluezone) ในเดือนเมษายน 2020 เพื่อติดตามความเคลื่อนไหวของผู้คนโดยมีเป้าหมายในการควบคุมการแพร่กระจายของ โควิด-19 ทศนคติของประชาชนเปลี่ยนไปอย่างมาก เมื่อเวลาผ่านไป ความคิดเห็นมากมายบนสื่อสังคมออนไลน์และบทวิจารณ์เกี่ยวกับแอปพลิเคชันบลูโซนได้สะท้อนทัศนคติเชิงบวก เมื่อผู้คนค่อย ๆ ยอมรับแอปพลิเคชันบลูโซนและแนะนำให้ผู้อื่นดาวน์โหลดแอปพลิเคชันนี้บนโทรศัพท์ของพวกเขา ด้วยกรณีศึกษาในจังหวัดกวางนินห์ (ตะวันออกเฉียงเหนือของเวียดนาม) ผลการศึกษาพบว่าผู้คนให้ความสำคัญกับปัญหาสุขภาพในระดับสูงสุด ประเด็นนี้ได้ก้าวข้ามปัญหาความเป็นส่วนตัวในยุคโควิด-19 ในตอนแรกคนไม่ต้องการดาวน์โหลดแอปพลิเคชันบลูโซน อย่างไรก็ตาม ผลการศึกษาพบว่า ความเชื่อมั่นอย่างสูงของประชาชนต่อรัฐบาลในการยับยั้งการแพร่กระจายของโควิด-19 ทำให้ผู้คนให้การยอมรับแอปพลิเคชันนี้อย่างกว้างขวาง การศึกษาให้ข้อมูลตามสัดส่วนและความคิดเห็นเกี่ยวกับวิธีที่คนหนุ่มสาวตัดสินใจยอมรับการใช้แอปพลิเคชันบลูโซนที่รัฐบาลจัดให้เพื่อลดการแพร่กระจายของไวรัสโคโรนา กลุ่มเยาวชนไม่คำนึงถึงความเป็นส่วนตัวเป็นลำดับความสำคัญสูงสุดอีกต่อไป พวกเขาต้องการความปลอดภัยส่วนบุคคลและชุมชนอย่างจริงจังมากกว่า กรณีดังกล่าวแสดงให้เห็นว่าประชาชนให้ความเชื่อมั่นในความสามารถของรัฐบาลและเลือกที่จะปฏิบัติตามคำแนะนำของรัฐบาลมากกว่าที่จะคำนึงถึงสิทธิความเป็นส่วนตัว

สาขาวิชา เอเชียตะวันออกเฉียงใต้ศึกษา      ลายมือชื่อนิสิต .....

ปีการศึกษา 2564      ลายมือชื่อ อ.ที่ปรึกษาหลัก .....

# # 6288518520 : MAJOR SOUTHEAST ASIAN STUDIES

KEYWORD: Contact tracing application; Trust; Bluezone; privacy; COVID-19;  
Quang Ninh; Vietnam

Hung Gia Do : PUBLIC PERCEPTION ON PRIVACY AND ACCEPTANCE OF CONTACT TRACING APPLICATION FOR CONTROLLING THE SPREAD OF COVID-19 IN QUANG NINH, VIETNAM. Advisor: Saikaew Thipakorn, Ph.D.

Since personal data has become valuable resources in the digital age, the concern of people on privacy turns to be more sensitive and significant among Vietnamese young adults. However, when the government introduced contact tracing application (Bluezone) in April 2020 to trace the movement of people with the aim in controlling the spread of COVID-19, the public attitude changed significantly. As time goes by, many comments on social networks and reviews on the Bluezone app had shown positive attitudes when people gradually accepted Bluezone and recommended others to download the app on their phone. With a case study in Quang Ninh province (Northeast Vietnam), the study shows that the health issue is placed on the top of priority. It outweighs the privacy issues during COVID-19 era. The study gives propotional amount of information and opinion on how young people decide to accept the use if the Bluezone application provided by the government to mitigate the spread of coronavirus. This youth group do not take privacy consideration as the highest priority. They rather prefer safety of personal and community more seriously. People place their trust in the competency of the government and follow the instruction rather than other private sources of choice.

Field of Study: Southeast Asian Studies      Student's Signature .....

Academic Year: 2021      Advisor's Signature .....

## ACKNOWLEDGEMENTS

First of all, I would like to thank Chulalongkorn University for providing the ASEAN and Non-ASEAN Scholarship for Graduate Student to give me the opportunity to study at one of the best educational institutions in Thailand.

From the bottom of my heart, I would like to thank my advisor Dr. Saikaew Thipakorn, who taught and guided me a lot about how to do and develop research ideas in this long journey. This thesis cannot be completed without her prompt support and encouragement timely.

I owe my thesis committee Prof. Montira and Dr. Thanyathip for their valuable knowledge and advice for me to constantly learn and hone my research skills. I would also like to express my gratitude to Prof. Nguyen Manh Dung who always gives me priceless advice on research direction, and documentation support.

I also express my sincere thanks to the office staff at the Graduate School, Southeast Asian Studies Program, and Central library. I would like to send my deep gratitude to all my Vietnamese and international friends, especially Cao Van, Franc Han Shih, Chaya, Hsiang Ching. Their kindness and support makes my life abroad more interesting and I also learn many new things from their mindset and way of life.

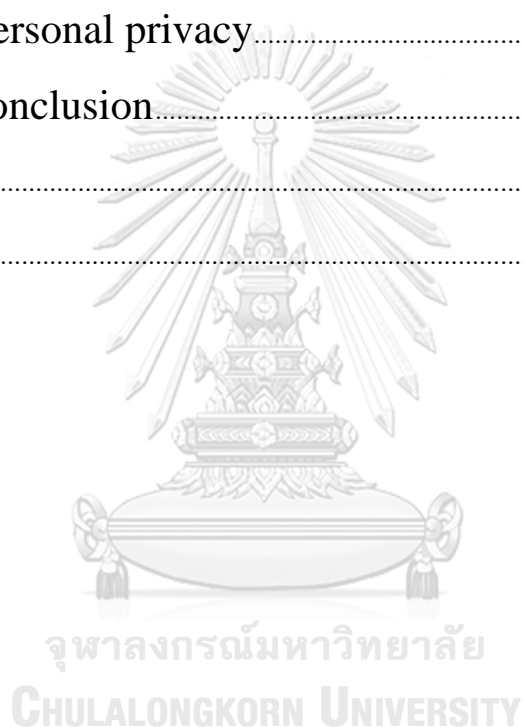
Last but not least, I am deeply indebted to my family. I would like to thank my parents for always trying to give me the best education as they can. This thesis is a gift to my family in the upcoming new year 2022.

Hung Gia Do

## TABLE OF CONTENTS

	Page
ABSTRACT (THAI).....	iii
ABSTRACT (ENGLISH).....	iv
ACKNOWLEDGEMENTS.....	v
TABLE OF CONTENTS.....	vi
<b>Chapter I: Introduction.....</b>	<b>1</b>
Research problem.....	1
Definition.....	5
Objective of the thesis.....	11
Hypothesis.....	11
Conceptual framework.....	11
Research methodology.....	12
Significance and usefulness of the thesis.....	17
Literature review.....	17
Structure of the thesis.....	23
<b>Chapter II: COVID-19 outbreak and contact tracing application</b> .....	<b>24</b>
<b>in Quang Ninh, Vietnam.....</b>	<b>24</b>
A. Quang Ninh, Vietnam in the flow of COVID-19 outbreak	25
B. Bluezone application and Privacy issue.....	30
<b>Chapter III: Explanation of statistical data.....</b>	<b>36</b>
A. Demographics.....	36

B. Perceived risk from COVID-19 .....	38
C. Perceived benefits from Bluezone.....	41
D. Perceived privacy risk from Bluezone.....	43
E. The acceptance of Quang Ninh people on Bluezone .....	45
Chapter IV: Discussion.....	48
A. Impetus of belief.....	48
B. Online personal privacy.....	71
Chapter V: Conclusion.....	86
REFERENCES .....	90
VITA.....	106





**List of tables**

<b>Tables</b>		<b>Page</b>
1	Items assessing the perceived risk from COVID-19 (B), perceived benefits from Bluezone (C) and perceived privacy risk form Bluezone (D).	19-20
2	Demographics	32
3	Provincial Performance by Dimension in selected localities in 2020	54



## List of figures

<b>Figures</b>		<b>Page</b>
1	Statistics of COVID-19 cases as of 19 April, 2021	2
2	Cumulative and new (past 7 days) cases and deaths by age and sex	3
3	Distribution of cumulative COVID-19 laboratory confirmed cases by place of detection, Viet Nam, as of 11 April 2021	26
4	Operation model of Bluezone	30
5	Perceived risk from COVID-19	35
6	Perceived benefits from Bluezone	37
7	Perceived privacy risk from Bluezone	39
8	The acceptance of Quang Ninh people on Bluezone	41
9	GDP growth in selected countries	45
10	Most Important Issue Facing the Country from Citizens' Perspective, 2020	48
11	Tracing information of infections is publicly announced on social networks	56
12	Market card in Mao Khe ward, Quang Ninh	58
13	Propaganda posters using war rhetoric	61
14	Epidemic propaganda is like fighting the enemy in Vietnam	62
15	Vietnam in Hofstede's cultural theory	66
16	A part of users are worried about personal privacy when using Bluezone	74
17	Many Vietnamese users react about hackers and scams on social networks	76
18	How users deal with scams via facebook	77
19	How users deal with scams via facebook (continues)	78

## Chapter I: Introduction

*“Where there is unity*

*There is always victory”*

---Publilus Syrus

### Research problem

In the early twentieth century, while the world was going through the end of the first world war (WWI), the Spanish flu pandemic appeared, leaving many serious economic, political and social consequences. After a century, when the globe has been witnessing the US-China trade war, COVID-19 comes and turns out everything.

Since the first case appeared in Wuhan, China at the end of 2019, the number of people infected has continuously increased and WHO has issued the declaration of COVID-19 as a global pandemic. COVID-19 has become a phenomenon through which it has left a profound impact on societies and countries around the world. According to WHO, globally, as of 4:32pm CEST, 29 March 2021, there have been 126,890,643 confirmed cases of COVID-19, including 2,778,619 deaths<sup>1</sup>.

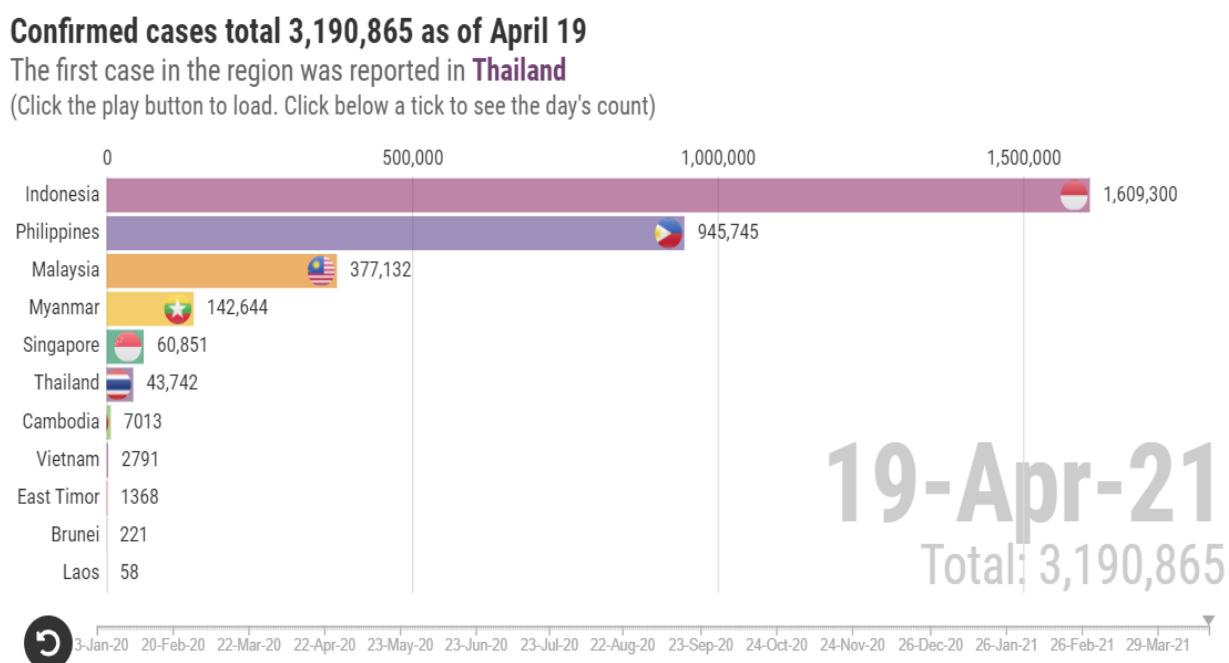
In Southeast Asia, after the first case was reported in Thailand, there are more than three million confirmed cases (update on 19th April, 2021), amongst Indonesia and the Philippines are two countries that have the highest COVID infections in the region.<sup>2</sup>

---

<sup>1</sup> WHO Coronavirus (COVID-19) Dashboard, <https://covid19.who.int/> accessed on March 29, 2021

<sup>2</sup> <https://www.reportingasean.net/covid-19-cases-southeast-asia/> accessed on 20 April, 2021

**Figure 1: Statistics of COVID-19 cases as of 19 April, 2021**

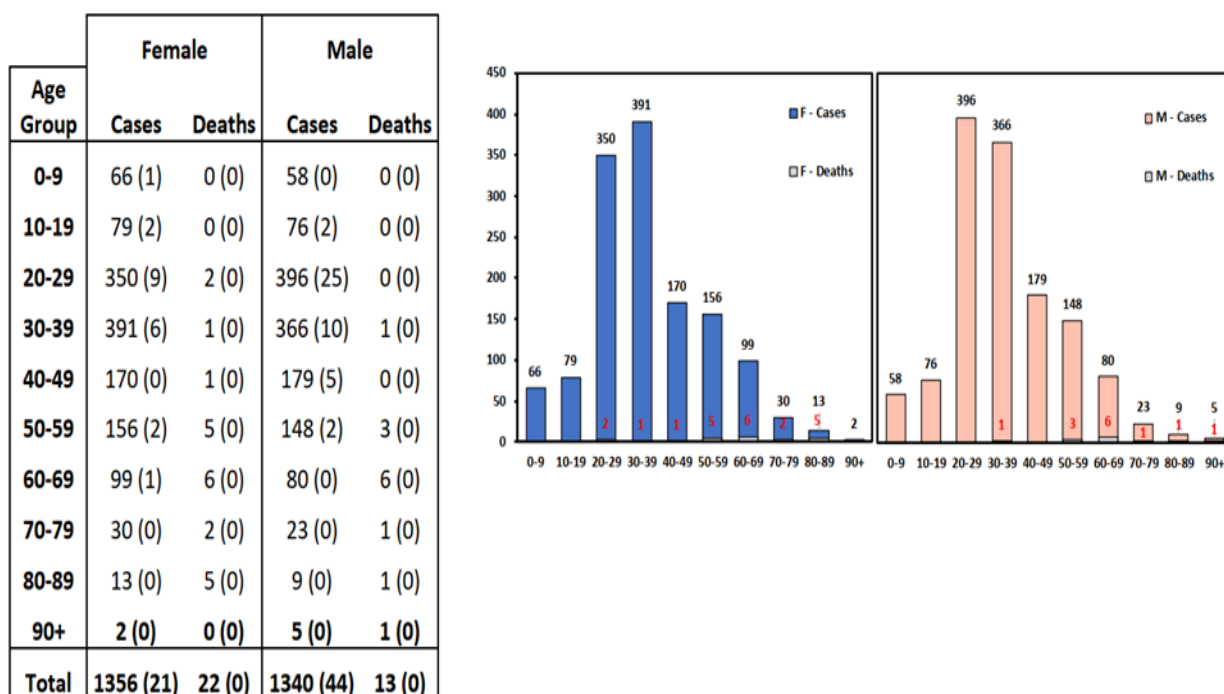


Sources: Johns Hopkins University, WHO as of 10:00 CET • July 30-31 data on Philippines sourced from its Department of Health website. Created by Yvonne T. Chua

With its geographical proximity to China, Vietnam is one of the countries that soon recorded the first COVID-19 cases in Asia. As of 11 April, 2021, Vietnam has confirmed 2696 cases, and 35 died in total (WHO)<sup>3</sup>. At the moment this research is being conducted, within 7 days from 5 April – 11 April 2021, 62 new laboratory-confirmed cases of COVID-19 had been reported in Vietnam by WHO. (see figure 2)

<sup>3</sup> World Health Organization (WHO), COVID-19 in Vietnam Situation Report 37, 14 April 2021 <https://www.who.int/vietnam/internal-publications-detail/covid-19-in-viet-nam-situation-report-37>

**Figure 2: Cumulative and new (past 7 days) cases and deaths by age and sex<sup>4</sup>**



Source: WHO

To limit the virus impact, along with some of behavioral measures (hand washing, social distancing, mask wearing), the Vietnamese government has issued smartphone tracking application (Bluezone app) in order to detect potential infections in community.

The effectiveness of contact tracing application depends mainly on the acceptance of young adults. On one hand, young adults who frequently engage in social activities and present with little to none of the SARS-CoV-2 symptoms have been identified as driving the spread of COVID-19 in many countries<sup>5</sup>, and Vietnam is not

<sup>4</sup> WHO, COVID-19 in Viet Nam Situation Report 37, Ibid

<sup>5</sup> World Health Organization. Virtual Press Conference on COVID-19 in the Western Pacific: Remarks by Dr Takeshi Kasai. Available online: <https://www.who.int/westernpacific/news/speeches/detail/virtual-press-conference-on-covid-19-in-the-western-pacific> (accessed on 9 September 2020).

an exception. However, questions about effectiveness, especially privacy and security of personal data, are the initial obstacles that make people not ready to accept Bluezone at the time it was launched. The following study will identify the risks, benefits, and acceptance of contact tracing application among Vietnamese adults.

Quang Ninh province, which is located in the economic dynamic triangle of northeast region of Vietnam, has a high rate of internet users and Bluezone downloads. According to Ministry of Information and Communications, in terms of the Bluezone installations out of the provincial population, Quang Ninh ranked fourth (After Da Nang, Hai Duong, and Ha Noi), with 454,674 downloads, accounting for 34.44% of the total population of the province<sup>6</sup>. Therefore, the study will choose Quang Ninh province as a case study for reasons below:

(1) Quang Ninh is one of the two biggest COVID epicenters in the fourth wave (early 2021). Local people can employ their memories and answer questions precisely.

(2) Quang Ninh has a high rate of internet users and Bluezone settings<sup>7</sup>.

In general, there has appeared a number of papers on the topic of COVID-19 in Vietnam focusing on issues such as the outbreak of COVID-19 in Vietnam<sup>8</sup>, social

<sup>6</sup> Hà Thanh (2021), Ứng dụng Bluezone đạt hơn 30 triệu lượt tải (Bluezone reach more than 30 million downloads) <http://kinhtedothi.vn/ung-dung-bluezone-dat-hon-30-trieu-luot-tai-411746.html>. See more Lê Viết Khuyên (2021) Ứng dụng Bluezone cán mốc 28 triệu lượt tải, người Việt đang làm mọi cách dù là nhỏ nhất để ngăn ngừa sự lây lan của dịch Covid-19 (Bluezone application reached 28 million downloads, Vietnamese people are doing everything even the smallest to prevent the spread of Covid-19 pandemic.) <https://www.thegioididong.com/tin-tuc/ung-dung-bluezone-can-moc-28-trieu-luot-tai-1325693> accessed 20 April 2021

<sup>7</sup> Hà Thanh (2021), Lê Viết Khuyên (2021), Ibid

<sup>8</sup> H.D.N. Trang, D.C. Vu: Summary of the COVID-19 outbreak in Vietnam — lessons and suggestions, *Travel Med Infect Dis* (2020), Article 101651; H.N. Thanh, T.N. Van, H.N.T. Thu, B.N. Van, B.D. Thanh, H.P.T. Thu, et al: Outbreak investigation for COVID-19 in northern Vietnam, *Lancet Infect Dis*, 20 (5) (2020), pp. 535-536. See more L.T. Hai, L.V. Nguyen, D.M. Tran, H.T. Do, H.T. Tran, Y.T. Le, et al: The first infant case of COVID-19 acquired from a secondary transmission in Vietnam *Lancet Child Adolesc Health*, 4 (5) (2020), pp. 405-406

media issues<sup>9</sup>, the perception of risk<sup>10</sup>, some factors that help in controlling COVID-19 in Vietnam<sup>11</sup> and Psychological Impacts of Coronavirus Disease 2019 to people<sup>12</sup>. From the above situation, it can be seen that, although contact tracing technology (Bluezone app) has been implemented in Vietnam since April 2020, there is still no academic study to assess the level of impact, influence or psychology, awareness of people when using this type of tracking technology. Therefore, by conducting this research, the study would like to fill in the gap of academic sources in terms of public perceptions towards contact tracing technology and privacy issues in Vietnam during COVID-19 era.

## **Definition**

### **General privacy**

There are a plenty of studies which explore the definition of privacy. In the world, the concept of privacy has been explored in philosophical, psychological, sociological, and legal spheres of social sciences for over one century. Among those studies, Alan Westin, privacy researcher in the west, is well known by providing one of the most cited definitions of privacy: “Privacy is the claim of individuals, groups or institutions to determine for themselves when, how, and to what extent information

---

<sup>9</sup> V.P. La, T.H. Pham, M.T. Ho, N.M. Hoang, N.P.K. Linh, V.T. Trang, et al: Policy response, social media, and science journalism for the sustainability of the public health system amid COVID-19 outbreak: the Vietnam lessons Sustainability, 12 (7) (2020), p. 2931

<sup>10</sup> T.L. Huynh: The COVID-19 risk perception: a survey on socioeconomics and media attention, Econ Bull, 40 (1) (2020), pp. 758-764

<sup>11</sup> Van Nhu, H., Tuyet-Hanh, T.T., Van, N.T.A. et al. Knowledge, Attitudes, and Practices of the Vietnamese as Key Factors in Controlling COVID-19. J Community Health 45, 1263–1269 (2020). <https://doi.org/10.1007/s10900-020-00919-4>

<sup>12</sup> Ngoc Cong Duong K, Nguyen Le Bao T, Thi Lan Nguyen P, Vo Van T, Phung Lam T, Pham Gia A, Anuratpanich L, Vo Van B: Psychological Impacts of COVID-19 During the First Nationwide Lockdown in Vietnam: Web-Based, Cross-Sectional Survey Study, JMIR Form Res 2020;4(12):e24776 URL: <https://formative.jmir.org/2020/12/e24776> DOI: 10.2196/24776

about them is communicated to others”<sup>13</sup>. Irwin Altman defined privacy as an individual’s ability and effort to control social contacts.<sup>14</sup> In another explanation of privacy, Ruth Gavison, an Israeli law professor, stated that “our interest in privacy [...] is related to our concern over our accessibility to others: the extent to which we are known to other, the extent to which we are the subject of others’ attention” (16, pp).  
423 In Vietnam, Nguyen Dang Dung explained privacy as the right of the individual to be protected from any nosiness, ensuring that their action or secrecy is not exposed to the public.<sup>15</sup>

In short, it is noticed that many definitions above give us an important sense of privacy that we should protect what is considered as private and crucial of ourselves with others.

Due to the various approaches in conceptualizing privacy, Jeff Smith *et al* suggests a broadly classification of privacy definition as either *valued-based* or *cognate-based*.<sup>16</sup>

(1) The value-based definition examines general privacy as two types: privacy as *a human right* and privacy as *a commodity*. In the view of general *privacy as a human right* integral to society’s moral value system. However, in economics, when the general privacy as right concept is examined to explore the behaviour of customer, a privacy paradox is emerged. A privacy paradox means although recorded high privacy

---

<sup>13</sup> Westin, A. F. (1967) Privacy and freedom. New York: Atheneum, pp.10

<sup>14</sup> Altman, I. (1975) The Environment and Social Behavior, Monterey: Brooks/Cole

<sup>15</sup> Nguyễn Đăng Dung (2018). Sự phát triển quyền riêng tư trên thế giới và ở Việt Nam. (The evolution of privacy in the world and in Vietnam) Quyền về sự riêng tư, Nhà xuất bản chính trị Quốc gia sự thật, Hà Nội, tr. 34

<sup>16</sup> Smith, H. J., Dinev, T., & Xu, H. (2011). Information privacy research: an interdisciplinary review. MIS quarterly, 989-1015.



concerns, consumers still gradually disclose their personal information in a certain circumstances. Therefore, Bennett introduced a notion of *privacy as a commodity*. From this view, privacy is still an individual and societal value, but it is not absolute, as it can be assigned an economic value and be considered in a cost-benefit calculation at both individual and societal levels.

(2) The cognate-based definition also classifies general privacy as two types: *state* and *control*. The notion of *state privacy* concept was first introduced in Westin's research (1967): "voluntary and temporary withdrawal of a person from the general society". Psychologists and cognitive scientists played a vital role in producing a cognate-based conceptualization of general privacy-related to the individual's mind, perceptions, and cognition rather than to an absolute moral value or norm. Meanwhile, the definitions of general *privacy as control* is: "Privacy, as a whole or in part, represents the control of transactions between person(s) and other(s), the ultimate aim of which is to enhance autonomy and/or to minimize vulnerability".<sup>17</sup> The control-based concept of privacy then has proliferated as a mainstream on privacy study. Smith suggests that it seems because of the attributes of information privacy – and has been further developed in the area of information systems and marketing.<sup>18</sup>

In summary, it can be seen that privacy has many definitions in itself, depending on the approaches of scholars in different scientific disciplines and research periods. However, within the scope of the personal privacy study of the thesis, we would suggest that personal privacy is private life of an individual, and the degree of privacy concern

---

<sup>17</sup> Margulis, S. T. 1977a. "Conceptions of Privacy: Current Status and Next Steps," *Journal of Social Issues* (33:3), pp. 5-21.

<sup>18</sup> Smith (2011), *Ibid*, pp. 995

of every person depends on subjective perception and the impacts of environment considering political, societal and cultural context in a certain society and in a specific period of time.

### **Online privacy**

Online privacy, emerging along with the spread of internet, is part of general privacy. This study focuses on online privacy of individual (not group, institution, and societal level). In other word, this is a study on online personal privacy.

With the explosive development of the internet on a global scale since from late 20th century, research on online privacy has received more and more attention among scholarship. On one hand, this is still a discussed topic existing mainly in Western countries. On the other hand, it is getting more attention of scholars who get educated in the West.

In the context of Internet communications, Laurie Thomas Lee conceptualizes privacy from the notion of intrusion. From this point, privacy concerns not only just what information others *take* but also what others can *see* . Here, any form of unauthorized online surveillance, for example, is as much a violation of personal privacy as intercepting and capturing personal emails or creditcard information.<sup>19</sup>

Kenneth Laudon, an online information systems scholar, has suggested a concept of online privacy: “the claim of individuals to be left alone, free from surveillance, or interference from other individuals or organizations including the

---

<sup>19</sup> Lee. 2007. “Digital media technology and individual privacy,” In Communication Technology and Social Change ,eds. Carolyn A. Lin and David J. Atkin. (London: Routledge.)

state.”<sup>20</sup> Kenneth’s definition of online privacy could encircle the multiple dimensions that reflects conceptions from the West.

Situated in the context of online social networks (OSN) such as Facebook, Twitter, etc, which enable people to keep in touch with their contacts, Zhang has proposed that privacy refers to a user’s control over identity anonymity (the ability to stay anonymous online), a user’s personal space privacy (the visibility of the user’s online self-representation), and a user’s communication privacy (data regarding the user’s network connection, such as IP address, length of connection or user’s other messages).<sup>21</sup>

In short, the study would suggest that online personal privacy has both similarities and differences with personal privacy in general. Online personal privacy is private information that needs to be protected by owner before it is disclosed by himself or being intruded and released publicly by others. However, online personal privacy is different from general personal privacy in that state legislation is often slow and technology develops very quickly, so the protection of personal information in digital conditions depends mainly on digital literacy of each individual.

### **Contact tracing application**

Contact tracing applications or smartphone tracking technologies employ GPS, telecommunication, or Bluetooth data to generate a list of the user’s contacts with other

---

<sup>20</sup> Laudon, Kenneth C. and Jane P. Laudon. 2008. *Essentials of Management Information Systems. Organization & Technology in the networked Enterprise* (8 th Ed). New Jersey: Prentice Hall.

<sup>21</sup> Zhang, C., Sun, J. et al. (2010) ‘Privacy and security for online social networks: challenges and opportunities’, *IEEE Network*, Vol. 24, No. 4, pp.13–18. See more Sriratanaviriyakul, N., Nkhoma, M., Felipe, A. L., Cao, T. K., & Tran, Q. H. (2014). Vietnamese privacy concerns and security in using online social networks. *International Journal of Electronic Security and Digital Forensics*, 6(4), 306-318.

individuals within a certain distance.<sup>22</sup> If an individual is found to be positive for COVID-19, the user will get an immediate notification of their health status, and receive recommendations from health authorities on proactive measures to prevent the virus's spread such as self-isolate at home. With such a working mechanism, contact tracing applications is expected to be a solution to mitigate the spread of viruses in countries around the world.<sup>23</sup> In terms of storage options, it is divided into two main categories: centralized vs decentralized storage.

Bluezone was introduced and circulated by the Vietnamese government from the end of April 2020. Bluezone application uses *Bluetooth technology* and *decentralized storage*. It is described briefly as below:<sup>24</sup>

Bluetooth Tracking:

- + Usually a 10 meter radius<sup>3</sup>.
- + Obstructed by objects.
- + Records who you have been in proximity to, not locations.
- + Anonymized IDs; low threat to privacy and security.
- + Only works on Bluetooth enabled phones.
- + Voluntary: Can be turned off

---

<sup>22</sup> Oliver et al., Oliver, N., Lepri, B., Sterly, H., Lambiotte, R., Deletaille, S., De Nadai, M., ... others(2020).Mobile phone data for informing public health actions across the covid-19pandemic life cycle.American Association for the Advancement of Science.

<sup>23</sup> Ferretti, L., Wymant, C., Kendall, M., Zhao, L., Nurtay, A., Abeler-Dörner, L., ...Fraser, C. (2020). Quantifying sars-cov-2 transmission suggests epidemic control with digital contact tracing.Science,368(6491).

<sup>24</sup> Garrett, P. M., White, J. P., Lewandowsky, S., Kashima, Y., Perfors, A., Little, D. R., ... Dennis, S. (2020, September 29). The acceptability and uptake of smartphone tracking for COVID-19 in Australia. <https://doi.org/10.31234/osf.io/7tme6>, pp2. See more Bluezone white paper (English version)

Decentralized storage:

+ Data stored on the phone

+ Notifications are coordinated phone-to-phone

### **Objective of the thesis**

1. To examine people's attitude toward privacy related to the Vietnamese government's use of information and communication technology during COVID-19 outbreak.

2. To investigate the degree of acceptance of Bluezone app among young adults in Quang Ninh during the coronavirus pandemic period, from April 2020 to April 2021.

### **Hypothesis**

Due to high public health concerns, privacy issues became less important among Vietnamese during COVID-19 era. As when users download Bluezone, they are required to register by their own private phone number. Besides, smartphone owners also need to open Bluetooth mode all the time to trace the connection with others. Young adults fear the personal data can be lost or used for another purpose by the third party. However, since the coronavirus outbreak became worsen over time and the reassurance from the government on data protection, Bluezone gradually became accepted among young adults in Quang Ninh, Vietnam.

### **Conceptual framework**

The study will employ the privacy calculus theory to interpret the relationship between benefits (public and individual health) and risks (privacy, data surveillance<sup>25</sup>).

---

<sup>25</sup> Laufer, R.S.; Wolfe, M. Privacy as a concept and a social issue: A multidimensional developmental theory. *J. Soc. Issues* 1977, 33, 22–42. See more Culnan, M.J.; Armstrong, P.K. Information privacy

The privacy calculus model suggests that users tend to weigh up what is more beneficial when they decide to share information with others.<sup>26</sup> Drawing on this theoretical model as well as risk – benefit analysis developed by Garrett, P. M et al<sup>27</sup>, the current study aims to test a research model on the acceptance of Vietnamese users to Bluezone application in Quang Ninh, Vietnam

Perceived benefits in this context would depend on some of the important elements in terms of public and individual health issues, such as: Bluezone helps to reduce the spread of COVID-19, resume normal life and avoid potential infection.

Perceived risks would depend on whether privacy is a big concern among Bluezone users or not. Whether Bluezone users are concerned about the inappropriate collection, storage, profiling, and use of their personal information for unintended purposes without their consent. In addition, if the government or medical authorities get high rate of trust in users, people tend to accept Bluezone. In theory, to maximize the acceptance rate of people, it needs to be ensured that the perceived benefits (health issues) outweigh perceived risks (data risk, privacy).

### **Research methodology**

It can be difficult if we want to transfer the qualities of attitude, character, and personality traits into quantitative measures for data analysis. To bypass this issue, the study employs the method of creating a Likert scale which was developed by Rensis

---

concerns, procedural fairness, and impersonal trust: An empirical investigation. *Organ. Sci.* 1999, 10, 104–115; Wang, T.; Duong, T.D.; Chen, C.C. Intention to disclose personal information via mobile applications: A privacy calculus perspective. *Int. J. Inf. Manag.* 2016, 36, 531–542.

<sup>26</sup> Laufer, R.S.; Wolfe (1977), *Ibid.* See more Xu, H., Luo, X. R., Carroll, J. M., & Rosson, M. B. (2011). The personalization privacy paradox: An exploratory study of decision-making process for location-aware marketing. *Decision support systems*, 51(1), 42-52.

<sup>27</sup> Garrett, P. M., White, J. P., Lewandowsky, S., Kashima, Y., Perfors, A., Little, D. R., ... Dennis, S. (2020, September 29). The acceptability and uptake of smartphone tracking for COVID-19 in Australia. <https://doi.org/10.31234/osf.io/7tme6>

Likert (1932) (an American psychologist) to develop the procedure for measuring attitudinal scales. The respondents will be asked to indicate their level of agreement, approval, or belief in the form of the 5-point scale in terms of perceived benefits and risks which drive their acceptance on Bluezone.

To collect data of public perception on Bluezone, the author will create a questionnaire in Google form and people will answer it on the internet. A questionnaire will be created, and the participants will answer multiple choice questions on issues surrounding the topic of COVID-19 and Bluezone app. Survey results will help re-evaluate the hypothesis and come up with new findings.

In addition, the study also relies on documentary research to gather basic data. Primary sources including the Ministry of Health reports, WHO reports, and legal documents provided by the Vietnamese government will be collected to give an overview of coronavirus pandemic in the globe and Vietnam as well as COVID-19 related policy of Vietnam government. Statistics and information on analytical part which consists of privacy issues and acceptance of young adults on Bluezone are mostly collected from Vietnamese sources as well as gathered by some local informants in Quang Ninh.

#### ***Data collection***

The author creates a Google form and shares it on various online platforms. People are able to access the survey on a smartphone, laptop, or PC (personal computer). Each surveyor answers every question by clicking on it. Time consuming could be from 10 to 15 minutes, depending on each individual. The data was gathered within one week.

The survey collected 132 samples from participants. After a comprehensive check, there are 111 samples that can be used in statistics.

### *Participants*

Young adults who are living or working in Quang Ninh in this study will be counted from 18 to 39 years old. On one hand, majority of COVID-19 infections belong to this group (see Figure 2). On the other hand, young adults have better knowledge in terms of digital literacy than elders (Children under the age of 18 will not be counted in this research). Most importantly, young adults seem to be more sensitive and concern about privacy issues than others.

### *Design and data analysis*

After responding to some demographic questions (A), participants were asked about Perceived risk from COVID-19 (B), Perceived benefits from Bluezone (C), Perceived privacy risk from Bluezone (D) (see table 1). Apart from this, some questions were made to ask the acceptance of Quang Ninh people on Bluezone. In category (B), (C), (D), responses were made on a 5-point scale, where increasing values were associated with greater endorsement of the issue, (e.g., 1 = None, 5 = Extremely).

**Table 1: Items assessing the perceived risk from COVID-19 (B), perceived benefits from Bluezone (C) and perceived privacy risk form Bluezone (D).**

Category	Item	Question	Label
B	Risk 1	You think COVID-19 is very dangerous of Covid to public health.	Public harm
	Risk 2	You think COVID-19 is very dangerous to your own health.	Personal Harm
	Risk 3	You are very worried if you are infected by Coronavirus	Concern self



	Risk 4	You are very worried if you know that someone around you (relatives, friends, neighbors, co-workers ...) is infected by Coronavirus	Concern others
C	Benefit 1	You believe that the use of Bluezone application is very effective in preventing the spread of Covid 19 to the community.	Reduce the spread
	Benefit 2	You believe that Bluezone could help you back to normal life quickly.	Resume normal life
	Benefit 3	You are very confident that the Bluezone app has helped you proactively stay away from potentially infectious individuals thanks to its warning system.	Avoid potential infection
D	Harm 1	When using Bluezone, you think the personal data being collected is a sensitive issue	Data sensitivity
	Harm 2	You think that data is collected by government in controlling COVID-19 pandemic is necessary	Necessary data
	Harm 3	You strongly believe that the government only use data in preventing COVID-19 transmission	Trust intention
	Harm 4	You trust the government to be able to ensure the privacy of each individual	Trust privacy
E	Yes/No	I think Bluezone is necessary for private health protection	Private health protection

	Yes/No	I think Bluezone is necessary for public health protection	Public health protection
	Yes/No	I comply with any behavioral means and regulations to prevent COVID-19 transmission	Regulatory compliance
	Yes/No	I think Bluezone is an effective tool in controlling coronavirus spread	COVID-19 effective prevention
	Yes/No	I believe the government has succeeded in curbing the spread of the pandemic so far	Trust in government
	Yes/No	I recognize the Bluezone application	Bluezone recognition
	Yes/No	I installed Bluezone into my smartphone	Bluezone installation
	Yes/No	I always open Bluetooth mode for Bluezone	Always active Bluetooth mode
	Yes/No	I sometimes open Bluetooth mode for Bluezone	Sometimes active Bluetooth mode
	Yes/No	I downloaded Bluezone but do not use it	Download but inactive

For Likert scale items in category (B), (C), and (D), mean values will be selected to be visualized by charts. The demographics (A) and the acceptance of Quang Ninh young adults on Bluezone (E) will be calculated by percentage values (%).

### **Significance and usefulness of the thesis**

1. This study will provide an understanding of public perceptions towards contact tracing applications in Vietnam during the coronavirus pandemic
2. This research will add to the body of knowledge on Vietnamese studies and privacy issues in political-social and cultural context in contemporary Vietnam history

### **Literature review**

Research on privacy is a relatively new issue in Vietnam. In fact, some privacy studies in Vietnam have mainly appeared about one decade ago. Most of the authors are foreigners doing research on online privacy in Vietnam. However, under the remarkable development of the internet in Vietnam, privacy issue has been gradually explored by a number of Vietnamese scholars in terms of privacy security, privacy rights, cultural dimension as well as technological applications. In general, the study will examine and categorize previous scholar's studies on online privacy and technological applications in Vietnam in two mainstreams: (1) *Vietnamese privacy concerns in digital environment* and (2) *Vietnamese's attitude towards the acceptance of technological applications*.

#### **Vietnamese privacy concerns in digital environment**

Research on online privacy has flourished in Anglophone countries, Europe but is still limited in Asia in general and Vietnam in particular, where traditional Confucian and collectivist cultures tend to place a lower premium on Western-based normative values relating to individual rights and concerns<sup>28</sup>. This view is agreed and shared by

---

<sup>28</sup> Sharbaugh, P. E. (2013). What is mine is yours: an exploratory study of online personal privacy in the socialist republic of Vietnam. In *CyberCulture Now: Social and Communication Behaviours on the Web* (pp. 69-85). Brill, pp.2

Sriratanaviriyakul *et al* in their research. Sriratanaviriyakul *et al* in the study “Vietnamese privacy concerns and security in using online social networks” stated that the collectivists’ culture of Vietnam makes people more comfortable in sharing their private information and life experiences.<sup>29</sup> We raise a question here whether the perception of people in general when the concept of privacy is not so important in social behavior leading to the academic community in Vietnam has not considered privacy as a comprehensive research issue (?).

Many Western scholars focus their research on privacy on the interrelationships between different factors. According to Jelena Budak *et al*, there are three broad of user-level antecedents that impact privacy concerns in general: demographic factors (eg: gender, education), experience factors (eg internet use, web expertise) and socio-psychological factors (eg the psychological need for privacy, generalized self-efficacy, belief in privacy rights).<sup>30</sup> However, in a broader picture, the Budak’s study also suggests that the cultural characteristics of a society determine the level of privacy concerns.

---

<sup>29</sup> Sriratanaviriyakul, N., Nkhoma, M., Felipe, A. L., Cao, T. K., & Tran, Q. H. (2014). Vietnamese privacy concerns and security in using online social networks. *International Journal of Electronic Security and Digital Forensics*, 6(4), 306-318.

<sup>30</sup> Budak, J., Rajh, E., & Recher, V. (2017). Citizens’ privacy concerns: Does national culture matter?. In *Surveillance, Privacy and Security* (pp. 36-51). Routledge.

### *Privacy and national culture*

Kruger and Roodt argue that cultural differences are essential to understanding human behaviour.<sup>31</sup> Meanwhile, Bellman *et al* stated that differences in cultural values and internet usage experiences will lead to differences in internet privacy concerns.<sup>32</sup> Hofstede supposed that the culture is a “collective programming of the mind that distinguishes the members of one group or category of people from others”.<sup>33</sup> It means cultural core elements will form common universal values that are shared in the whole society.

In theory, Hofstede suggested that there are five dimensions of national culture, namely: (1) Power distance (2) Individualism vs. collectivism (3) Masculinity vs femininity (4) Uncertainty avoidance (5) Long-term orientation. Considering the above criteria in the context of Vietnam, Patrick E. Sharbaugh pointed out that Vietnam is a deeply collectivistic society.<sup>34</sup> This means that people living in such a society tend to readily accept the intrusion by groups and organizations in their private life and have more trust and faith in other individuals than those in highly individualist societies.<sup>35</sup> Taking some case studies of personal privacy in Vietnam, Indonesia, Taiwan and the US, the study of Chiou *et al* shows that the difference in people’s response to the questions about “income” and “marital status” reflects the difference between Asian

---

<sup>31</sup> Kruger, T., and Roodt, G. (2003) ‘Hofstede’s VSM-94 revisited: is it reliable and valid?’, *SA Journal of Industrial Psychology*, 29(1): 75–82.

<sup>32</sup> Bellman, S., Johnson, E. J., Kobrin, S. J., and Lohse, G. L. (2004) ‘International differences in information privacy concerns: A global survey of consumers’, *The Information Society*, 20(5): 313–324.

<sup>33</sup> Hofstede, G., Hofstede, G. J., and Minkov, M. (2010) *Cultures and Organizations: Software of the mind* (3rd ed.), New York: McGraw Hill.

<sup>34</sup> Sharbaugh, P. E. (2013). What is mine is yours: an exploratory study of online personal privacy in the socialist republic of Vietnam. In *CyberCulture Now: Social and Communication Behaviours on the Web* (pp. 69-85). Brill.

<sup>35</sup> Sharbaugh, P. E. (2013), *Ibid*, pp. 5

culture and American culture. If Americans feel uncomfortable being asked such questions, Vietnamese, Taiwanese or Indonesian feel that the matter of sharing personal information is not too sensitive. Also, discussing those issues is considered part of the socialization process and builds trust among people.<sup>36</sup>

*Vietnamese's attitude towards privacy issues in online conditions*

Although theoretically, living in a collectivistic society in Vietnam, people should exhibit less level of privacy concern compared to individualist society. Sharbaugh's research argued that there was a paradox in terms of privacy values in Vietnam when private information was highly protective of online private information from other individuals. The author suggests that "Vietnamese conceptions of privacy may have more in common with notions of information security than with traditional Western ideas of personal."<sup>37</sup> Likewise, the study of Sharbaugh and Le Trang (2012) focused on interpreting the Vietnamese perception of online personal privacy and found that Vietnamese people tend to worry about privacy issues from personal threats such as friends, colleagues, hackers, thieves than from entities (eg, government, corporations, and marketers).<sup>38</sup>

The study of Narumon Sriratanaviriyakul *et al* "Vietnamese privacy concerns and security in using online social networks" examines the relationships among online

---

<sup>36</sup> Chiou, A., Jeng-chung, V. C., & Bisset, C. (2008). Cross Cultural Perceptions on Privacy in the United States, Vietnam, Indonesia, and Taiwan. *Online Consumer Protection: Theories of Human Relativism: Theories of Human Relativism*, 284.

<sup>37</sup> Sharbaugh, P. E. (2013), *Ibid*, pp. 8

<sup>38</sup> Sharbaugh, P. E. (2013). What is mine is yours: an exploratory study of online personal privacy in the socialist republic of Vietnam. In *CyberCulture Now: Social and Communication Behaviours on the Web* (pp. 69-85). Brill.

privacy concerns, security, trust, and intention<sup>39</sup>. The results revealed that “privacy” and “security” did not have a significant impact on online social network sites (OSN) users’ trust in Vietnam. In addition, only the “trust” and “security” factors have an impact on the user’s intention to use OSN. The study also identified four main privacy concerns of Vietnamese about OSNs, namely:

(1) General accessibility (fear of personal information being viewed by unwanted parties, such as parents, bosses, or unauthorized parties like stalkers);

(2) Social threats (other users’ actions they cannot control, such as being tagged in a photo or posting humiliating content on the user’s profile);

(3) Organizational threats (the misuse of personal information by OSN providers and third parties such as online marketing agencies);

(4) Identity theft .

Thus, previous research results show that “trust”, “privacy”, and “security” concerns are important keywords that play a decisive role in users’ intention to adopt a service being offered in online environment in Vietnam.

### **Vietnamese’s attitude towards the acceptance of technological applications**

Based on our best knowledge, there are very few studies on Vietnamese psychology and attitudes towards technology applications related to online privacy issues. However, there have been a number of studies by Vietnamese scholars on e-

---

<sup>39</sup> Sriratanaviriyakul, N., Nkhoma, M., Felipe, A. L., Cao, T. K., & Tran, Q. H. (2014). Vietnamese privacy concerns and security in using online social networks. *International Journal of Electronic Security and Digital Forensics*, 6(4), 306-318.

commerce and health technological applications, which contribute to the knowledge body of privacy issues in Vietnam.

Phan Trong Nhan et al., in a study on young Vietnamese's acceptability with the use of e-wallet applications. The study examines the correlation between social influence, intention, privacy and security indicators. The research results show that performance expectancy and social influence significantly predict behavioral intention to use e-wallets in payment. In contrast, the factors, namely, security intention and privacy, and effort expectancy, are statistically significant on behavioral intention<sup>40</sup>. In other words, Internet users in Vietnam do not currently put privacy concerns as the most important factor when making a decision to accept a technological application in the context of e-commerce.

Recent research on the role of mHealth literacy and other factors towards the adoption of wellness apps among the users in Danang city conducted by Doan Thi Lien Huong and Tran Dinh Long has revealed some interesting findings.<sup>41</sup> The authors performed a quantitative research to find out the correlations between the determinants such as perceived usefulness, perceived ease of use, and privacy and security concerns to then intention to use health applications. It is noticed that the research outcome shows that the "privacy and security" has no impact on intention concerns to use health applications. This means that Internet users are still negligent, careless, and not concerned about their privacy and security. The authors also do not forget to suggest

---

<sup>40</sup> PHAN, T. N., HO, T. V., & LE-HOANG, P. V. (2020). Factors Affecting the Behavioral Intention and Behavior of Using E-Wallets of Youth in Vietnam. *The Journal of Asian Finance, Economics, and Business*, 7(10), 295-302.

<sup>41</sup> Huong, D. T. L., & Long, T. D. (2021). Does knowledge matter? The role of m-Health literacy to the acceptance of m-Health applications. *The University of Danang-Journal of Science and Technology*, 42-47.



that the government should implement measures or programs to raise people's awareness of privacy and information protection to protect themselves against dangers in the Internet environment.<sup>42</sup>

However, it is noticed that economic, political and cultural factors in relation to privacy issue have not been discussed in these studies.

It can be seen that currently there is not research on contact tracing applications during the COVID-19 pandemic in Vietnam yet, either at the local or state level. In addition, studies on privacy in Vietnam will become necessary when placing privacy issues in other relationships between the government and the people, examining in political-social and cultural dimensions are topics that need to be added in any further studies. Therefore, this study seeks to fill these gaps in the literature as well as provide a another lens of exploring online privacy in the context of Vietnam at present.

### **Structure of the thesis**

Chapter 1 Research problem, significant definitions and conceptual framework will be explained. Moreover, hypothesis and objectives of the study are given along with review of literature.

Chapter 2 will explore the background of COVID-19 outbreak in Quang Ninh province in particular and Vietnam in general from early 2020 to April 2021. In addition, the overview of releasing contact tracing application (Bluezone) provided by the Vietnam government would be investigated.

---

<sup>42</sup> Huong, D. T. L., & Long, T. D. (2021), Ibid, pp.46

Chapter 3 will give a detail on statistical data. After getting the information from participants who get involved in online survey, the results will be explained. The outcome of research are stated along with some useful statements from the interview with participants.

Chapter 4 gives insightful discussion about the matter of trust and online personal privacy issue in Vietnam in the context of the pandemic.

Chapter 5 Conclusion



**Chapter II: COVID-19 outbreak and contact tracing application**

**in Quang Ninh, Vietnam**

### **A. Quang Ninh, Vietnam in the flow of COVID-19 outbreak**

Vietnam is a country with a relatively long land border with the southern provinces of China. With the large number of Chinese tourists entering Vietnam yearly and the close trade and economic exchange, it is not surprising that Vietnam has become one of the early countries in Asia where discovered COVID-19 patients. The first case of COVID-19 in Vietnam was recorded on January 23, 2020.<sup>43</sup>

As of early April 2021, there were three main episodes of domestic outbreaks.

*The first wave* (from January to April 2020) occurred on the 23rd January in Vinh Phuc (about 50km from Hanoi). Vietnam began closed borders, the entire Son Loi commune was lockdowned, many educational institutes were closed, set up quarantine, testing and keeping track of second, third and fourth levels of infected persons. After the first coronavirus death was reported in China, Vietnam immediately suspended all flights between Vietnam and China. In addition, Vietnam implemented health checks at airports and scanned body temperature. It became stronger from early March to late April 2020. The 27-year-old woman patient became the super spreader when flying back to Hanoi from Europe. This wave took place from early March to late April. Hanoi was imposed on lockdown promptly in many streets, people were asked to wear masks, only go out if necessary, contact tracing and testing body temperature on a large scale. It is noticed that smartphone contact tracing technology has been introduced on 18 April 2020 - Bluezone application (app)<sup>44</sup>. However, after its launch, the app was heavily

---

<sup>43</sup> Vietnamese Ministry of Health, 2020. News on COVID-19. <https://ncov.moh.gov.vn/>

<sup>44</sup> There are various terms of this technology such as contact tracing application, mobile tracing technology, smartphone contract tracing, smartphone tracking data, tracking app. It will be flexibly utilized in this thesis.

skeptical and criticized because of technical errors<sup>45</sup>, especially the community worried about personal data being stolen.<sup>46</sup> However, there are 24,000 downloads of Bluezone as of 26 April 2020.<sup>47</sup>

*The second wave* hit Da Nang city after more than 3 months without community transmission. Da Nang city was the epicenter of the third wave when an infectious COVID-19 illegal immigrant was detected in July. This wave left deadly consequences when the infections and facilities escalated notably. Because of its seriousness, various measures were implemented as previous waves, but at a more localized level. For example, strict social distancing measures, including a ban on public gatherings of more than two individuals, travel to/from Da Nang curtailed for 5 weeks, business closures, mass quarantines, and widespread testing.<sup>48</sup> As of mid-September, 61,968 people were being monitored, 998 were quarantined in health care facilities, 15,619 were quarantined in centralized facilities, and 45,351 were self-quarantined at home.<sup>49</sup> Thanks to those strong measures, the number of deaths was limited and stopped at 35

<sup>45</sup> Thái blog (2020): Dùng Bluezone có nguy cơ lộ thông tin như thế nào? (how risky it is on personal data when using Bluezone?) <https://vnhacker.blogspot.com/2020/04/dung-bluezone-bi-lo-thong-tin-nhu-nao.html> accessed 20 April 2021

<sup>46</sup> Thái blog (2020), Ibid. See more Ngọc Lưu (2020): Người dùng lo ngại việc Bkav đứng sau ứng dụng Bluezone: Bộ TT&TT nói gì? (Users are concerned about Bkav behind Bluezone application: What does the Ministry of Information and Communications say?) <https://vietnamfinance.vn/nguoi-dung-lo-ngai-viec-bkav-dung-sau-ung-dung-bluezone-bo-tttt-noi-gi-20180504224242509.htm> accessed 20 April 2021

<sup>47</sup> Mai Hà (2020) Thực hư thông tin Bluezone “ảnh hưởng an toàn và riêng tư của người dùng” (It is said that Bluezone affects on the safety and privacy of users, true or not?) <https://thanhnien.vn/cong-nghe/thuc-hu-thong-tin-bluezone-anh-huong-an-toan-va-rieng-tu-cua-nguoi-dung-1216167.html> accessed 20 April 2021

<sup>48</sup> International Monetary Fund (2021), Vietnam : 2020 Article IV Consultation-Press Release; Staff Report; and Statement by the Executive Director for Vietnam, p 44 <https://www.imf.org/en/Publications/CR/Issues/2021/02/24/Vietnam-2020-Article-IV-Consultation-Press-Release-Staff-Report-and-Statement-by-the-50121> accessed 18th April 2021

<sup>49</sup> SD Pradhan (2021), Vietnam’s successful handling of multiple waves of Coronavirus attack, the times of India <https://timesofindia.indiatimes.com/blogs/ChanakyaCode/vietnams-successful-handling-of-multiple-waves-of-coronavirus-attack/> accessed 16th April 2021

cases until present. The lesson from Da Nang outbreak is that the loophole in controlling COVID-19 somehow would make way for the penetration of illegal immigrants which other countries should stay alert.<sup>50</sup> There are more than 20 million Bluezone downloads at the end of August – at the same time COVID in central Vietnam basically was suppressed.<sup>51</sup>

*The third wave* happened from January to March, 2021 in two epicenters Quang Ninh and Hai Duong, northern Vietnam. “Patient 1552” is a 34-year-old woman worker in Vietnam Poyun Electronics Co., Ltd. in Hai Duong and “Patient 1553” is a 31-year-old employee at the Van Don International Airport in Quang Ninh Province.<sup>52</sup> Both cases are infected by coronavirus variant from the United Kingdom (the UK) which can transmit in the air and difficult to detect the symptoms. In addition to the already implemented anti- epidemic measures, at the fourth stage, individuals who do not strictly comply with the disease prevention regulations will be penalized by law. For example, the male VNA hostess who spread the disease was sentenced to 2 years of suspended imprisonment.<sup>53</sup> Meanwhile, as of early March 2021, the number of Bluezone downloads exceeded 30 million on record.<sup>54</sup>

In general, provinces that recorded the highest number of COVID-19 cases are mainly located in big cities, the industrial, tourist and commercial centers of the country.

<sup>50</sup> Le TH, Tran TPT. Alert for COVID-19 second wave: A lesson from Vietnam. J Glob Health 2021;11:03012.)

<sup>51</sup> Luru Quý (2020), Bluezone đạt trên 20 triệu lượt tải (Bluezone reach over 20 million downloads) <https://vnexpress.net/bluezone-dat-tren-20-trieu-luot-tai-4150096.html>

<sup>52</sup> Chile (2021) Vietnam records first Covid-19 community transmissions in two months <https://e.vnexpress.net/news/news/vietnam-records-first-covid-19-community-transmissions-in-two-months-4227568.html> accessed 20th April 2021

<sup>53</sup> Phan Thương (2021) Nam tiếp viên VNA làm lây lan dịch bệnh bị tuyên 2 năm tù treo (VNA hostess was sentenced to 2 years of suspended imprisonment for being a COVID super spreader in community) <https://thanhnien.vn/thoi-su/nam-tiep-vien-vna-lam-lay-lan-dich-benh-bi-tuyen-2-nam-tu-treo-1361194.html>

<sup>54</sup> Hà Thanh (2021) Ứng dụng Bluezone đạt hơn 30 triệu lượt tải (Bluezone application reaches more than 30 million downloads) <http://kinhnedothi.vn/ung-dung-bluezone-dat-hon-30-trieu-luot-tai-411746.html> accessed 15 June, 2021

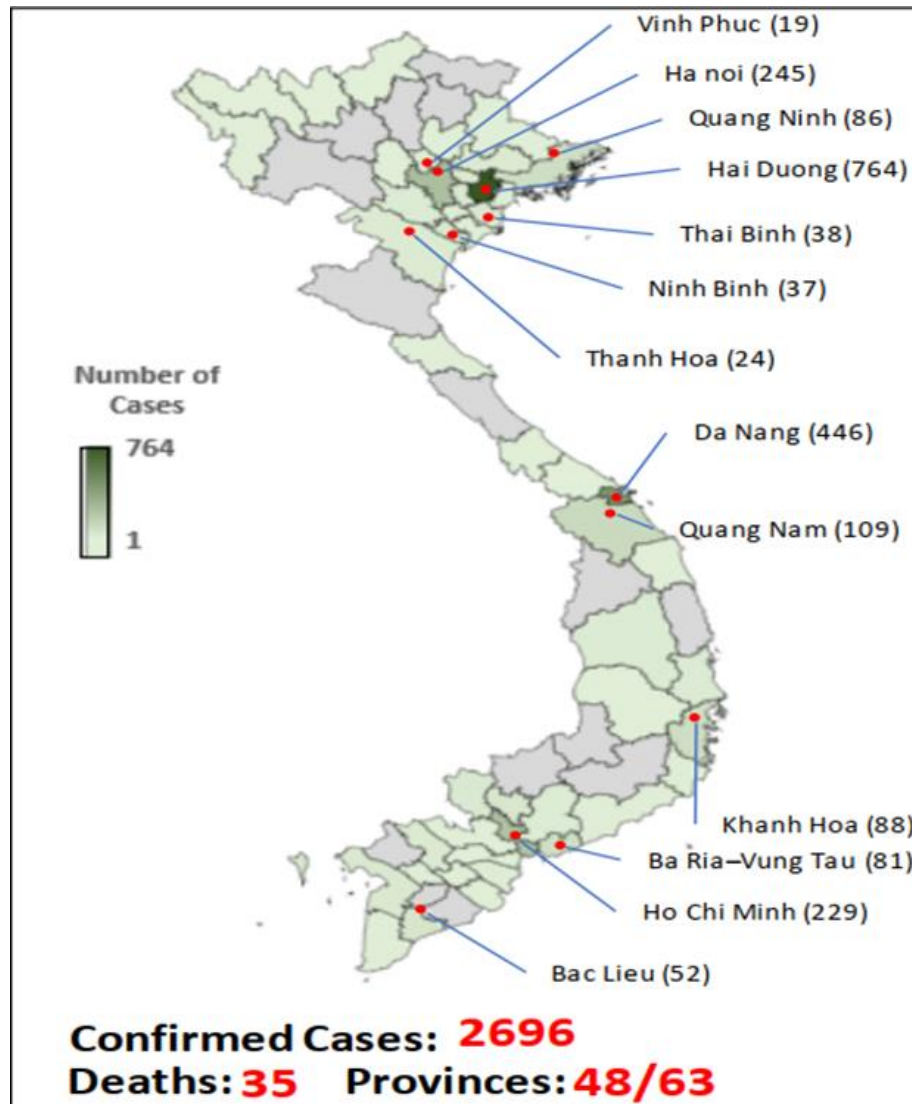
Northern provinces include Hai Duong (764), Ha Noi (245), Quang Ninh (86). The central region is mainly located in Da Nang city (446) and Quang Nam (109). The cases in the South are concentrated in Ho Chi Minh City (229), Khanh Hoa (88) and Ba Ria-Vung Tau (81).<sup>55</sup>



**Figure 3: Distribution of cumulative COVID-19 laboratory confirmed cases by place of detection, Viet Nam, as of 11 April 2021**

---

<sup>55</sup> WHO, COVID-19 in Viet Nam Situation Report 37, 14 April 2021 <https://www.who.int/vietnam/internal-publications-detail/covid-19-in-viet-nam-situation-report-37>



Source: WHO

In addition, as time goes by, it is noticed that the more serious COVID-19 outbreak becomes, the more drastic measures to be taken by the government. In early 2021, even criminal punishment would be implemented if the individual is identified as a super spreader (intentionally and irresponsible to the community). Along with that, Bluezone downloads also increased sharply over time. In given context, it can be seen a significant transformation of Vietnamese people in action and awareness of Bluezone in particular and contact tracing technology in general over the time during COVID-19.

## **B. Bluezone application and Privacy issue**

### *A new issue of privacy*

Clearly, personal data has become valuable resources in the digital age. In the age of the digital economy, AI and big data have played an important role in changing the way of economy and society running. Facebook, Google, Alibaba and many other tech corporations have become wealthy and powerful by using sophisticated algorithms to analyze customer's information, shopping habits for product development and digital marketing. The emergence of Bluezone - mobile tracing technology - has raised one of the hot issues in Vietnam society recently: *privacy violation*.

In Vietnam in recent years, using personal information of others without an individual's permission has become common. For example, personal information is brought to trading, exchanging between business groups such as buying and selling apartments, insurance, cars, gold, silver, stock market, etc, with prices ranging from 400 thousand to several million VND (20 USD ~ 2-300 USD), depending on the level of "important" information.<sup>56</sup> Personal information used for many other bad purposes such as fraud, online extortion worth billions of VND has been publicized on the mass media<sup>57</sup>.

In the trend of technology development and transition to digital economic fashion, Vietnam government issues many legal documents, creating an important legal

---

<sup>56</sup> Trần Thị Hồng Hạnh (2018), Vi phạm pháp luật về bảo vệ thông tin cá nhân ở Việt Nam hiện nay - thực trạng, nguyên nhân và giải pháp (Violation of the law on the protection of personal information in Vietnam today – current situation, causes and solutions), <http://lyluanchinhtri.vn/home/index.php/thuc-tien/item/2763-vi-pham-phap-luat-ve-bao-ve-thong-tin-ca-nhan-o-viet-nam-hien-nay-thuc-trang-nguyen-nhan-va-giai-phap.html>.

<sup>57</sup> Thiên Vương (2021) Triệt phá đường dây lừa đảo hàng tỷ đồng của phụ nữ qua mạng (Destroying a female fraudulent line of billions of dong online) <https://nhandan.com.vn/thoi-su-phap-luat/triet-pha-duong-day-lua-dao-hang-ty-dong-cua-phu-nu-qua-mang-640954/>



corridor for the protection of personal information such as Network Information Security Law 2015. Vietnam's National Assembly passed the Law on Cybersecurity, took effect on January 1, 2019. Lately, Vietnam introduced an eID project in which chip-based identity cards are issued by the Ministry of Public Security. The Ministry of Public Security wants to speed up the project on ID issuance to bring it in line with the national database population project.

Bluezone was introduced on 18 April 2020 when Vietnam was facing with the second wave of COVID-19. After its launch, the app was heavily skeptical and criticized because of technical error<sup>58</sup>, especially the community was worried about personal data being stolen.<sup>59</sup> Users have to log in with their personal phone number before using the app. In addition, if they are identified as F0, F1, F2, F3, users will be asked for sensitive information such as where they have been, whom they meet, when it occurred. Therefore many people seems to hesitate to accept Bluezone at the moment. Although being developed by big tech Vietnamese company (BKAV) and getting supported by Vietnam government, there were only 24.000 downloads of Bluezone as of 26 April 2020.<sup>60</sup>

From the above-mentioned reality, the anxiety of people in terms of privacy is understandable at the time Bluezone was introduced.

---

<sup>58</sup> Thái blog (2020): Dùng Bluezone có nguy cơ lộ thông tin như thế nào? (how risky it is on personal data when using Bluezone?) <https://vnhacker.blogspot.com/2020/04/dung-bluezone-bi-lo-thong-tin-nhu-nao.html> accessed 20 April 2021

<sup>59</sup> Thái blog (2020), Ibid. See more Ngọc Lưu (2020): Người dùng lo ngại việc Bkav đứng sau ứng dụng Bluezone: Bộ TT&TT nói gì? (Users are concerned about Bkav behind Bluezone application: What does the Ministry of Information and Communications say?) <https://vietnamfinance.vn/nguoi-dung-lo-ngai-viec-bkav-dung-sau-ung-dung-bluezone-bo-tttt-noi-gi-20180504224242509.htm> accessed 20 April 2021

<sup>60</sup> Mai Hà (2020) Thực hư thông tin Bluezone “ảnh hưởng an toàn và riêng tư của người dùng” (It is said that Bluezone affects on the safety and privacy of users, true or not?) <https://thanhnien.vn/cong-nghe/thuc-hu-thong-tin-bluezone-an-huong-an-toan-va-rieng-tu-cua-nguoi-dung-1216167.html> accessed 20 April 2021

However, the number of Bluezone downloads has increased rapidly in about one year since the first date it was available in CH Play or App Store. Some may argue that much of Vietnamese success in dealing with coronavirus was possible due to the authoritarian rule of the Vietnamese Communist Party.<sup>61</sup> This perspective may imply the achievement of Bluezone in terms of high downloads stem from the force of central Vietnamese power.

In contrast, the author Maya Nguyen (2020) in the article “Vietnam’s War Against COVID-19” stated that the success of Vietnam in containing COVID-19 because of authoritarianism do not account for the complexity behind the government messaging its people to “beat the pandemic like beating invaders”. It needs to be read in the context of the country’s history, culture, and the urgency of the current circumstances.<sup>62</sup> Obviously, patriotism has become a vital role in Vietnamese social cohesion.



***However, is it enough to drive people to accept Bluezone?***

Bluezone was launched by the cooperation of Technology Corporations BKAV and the Ministry of Health. As mentioned in Bluezone white paper, this app uses Bluetooth tracking technology described as 0.5-20 meters radius, obstructed by objects, records who you have been in proximity to, not locations; anonymized IDs, ensure

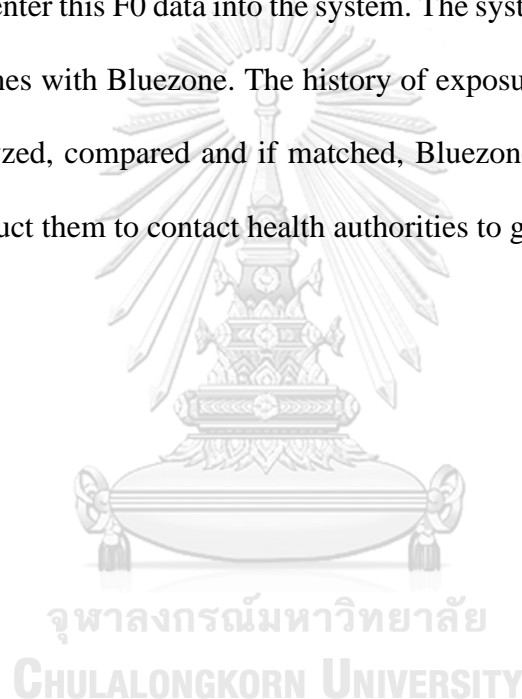
---

<sup>61</sup> Maya Nguyen (2020) Vietnam’s War Against COVID-19, <https://thediplomat.com/2020/10/vietnams-war-against-covid-19/> accessed 18 April 2021

<sup>62</sup> Maya Nguyen (2020), Ibid

privacy and security, only works on Bluetooth enabled phones, voluntary, and can be turned off.

Bluezone uses Bluetooth low energy technology<sup>63</sup> to protect the community against COVID-19 pandemic. Smartphones with Bluezone installed can communicate with each other within a distance of 2 meters, recording close contacts as well as the time and duration of such contacts. When a new case of SARS-CoV-2 is confirmed, health authorities enter this F0 data into the system. The system then sends such F0 data to other smartphones with Bluezone. The history of exposure to F0 in the previous 14 days will be analyzed, compared and if matched, Bluezone will alert users at risk of infection and instruct them to contact health authorities to get help.<sup>64</sup>

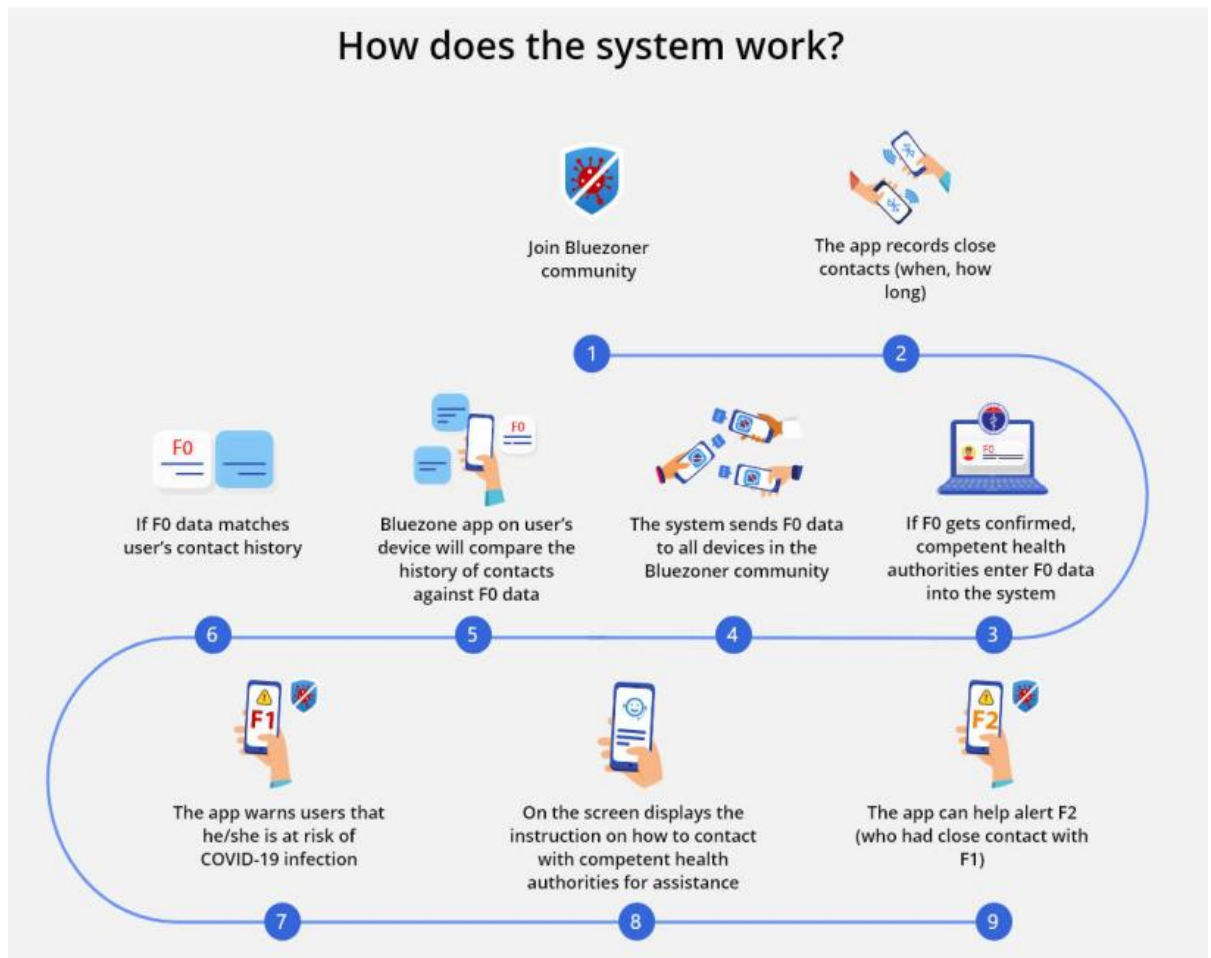


**Figure 4: Operation model of Bluezone**

---

<sup>63</sup> BLE (Bluetooth low energy) is a power saving and short-range technology that operates stably in a distance up to 10 meters and helps to transmit small loads of data. The technology is suitable for intermittent control applications and is now integrated in almost all smartphone products.

<sup>64</sup> Bluezone white paper, <https://bluezone.gov.vn/>



Until August 2020, the number of Bluezone downloads reached 20 million<sup>65</sup>, and then this number exceeded 30 million in March, 2021.<sup>66</sup> This is a great number when compared to other countries<sup>67</sup>. However, from the study of Do, Huyen Thanh et al. (2021), it indicates that although Bluezone had a large number of downloads and was created to prevent the spread of COVID-19, “only 3 percent of our survey

<sup>65</sup> <https://vietnaminsider.vn/bluezone-covid-19-tracking-app-exceeded-20-million-downloads/> access 10th April 2021

<sup>66</sup> Hà Thanh (2021) Ibid, accessed 15 June, 2021

<sup>67</sup> An American friend of the author said that the smartphone contract tracing application has not been accepted by the majority of American people. Source: Author, interview on 15th April 2021

mentioned it as a measure to prevent COVID- 19”<sup>68</sup>. This is an important clue and provokes our curiosity. Some of the questions can be asked for it as below:

(1) What are the reasons for Vietnamese people downloading this app?

(2) Why do people concern themselves with privacy but the number of downloads of Bluezone increases continuously?



---

<sup>68</sup> Do, Huyen Thanh et al. (2021): Citizens' Opinions of and Experiences with Government Responses to COVID-19 Pandemic in Vietnam, GLO Discussion Paper, No. 776, Global Labor Organization (GLO), Essen, available at: <http://hdl.handle.net/10419/229435>

### Chapter III: Explanation of statistical data

#### A. Demographics

Participants do not spend time in Quang Ninh during COVID period and do not belong to 18-35 age group were failed in comprehension check. Demographic information is summarized in the table below.

**Table 2: Demographics**

		<b>Quang Ninh, Vietnam</b>
Initial Sample		132
Removals	Comprehension check	21
	Incomplete	0
<b>Final Sample</b>		<b>111</b>
Gender (%)	Men	33.3%
	Woman	65.8%
	Other	0.9%
Age (years)	Mean	24.68
	The standard deviation	4.08
Income	<200 USD/ month	41.4%
	200 – 450 USD/ month	37.8%
	>450 USD/ month	20.7%
Occupation (%)	College students	31.5%
	Unskilled labors	25.2%
	Medical workers	6.3%

	Education and training	9%
	Businessman	5.4%
	Other	22.5%
Sources for COVID-19 information	Newspapers (including online and paper ones)	16.2%
	Social networking sites (facebook, twitter, zalo)	62.2%
	Television	14.4%
	Bluezone app	28.8%
	Other	0.9%
Positive to COVID-19	Yes	9.9%
	No	90%
Know someone who are positive to COVID-19	Yes	18%
	No	82%
Quarantine or self-isolation	Yes	8.1%
	No	91.9%
Job loss (both temporary and permanent)	Yes	40.5%
	No	59.5%

The table above shows that COVID-19 has had a significant impact on young adults in Quang Ninh. In terms of health issues, there are 9.9% of participants who

tested positive for Coronavirus. The respondents mainly belong to the low income group (41.4%) and the middle income group (37.8%).<sup>69</sup> The impact of COVID pandemic on the economic status of people is also strong. According to survey results, 40.5% of all respondents said they have lost their jobs temporarily or permanently as a consequence of COVID-19. In which, the group that is most affected economically are college students and unskilled laborers. Among 31.5% college students, 42.9% responded that they lost jobs due to the coronavirus pandemic. The figure for unskilled laborers is 46.4%.COVID-19, respectively.

### B. Perceived risk from COVID-19

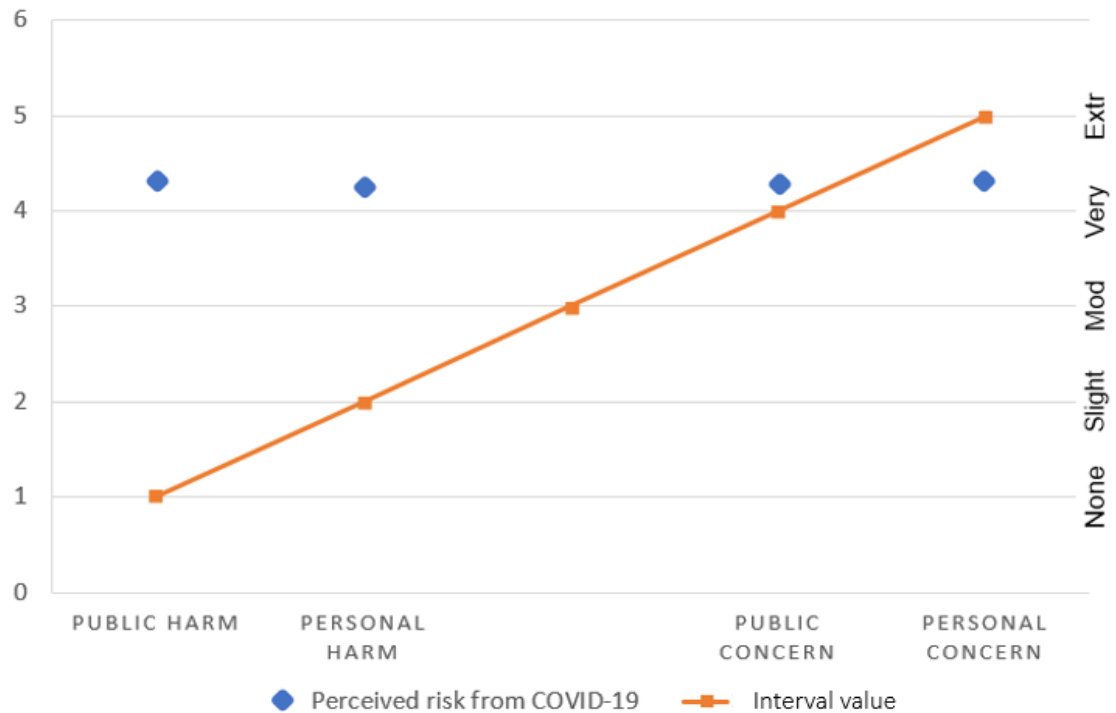
		Public harm	Personal harm	Personal concern	Public concern
N	Valid	111	111	111	111
	Missing	0	0	0	0
Mean		4,32	4,26	4,30	4,32
Mode		5	4 <sup>a</sup>	4	5
Minimum		1	1	2	1
Maximum		5	5	5	5

a. Multiple modes exist. The smallest value is shown

<sup>69</sup> Monthly average income per capita in 2020 at current prices by income quintile and by province, Red River Delta, Quang Ninh. See more Tổng cục thống kê (2021), Thông cáo báo chí Về kết quả Khảo sát mức sống dân cư năm 2020 (General Statistics Office, Press Release on the results of the 2020 Population Living Standards Survey), <https://www.gso.gov.vn/du-lieu-va-so-lieu-thong-ke/2021/07/thong-cao-bao-chi-ve-ket-qua-khao-sat-muc-song-dan-cu-nam-2020/>



**Figure 5: Perceived risk from COVID-19**



**\*The blue dots display mean values of respondents (1 to 5). Orange line depicts ordinal responses (none to extremely).**

In general, locals feel COVID-19 as “very risky” to their health. The results show that young adults in Quang Ninh viewed COVID-19 as “very” dangerous for both the community and the individual. Similarly, people also feel “very” worried if they know that someone around them gets infected by COVID-19. According to a construction worker (26 years old) in Dong Trieu ward, Quang Ninh, he said:

*“This kind of virus is literally too dangerous. Everyone from youngsters to elders are able to get sick and even die. It is essential to be noticed that the virus has evolved into so many variants that we do not know when this disaster will end.”<sup>70</sup>*

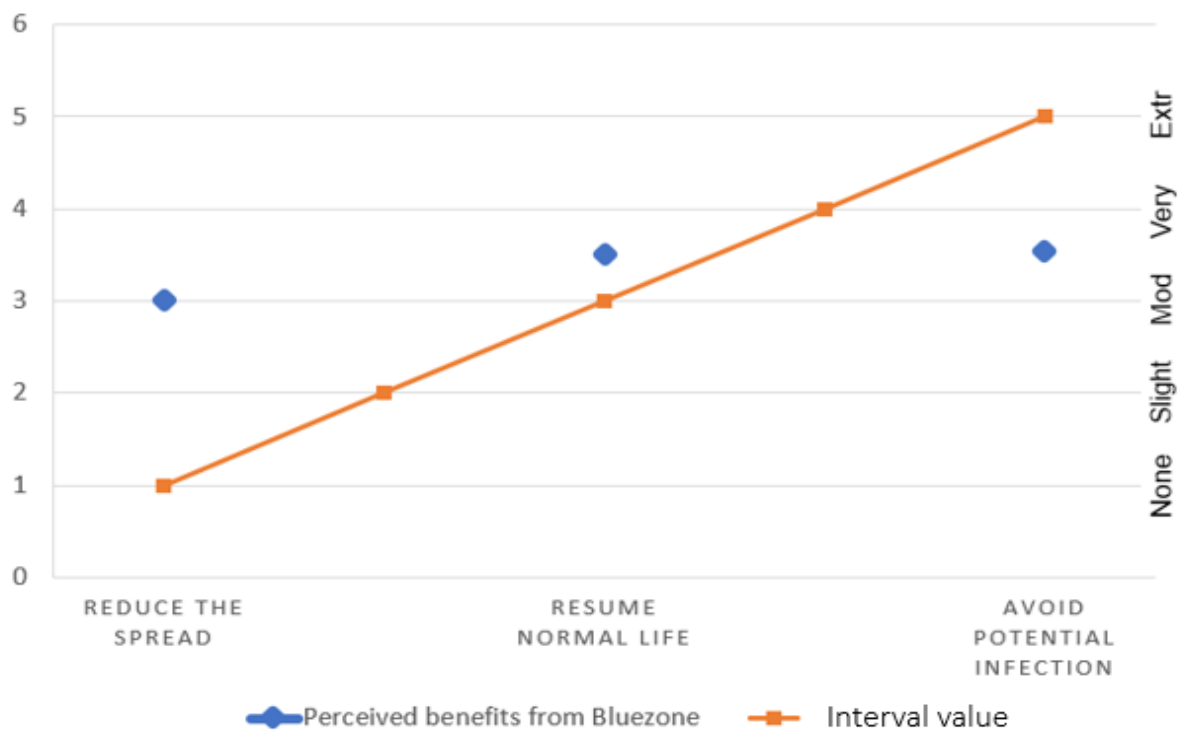
<sup>70</sup> Video call interview online via messenger on 12 May 2021

From the given comment, it refers to two main points that need to be addressed: population and virus. On one hand, the risk of coronavirus is the same to everybody regardless of their age or occupation. Therefore, people are worried and required to enhance the awareness of protecting public health as well as their own private health. In fact, the strongest outbreak in Quang Ninh begins around the end of January and the beginning of February, this is also the time when people across Vietnam prepare to welcome the Lunar New Year (Tet holiday/Tết in Vietnamese) - the most important celebration in Vietnamese culture. Traditionally, people go to visit each other's houses to have fun and celebrate the new year. However, during Lunar New Year 2021, people basically just celebrated the new year at home and wished all the best to their relatives or friends online via smartphone. On the other hand, people witnessed that coronavirus has many variants with increasing speed of spread and its poison. The 31-year-old super spreader, who was first detected at Van Don International Airport, was confirmed to be infected by a variant from the UK. Because of the increase in the number of infections and deaths in Vietnam over time, especially in Quang Ninh early 2021, the anxiety towards COVID-19 became popular among locals.

### C. Perceived benefits from Bluezone

		Reduce the spread	Resume normal life	Avoid potential infection
N	Valid	111	111	111
	Missing	0	0	0
Mean		3,01	3,51	3,54
Mode		3	4	4
Minimum		1	1	1
Maximum		5	5	5

Figure 6: Perceived benefits from Bluezone



\*The blue dots display mean values of respondents (1 to 5). Orange line depicts ordinal responses (none to extremely).

The figure 6 displays how people perceive benefits from Bluezone. As can be seen from the chart, Bluezone is only “moderately” beneficial in reducing the spread of Coronavirus. Meanwhile, it shows similar benefits to resume normal life and avoid potential infection with a bit “higher moderate” level.

From the data can be seen, after a period of experiencing the tracing app, users feel that Bluezone is relatively effective in preventing the spread of coronavirus and tracing infections. However, talking about the benefits of Bluezone, some locals stated that:

*“I think Bluezone is good, people should download it because it will notify me of the potential infections if any. In fact, another function of Bluezone that I like the most is updating COVID-19 information very quickly and people can also inform their health information through Bluezone for medical authorities, so I find it quite convenient.”<sup>71</sup>*

*“I believe Bluezone is not really effective because not all population installs Bluezone. If I install it but others do not, it becomes useless. If we lock down the whole society, people do not contact each other in close distance, it becomes useless too. I think other measures such as social distancing or lockdown are still much more effective than just installing an app on a phone.”<sup>72</sup>*

From those comments, the perceived benefits from Bluezone seem to be different depending on the experience of each individual. However, there are two important points that should not be ignored including: *Function* and *effectiveness* of

<sup>71</sup> Interview a bank teller in Dong Trieu ward, Dong Trieu district, Quang Ninh on 12 May, 2021

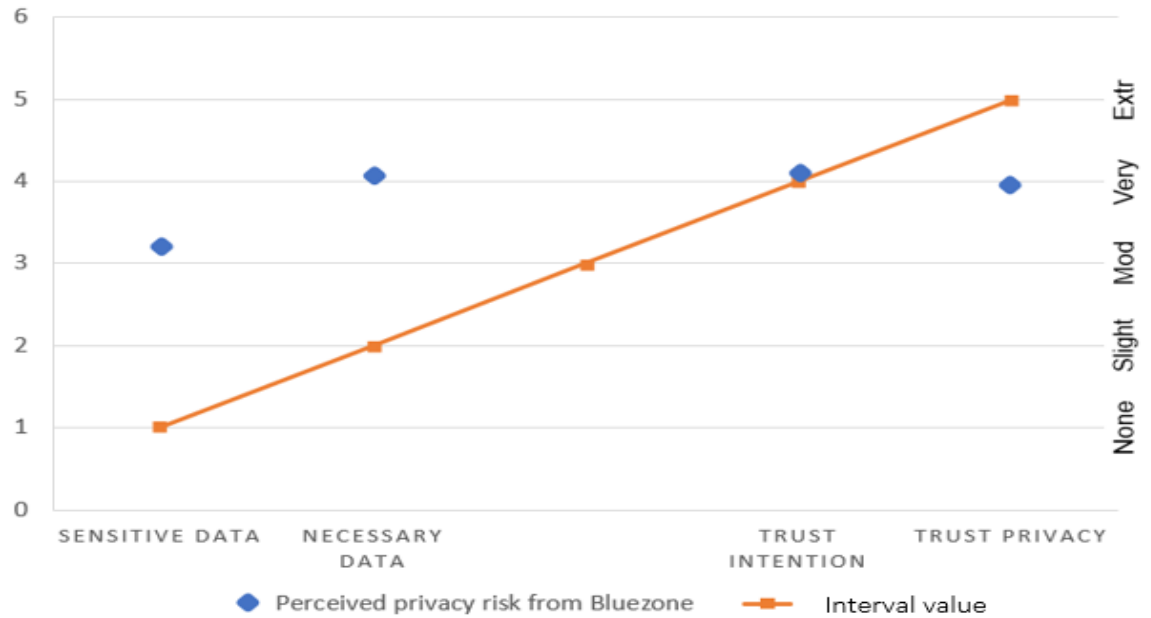
<sup>72</sup> Interview a high school teacher in Mao Khe ward, Dong Trieu district, Quang Ninh on 12 May, 2021

Bluezone. First, it is said that Bluezone not only has the function of tracing the potential risks and preventing COVID-19 but also other operations such as updating information and informing medical status for authority. Secondly, the effectiveness of Bluezone depends on the majority of the population downloading and activating this app widely. However, a number of people believe that some strong behavioral measures such as social distancing or lockdown in a large area make them much more effective in dealing with virus transmission than using a contact tracing application only.

#### D. Perceived privacy risk from Bluezone

		Sensitive data	Necessary data	Trust intention	Trust privacy
N	Valid	111	111	111	111
	Missing	0	0	0	0
Mean		3,32	4,08	4,11	3,97
Mode		3	5	5	5
Minimum		1	1	1	1
Maximum		5	5	5	5

**Figure 7: Perceived privacy risk from Bluezone**



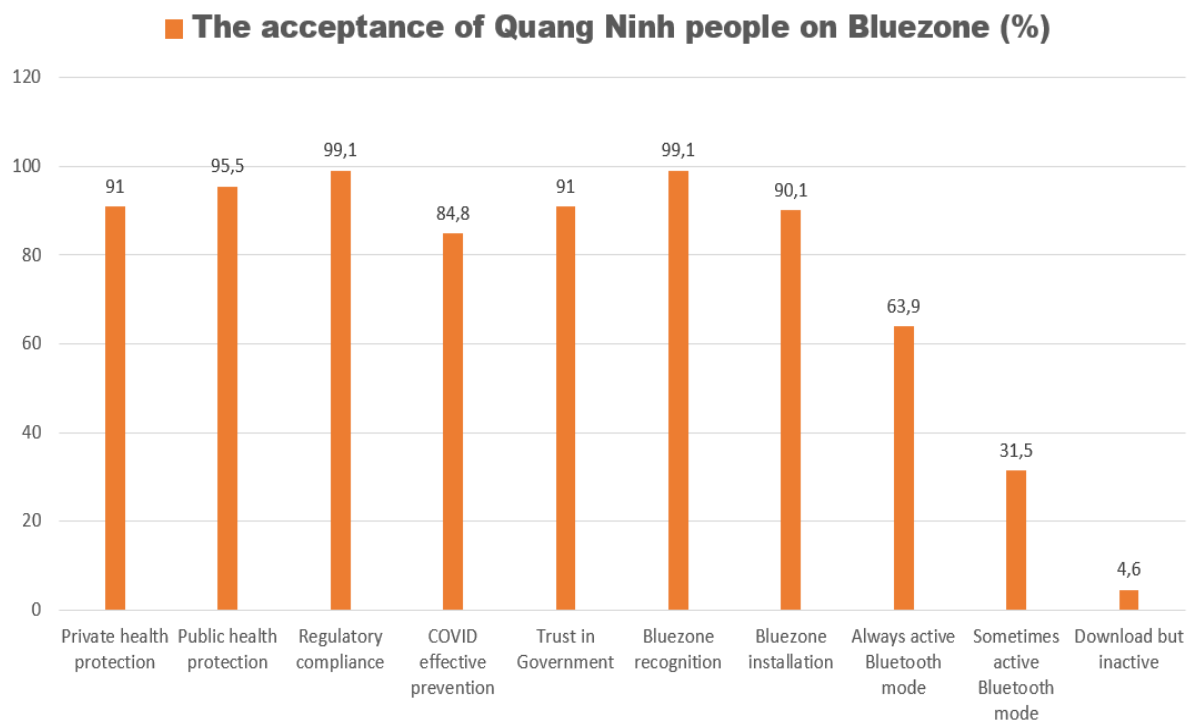
**\*The blue dots display mean values of respondents (1 to 5). Orange line depicts ordinal responses (none to extremely).**

The figure 7 shows responses for items querying people's privacy risk from Bluezone. As can be seen from the chart, people believe that data collected by Bluezone is "moderately" sensitive. However, people also think that personal information used by the government and the Ministry of Health is "very necessary" in preventing COVID-19 spreads. Most importantly, people also strongly believe that the data on Bluezone is collected by health authorities only for one purpose (trust intention) in the fight against COVID-19, and it will not be used for any other purpose (trust privacy). Roughly, young adults are aware that personal information is a fairly sensitive issue. However, they are willing to share personal information with the government to restrain the COVID-19 pandemic. In addition, the strong belief in the government in using data properly is also the reason why people consider Bluezone not too risky in using it.

### E. The acceptance of Quang Ninh people on Bluezone

The following figure can be seen as the outcome of categories A, B, C, and D. In general, due to great negative impact of COVID-19 in terms of economic and health issues, nearly 100% young adults comply with any behavioral means and regulations (such as wearing mask, social distancing, quarantine, lockdown, etc) to prevent COVID-19 transmission (*regulatory compliance*). In terms of contact tracing technology, Bluezone was judged as an effective tool in controlling coronavirus spread (84,8%, *COVID-19 effective prevention*) as well as getting a high acceptance rate among young adults as a measure of *private and public health protection*.

**Figure 8: The acceptance of Quang Ninh people on Bluezone**



Apart from health issues, the people's great confidence in the government's protection of personal data as well as using data only for coronavirus-preventing

purposes makes the acceptance and use of Bluezone also high. Almost 100% of people recognize the Bluezone application and install it into their smartphone (90.1%). Bluezone's operational efficiency is also relatively high in the population. Among those who have downloaded Bluezone, only 4.6% do not activate this application (*download but inactive*) due to various reasons (not opening Bluetooth mode, fear of reducing the life span of the phone battery, etc.). Asking local people in Dong Trieu and Mao Khe ward, they said:

*“There are few vaccines currently, the most important thing is protecting our health. Privacy is nothing when you die. Be smart!”*

*“Protecting personal data is an important duty. Many people have lost their social networking site accounts due to hackers, many bad guys use users' information to scam and blackmail online. Really too dangerous. Personally, if Bluezone was released by some technology company without a government commitment to protect user data, I would not install this app.”*

*“I think the Vietnamese government has done quite well in fighting the pandemic compared to some other countries in Southeast Asia. It is a disease, we can not do anything but follow the instruction from the government, just hope coronavirus pandemic will be vanished soon so that we are able to go back to work.”*

It can be seen that health anxiety is the most imperative factor driving the behavior of people to comply with any coronavirus-preventing means, and Bluezone is not an exception. In addition, the high rate of trust in the Vietnamese government (91%) due to its initial success in dealing with coronavirus outbreak is a crucial point as well (*trust in government*). To a certain extent, people believe in the commitment to data



security. Therefore, the privacy concerns seem to be less important than two given factors (*health concerns* and *trust in government*), and thus explaining why Bluezone is widely accepted among young adults in Quang Ninh, Vietnam.



## Chapter IV: Discussion

Basically, personal privacy is considered to be a person's decision whether he/she should share personal information with others or not. In addition, an individual himself does not live alone but he belongs to a certain organization or social group. In other words, the disclosure of personal data matters individually and socially. In this sense, personal privacy needs to be considered in a particular political-social and cultural context over a certain period of time.<sup>73</sup> According to the statistical data in the last chapter, the study found that the online personal privacy issue is less important than health concerns and the high trust of the citizens towards the government causing acceptance of Vietnamese people on Bluezone application. In this chapter, the study will discuss the matter of trust and online personal privacy in Vietnam during the time of the pandemic.

### A. Impetus of belief

In the context of the pandemic, the element of trust and health concern became prominent, influencing the awareness and actions of the whole community to join hands to prevent the spread of the COVID-19. Meanwhile, although the majority of people perceive personal data as relatively sensitive when they decide to share their personal information with others (*sensitive data*), privacy becomes less important than the health issue (*perceived risk from COVID-19*) and great trust in the government (*trust in government*) will help control the disease (*necessary data*). In this part, the study will

---

<sup>73</sup> Pennock, J. R., & Chapman, J. W. (Eds.). (1971). *Privacy*. New York: Atherton Press. See more Solove, D. J. (2002). Conceptualizing privacy. *California Law Review*, 90(4), 1087–1156; Westin, A. F. (2003). Social and political dimensions of privacy. *Journal of social issues*, 59(2), 431-453; Margulis, S. T. (2003). Privacy as a social issue and behavioral concept. *Journal of social issues*, 59(2), 243-261

shed light on the role of trust in the context of the coronavirus pandemic in Quang Ninh, Vietnam since the beginning until April 2021.

### **Prior success of central government**

Trust is a complex phenomenon as well as the most important factor reflecting the characteristics and nature of not only interpersonal but also social relationships as a whole. Francis Fukuyama, an American philosopher, believes that trust is built on ethical values, shared by representatives of a particular group or society. In a community, people share a consensus that manifests in values and norms, and create the basis of mutual trust.<sup>74</sup> In the book “Trust and Power”, Niklas Luhmann believes that trust is one of the crucial conditions for social development and helps people face possible uncertainties in the future.<sup>75</sup> In a society, citizens express their trust or distrust towards a certain thing or phenomenon not only reflecting their personalities or social characteristics, but also their political views.<sup>76</sup> When people assess their level of trust toward an institution, they will evaluate it depending on the general perception of that institution, the capacity of leaders and observe whether the leaders act in the right way or not.<sup>77</sup> Thus, trust is not just a belief of an individual, but it also reflects dynamically the political and social attributes of individuals living in a community.

Due to the strong bond between community members and people with the state, Vietnam has achieved a number of remarkable development outcomes despite the COVID-19 crisis. In terms of economic development, statistics from the International

---

<sup>74</sup> Fukuyama, Francis Trust: the social virtues and the creation of prosperity - Free Press, 1995 – p. 457

<sup>75</sup> Luhmann, Niklas Trust and power / Luhmann. – n. Y. : J. Wiley, 1979. – p. 228

<sup>76</sup> Levi M and Stoker L (2000) Political Trust and Trustworthiness. Annual Review of Political Science 3 (1): 475–507

<sup>77</sup> Fisher J, Van Heerde J and Tucker A (2010) Does One Trust Judgement Fit All? Linking Theory and Empirics. The British Journal of Politics and International Relations 12 (2): 161–188

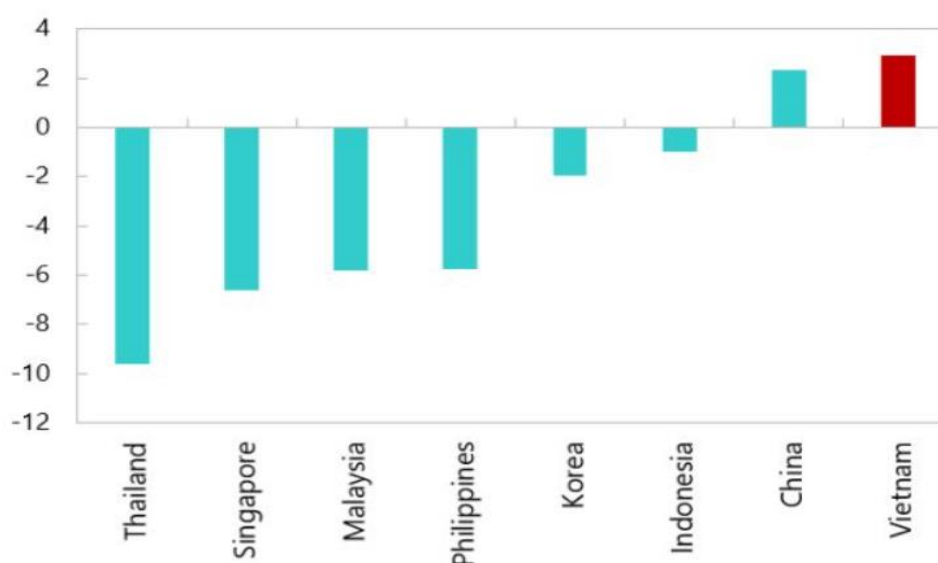
Monetary Fund (IMF) show that Vietnam is one of the very few countries that maintains positive economic growth in the region.<sup>78</sup>

**Figure 9: GDP growth in selected countries**

**High growth in a perilous year**

Vietnam's growth in 2020 was the highest in Asia.

(percent)



Source: IMF, World Economic Outlook database.

In 2017, Vietnam had its first domestic car manufacturer, Vinfast (Vingroup), and by the end of April 2021, the Vietnamese automaker had a plan to introduce products to the US market. In fact, after only a few months, Vinfast was present at the Los Angeles Auto Show (November 2021) and planned to sell cars in the US and

<sup>78</sup> Era Dabla-Norris and Yuanyan Sophia Zhang (2021) Vietnam: Successfully Navigating the Pandemic <https://www.imf.org/en/News/Articles/2021/03/09/na031021-vietnam-successfully-navigating-the-pandemic> accessed 15 November 2021

Europe in the near future<sup>79</sup>. By the end of 2020 and early 2021, Foxconn and Apple plan to move part of their electronic equipment production chain in China to Vietnam to avoid risks from the US-China trade war, promising to create create thousands of jobs for local people<sup>80</sup>. European countries also look to Vietnam as one of the new potential markets to reduce dependence on China and avoid risks when the global supply chain is broken. The Free Trade Agreement between the European Union (EU) and the Socialist Republic of Vietnam, effective from August 2020, will provide opportunities to increase trade and support jobs and growth on both sides.<sup>81</sup> The Vietnam – the United Kingdom (UK) free trade agreement was signed in December 2020<sup>82</sup> and immediately increased trade turnover between Vietnam and the U.K afterwards<sup>83</sup>. In regards with foreign affairs, Vietnam is the first destination of Japanese Prime Minister Yoshihide Suga after he took office in August 2020 with the image of not wearing a mask implying Vietnam's success in the fight against the COVID-19 epidemic at that moment<sup>84</sup>. Such positive information is widely shared on online forums

จุฬาลงกรณ์มหาวิทยาลัย

<sup>79</sup> Huileng Tan (2021) Vietnam carmaker VinFast will start selling two EV models in the US next year as it challenges Tesla on its home turf, <https://www.businessinsider.com/vietnam-vinfast-to-start-selling-evs-in-us-challenge-tesla-2021-11> accessed 19 November 2021

<sup>80</sup> Yimou Lee (2020) Exclusive: Foxconn to shift some Apple production to Vietnam to minimise China risk, <https://www.reuters.com/article/us-foxconn-vietnam-apple-exclusive-idUSKBN2860VN> accessed 7 October 2021; see more Ralph Jennings (2021) Apple Supplier Foxconn To Build \$270 Million Plant In Vietnam Amid U.S.-China Tensions, <https://www.forbes.com/sites/ralphjennings/2021/01/22/apple-supplier-foxconn-to-build-270-million-plant-in-vietnam-amid-us-china-tensions/?sh=6cac0ba25554> accessed 9 October 2021

<sup>81</sup> Dezan Shira & Associates (2020) Vietnam-EU Trade: EVFTA Comes Into Effect, <https://www.vietnam-briefing.com/news/vietnam-eu-trade-evfta-comes-into-effect.html/> accessed 30 September 2021

<sup>82</sup> Department for International Trade (2020) UK/Vietnam: The free trade agreement between the UK and the Socialist Republic of Vietnam, <https://www.gov.uk/government/publications/ukvietnam-free-trade-agreement> accessed 1 October 2021

<sup>83</sup> Duc Minh (2021). Vietnam-UK trade turnover soars after post-Brexit free trade deal, <https://e.vnexpress.net/news/business/economy/vietnam-uk-trade-turnover-soars-after-post-brexit-free-trade-deal-4241118.html> accessed 2 October 2021

<sup>84</sup> Kuni Miyake (2020) Why did Suga choose Vietnam and Indonesia for his first official trip as prime minister? <https://www.japantimes.co.jp/opinion/2020/10/15/commentary/japan-commentary/yoshihide-suga-vietnam-indonesia-first-trip/> accessed 10 October 2021

and social networks in Vietnam, reinforcing citizen's trust toward the state. It can be said that a strong, capable state and the strengthening of people's trust in the state are one of the key conditions for political stability and socio-economic development in Vietnam.

In a large picture, the COVID-19 pandemic is the perfect test politically in the globe. Fukuyama points out the three most important factors for successful responses against the pandemic including state capacity, social trust, leadership.<sup>85</sup> High governance capacity means that governments have more policy tools and can deploy them more quickly, also because of the greater legitimacy afforded by their policy actions in the public eye. High governance capacity underpinned by established rules and procedures for crisis detection and response, including the establishment of specialized committees, agencies and other advisory bodies.<sup>86</sup> It is significant to notice the degree of citizen's trust in the government. When citizen's trust in the government is high, governments have more policy options to choose from, and the decision will be respected and obeyed by the citizens.<sup>87</sup> Obviously, trust is extremely important to create momentum and find a common voice between Vietnamese citizens and governments in combating shocks similar to COVID-19.

### **Health issue at local scale**

Basically, the success of virus prevention depends greatly on the cooperation of the whole community, not the efforts of an individual. In the fight against the spread of

---

<sup>85</sup> Fukuyama, F. (2020). The pandemic and political order. *Foreign Aff.*, 99, 26.

<sup>86</sup> Toshkov, D., Carroll, B., & Yesilkagit, K. (2021). Government capacity, societal trust or party preferences: what accounts for the variety of national policy responses to the COVID-19 pandemic in Europe?. *Journal of European Public Policy*, 1-20

<sup>87</sup> Toshkov, D., Carroll, B., & Yesilkagit, K. (2021). *Ibid.*

the COVID-19 outbreak, some important indicators that should be paid greater attention includes coronavirus risk perceptions, trust, and restrictive policies. It is suggested that a high degree of trust is seen as a necessary condition for implementing restrictive policies and for the public to comply with them.<sup>88</sup>

*From coronavirus risk perception*

Since knowing about the SARS-CoV-2 epidemic for the first time in the country, Vietnamese people have shown great concern in this new disease. After successfully stopping the spread of the virus at an early stage without fatality, vigilance turned to high anxiety when Vietnam announced its first death on Friday, 31 July 2021 in the second wave of the epidemic<sup>89</sup>. Survey results from the PAPI scores show that the health issue is one of the greatest concerns in the year of 2020 among Vietnamese citizens nationwide.<sup>90</sup>

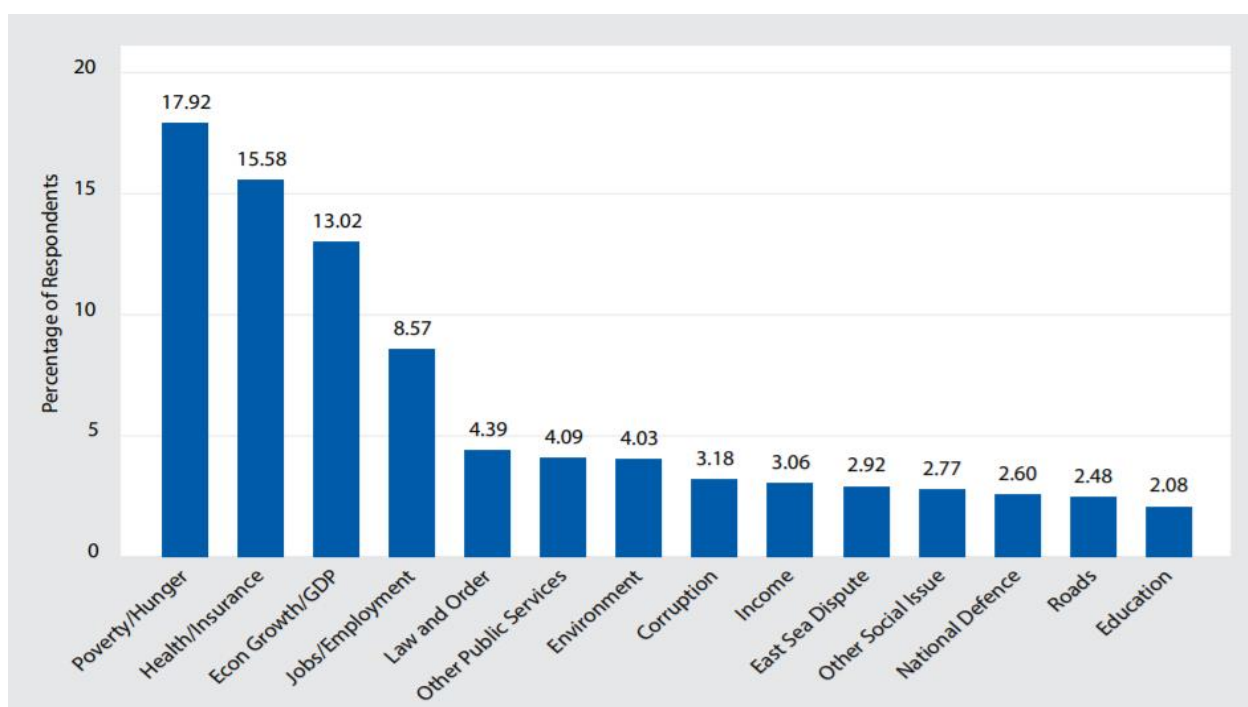


<sup>88</sup>Bavel JJ, Baicker K, Boggio PS, et al. (2020) Using Social and Behavioural Science to Support COVID-19 Pandemic Response. *Nature Human Behaviour* 4: 460–471.

<sup>89</sup> Reuters (2020) Vietnam records first COVID-19 death after virus re-emerges: state media, <https://www.reuters.com/article/us-health-coronavirus-vietnam-death-idUSKCN24W0XS>, accessed 28 November 2021; BBC (2020) Coronavirus: Alarm in Vietnam after first cases in months, <https://www.bbc.com/news/world-asia-53549809>, accessed 29 November 2021

<sup>90</sup> CECODES, VFF-CRT, RTA & UNDP (2021). The 2020 Viet Nam Governance and Public Administration Performance Index (PAPI 2020): Measuring Citizens' Experiences. A Joint Policy Research Paper by Centre for Community Support and Development Studies (CECODES), Centre for Research and Training of the Viet Nam Fatherland Front (VFF-CRT), Real-Time Analytics, and United Nations Development Programme (UNDP). Ha Noi, Viet Nam, pp19

**Figure 10: Most Important Issue Facing the Country from Citizens' Perspective, 2020**



Source: Viet Nam Governance and Public Administration Performance Index (PAPI)

Many new cases and deaths are reported causing an increased fear of coronavirus transmission in the community.<sup>91</sup> The situation became worsen when the anxiety of the virus has other negative effects related to people's behavior and lifestyle. The fear of virus exposure causes many people to suffer mental health problems such as depression, anxiety or even suicide<sup>92</sup>. Many patients, children, or people with

<sup>91</sup> WHO (2021) COVID-19 in Viet Nam Situation Report 40, <https://www.who.int/vietnam/internal-publications-detail/covid-19-in-viet-nam-situation-report-40> accessed 1 December 2021

<sup>92</sup> Nguyen, M. H., Pham, T., Nguyen, K. T., Nguyen, Y. H., Tran, T. V., Do, B. N., ... & Duong, T. V. (2021). Negative Impact of Fear of COVID-19 on Health-Related Quality of Life Was Modified by Health Literacy, eHealth Literacy, and Digital Healthy Diet Literacy: A Multi-Hospital Survey. *International journal of environmental research and public health*, 18(9), 4929.



symptoms other than COVID-19 such as chronic diseases, are unwilling or delayed to seek medical care at hospitals.<sup>93</sup> Many people are overprotective of COVID when buying overdoses of medicine, vitamin C without prescription from doctors<sup>94</sup>.

Although COVID-19 threatens people's ability to lose their jobs and economic status causing the mental ill-being of people<sup>95</sup>, most people accept to sacrifice economic benefits to protect their private health and the community<sup>96</sup>. In addition, young people are afraid of coronavirus partly because youngers tend to live with older ones, who are considered more vulnerable to this unprecedented disease<sup>97</sup>. According to the 2016 Viet Nam Household Living Standard Survey, in approximately 21 percent of households, grandparents lived with their children and grandchildren.<sup>98</sup>

As one of the coronavirus epicenters during the third wave of COVID-19, after efforts to strengthen contact tracing and mass testing, Quang Ninh has continuously

<sup>93</sup> Nguyen, M. H., Pham, T., Nguyen, K. T., Nguyen, Y. H., Tran, T. V., Do, B. N., ... & Duong, T. V. (2021), Ibid, pp5; See more Khuyen Nguyen (2021), Đừng vì quá sợ dịch bệnh COVID-19 mà đưa trẻ đến viện không kịp thời (Don't let your anxiety of the COVID-19 epidemic leading to bring your children to the hospital late), <http://sannhivinhphuc.vn/Content/NewsDetail/9584491b-a3f2-4754-9a04-d1ba6a130cfa> accessed 30 November 2021

<sup>94</sup> Kontum (2021), Cảnh giác với thông tin mạng xã hội về cách ngăn ngừa và chữa COVID-19 (Be wary of information in social media on how to prevent and cure COVID-19, <http://covid-19.kontum.gov.vn/Default.aspx?tabid=109&Group=121&NID=10153&canh-giac-voi-thong-tin-mang-xa-hoi-ve-cach-ngan-ngua-va-chua-covid-19> accessed 19 November 2021; Hanoimoi (2021), Ngăn chặn việc thổi phồng công dụng dược phẩm (Prevent the exaggeration of medicinal uses) <http://hanoimoi.com.vn/tin-tuc/Doi-song/1007980/ngan-chan-viec-thoi-phong-cong-dung-duoc-pham> accessed 30 November 2021

<sup>95</sup> Luong, T. C., Pham, T. T., Nguyen, M. H., Do, A. Q., Pham, L. V., Nguyen, H. C., ... & Duong, T. V. (2021). Fear, anxiety and depression among pregnant women during COVID-19 pandemic: impacts of healthy eating behaviour and health literacy. *Annals of medicine*, 53(1), 2120-2131

<sup>96</sup> Herrera, H., Konradt, M., Ordoñez, G., & Trebesch, C. (2020). The Political Consequences of the COVID Pandemic: Lessons From Cross-Country Polling Data. *Vox EU*. <https://voxeu.org/article/political-consequencescovid-pandemic> accessed 29 November, 2021

<sup>97</sup> Sài Gòn Giải Phóng (2020), Người cao tuổi dễ bị tổn thương bởi Covid-19 (Elderly people are vulnerable to Covid-19), <https://www.sggp.org.vn/nguoi-cao-tuoi-de-bi-ton-thuong-boi-covid19-652542.html> accessed 1 December 2021

<sup>98</sup> See more Do, Huyen Thanh & Nguyen, Cuong Viet & Nguyen, Long Thanh & Nguyen, Phuong Minh & Ngo, Quyen Ha & Phung, Quyen Ha, 2021. "Citizens' Opinions of and Experiences with Government Responses to COVID-19 Pandemic in Vietnam," GLO Discussion Paper Series 776, Global Labor Organization (GLO), pp 11

recorded many new positive cases in various places such as Van Don, Ha Long, Cam Pha, Dong Trieu, etc<sup>99</sup>. In which, Dong Trieu is one of the hotpots of virus spread. Right on the eve of the Lunar New Year, the traditional holiday of the Vietnamese people, Dong Trieu recorded all 21 communes having COVID-19 patients with a total of 42 positive cases.<sup>100</sup>

Traditionally, the Lunar New Year (Tet holiday) is an occasion when people will visit relatives, friends and neighbors to wish good health and hope for luck in the new year. However, the high degree of fear of the new coronavirus variant spread in the third wave, the UK variant-that increases risk of death compared with other previous variants<sup>101</sup>, local people are afraid of going out and mostly stay at home celebrating for new year and to hope the epidemic will pass soon.

*“This year, people only stay at home, eat banh chung (rice cake) and make video calls to celebrate Tet. In the neighborhood, people have restrictions on movement, but it does not mean everyone can not go anywhere at all. It is fine if I pay visit and celebrate New Year’s with some neighbors, but basically everyone is afraid of coronavirus so no one goes to anyone’s house”*<sup>102</sup>

Concerns about health and safety over the spread of the virus were last for long after many months, although Quang Ninh is no longer identified as a the red zone of the epidemic. Quang Ninh people, who went to work in another provinces or cities, still

---

<sup>99</sup> Huong Giang (2021) Quang Ninh to scale up COVID-19 testing to contain virus spread, <http://news.chinhphu.vn/Home/Quang-Ninh-to-scale-up-COVID19-testing-to-contain-virus-spread/2021/42890.vgp> accessed 1 November 2021

<sup>100</sup> Huong Giang (2021), Ibid.

<sup>101</sup> Centers for Disease Control and Prevention (2021), Science Brief: Emerging SARS-CoV-2 Variants, <https://www.cdc.gov/coronavirus/2019-ncov/science/science-briefs/scientific-brief-emerging-variants.html> accessed 28 November 2021

<sup>102</sup> Interview with a local in Dong Trieu, Quang Ninh on the first day of the Lunar New Year 2021

feel uneasy and anxious about the possible stigma and discrimination when they return home after the quarantine.

*“I delayed my return to Quang Ninh just because I knew my relatives and neighbors will be scared of people from Saigon. I hope they will feel okay after I finish quarantine.”*<sup>103</sup>

Thus, it can be seen that basically the fear of Quang Ninh people of coronavirus in the third outbreak comes from the following three main reasons:

\*The first outbreak has no deaths, but the second outbreak has reported fatalities.

\*The UK variant has been determined to be more toxic and lethal than previous variants

\* General anxiety of the whole community, sometimes that anxiety leads to an extreme state like a prejudicial attitude towards people from other endemic areas trying to get inside the province.

However, in general, people expressed high concern about the danger of coronavirus, which is an important social basis that affects the community’s attitude towards state policies in handling the pandemic in Quang Ninh province.

### ***To trust and policy compliance***

In order to cope with the coronavirus spread, the authorities will have to act as the paramount factor in resolving the crisis. Theoretically, a good government, which

---

<sup>103</sup> Dang Khoa, Long Nguyen, Tran Hoa (2021). People flee HCMC on economic woes, Covid fears, <https://e.vnexpress.net/news/life/trend/people-flee-hcmc-on-economic-woes-covid-fears-4329055.html> accessed 29 November 2021

receives the trust and engagement of its citizens will strengthen compliance with laws and regulations<sup>104</sup>. In prior success of the government, it is no coincidence that Vietnamese people put their trust in the government during the time of COVID-19 transmission.

Trang Nguyen and Edmund Malesky suggested that Vietnamese authorities made long-standing efforts to professionalize the administrative state which become important key to gain a greater confidence of citizens towards central government<sup>105</sup>. Among them, the improvement in healthcare, information access, and corruption control are the utmost significant elements<sup>106</sup>. Meanwhile, according to Caitlin Wiesen - UNDP Resident Representative in Vietnam, the public's trust and observance of prevention and control measures are the three key components determining the success of the fight against the COVID-19 pandemic in Vietnam<sup>107</sup>.

In fact, in each wave of the pandemic, the new outbreak of COVID-19 infections does not affect the entire territory of Vietnam. In addition, the outcome of the fight against COVID-19 depends on the effectiveness of the cooperation between local authorities and its citizens. Therefore, it is important to have a deeper look at governance capacity at the local level, thereby drawing a connection between public

---

<sup>104</sup> CECODES, VFF-CRT, RTA & UNDP (2021). Ibid

<sup>105</sup> Trang (Mae) Nguyen and Edmund Malesky (2020) Reopening Vietnam: How the country's improving governance helped it weather the COVID-19 pandemic, <https://www.brookings.edu/blog/order-from-chaos/2020/05/20/reopening-vietnam-how-the-countrys-improving-governance-helped-it-weather-the-covid-19-pandemic/> accessed 1 December 2021

<sup>106</sup> Trang (Mae) Nguyen and Edmund Malesky (2020), Ibid

<sup>107</sup> Vietnamplus (2020), Joint efforts by government, citizens key to success in fighting COVID-19: Survey, <https://en.vietnamplus.vn/joint-efforts-by-government-citizens-key-to-success-in-fighting-covid19-survey/192803.vnp> accessed 2 December 2021

administration, citizen's trust toward government and regulatory compliance of population in resisting coronavirus in Quang Ninh, Vietnam.

By exploring the causal relationship between provincial capacity indicators, citizen's trust and willingness to follow regulations suggested by the Viet Nam Provincial Governance and Public Administration Performance Index (PAPI), we have the summary table as below:<sup>108</sup>

<b>Indicators</b>	<b>Denotation</b>
Participation at Local Levels	The high scores of Participation at Local Levels Dimension lead to a greater willingness to comply with the regulations such as lockdown nationwide, etc.
Transparency in Local Decision-making	Publicly and transparently disclosed information by local governments leads to the better public understanding of policies. The higher the Transparency Index, the more citizens can exercise their citizenship rights, while ensuring the legitimacy of the local authority.
Vertical Accountability	Reflecting people's beliefs in courts and judicial agencies as well as non-court mechanisms when civil disputes occur
Control of Corruption in the Public Sector	The better of Control of Corruption in the Public Sector dimension leads to higher public trust and the regulatory compliance such as quarantines, social distancing, and local implementation

<sup>108</sup> CECODES, VFF-CRT, RTA & UNDP (2021). Ibid

E-Governance	Local governments interact effectively with citizens through a variety of online channels. If people have Internet access to participate in the policymaking and policy implementation, the information that is issued by the authority via online platform will be more effective and convincing to the people.
--------------	--

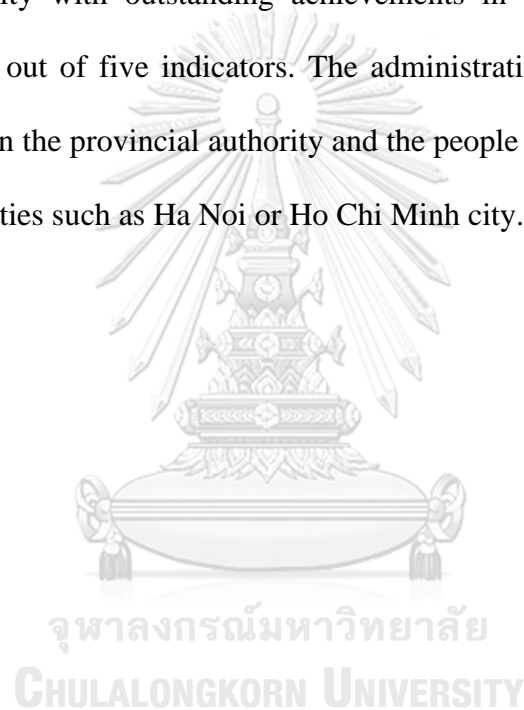
Source: PAPI 2020

**Table 3: Provincial Performance by Dimension in selected localities in 2020**

Localities	Citizen Participation at Local Levels	Transparency in Local Decision-making	Vertical Accountability	Control of Corruption in the Public Sector	E-Governance
Quang Ninh	Best Performers	Best Performers	Low Average	Best Performers	Best Performers
Ha Noi	High Average	Low Average	Low Average	Low Average	High Average
Ho Chi Minh city	Poor Performers	High Average	Low Average	Poor Performers	Best Performers
Hai Phong	Best Performers	High Average	Poor Performers	Poor Performers	Best Performers
Da Nang	Poor Performers	Poor Performers	Poor Performers	Low Average	Best Performers
Can Tho	Low Average	High Average	Poor Performers	High Average	Low Average

Source: PAPI 2020.

The given table shows the indicators of provincial performance in some localities in Vietnam, namely Quang Ninh province with five other major central cities including Ha Noi, Ho Chi Minh city, Hai Phong, Da Nang, and Can Tho in the year of 2020. The provincial competitiveness indexes, which are classified from lowest to highest level, are Poor Performers, Low Average, High Average, and Best Performers, respectively. It is noticed that Quang Ninh is a province that demonstrates provincial governance capacity with outstanding achievements in 2020 when it is the best performer in four out of five indicators. The administrative effectiveness and close interaction between the provincial authority and the people in Quang Ninh far exceeds that of other big cities such as Ha Noi or Ho Chi Minh city.



**Figure 11: Tracing information of infections is publicly announced on social networks**



Source: Facebook (February 2021)

\*Translation

*“Emergency notification:*

*About tracing F1, F2 in Mao Khe ward*



*Anyone who went on flight VN 1188 from Tan Son Nhat airport in Ho Chi Minh City to Cat Bi in Hai Phong city on March 6, 2021, urgently go to the health agencies or head of villages in Mao Khe ward to notify medical status because there are F0 on the flight.*

*Currently, Mao Khe ward has 03 cases of F1 traveling on flight VN 1188 with F0 people in Vinh Xuan, Doan Ket, Vinh Tuy 2 areas who have been taken to concentrated medical isolation in Kim Son ward. In the area detected F1 cases, people need to do well the work of isolating F2 at home, preventing and controlling epidemics occurring in the village.”*

In practice, in order to minimize person-to-person contact, local authorities only allow markets and supermarkets to sell some essential items such as food or medicine. Quang Ninh implements an innovative policy on food distribution which is called the “market cards” mode. Each household will be given a market card to go to the market on the specified days. For example, Mr. A’s family has a market card to go to the market on Monday, Wednesday and Friday, which means that Mr. A’s household will only be able to go to the market on those days in a week. Except food or medicine sellers, other stalls and vendors in the market were closed, significantly affecting the income of small businesses. However, to prevent the epidemic, in general, the majority of locals support the arrangement from officials.

Figure 12: Market card in Mao Khe ward, Quang Ninh<sup>109</sup>

ỦY BAN NHÂN DÂN PHƯỜNG MẠO KHÊ

CỘNG HÒA XÃ HỘI CHỦ NGHĨA VIỆT NAM  
Độc lập - Tự do - Hạnh phúc

**PHIẾU ĐI CHỢ**

TRÊN ĐỊA BÀN PHƯỜNG MẠO KHÊ  
TRONG ĐỢI CAO ĐIỂM PHÒNG CHỐNG DỊCH COVID - 19

Họ và tên:.....

Số điện thoại:.....

Nơi ở hiện nay:.....

Đi chợ vào các ngày: **Thứ 2, thứ 4, và thứ 6 hàng tuần.**

- Lưu ý: Mỗi hộ gia đình 01 phiếu; yêu cầu hộ gia đình ghi đầy đủ thông tin vào phiếu.

Source: Mao Khe electrical portal

“Security staff in the village went to every home to explain and convince people to comply with regulations of disease prevention. Due to travel restrictions, people just go to buy food once every two or three days but I think that is fine because whole buying can be stored in the refrigerator. The food supply is basically enough, no one faces with food shortage.”<sup>110</sup>

<sup>109</sup> Mao Khe electrical portal (2021), Người dân phường Mạo Khê đi vào chợ phải có phiếu của chính quyền địa phương. (People in Mao Khe ward going to the market must have a market card from the local government),

<https://www.quangninh.gov.vn/donvi/phuongmaokhe/Trang/ChiTietTinTuc.aspx?nid=373> accessed 4 December 2021

<sup>110</sup> Interview a local at Mao Khe, Quang Ninh on 30 May 2021

*“Only those who sell food and medicine can trade goods in the market. Those who cannot sell goods will be given a subsidy of several million dong a month by the local authority that generally enough to live on during the pandemic.”<sup>111</sup>*

In summary, as one of the hot spots for the COVID-19 outbreak in early 2021, the authority applied a transparent approach in combating the pandemic. In other words, information transparency help to create the consensus between people and the authority to fight the epidemic successfully (86 infections, no deaths as of 11 April, 2021).<sup>112</sup>

### **Political culture**

From the Western interpretation, the success of pandemic restriction in Vietnam as of early 2021 was interpreted by many people by the authoritarian rule of the Vietnamese Communist Party, and the state used its power to ask the people to take measures containing the virus<sup>113</sup>. This may be true in a certain extent, but it is not enough to objectively assess the situation on the ground.

Building trust between the people and the state has been one of the key tasks of the authorities in Vietnam throughout the historical discourse. As a country with frequent wars and resistance to foreign invaders, the acquisition of trust from the citizens (*lòng dân*) plays a decisive factor determining the success or failure of the country in dealing with challenges of history. One of the prime examples for the lesson of the significance of trust is the fall of the Ho dynasty. After overthrowing the Tran

---

<sup>111</sup> Interview a local at Dong Trieu, Quang Ninh on 31 May 2021

<sup>112</sup> WHO (2021), Ibid.

<sup>113</sup> Mike Cerre (2020), How Vietnam’s authoritarian government succeeded at containing COVID-19, <https://www.pbs.org/newshour/show/how-vietnams-authoritarian-government-succeeded-at-containing-covid-19> access on 15 October, 2021; See more Rachel Kleinfeld (2020), Do Authoritarian or Democratic Countries Handle Pandemics Better? <https://carnegieendowment.org/2020/03/31/do-authoritarian-or-democratic-countries-handle-pandemics-better-pub-81404> access on 18 October, 2021

dynasty, one of the famous dynasties in Vietnamese history that defeated the Mongol invaders three times in the 13th century, the Ho Dynasty was established but immediately faced the threat of invasion from the Ming dynasty (China). Although the Ho dynasty possessed a strong fortress and a large army, the disobedience of the people led to the defeat of the dynasty in the hands of the Ming army. The left general Ho Nguyen Trung once said:

*“Thần không sợ đánh, chỉ sợ lòng dân không theo thôi!”<sup>114</sup>*

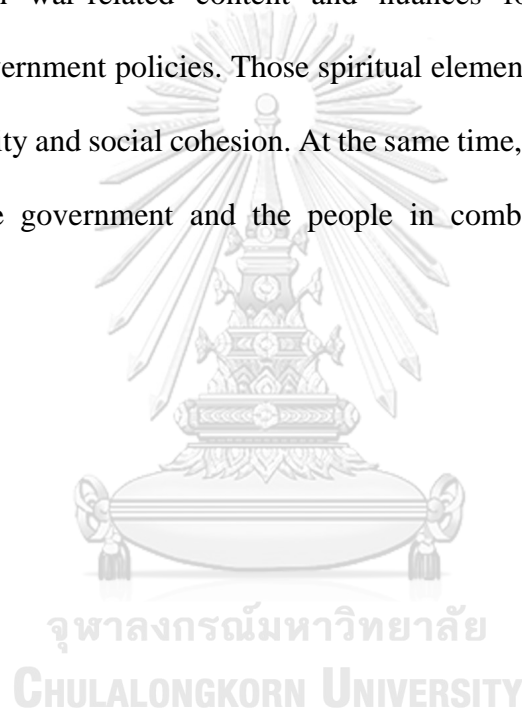
Translation: Majesty, I am not afraid of fighting, I am just afraid that people will not listen to me

In 1427, after the great victory of Chi Lang - Xuong Giang, the Ming invaders surrendered and withdrew their remaining troops back home. Lam Son movement won. In the spring of 1428, Nguyen Trai wrote Dai Cao Binh Ngo (Great Proclamation upon the Pacification of the Wu), considered as one of the Declarations of Independence in Vietnamese history. The thought of “Peace”, “Safety” and “Humanism”, was once again repeated by Nguyen Trai: Rulling by humanity is the core for the peace and safety of the people.<sup>115</sup> In his talk at the political class on December 8, 1956, President Ho Chi Minh stated his views on the power of the people: “There is nothing in the sky as valueble as the people. There is nothing stronger in the world than the solidarity of the people”. The statement was made at the end of 1956, when the land reform in the Northen Vietnam was suspended due to the huge mistakes of the leadership. In the

<sup>114</sup> Viện Khoa học xã hội Việt Nam, Viện sử học (1998). Đại Việt sử ký toàn thư (Dai Viet chronicle) tập II.Nxb. Khoa học xã hội. Hà Nội, pp.211

<sup>115</sup> Ủy ban Khoa học xã hội Việt Nam (1976) Nguyễn Trãi toàn tập (Nguyen Trai collection). Nxb. Khoa học xã hội. Hà Nội, pp 77, 79

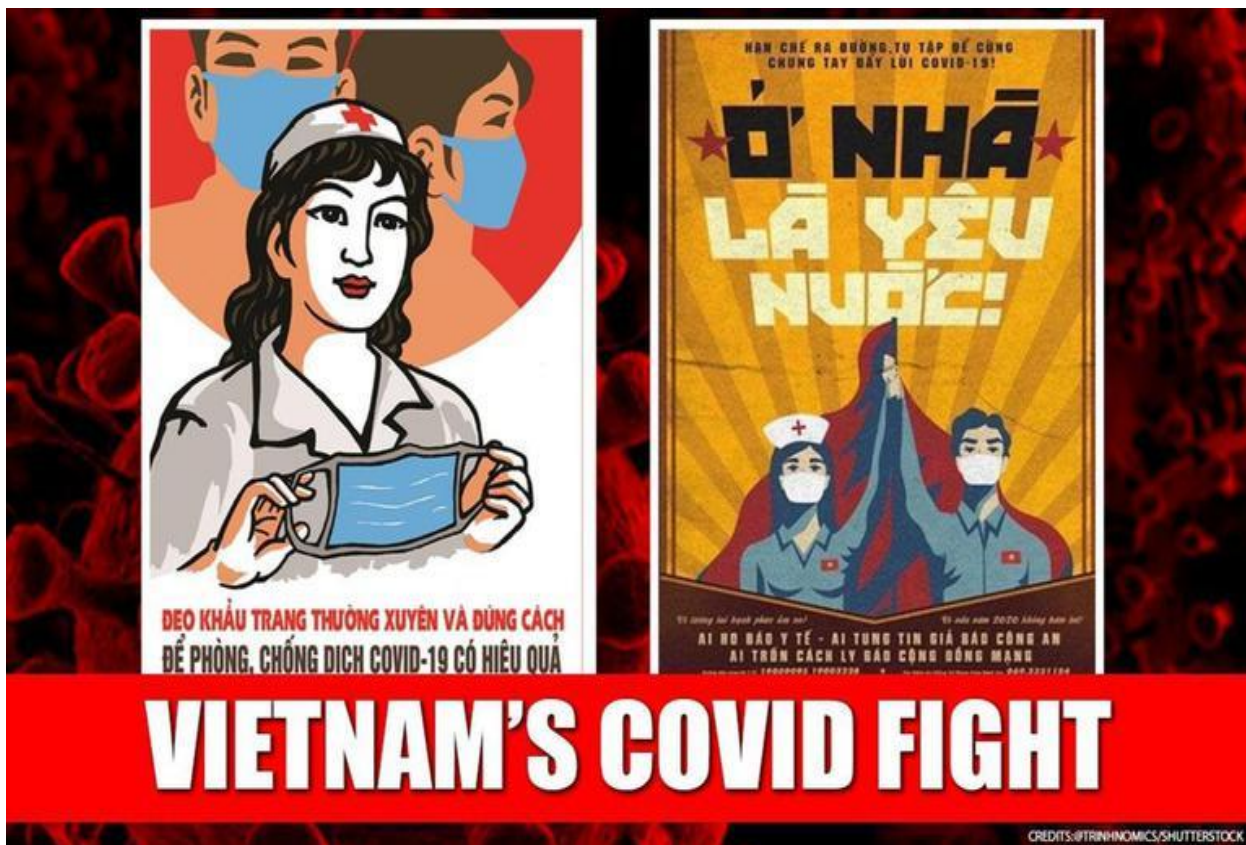
atmosphere of deep learning from wrongdoing, Ho Chi Minh's thought is contemplation and reminder to the leadership that they should not lose the people's trust in the government.<sup>116</sup> Thanks to the support of the people, after regaining the independence from Japan in 1945, Vietnam has won many wars with major powers in the world such as France (1945-1954), the US (1954-1975), and China (1979) in the twentieth century. Therefore, in the fight against coronavirus, it is not by chance that the Vietnamese state uses images with war-related content and nuances for propaganda campaigns supporting for government policies. Those spiritual elements are both meant to arouse patriotism, solidarity and social cohesion. At the same time, it helps to create a stronger bond between the government and the people in combating the invisible enemy COVID-19.



---

<sup>116</sup> Hồ Chí Minh (2011), Toàn tập (Ho Chi Minh full collection), volume 10. Nxb. Chính trị quốc gia - sự thật. Hà Nội, pp453.

Figure 13: Propaganda posters using war rhetoric<sup>117</sup>



<sup>117</sup> Pragadish Kirubakaran (2020) From Propaganda Posters To War Rhetoric, How Vietnam Is Winning The War Against COVID-19, <https://www.republicworld.com/world-news/rest-of-the-world-news/from-propaganda-posters-to-war-rhetoric-how-vietnam-fights-coronavirus.html> accessed on 7 November 2021



Figure 14: Epidemic propaganda is like fighting the enemy in Vietnam<sup>118</sup>



Figure 13 and 14 provide information about the Vietnamese government's propaganda campaign in dealing with the COVID-19 epidemic. Inspired by the nation's history, "chống dịch như chống giặc" - fight COVID-19 as an enemy - has aroused patriotism and the cooperation of the whole society.

However, there is a question that it is effective with talking only? The answer is obviously not. The authority demonstrate its competency in dealing with the

<sup>118</sup> Công đoàn Than – Khoáng sản Việt nam (Vietnam national union of coal and mining workers) (2020). Công tác tuyên truyền - Chống dịch như chống giặc (Propaganda work - Fighting the epidemic is like fighting the enemy), <https://congdoantkv.vn/tin-tuc/chi-tiet/19310/Chong-dich-nhu-chong-giac> accessed on 8 November 2021

transmission of virus by many policies and measures to combat COVID-19 at local and national levels. When detecting a new cluster of COVID-19 patients in the community, the authority immediately took measures to prevent the disease such as school closures, mask policies, implementing 5K message<sup>119</sup>, mass quarantine, targeted lockdown, and supporting vulnerable people<sup>120</sup>. In addition, the use of tracking technology through the Bluezone application is also promoted by the Quang Ninh authority to propagate people to install and use this app to track down F1, F2 and F3 cases, making it become one of the preventive measures against disease.

The people of Quang Ninh put their trust in the government partly because Pham Minh Chinh, a politician who used to serve as party secretary of Quang Ninh province from 2011 to 2015,<sup>121</sup> was elected to become the new Prime Minister of Vietnam in early 2021. Pham Minh Chinh proved his leadership capacity while working in Quang Ninh province as a reformist. Indeed, he oversaw the pilot unification of party and state titles at the local level to remove overlap, reduce the complication of the government apparatus, and improve the efficiency of the political system. He is also known to be a strong supporter of some major economic development plans, such as the establishment of special economic zones.<sup>122</sup> Interviewing a man in Dong Trieu town, Quang Ninh, he said:

---

<sup>119</sup> 5K stands for “Khẩu trang” (face masks), “Khử khuẩn” (disinfection), “Khoảng cách” (distance), “Không tụ tập” (no gathering) and “Khai báo y tế” (health declaration).

<sup>120</sup> Chau, N. V. V., Dung, N. T., Geskus, R., Dung, N. T., Thai, P. Q., Thanh, T. T., ... & Anh, D. D. (2021). Proactive response and innovative approaches to SARS-CoV-2 in Vietnam.

<sup>121</sup> Le Hong Hiep (2021), The economic agenda taking shape under Vietnam's new leader, <https://asia.nikkei.com/Opinion/The-economic-agenda-taking-shape-under-Vietnam-s-new-leader> accessed on 11 September, 2021

<sup>122</sup> Le Hong Hiep (2021), Work Cut Out for Vietnam's New Prime Minister, <https://fulcrum.sg/work-cut-out-for-vietnams-new-prime-minister/> accessed on 21 September 2021



“Chinh is a person dedicated his work to Quang Ninh province. Thanks to his leadership ability and his followers, Quang Ninh has become one of the leading developed province in the country. I believe he has the competence to lead not only at the local level but in the government as well.”<sup>123</sup>

In the context of the COVID-19 pandemic, people’s great confidence in the government (*Trust in government*) makes them proactively and seriously comply with local prevention policies and regulations (*Regulatory compliance*), including the high rate of Bluezone acceptance (*Bluezone installation*) which is one of the fundamental reasons why Quang Ninh soon succeeded in controlling the COVID-19 outbreak in the province. It is worth noting that in the war of Vietnam against COVID-19, patriotism and community solidarity become spiritual weapons that are powerful and help unite citizens with the government in combating the invisible common enemy called COVID-19. Most importantly, acceptance of citizens towards Bluezone not only mirror the need to protect the health of members in the society but also reflect the image of nationalism and reinforce the political legitimacy of the political system.

### **B. Online personal privacy**

Culture is one of the basic elements and plays an important role to understand the way of thinking, mindset and human behaviour<sup>124</sup>. Vietnam is a country with thousands of years of history and a long culture<sup>125</sup>. A sense of community is a characteristic in Vietnamese culture. According to cultural researcher Nghiem Thi Thu

<sup>123</sup> Video interview with a man in Vinh Lap village, Dong Trieu, Quang Ninh on 20 August, 2021

<sup>124</sup> Kruger, T., and Roodt, G. (2003) ‘Hofstede’sVSM-94 revisited: is it reliable and valid?’, *SA Journal of Industrial Psychology*, 29(1): 75–82.

<sup>125</sup> Thê, T. N. (1996). *Tìm về bản sắc văn hóa Việt Nam*. (Discovering the identity of Vietnamese culture – Typological-systematic views), Nxb Tp. Ho Chi Minh

Nga<sup>126</sup>, in social life, the community of Vietnamese people is reflected in the collective spirit and sense of responsibility. In each behavior, lifestyle and way of thinking, people always think about the community, the collective body, always pay attention to the relationships surroundings, and avoid doing things that are harmful to the community. For the society as a whole, people are willing to sacrifice personal interests. This is different from the West when everyone values personal interests and freedoms much more than the East. The question is, while community is superior to personal interests and personal privacy emphasizes individuality, do Vietnamese not care about online personal privacy issues? Are they willing to share any personal data to others in digital environment?

Today, digital technology has made amazing leaps and bounds on the Internet and many smart applications serving the diverse needs of users and society. However, the emergence of information technology has raised many concerns about the leakage of personal information in digital conditions. The concern of privacy among Vietnamese people has appeared many years ago due to the explosion of the internet and social networks in Vietnam<sup>127</sup>. In the context of the COVID-19 epidemic in Vietnam, in a short time, Bluezone application was launched (April 2020) to assist in tracing the sources of coronavirus infection in the community, contributing to ensuring the health security of the citizens. People in Quang Ninh show that they widely accept Bluezone not only because of the expectation of the application's effectiveness (*perceived benefits from Bluezone and COVID-19 effective prevention*), but their

---

<sup>126</sup> Nghiem Thi Thu Nga (2021), Tinh cộng đồng của người Việt (A sense of community of Vietnamese people) <https://ct.qdnd.vn/van-hoa-xa-hoi/tinh-cong-dong-cua-nguoi-viet-526617> accessed 1 November 2021

<sup>127</sup> Sharbaugh, P. E. (2013). Ibid; Sriratanaviriyakul, N. *et al* (2014). Ibid

behavior is strongly influenced by trust and health concerns. However, it does not mean that privacy was completely ignored by users when Bluezone was first introduced in Vietnam (see Chapter 1). Many doubts about the sensitive issue of personal information were spread on social networking sites and personal blogs. In order to provide a more in-depth commentary on privacy issues among Vietnamese young adults, this part of the study will shed light on privacy issues from the angle of cultural dimension in Vietnam during the time of pandemic.

Psychologist Harry Triandis stated that three aspects of the self – private, public, and collective are formed by cultural patterns along with other environmental factors.<sup>128</sup> Meanwhile, Henderson's research on online privacy suggests that each individual's decision to share his or her personal information with others depends significantly on the cultural characteristics of the given society<sup>129</sup>. From that point, the study would suggest that the cultural characteristics of a society also is one of the important factors that determine the level of privacy concerns among citizens.

To date, there are some studies related to personal privacy in Vietnam. However, examining the interrelationships between culture and personal privacy through the lens of Western scholars would be unsatisfactory and is no longer suitable with the current social conditions of Vietnam, at least in theory.

In his seminal work, Geert Hofstede, a Dutch renowned Dutch social psychologist of cultural theory, points out five dimensions of national culture that consists of Power Distance, Individualism vs. Collectivism, Masculinity vs. Femininity,

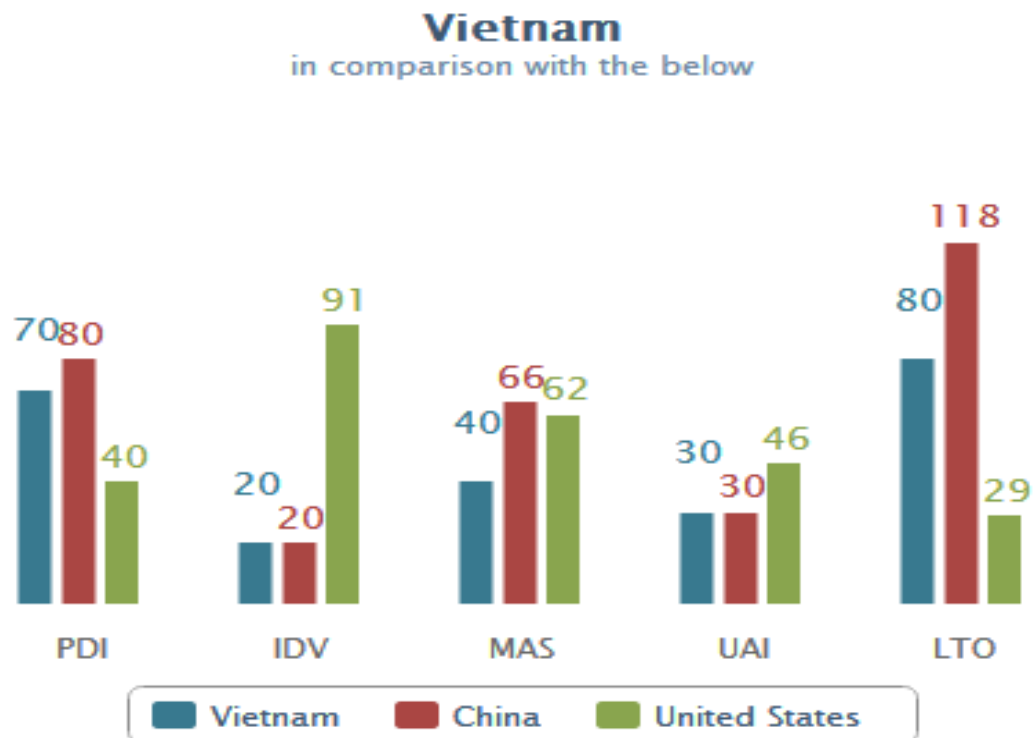
---

<sup>128</sup> Triandis, H. C. (1989) 'The self and social behavior in differing cultural contexts', *Psychological Review*, 96(3): 506–520

<sup>129</sup> Henderson, H. (2015) *Online Privacy and Government*, San Diego: Reference Point Press

Uncertainty Avoidance, and Long-Term Orientation<sup>130</sup>. Considering Hofstede's theory in Vietnam, some theoretical presumption are as follows:

**Figure 15: Vietnam in Hofstede's cultural theory**<sup>131</sup>



*Power distance* is defined as the extent to which the less powerful members of institutions (family, school, etc.) and organizations (workplace) within a nation expect and accept that power is distributed unequally. There is inequality in most societies and the Power Distance Index (PDI) measures the degree of inequality in society and how

<sup>130</sup> Hofstede, G., Hofstede, G. J., and Minkov, M. (2010) *Cultures and Organizations: Software of the mind* (3rd ed.), New York: McGraw Hill.

<sup>131</sup> Patrick E. Sharbaugh, *Wisdom of the Crowd: Conceptions of Online Personal Privacy in the Socialist Republic of Vietnam*, unpublished paper, [https://www.academia.edu/1827853/Wisdom\\_of\\_the\\_Crowd\\_Conceptions\\_of\\_Online\\_Personal\\_Privacy\\_in\\_the\\_Socialist\\_Republic\\_of\\_Vietnam?from=cover\\_page](https://www.academia.edu/1827853/Wisdom_of_the_Crowd_Conceptions_of_Online_Personal_Privacy_in_the_Socialist_Republic_of_Vietnam?from=cover_page) accessed on 9 October 2021

nations deal with inequalities<sup>132</sup>. For example, in a country with a small PDI, juniors are less dependent on their superiors, the gap between juniors and seniors is not large, thus having easy access to seniors for juniors. Given this explanation of PDI, we can understand that the smaller the PDI index of the country, the smaller the concern of online privacy, and *vice versa*<sup>133</sup>. However, countries with large PDI exhibit small levels of interpersonal trust.<sup>134</sup> Vietnam is a country with a high PDI of 70. This means that individuals may exhibit higher levels of privacy issues, but have lower trust between people.<sup>135</sup>

*Individualism* and *collectivism* represent differences through shared work. In collectivist societies, the power of the collective is often greater than that of the individual. Everyone works as a team and values the group effort. Therefore, Western scholars believe that privacy issues are often given more importance in individualist societies, while in collectivist societies it is normal for a group member to invade the private life of a group member at any time<sup>136</sup>. With an Individualism score (IDV) of just 20, Vietnam is considered a country with a deep collectivist culture. People living in collectivist societies is believed that it will be easier to accept the group's invasion

---

<sup>132</sup> Hofstede, Geert H. 1991. *Cultures and Organizations: Software of the Mind*. Berkshire, England: McGraw-Hill.

<sup>133</sup> Budak, J., Rajh, E., & Recher, V. (2017). Citizens' privacy concerns: Does national culture matter? In *Surveillance, Privacy and Security* (pp. 36-51). Routledge., pp39

<sup>134</sup> Sharbaugh, P. E. (2013). What is mine is yours: an exploratory study of online personal privacy in the socialist republic of Vietnam. In *CyberCulture Now: Social and Communication Behaviours on the Web* (pp. 69-85). Brill

<sup>135</sup> Sharbaugh, P. E. (2013). *Ibid*

<sup>136</sup> Hofstede et al., (2010), *Ibid*, pp.123–125; see more Westin, A. F. (2003). Social and political dimensions of privacy. *Journal of social issues*, 59(2), 431-453; Margulis ST (2003a) Privacy as a social issue and a behavioral concept. *J Soc Issues* 59(2):243–262

of private life, and at the same time have more trust and faith in other individuals than those in highly individualist societies.<sup>137</sup>

*Masculinity* and *femininity* distinguish societies in terms of assertiveness and emotion. People living in masculine cultures are more inclined to manifest material success, and they are willing to share and use their personal information more liberally to maximize economic benefits. Meanwhile, feminine societies tend to find solutions and disputes through consensus and soft value<sup>138</sup>. Feminine societies (such as Thailand, Vietnam) that had smaller populations, less economic scale, and strong collective philosophies.<sup>139</sup> Vietnam is assessed at low level in Masculinity (MAS) indicator with 40 scores, and thus suggesting that Vietnamese are willing to share their personal information to others..

*Uncertainty avoidance* is one of the important indicators that express of how members of a given society react to an ambiguous or unknown situation. If a culture got low scores on the Uncertainty Avoidance Index (UAI), it is assumed the privacy concerns is lower as well. Vietnam has a UAI just of 30 scores suggesting that privacy concerns are not a big deal among Vietnamese citizens.

*Long-term orientation* (LTO) is the ultimate indicator of Hofstede's theory of culture. This factor denotes the meaning of nurturing the present for results in the future, with emphasis on perseverance and providence. LTO is thought to be more dominant in Asian societies than in Western-style societies, where people often deal with short-

---

<sup>137</sup> Hofstede, Geert H. 1991. *Cultures and Organizations: Software of the Mind*. Berkshire, England: McGraw-Hill.

<sup>138</sup> Hofstede, G., Hofstede, G. J., & Minkov, M. (2010). *Cultures and organizations: software of the mind: intercultural cooperation and its importance for survival*. McGraw-Hill;

<sup>139</sup> Budak, J., Rajh, E. *et al* (2017), *Ibid*.

term problems in the relationship between the past and the present. Privacy concerns are believed to be higher in long-term-oriented societies (the East) than in short-term-oriented environments (the West).<sup>140</sup> Vietnam is a country with an LTO index of 80, which means that Vietnamese people should express more concerns on personal privacy.

In short, theoretically, while the three indicators PDI, LTO give the implications of high level concerns of personal privacy among Vietnamese, IDV, MAS and UAI give the opposite thinking. Within the limited available literature at present, there are a number of reasons why Western scholar's research on personal privacy issues in Vietnam is still inadequate and unsatisfactory. Namely:

First, there is a longstanding notions of personal privacy in the Western hemisphere about online privacy of Vietnamese citizens when considering Vietnam as a country without a developed internet system, and thus people do not attach importance to privacy issues. For instance, when it comes to collectivistic culture (including Vietnam), the assumption suggest that due to limited access to the Internet, email is rarely used leading to online personal privacy not being a big concern for Vietnamese<sup>141</sup>. However, it is noticed that according to Digital's statistics, as of June 2021, the number of Internet users in Vietnam is nearly 70 million, an increase of 0.8% in the period of 2020 - 2021 (accounting for more than 70% of the population); The number of people using social networks in Vietnam is nearly 76 million, an rise of nearly 10 million people within a year (equivalent to 73.7% of the population). With this figure, Vietnam is the country with the 12th highest number of Internet users worldwide and 6th out of 35 Asian countries/territories. Vietnamese users spend an average of nearly 7 hours a

---

<sup>140</sup> Hofstede et al., (2010), Ibid; Budak, J., Rajh, E., & Recher, V. (2017). Ibid, pp40

<sup>141</sup> Budak, J., Rajh, E. *et al* (2017), Ibid; see more Hofstede et al., 2010, pp123–125

day participating in Internet-related activities<sup>142</sup>. Unlike China, a country that bans Google and Facebook, the Vietnamese government allows its netizens to use all existing social networks around the world such as Google, Facebook, YouTube, Instagram, Telegram, Line, Weibo, etc. At the same time, domestic software developers also created Vietnam's own social networking sites that are used by many Vietnamese such as Zalo, Gazo, Lotus and so on. Therefore, it is suggested that prospective research on online personal privacy in Vietnam context needs to be more objective and go beyond traditional prejudice.

Second, most of the studies on the Vietnamese conception of online personal privacy, social practice, and regulatory efforts from foreign scholars are mostly in the early stages of Internet integration in Vietnam. Therefore, studies often come to the relatively same conclusion that people in a higher collectivist culture (such as Vietnam) may have a higher ability to share their personal information with others in the online environment<sup>143</sup>. However, some foreign scholars who have had many years of research experience in Vietnam, like Sharbaugh<sup>144</sup>, said that Vietnamese people also have concerns about online privacy issues, especially their attitude against any harmful threat online.

---

<sup>142</sup> Nguyễn Sơn (2021) Một bản báo cáo thiếu khách quan, sai sự thật về tự do Internet ở Việt Nam (An biased and untrue report on Internet freedom in Vietnam), <https://dangcongsan.vn/bao-ve-nen-tang-tu-tuong-cua-dang/mot-ban-bao-cao-thieu-khach-quan-sai-su-that-ve-tu-do-internet-o-viet-nam-592613.html> accessed on October 30, 2021

<sup>143</sup> Boritz, Efrim, Wan Gyun No, and R.P. Sundarraj. 2006. "Internet privacy: framework, review and opportunities for future research." Waterloo, ON: School of Accountancy, University of Waterloo.; Chen, Houn-Gee, Charlie C. Chen, Louis Lo, and Samuel C. Yang. 2008. "Online privacy control via anonymity and pseudonym: Cross-cultural implications." *Behaviour & Information Technology* 27 (3): 229-242; Chiou, A., Jeng-chung, V. C., & Bisset, C. (2008). *Cross Cultural Perceptions on Privacy in the United States, Vietnam, Indonesia, and Taiwan. Online Consumer Protection: Theories of Human Relativism: Theories of Human Relativism*, 284.

<sup>144</sup> Sharbaugh, P. E. (2013). *Ibid.*



In order to fill in the gap in the literature of online privacy in Vietnam, the study conducted several interviews with local people on topics related to online personal privacy, Bluezone in Vietnam, and compare with existing literature. Feedback from informants gives us some interesting hints about the thinking of Vietnamese youth today about privacy concerns.

*“Bluezone itself only takes my phone number to contact me, I do not have to fill in any other information, so I do not need to worry too much about leaking personal information when using this application.”*

(A male respondent, 20 years old in Dong Trieu, Quang Ninh)<sup>145</sup>

Meanwhile, a male respondent, 31 years old in Mao Khe, Quang Ninh stated that letting personal connection with others to be checked is obviously sensitive. It is more precise for those who can be called as having better positions in society such as politicians, businessmen, and celebrities. The name of business partners should not be public if not necessary. The act of meeting with anyone, going anywhere will also become sensitive to businessman, politicians, or entertainment stars. However, that does not mean that ordinary people think that personal information is not important to them because in the era of the internet and social networks, if people’s personal information is leaked to the bad persons, they will be in big trouble for sure.<sup>146</sup>

Another informant in Mao Khe shared the same opinion about the importance of personal information and suggest that it should be protected carefully in online environment. Vietnamese people mainly use facebook while facebook is easy to be

<sup>145</sup> Video call made in the morning July 1, 2021

<sup>146</sup> Video call made in the afternoon, July 1, 2021

hacked causing data loss. Many evil-doer use that facebook nick to trick people. Friends, lovers and relatives of the person whose nick is hacked are the first to be targeted, simply because it is easier for bad entities to take advantage of their trust.<sup>147</sup>

It is noticed that the perception of citizens towards online privacy is different depending on each person's experience. Overall, we can extract some remarks as follows:

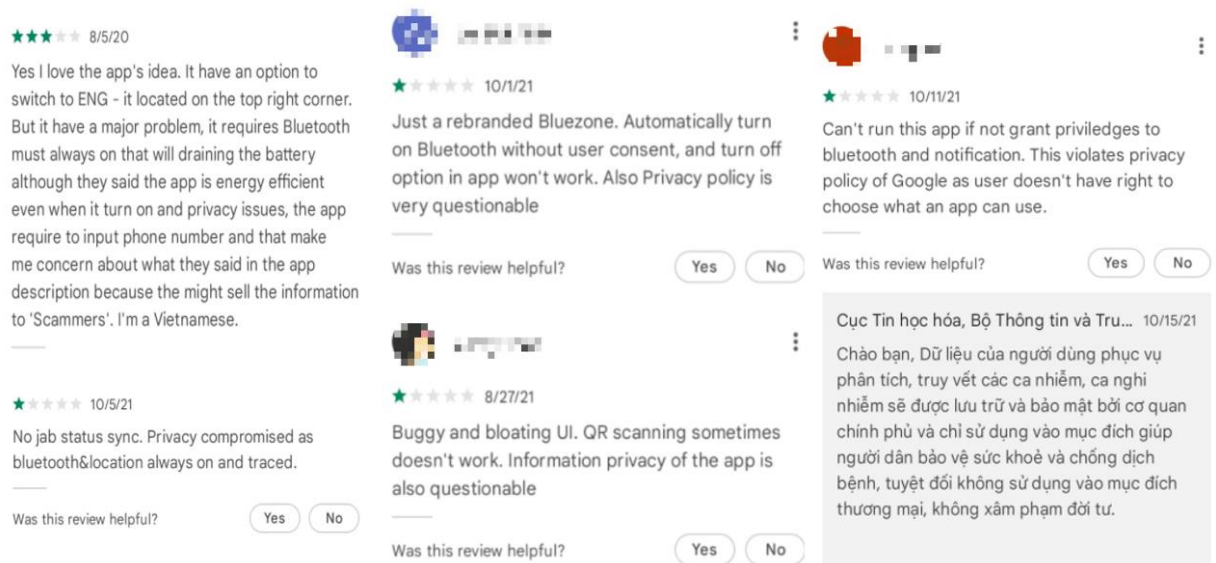
Firstly, Bluezone is an application that tracks the movement of users if it is found to be a potential source of infection in the community. Regarding the working principle of Bluezone, it is true that the person who installs and uses Bluezone does not need to fill in any information other than the phone number. Users believe that Bluezone itself is not a sensitive application. However, by the tone of the respondent's nuance, it can be implied that personal data has become their concern to certain extent when determining information disclosure to another party. This is even more grounded when some other informants also assert that they feel more secure about using Bluezone when there is a guarantee of data security from the government (see chapter 3)<sup>148</sup>.

---

<sup>147</sup> Interview A female respondent, 24 years old in Mao Khe, Quang Ninh, July 2, 2021

<sup>148</sup> Huyền Thanh (2020) Cài đặt ứng dụng Bluezone, thông tin cá nhân của người dùng có được bảo mật? (Installing the Bluezone application, is the user's personal information secure?) <https://cand.com.vn/Cong-nghe/Cai-dat-ung-dung-Bluezone-thong-tin-ca-nhan-cua-nguoi-dung-co-duoc-bao-mat-i577187/> accessed on October 8, 2021; see more Trọng Đạt (2020) Ứng dụng Bluezone có theo dõi vị trí người dùng không? (Does Bluezone app track user location?) <https://vietnamnet.vn/vn/cong-nghe/ung-dung/ung-dung-bluezone-co-theo-doi-hay-giam-sat-vi-tri-nguoi-dung-khong-663928.html> accessed on October 9, 2021

**Figure 16: A part of users are worried about personal privacy when using Bluezone**



*Many comments about Bluezone in CH Play (google app store) show that online personal privacy has become a significant concern among users. Meanwhile, a representative of the Department of Informatization, the Ministry of Information and Communications - the unit that manages the Bluezone app, tried to explain that Bluezone's purpose is only to serve to track COVID-19 cases and not aim to invade the privacy of users.*

Secondly, during the time of COVID-19, many individuals face trouble when their personal information is exposed or their personal data is spread on social networks. In May 2021, there is a Vietnamese actress who was leaked an sensitive clip with her boyfriend, and her private data was quickly shared on online forums, causing her to fall into depression, even intend to commit suicide.<sup>149</sup> Meanwhile, in the process of tracing

<sup>149</sup> La Nghia Hieu (2021), Quảng Ninh cách ly 6 khách hát cùng 6 “tay vịn” vì hát karaoke chui giữa dịch Covid-19 (Quang Ninh isolates 6 guests to sing with 6 “handrails” for singing karaoke in the midst of

potential infections in the community, some male individuals in Halong city (Quang Ninh) also faced a big problem with their private life when they were traced by the police. They were announced publicly going to a karaoke bar. This information is widely shared online. Netizens on the one hand fear the outbreak of the disease in crowded places such as entertainment venues. On the other hand, they focus more attention on the details of karaoke bars which are considered as a sensitive places for many men.<sup>150</sup> The behavior is considered to be incompatible with traditional ethics and customs of Vietnam, especially for men who already have wife.

Thirdly, in a larger picture, many young people are often troubled by bad individuals on social networks, especially facebook - one of the most commonly used social networking sites in Vietnam today. Facebook users have been hacked and lost their personal facebook nicks, which means that all their private data will fall into the hands of scammers or digital criminals. When searching for the keyword “my facebook is hacked”, it will appear many stories regarding this issue.

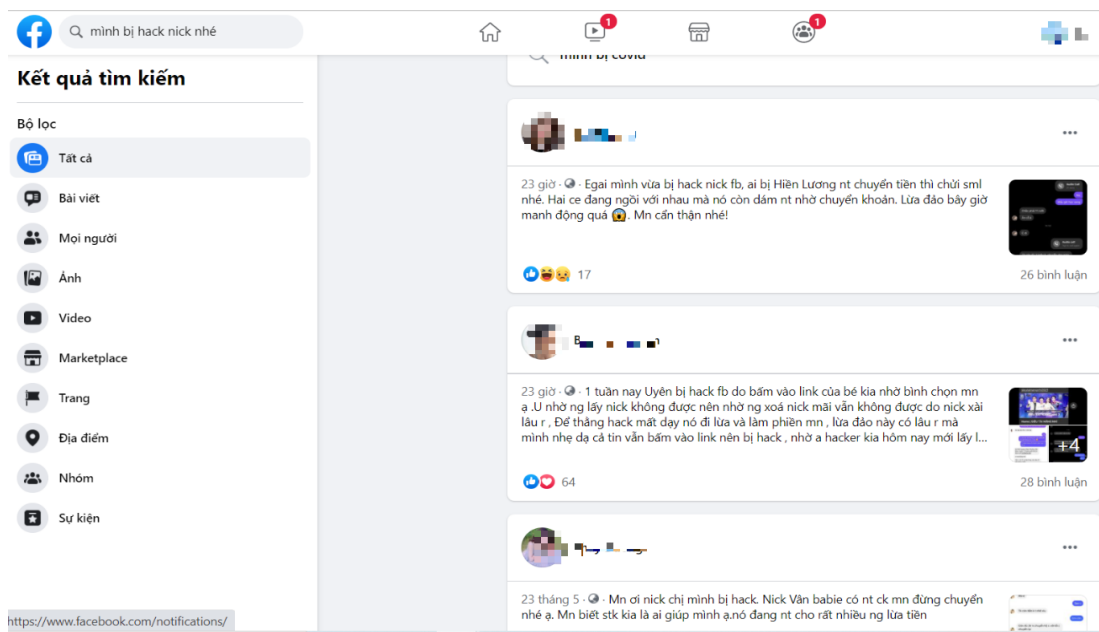
จุฬาลงกรณ์มหาวิทยาลัย  
CHULALONGKORN UNIVERSITY

---

the Covid-19 epidemic) <https://thanhnien.vn/quang-ninh-cach-ly-6-khach-hat-cung-6-tay-vin-vi-hat-karaoke-chui-giua-dich-covid-19-post1034434.html> accessed on 3 November 2021

<sup>150</sup> Among Vietnamese, in normal conditions, it is totally fine to go to karaoke with friends for entertainment. However, because some “unhealthy” businesses owners often combine karaoke services with prostitutes. People often get caught up in rumors such as going to karaoke bars as a way to go “bia ôm” (“bia” = beer”, “ôm”, hug” = “hug”, “bia ôm” = “drink beer and hug prostitutes”).

**Figure 17: Many Vietnamese users react about hackers and scams on social networks**



Source: Facebook

Translation:

“My sister’s facebook account has just been hacked, anyone who gets a message from this account asking to transfer money, please scold her. We are sitting together, but he still dares to text me to ask for a money transfer. Scams are so cunning now. Be careful everyone”

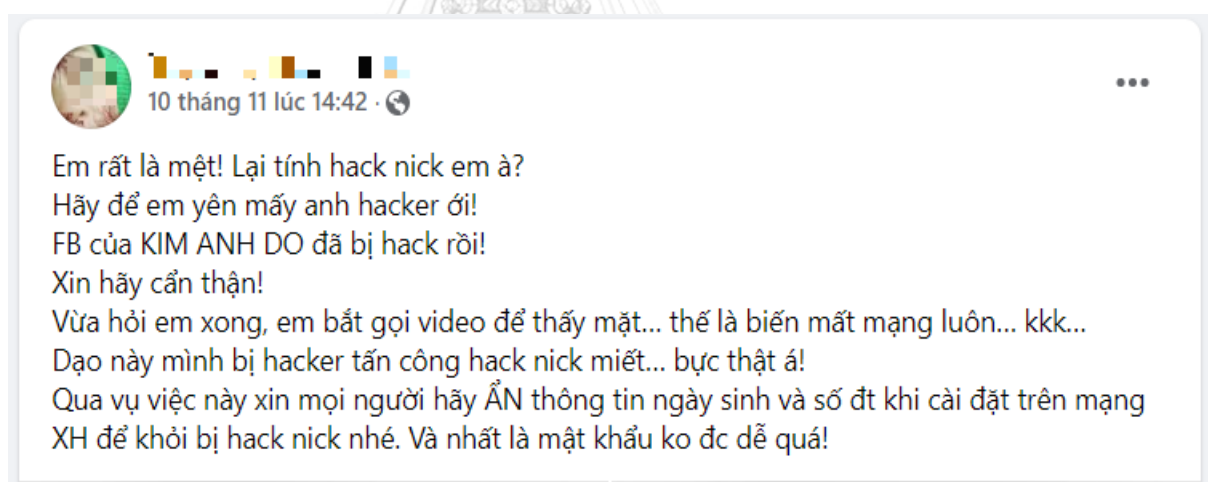
“A week ago, my facebook account, that has been used for a long time, was hacked because I clicked on the harmful link. I asked for help to get my nick back, but

it is ineffective. So I asked everyone to unfriend with my own account forever. I do not want people to be bothered and scammed by this bad guy. This scam has been around for a long time but I was gullible and still clicked on the link so it got hacked”.

“Hey everyone, my nick has been hacked. If this facebook account texts everyone to transfer money, please do not do it. They are scammers”.

Many bad guys use tricks to hack facebook accounts, steal personal information, take advantage of the trust of relatives and friends of the victim and then commit fraud. The main purpose of the fraudsters is to take advantage of people’s trust to get money and gain illicit profits.

**Figure 18: How users deal with scams via facebook**



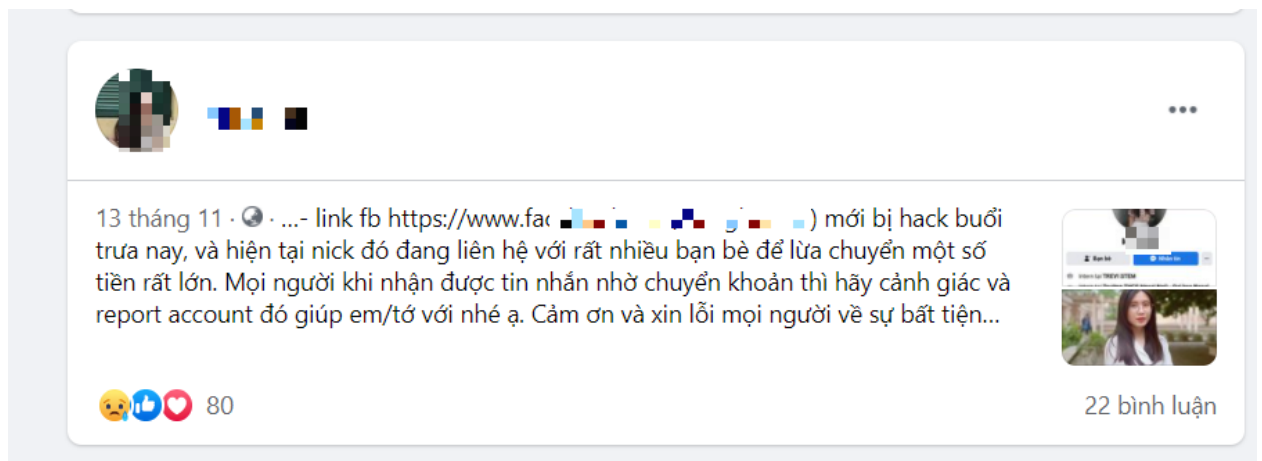
Source: *Facebook*

Translation:

“My account has been hacked frequently these days, I mm very tired and frustrated. When he was trying to cheat on me, I said to call a video to see his face, then he ran away. Through this incident, everyone, please hide your date of birth and phone

number settings on social networks to prevent your nick from being hacked, especially the password setting should not be too easy.”

**Figure 19: How users deal with scams via facebook (continues)**



Source: Facebook

Translation:

“My Facebook just got hacked this afternoon. Currently scammers are using this account to contact friends to scam money. When people receive a message asking for a money transfer, please be alert and report that account for me. Thanks everyone”.

It can be seen that the situation of fraud in the internet space in Vietnam is clearly becoming an increasingly serious problem. A common trick of scammers is to hack a social network account, then use that that account to take advantage of the trust of brothers, friends and relatives to gain illicit money. On the user side, it is noticed that people’s awareness of the fraudulent acts and tricks of the bad individuals has gradually been enhanced. Again, people use online platforms such as social networks to spread

information for others knowing about how to avoid this phenomenon. Thereby, it can be seen that online personal privacy concern among Vietnamese young adults has become significant at present. In addition, people turn to be more cautious when sharing their personal data with others, especially in digital conditions.

## Chapter V: Conclusion

### A. Summary

This is a timely research about public perception on privacy and acceptance of contact tracing application for controlling the spread of COVID-19 in Quang Ninh, Vietnam. Even at the time the study was conducted, the coronavirus pandemic was still raging around the world. As of the end of April 2021, Vietnam has experienced three waves of the COVID-19 pandemic, in which Quang Ninh is one of the epicenters of the third wave. This study is one of the contributions on the topic of online personal privacy in Vietnam in the context of the pandemic. The study employs the privacy calculus theory to examine the relationship between benefits (*public and individual health*) and risks (*privacy and data surveillance*) to find out the cause that drives the acceptance of local people when deciding to use contact tracing application (Bluezone). In addition, the study combined the methods of questionnaire survey and in-depth interviews with local individuals to get insights from the ground.

On one hand, the study found that young adults in Quang Ninh showed *high health concerns* on COVID-19 pandemic (*concern self, concern other*). Although people acknowledge that data is moderately a sensitive issue, their privacy concerns seem to be reduced by the promise and assurance from medical authorities or government in using data (*lower privacy risk*). In addition, Bluezone itself has shown



its certain benefits in helping users to proactively stay away from the risk of coronavirus infection and other functions. Therefore, the number of people downloading Bluezone also reaches a high rate and the operational efficiency is also significant. On the other hand, the high rate of trust in the Vietnamese government (91%) due to its initial success in dealing with coronavirus outbreak is a crucial point as well (*trust in government*). To certain extent, people believe in the commitment to data security from the government. Therefore, the privacy concerns seem to be less important than two given factors (*health concerns* and *trust in government*), and thus explaining why Bluezone is widely accepted among young adults in Quang Ninh, Vietnam.

In general, people's thoughts and actions during the epidemic season are mainly for the purpose of ensuring the health of individuals and communities. It is suggested that the privacy issue is less important than health concerns and the high trust of the citizens towards the government causing the acceptance of Vietnamese people on Bluezone application. High trust makes people actively and seriously implement the regulations and policies of the state and health agencies. In particular, Bluezone is also considered as one of the technological measures accepted widely by the people to detect, warn and trace sources of infection in the community, to support disease prevention in Quang Ninh, and Vietnam as a whole. Obviously, trust is the key core that helps maintain political and social stability for Vietnam to deal with a crisis similar to COVID-19.

It is noticed that although trust and health issue are big concerns among citizens, personal privacy in online environment has become one of the significant concerns of Vietnamese people nowadays. Contrary to the traditional view of Western scholars that

Vietnamese people find it easy to share their personal data with others, the research results show a rather different picture. Vietnamese young adults now have a higher awareness of scams on social networks, raising greater concerns about personal information security. This is one of the important indicators for privacy-related research in Vietnam to continue to deepen in the future.

### B. Limitations

One of the limitations on researching privacy issues in Vietnam to date is the lacking of source material. Besides, due to rapid changes in technology, political, social and cultural situation, quantitative and qualitative research on online personal privacy in Vietnam still need to be studied from different angles, and go further contributing to the knowledge body of privacy in Vietnam.

Research addressed acceptance of young adults in Quang Ninh, Vietnam. However, to optimize the effectiveness of Bluezone, it needs the cooperation of the whole community, not just the young generation. The COVID-19 outbreaks in Vietnam took place in many different provinces and cities, with different time and scale leading to different people's awareness and actions about the virus and Bluezone. Therefore, the acceptance of Quang Ninh young adults does not necessarily reflect the views of Vietnamese people in Vietnam as a whole.

### C. Suggestions for further research

The study provides an important premise for understanding the links between online personal privacy, technology and health issues in the context of the COVID-19 pandemic. During the pandemic period, people somehow can sacrifice personal interests to protect public health. Great trust in the government has helped the people

of Quang Ninh in particular and Vietnam in general to achieve great achievements in pandemic prevention. However, COVID-19 will be gone for years to come, the scenario for the new development of resilience in Quang Ninh and Vietnam will have to study more in the future. Vietnam will enter in a post-COVID era with new emerging issues such as global supply chain, e-commerce, etc, the Vietnamese government will need to implement new policies and measures to recover and develop the economy, at the same time maintain society's trust as well as the legitimacy of political system.



## REFERENCES



จุฬาลงกรณ์มหาวิทยาลัย  
**CHULALONGKORN UNIVERSITY**

## **In Vietnamese**

Chí Hiếu (2021) TPHCM: Quân đội sẽ đưa lương thực, thực phẩm đến từng nhà dân (Ho Chi Minh City: The army will bring food to every house) <https://thanhnien.vn/tphcm-quan-doi-se-dua-luong-thuc-thuc-pham-den-tung-nha-dan-post1103174.html> access on 15 October 2021

Công an nhân dân (2021) Tổng Bí thư chủ trì họp lãnh đạo chủ chốt về công tác phòng chống dịch COVID-19 (General Secretary chaired a meeting with key leaders on COVID-19 control and prevention). <https://cand.com.vn/thoi-su/tong-bi-thu-chu-tri-hop-lanh-dao-chu-chot-ve-cong-tac-phong-chong-dich-covid-19-i625531/> accessed on 6 November

Công đoàn Than – Khoáng sản Việt nam (Vietnam national union of coal and mining workers) (2020). Công tác tuyên truyền - Chống dịch như chống giặc (Propaganda work - Fighting the epidemic is like fighting the enemy), <https://congdoantkv.vn/tin-tuc/chi-tiet/19310/Chong-dich-nhu-chong-giac> accessed on 8 November 2021

Hà Thanh (2021) Ứng dụng Bluezone đạt hơn 30 triệu lượt tải (Bluezone application reaches more than 30 million downloads) <http://kinhtedothi.vn/ung-dung-bluezone-dat-hon-30-trieu-luot-tai-411746.html> accessed 15 June, 2021

Hồ Chí Minh (2011), Toàn tập (Ho Chi Minh full collection), volume 10. Nxb. Chính trị quốc gia - sự thật. Hà Nội, pp453.

Huyền Thanh (2020) Cài đặt ứng dụng Bluezone, thông tin cá nhân của người dùng

có được bảo mật? (Installing the Bluezone application, is the user's personal information secure?) <https://cand.com.vn/Cong-nghe/Cai-dat-ung-dung-Bluezone-thong-tin-ca-nhan-cua-nguoi-dung-co-duoc-bao-mat-i577187/> accessed on October 8, 2021

La Nghia Hieu (2021), Quảng Ninh cách ly 6 khách hát cùng 6 “tay vịn” vì hát karaoke chui giữa dịch Covid-19 (Quang Ninh isolates 6 guests to sing with 6 “handrails” for singing karaoke in the midst of the Covid-19 epidemic) <https://thanhnien.vn/quang-ninh-cach-ly-6-khach-hat-cung-6-tay-vin-vi-hat-karaoke-chui-giua-dich-covid-19-post1034434.html> accessed on 3 November 2021

Lê Viết Khuyên (2021) Ứng dụng Bluezone cán mốc 28 triệu lượt tải, người Việt đang làm mọi cách dù là nhỏ nhất để ngăn ngừa sự lây lan của dịch Covid-19 (Bluezone application reached 28 million downloads, Vietnamese people are doing everything even the smallest to prevent the spread of Covid-19 pandemic.) <https://www.thegioididong.com/tin-tuc/ung-dung-bluezone-can-moc-28-trieu-luot-tai-1325693> accessed 20 April 2021

Lưu Quý (2020), Bluezone đạt trên 20 triệu lượt tải (Bluezone reach over 20 million downloads) <https://vnexpress.net/bluezone-dat-tren-20-trieu-luot-tai-4150096.html>

Mai Hà (2020) Thực hư thông tin Bluezone “ảnh hưởng an toàn và riêng tư của người dùng” (It is said that Bluezone affects on the safety and privacy of users, true or not?) <https://thanhnien.vn/cong-nghe/thuc-hu-thong-tin->

[bluezone-anh-huong-an-toan-va-rieng-tu-cua-nguoi-dung-1216167.html](https://bluezone-anh-huong-an-toan-va-rieng-tu-cua-nguoi-dung-1216167.html)

accessed 20 April 2021

Nghiêm Thi Thu Nga (2021), Tính cộng đồng của người Việt (A sense of community of Vietnamese people) <https://ct.qdnd.vn/van-hoa-xa-hoi/tinh-cong-dong-cua-nguoi-viet-526617> accessed 1 November 2021

Ngọc Lưu (2020): Người dùng lo ngại việc Bkav đứng sau ứng dụng Bluezone: Bộ TT&TT nói gì? (Users are concerned about Bkav behind Bluezone application: What does the Ministry of Information and Communications say?) <https://vietnamfinance.vn/nguoi-dung-lo-ngai-viec-bkav-dung-sau-ung-dung-bluezone-bo-tttt-noi-gi-20180504224242509.htm> accessed 20 April 2021

Nguyễn Đăng Dung (2018). Sự phát triển quyền riêng tư trên thế giới và ở Việt Nam. (The evolution of privacy in the world and in Vietnam) Quyền về sự riêng tư, Nhà xuất bản chính trị Quốc gia sự thật, Hà Nội, tr. 34

Nguyễn Sơn (2021) Một bản báo cáo thiếu khách quan, sai sự thật về tự do Internet ở Việt Nam (An biased and untrue report on Internet freedom in Vietnam), <https://dangcongsan.vn/bao-ve-nen-tang-tu-tuong-cua-dang/mot-ban-bao-cao-thieu-khach-quan-sai-su-that-ve-tu-do-internet-o-viet-nam-592613.html> accessed on October 30, 2021

Phan Thương (2021) Nam tiếp viên VNA làm lây lan dịch bệnh bị tuyên 2 năm tù treo (VNA hostess was sentenced to 2 years of suspended imprisonment for being a COVID super spreader in community) <https://thanhnien.vn/thoi->

[su/nam-tiep-vien-vna-lam-lay-lan-dich-benh-bi-tuyen-2-nam-tu-treo-1361194.html](https://nam-tiep-vien-vna-lam-lay-lan-dich-benh-bi-tuyen-2-nam-tu-treo-1361194.html)

Thái blog (2020): Dùng Bluezone có nguy cơ lộ thông tin như thế nào? (how risky it is on personal data when using Bluezone?)  
<https://vnhacker.blogspot.com/2020/04/dung-bluezone-bi-lo-thong-tin-nhu-nao.html> accessed 20 April 2021

Thêm, T. N. (1996). Tìm về bản sắc văn hóa Việt Nam. (Discovering the identity of Vietnamese culture – Typological-systematic views), Nxb Tp. Ho Chi Minh  
 Thiên Vương (2021) Triệt phá đường dây lừa đảo hàng tỷ đồng của phụ nữ qua mạng (Destroying a female fraudulent line of billions of dong online)  
<https://nhandan.com.vn/thoi-su-phap-luat/triet-pha-duong-day-lua-dao-hang-ty-dong-cua-phu-nu-qua-mang-640954/>

Trọng Đạt (2020) Ứng dụng Bluezone có theo dõi vị trí người dùng không? (Does Bluezone app track user location?) <https://vietnamnet.vn/vn/cong-nghe/ung-dung/ung-dung-bluezone-co-theo-doi-hay-giam-sat-vi-tri-nguoi-dung-khong-663928.html> accessed on October 9, 2021

Ủy ban Khoa học xã hội Việt Nam (1976) Nguyễn Trãi toàn tập (Nguyen Trai collection). Nxb. Khoa học xã hội. Hà Nội, pp 77-79

Viện Khoa học xã hội Việt Nam, Viện sử học (1998). Đại Việt sử ký toàn thư (Đại Việt chronicle) tập II.Nxb. Khoa học xã hội. Hà Nội, pp.211



### **In English**

Altman, I. (1975) *The Environment and Social Behavior*, Monterey: Brooks/Cole

Bavel JJ, Baicker K, Boggio PS, et al. (2020) Using Social and Behavioural Science to Support COVID-19 Pandemic Response. *Nature Human Behaviour*

Bellman, S., Johnson, E. J., Kobrin, S. J., and Lohse, G. L. (2004) 'International differences in information privacy concerns: A global survey of consumers', *The Information Society*, 20(5)

Bellman, Steven. *The Information Society*

Bluezone white paper, <https://bluezone.gov.vn/>

Boritz, Efrim, Wan Gyun No, and R.P. Sundarraj. 2006. "Internet privacy: framework, review and opportunities for future research." Waterloo, ON: School of Accountancy, University of Waterloo.

Budak, J., Rajh, E., & Recher, V. (2017). Citizens' privacy concerns: Does national culture matter?. In *Surveillance, Privacy and Security* (pp. 36-51). Routledge.

Chau, N. V. V., Dung, N. T., Geskus, R., Dung, N. T., Thai, P. Q., Thanh, T. T., ... & Anh, D. D. (2021). Proactive response and innovative approaches to SARS-CoV-2 in Vietnam.

Chen, Houn-Gee, Charlie C. Chen, Louis Lo, and Samuel C. Yang. 2008. "Online

privacy control via anonymity and pseudonym: Cross-cultural implications.” *Behaviour & Information Technology* 27 (3).

Chile (2021) Vietnam records first Covid-19 community transmissions in two months

Chiou, A., Jeng-chung, V. C., & Bisset, C. (2008). Cross Cultural Perceptions on

Privacy in the United States, Vietnam, Indonesia, and Taiwan. *Online Consumer Protection: Theories of Human Relativism: Theories of Human Relativism*, 284.

Culnan, M.J.; Armstrong, P.K. Information privacy concerns, procedural fairness, and impersonal trust: An empirical investigation. *Organ. Sci.* 1999, 10, 104–115;

Wang, T.; Duong, T.D.; Chen, C.C. Intention to disclose personal information via mobile applications: A privacy calculus perspective. *Int. J. Inf. Manag.* 2016, 36, 531–542.

Do Gia Hung and Nguyen Manh Dung (2021), Evaluating Food Issue in the Context of COVID-19 Pandemic - The Study Case of Ho Chi Minh City, Vietnam, in Workshop Agriculture production in Vietnam and Southeast Asian countries from the social-ecological transformation approach: Opportunities, challenges and policy implications, The Institute of Policy and Management, VNU-University of Social Sciences and Humanities, Hanoi

Do, Huyen Thanh et al. (2021): Citizens' Opinions of and Experiences with Government Responses to COVID-19 Pandemic in Vietnam, GLO Discussion Paper, No. 776, Global Labor Organization (GLO), Essen.

Dryhurst S, Schneider CR, Kerr J, et al. (2020) Risk Perceptions of COVID-19

Around the World. *Journal of Risk Research*. Epub ahead of print 5 May.

DOI: 10.1080/13669877.2020.1758193.

Ferretti, L., Wymant, C., Kendall, M., Zhao, L., Nurtay, A., Abeler-Dörner, L.,

...Fraser, C. (2020). Quantifying sars-cov-2 transmission suggests epidemic control with digital contact tracing. *Science*, 368(6491).

Fisher J, Van Heerde J and Tucker A (2010) Does One Trust Judgement Fit All?

Linking Theory and Empirics. *The British Journal of Politics and International Relations* 12 (2): 161–188

Freedom House (2021), *Freedom in the world 2021*,

<https://freedomhouse.org/country/vietnam/freedom-world/2021> accessed November 2, 2021

Fukuyama, F. (2020). The pandemic and political order. *Foreign Aff.*, 99, 26.

Fukuyama, Francis *Trust: the social virtues and the creation of prosperity* - Free Press, 1995

Garrett, P. M., White, J. P., Lewandowsky, S., Kashima, Y., Perfors, A., Little, D. R.,

... Dennis, S. (2020, September 29). The acceptability and uptake of smartphone tracking for COVID-19 in Australia. <https://doi.org/10.31234/osf.io/7tme6>

H.D.N. Trang, D.C. Vu: Summary of the COVID-19 outbreak in Vietnam — lessons and suggestions, *Travel Med Infect Dis* (2020), Article 101651

H.N. Thanh, T.N. Van, H.N.T. Thu, B.N. Van, B.D. Thanh, H.P.T. Thu, et al:

Outbreak investigation for COVID-19 in northern Vietnam, *Lancet Infect Dis*, 20 (5) (2020), pp. 535-536

Han Q, Zheng B, Cristea M, et al. (2020) Trust in Government and Its Associations with Health Behaviour and Prosocial Behaviour During the COVID-19 Pandemic. *PsyArXiv*. Epub ahead of print 29 June. DOI: 10.31234/osf.io/p5gns; See more Olsen AL and Hjorth F (2020) Willingness to Distance in the COVID-19. *OSF Preprints*. Available at: <https://osf.io/xpwwg2/>

Henderson, H. (2015) *Online Privacy and Government*, San Diego: Reference Point Press

Hofstede, G., Hofstede, G. J., and Minkov, M. (2010) *Cultures and Organizations: Software of the mind* (3rd ed.), New York: McGraw Hill.

Hofstede, Geert H. 1991. *Cultures and Organizations: Software of the Mind*. Berkshire, England: McGraw-Hill.

Hofstede, G., Hofstede, G. J., & Minkov, M. (2010). *Cultures and organizations: software of the mind: intercultural cooperation and its importance for survival*. McGraw-Hill.

Hsiang, S., Allen, D., Annan-Phan, S., Bell, K., Bolliger, I., Chong, T., Druckenmiller, H., Huang, L. Y., Hultgren, A., Krasovich, E., Lau, P., Lee, J., Rolf, E., Tseng, J., & Wu, T. (2020). The effect of large-scale anti-contagion policies on the COVID-19 pandemic. *Nature*, 584(7820), 262–267.)

<http://hdl.handle.net/10419/229435>

Huong, D. T. L., & Long, T. D. (2021). Does knowledge matter? The role of m-Health literacy to the acceptance of m-Health applications. The University of Danang-Journal of Science and Technology, 42-47.

International Monetary Fund (2021), Vietnam : 2020 Article IV Consultation-Press Release; Staff Report; and Statement by the Executive Director for Vietnam, p 44 <https://www.imf.org/en/Publications/CR/Issues/2021/02/24/Vietnam-2020-Article-IV-Consultation-Press-Release-Staff-Report-and-Statement-by-the-50121> accessed 18th April 2021

Islam, N., Sharp, S. J., Chowell, G., Shabnam, S., Kawachi, I., Lacey, B., Massaro, J. M., D'Agostino, R. B., & White, M. (2020). Physical distancing interventions and incidence of coronavirus disease 2019: Natural experiment in 149 countries. *BMJ*, 370, m2743.

Kruger, T., and Roodt, G. (2003) 'Hofstede's VSM-94 revisited: is it reliable and valid?', *SA Journal of Industrial Psychology*, 29(1): 75–82.

L.T. Hai, L.V. Nguyen, D.M. Tran, H.T. Do, H.T. Tran, Y.T. Le, et al: The first infant case of COVID-19 acquired from a secondary transmission in Vietnam *Lancet Child Adolesc Health*, 4 (5) (2020), pp. 405-406

La Nghia Hieu (2021), Quảng Ninh cách ly 6 khách hát cùng 6 “tay vịn” vì hát karaoke chui giữa dịch Covid-19 (Quang Ninh isolates 6 guests to sing with 6 “handrails” for singing karaoke in the midst of the Covid-19

epidemic) <https://thanhvien.vn/quang-ninh-cach-ly-6-khach-hat-cung-6-tay-vin-vi-hat-karaoke-chui-giua-dich-covid-19-post1034434.html>

accessed on 3 November 2021

Laudon, Kenneth C. and Jane P. Laudon. 2008. *Essentials of Management Information Systems. Organization & Technology in the networked Enterprise* (8th Ed). New Jersey: Prentice Hall.

Xu, H., Luo, X. R., Carroll, J. M., & Rosson, M. B. (2011). The personalization privacy paradox: An exploratory study of decision-making process for location-aware marketing. *Decision support systems*, 51(1), 42-52.

Laufer, R.S.; Wolfe, M. Privacy as a concept and a social issue: A multidimensional developmental theory. *J. Soc. Issues* 1977, 33, 22–42.

Le Hong Hiep (2021), The economic agenda taking shape under Vietnam's new leader, <https://asia.nikkei.com/Opinion/The-economic-agenda-taking-shape-under-Vietnam-s-new-leader> accessed on 11 September, 2021

Le Hong Hiep (2021), Work Cut Out for Vietnam's New Prime Minister, <https://fulcrum.sg/work-cut-out-for-vietnams-new-prime-minister/> accessed on 21 September 2021

Le TH, Tran TPT. Alert for COVID-19 second wave: A lesson from Vietnam. *J Glob Health* 2021;11:03012.)

Lee. 2007. "Digital media technology and individual privacy," In *Communication Technology and Social Change*, eds. Carolyn A. Lin and David J. Atkin. (London: Routledge.)

Levi M and Stoker L (2000) Political Trust and Trustworthiness. Annual Review of

Political Science 3 (1): 475–507

Luhmann, Niklas Trust and power / Luhmann. – n. Y. : J. Wiley, 1979. – p. 228

Margulis ST (2003a) Privacy as a social issue and a behavioral concept. J Soc Issues

59(2): 243–262

Margulis, S. T. 1977a. “Conceptions of Privacy: Current Status and Next Steps,”

Journal of Social Issues (33:3), pp. 5-21.

Maya Nguyen (2020) Vietnam’s War Against COVID-19,

<https://thediplomat.com/2020/10/vietnams-war-against-covid-19/> accessed 18

April 2021

Mike Cerre (2020), How Vietnam’s authoritarian government succeeded at containing

COVID-19, <https://www.pbs.org/newshour/show/how-vietnams-authoritarian-government-succeeded-at-containing-covid-19> access on 15

October, 2021

Ngoc Cong Duong K, Nguyen Le Bao T, Thi Lan Nguyen P, Vo Van T, Phung Lam

T, Pham Gia A, Anuratpanich L, Vo Van B: Psychological Impacts of

COVID-19 During the First Nationwide Lockdown in Vietnam: Web-Based,

Cross-Sectional Survey Study, JMIR Form Res 2020;4(12):e24776

URL: <https://formative.jmir.org/2020/12/e24776> DOI: 10.2196/24776

Oksanen A, Kaakinen M, Latikka R, et al. (2020) Regulation and Trust: 3-Month

Follow-up Study on COVID19 Mortality in 25 European Countries. JMIR Public Health and Surveillance 6 (2): e19218.

Oliver et al., Oliver, N., Lepri, B., Sterly, H., Lambiotte, R., Deletaille, S., De Nadai, M., ... others (2020). Mobile phone data for informing public health actions across the covid-19 pandemic life cycle. American Association for the Advancement of Science

Patrick E. Sharbaugh, Wisdom of the Crowd: Conceptions of Online Personal Privacy in the Socialist Republic of Vietnam, unpublished paper, [https://www.academia.edu/1827853/Wisdom\\_of\\_the\\_Crowd\\_Conceptions\\_of\\_Online\\_Personal\\_Privacy\\_in\\_the\\_Socialist\\_Republic\\_of\\_Vietnam?from=cover\\_page](https://www.academia.edu/1827853/Wisdom_of_the_Crowd_Conceptions_of_Online_Personal_Privacy_in_the_Socialist_Republic_of_Vietnam?from=cover_page) accessed on 9 October 2021

PHAN, T. N., HO, T. V., & LE-HOANG, P. V. (2020). Factors Affecting the Behavioral Intention and Behavior of Using E-Wallets of Youth in Vietnam. The Journal of Asian Finance, Economics, and Business, 7(10), 295-302.

Pragadish Kirubakaran (2020) From Propaganda Posters To War Rhetoric, How Vietnam Is Winning The War Against COVID-19, <https://www.republicworld.com/world-news/rest-of-the-world-news/from-propaganda-posters-to-war-rhetoric-how-vietnam-fights-coronavirus.html> accessed on 7 November 2021

Rachel Kleinfeld (2020), Do Authoritarian or Democratic Countries Handle



Pandemics Better? <https://carnegieendowment.org/2020/03/31/do-authoritarian-or-democratic-countries-handle-pandemics-better-pub-81404> access on 18 October, 2021

SD Pradhan (2021), Vietnam's successful handling of multiple waves of Coronavirus attack, the times of India <https://timesofindia.indiatimes.com/blogs/ChanakyaCode/vietnams-successful-handling-of-multiple-waves-of-coronavirus-attack/> accessed 16th April 2021

Sharbaugh, P. E. (2013). What is mine is yours: an exploratory study of online personal privacy in the socialist republic of Vietnam. In *CyberCulture Now: Social and Communication Behaviours on the Web* (pp. 69-85). Brill.

Smith, H. J., Dinev, T., & Xu, H. (2011). Information privacy research: an interdisciplinary review. *MIS quarterly*, 989-1015.

Sriratanaviriyakul, N., Nkhoma, M., Felipe, A. L., Cao, T. K., & Tran, Q. H. (2014). Vietnamese privacy concerns and security in using online social networks. *International Journal of Electronic Security and Digital Forensics*, 6(4), 306-318.

T.L. Huynh: The COVID-19 risk perception: a survey on socioeconomics and media attention, *Econ Bull*, 40 (1) (2020), pp. 758-764

Toshkov, D., Carroll, B., & Yesilkagit, K. (2021). Government capacity, societal trust or party preferences: what accounts for the variety of national policy responses to the COVID-19 pandemic in Europe?. *Journal of European Public Policy*, 1-20

Trần Thị Hồng Hạnh (2018), Vi phạm pháp luật về bảo vệ thông tin cá nhân ở Việt

Nam hiện nay - thực trạng, nguyên nhân và giải pháp (Violation of the law on the protection of personal information in Vietnam today – current situation, causes and solutions), <http://lyluanchinhtri.vn/home/index.php/thuc-tien/item/2763-vi-pham-phap-luat-ve-bao-ve-thong-tin-ca-nhan-o-viet-nam-hien-nay-thuc-trang-nguyen-nhan-va-giai-phap.html>

Triandis, H. C. (1989) “The self and social behavior in differing cultural contexts”, *Psychological Review*, 96(3): 506–520

Trung Sơn (2021) HCMC chairman to take on new position,

<https://e.vnexpress.net/news/news/hcmc-chairman-to-take-on-new-position-4344874.html> accessed on 5 November

V.P. La, T.H. Pham, M.T. Ho, N.M. Hoang, N.P.K. Linh, V.T. Trang, et al: Policy

response, social media, and science journalism for the sustainability of the public health system amid COVID-19 outbreak: the Vietnam lessons Sustainability, 12 (7) (2020), p. 2931

Van Nhu, H., Tuyet-Hanh, T.T., Van, N.T.A. et al. Knowledge, Attitudes, and

Practices of the Vietnamese as Key Factors in Controlling COVID-19. *J Community Health* 45, 1263–1269 (2020). <https://doi.org/10.1007/s10900-020-00919-4>

Westin, A. F. (1967). *Privacy and freedom*. New York: Atheneum, pp.10

Westin, A. F. (2003). Social and political dimensions of privacy. *Journal of social issues*, 59(2), 431-453

WHO Coronavirus (COVID-19) Dashboard, <https://covid19.who.int/> accessed on

March 29, 2021

WHO, COVID-19 in Viet Nam Situation Report 37, 14 April 2021

<https://www.who.int/vietnam/internal-publications-detail/covid-19-in-vietnam-situation-report-37>

World Health Organization (WHO) (2021). COVID-19 in Viet Nam Situation Report

66 <https://www.who.int/vietnam/internal-publications-detail/covid-19-in-vietnam-situation-report-40> accessed on 2 November

World Health Organization (WHO), COVID-19 in Viet Nam Situation Report 37, 14

April 2021 <https://www.who.int/vietnam/internal-publications-detail/covid-19-in-vietnam-situation-report-37>

World Health Organization. Virtual Press Conference on COVID-19 in the Western

Pacific: Remarks by Dr Takeshi Kasai. Available online: <https://www.who.int/westernpacific/news/speeches/detail/virtual-press-conference-on-covid-19-in-the-western-pacific> (accessed on 9 September 2020).

Zhang, C., Sun, J. et al. (2010) 'Privacy and security for online social networks:

challenges and opportunities', IEEE Network, Vol. 24, No. 4, pp.13–18

## VITA

**NAME** Do Gia Hung

**DATE OF BIRTH** 07 December 1994

**PLACE OF BIRTH** Quang Ninh, Vietnam

**INSTITUTIONS ATTENDED** - Southeast Asian Studies Program, Graduate School, Chulalongkorn University  
- Faculty of History, University of Social Sciences and Humanities, VNU Hanoi

**HOME ADDRESS** Room 314, Rangnam Apartment, Thanon Phaya Thai, Ratchathewi, Bangkok, Thailand

**PUBLICATION**

1. Do Thi Thu Ha, Do Gia Hung (2018), “Japan’s Science and Technology in the Period of 1973-1991”, Vietnam Review of Northeast Asian Studies, Number 8 (210) (August 2018), pp. 41-51
2. Nguyen Manh Dung, Do Gia Hung, “Korean Science and Technology at the beginning of the Twentieth Century (A view from the history of science and technology)”, International Conference Proceedings: Korean Studies: Vietnam – Korea Strategic Cooperative Partnership 2009-2019, University of Social Science and Humanities, Vietnam National University – HCM, VNU-HCM Published House, 2019. ISBN: 978-604-73-7396-3
3. Do Gia Hung, Le Ha My, “Nguyễn Công Trứ với thời đại - đôi điều suy ngẫm”, (Nguyen Cong Tru’s legacy for current generation – a deeper understanding), Panel 1, in book: Scientific conference: Nguyen Cong Tru with Vietnamese history and culture in the first half of the 19th century, People’s Committee of Ha Tinh province, University of

Social Sciences and Humanities - Vietnam National University, Hanoi, Vietnam National University Press, 2020.

4. Do Gia Hung, “Public Perception on Privacy and the Acceptance of Contact Tracing Application in Controlling the COVID-19 Outbreak in Vietnam-A Case Study of Quang Ninh Province”, Proceeding of the 13th Southeast Asian Studies Graduate Symposium “Weaving Diversities in Southeast Asia: Political, Social and Cultural Perspectives”, Chulalongkorn University, 09 July, 2021, Bangkok, Thailand

5. Nguyen Manh Dung, Do Gia Hung, Do Thi Thu Ha (2022), “Hydro hegemony in Mekong sub-region revisited”, in the book Dao Thanh Truong and Philip Degenhart (2022), Agricultural production and Vietnam, from the Social-Ecological transformation approach: Oppotunities, Challengers and Policy implications, Lao dong publisher, pp.274

#### AWARD RECEIVED

1. ASEAN and Non-ASEAN Scholarship for Graduate Student, Chulalongkorn University, 2019

2. Teaching Assistant Scholarship, Chulalongkorn University, 2021