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Conference Paper

Facebook's Algorithms, Fake News, and Taiwan's 2018 Local Elections

30th European Conference of the International Telecommunications Society (ITS): "Towards a Connected and Automated Society", Helsinki, Finland, 16th-19th June, 2019

Provided in Cooperation with:

International Telecommunications Society (ITS)

Suggested Citation: Chen, Yi-Ning Katherine; Wen, Chia-Ho Ryan (2019) : Facebook's Algorithms, Fake News, and Taiwan's 2018 Local Elections, 30th European Conference of the International Telecommunications Society (ITS): "Towards a Connected and Automated Society", Helsinki, Finland, 16th-19th June, 2019, International Telecommunications Society (ITS), Calgary

This Version is available at:

<https://hdl.handle.net/10419/205174>

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Facebook's Algorithms, Fake News, and Taiwan's 2018 Local Elections

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Paper to be presented at the 30th European Conference of the International
Telecommunications Society, Helsinki, Finland, June 16-19, 2019

Abstract

This explorative study examines how Facebook's News Feed, fear of missing out (FOMO), news literacy, experience of fake news, disappointment at local election results, trust in the News Feed, and perceptions of algorithms affect users' attitude toward Facebook as a political news source and fake news regulations. After collecting 1453 valid online feedbacks, we find that the experiences of forwarding and receiving fake news play different roles. The experience of forwarding fake news raises trust in the News Feed and perceived risks of algorithmic biases (untruthfulness), while the experience of receiving fake news undermines trust and increases risk perceptions of algorithmic biases (both untruthfulness and decontextualisation). In addition, trust and risk perceptions of algorithmic biases significantly predict subjects' support for fake news regulations and preferred methods of such regulations. Lastly, FOMO, habitual usage, and tablet usage are evident predictors of fake news experiences and disappointment at the election results.

Keywords: algorithm, disinformation, fake news, FOMO, Taiwan elections

Introduction

The political crisis ignited by Cambridge Analytica and Facebook in early 2018 officially affirmed users' personal data and information preferences were secretly used, without consent, for generating rumours and fake news in order to sway people's political positions in consequential elections such as the U.S. presidential election and the UK Brexit referendum in 2016. According to Cadwalladr and Graham-Harrison (2018), Christopher Wylie created a system to harvest Facebook personal profiles for customising political rumours and projecting them back into the information flow of Facebook so that they could precisely be pushed to the most susceptible audiences.

Fake news, particularly from overseas, likewise severely disturbed Taiwanese society and possibly aimed to erode its quality of democracy throughout 2018 as well, from the warning raised by Swedish research of fake news diffusion (The Varieties of Democracy Institute, 2019). According to Tung, Liu, and Hetherington (2018), an anonymous complaint was diffused via Facebook that Taiwan's diplomat in Osaka,

Chii-Cherng Su, refused to properly aid his fellow visitors from Taiwan when Typhoon Jebi fatally hit Japan in late August 2018, and hence typhoon-affected Taiwanese visitors in Osaka were forced to claim themselves as citizens of China so as to receive timely aid from China's embassy. Though the complaint was later debunked as wholly fake, Mr. Su was already found dead by suicide on September 14 in Osaka presumably due to overwhelming pressure in the wake of harsh public criticisms over the false charge of malfeasance (Hsu, 2018). It was contended that conspiracies and a calculated mobilisation were behind the disinformation against Taiwan's diplomats so as to damage Taiwanese people's trust in their government; the fake news "was first published by a number of Chinese outlets, including state-run Xinhua news agency and Shanghai-based news outlet Guancha Syndicate. Xinhua cited the Communist Youth League of China's WeChat account as the source," according to *Taipei Times* ("Fight", 2018, p.8).

A BBC report (Jakhar, 2018) stated that enormous amounts of disinformation are suspiciously flooding from China into Taiwan's Internet domain "aimed at creating divisions in the Taiwanese society, with the eventual objective of altering the political landscape ahead of national elections in 2020." The report further noted that China is "behind widespread disinformation, social media attacks, all kinds of fake news and then spreading that around through social media networks, from fake Facebook accounts to China-sponsored fake news," since Beijing is worried about Taiwanese people's rising senses of national identity and human rights (e.g. equal marriage) and was eager to meddle in Taiwan's municipal elections held in late November 2018 (Zhou & Xiao, 2018). All in all, it is certainly evident that Taiwanese society and politics are confronting acute fake news disturbances while riding the great wave of social media's widespread influence.

The election results in late-2018 delivered a few critical messages. Taking the six municipal cities for example, except for New Taipei, all five other big cities were governed by DPP or pro-DPP mayors in the run-up to voting. However, after the votes were counted, only Taoyuan and Tainan mayorships remained in the hands of the DPP, whereas Kaohsiung and Taichung, which are the main cities in central and southern Taiwan, were taken over by newly elected KMT mayors. Moreover, although Wen-Je Ko, a rising political star who is relatively DPP-friendly, won his second term as mayor of Taipei albeit by a scant margin of a few thousand votes, the divide between him and

the DPP actually widened throughout 2018, as both sides showed reserved attitudes towards possibilities of further cooperation. Overall, the regional election results favourable to the pro-China KMT struck a great blow to the Taiwanese government led by the DPP (“Five”, 2018).

While Ko’s incumbent triumph was seen as a victory by young voters in Taipei, Kuo-Yu Han’s success at becoming the new mayor of Kaohsiung was viewed as a victory of old electorates. The stark contrast quite likely stemmed from divided public opinions over regional controversies (e.g. pollution, energy policies, and economic performance) and generational asymmetry of information regarding progressive values such as equal marriage and formal initiation of sex education into elementary schools (Yeh, 2018; Su & Hetherington, 2018).

The process that encompasses fake news being designed, personalized, and disseminated to target recipients for political purposes has grown standardized and aligned with Facebook’s own algorithmic biases. Shao, Ciampaglia, Varol, Flammini, and Menczer (2017) investigated how fake news took advantage of Tweeter’s algorithms, suggesting that a massive propagation of disinformation merely employed a few social media accounts, most of which were actually bots (web robots or software applications). First, rumours were proactively designed at a very early stage, way ahead of when possible official clarifications were prepared. Second, bots were responsible for spreading them by interacting with influential users (e.g. Internet celebrities) to boost their exposure to their followers. Finally, to stay in the background, the bots hid concrete geographical information. Their report also concluded that fake news bots were vigorously used by those having extreme political positions.

While it has been proven that fake news goes viral via social media’s algorithms, the experiment of Eslami et al. (2015) indicated that over 60% users might be unaware of the algorithms being present and are reluctant to admit their effects. By having 40 subjects blindly experience an algorithm-based News Feed and an algorithmless one, they found no significant differences in their satisfaction with and perceptions of them both. Their findings revealed that, under either version of the News Feeds, subjects were particularly reactive to missed stories. Furthermore, despite their awareness of the algorithms being present, subjects still tended to impute missed stories to their friends neglecting them, instead of the algorithms. Consequently, Eslami et al. claimed that users’ perceptions of the algorithms and fear of being left out involved them even deeper

with Facebook.

Some researchers have raised different insights. Pennycook and Rand (2018) found that social media users simply shared stories, regardless of their ability to discern fake news. Their results demonstrated that those over-claiming their knowledge levels and capability of discerning fake news are prone to trust “pseudo-profound bullshit” and describe it as accurate. Looking into the impacts of fake news and social media on the 2016 U.S. presidential election, Allcott and Gentzkow (2017) noted that social media played a vital but not decisive role in communicating electoral news, and that the average American voters did not just believe any fake news; they were likely to “believe stories that favour their preferred candidate.” Hence, given this opportunity, we intend to characterise relationships between information consumption via the Facebook News Feed, perceptions of election results, algorithmic biases, and preferences for fake news regulations.

Literature review

Disinformation, social media usage, and motives

Online false information comes in many forms such as fake news, misinformation, and disinformation, depending on how information is organised and presented. Widely considered to be interchangeable, all three appear synonymous, but subtly differ in nature. Misinformation refers to unverified and erroneous information in general, encompassing fake news and disinformation (Karlova & Fisher, 2013); however, while fake news and disinformation also mean fabricated information, the former stresses the genres, outlets, and forms where the fabricated information is presented at mimicking formal news stories in order to trick readers into believing, with the “semblance of objectivity and balanced reporting;” and the latter, “disinformation,” connotes the purposeful fabrication of information and the deliberate diffusion (Tandoc, Lim, & Ling, 2018, p.143; Chen et al., 2015). Thus, fake news and disinformation are nearly interchangeable when it comes to conveying the attempt at making up and disseminating stories, whereas misinformation would be less accurate.

Owing to the widespread influence of social media, information not only travels farther and faster, but also circulates longer (Ferrara, 2015; Mintz, 2012). It is believed that social media play a consequential role in the formation and propagation of disinformation, because they rely on users’ collective and collaborative activities of

information including creating, seeking, sharing, commenting, and debating, and social media happen to provide a highly effective arena to these collective and collaborative activities (Shah, 2012).

Users' flippant attitudes towards information quality and verification might contribute to disinformation. According to Kim et al. (2014), 60% of the participants they surveyed paid no attention to whether sources were provided adequately in the messages sent to them via social media. Furthermore, even if some did, they did not properly assess information reliability. For example, participants indicated they judged information credibility by the website's layout, or they confirmed the information largely through Wikipedia.

What encourages individuals to share disinformation is still inconclusive. It is anything but a new phenomenon that news consumers share disinformation; rumours also were propagated during the dominant era of conventional media such as TV news and printed newspapers, way before the emergence of social media. In other words, social media are hardly the reason for rumours being massively created and disseminated; they simply reinforce the efficiency of disinformation delivered to individuals and its persuasion, because they are able to convey more intricate and abundant information than that of conventional media (Ratkiewicz et al., 2010; Budak, Agrawal, & Abbadi, 2011).

To understand the propagation of online disinformation, Chen et al. (2015) proposed that it is of great essence to explore what social media characteristics encourage users to share fake news, and how social media are used to affect the contagiousness of disinformation (Bertot, Jaeger, & Grimes, 2010). As objective and indisputable criteria to identify fake news are not yet fully developed, social media users often share fake news without realising it is false beforehand. Hence, it is technically difficult to find out the clear and certain motives of users to share fake news. On the other hand, it is also maintained that since, at the moment of sharing fake news, social media users are quite possibly unaware of its nature, their motives to use social media for sharing fake news might hardly deviate from their motives to share funny photos, interesting articles, and useful links with their contacts.

Mintz (2012) stated that social media users share false information they misconstrue as reliable, because they have trouble evaluating the authority of the source. For example, people are prone to overestimate the reliability of information told by

friends and believe it to be so credible and important that their other online friends need to be informed of it, while downgrading information from unfamiliar sources. On top of that, it is also probably because the false information they come across by chance reconciles with and abets their strong beliefs, and they therefore have difficulty objectively discerning its reliability. Additionally, according to one study on rumour sharing (Chen et al., 2015) with 171 valid feedbacks, the top three reasons for why the subjects shared information that they already knew was suspicious or unproven are: 1) sensational gossips or rumours are very ideal topics for ice breaking conversations; 2) they are interesting topics to talk about; and 3) they are eye-catching enough to draw social attention. By and large, the behaviour of sharing suspicious or false information online is highly social, intensified by the purposes and usage of social media (e.g. activating latent relationships, becoming the focus in a social occasion, and enriching information exchanges in the network).

Habitual social media usage and online deception

Habitual social media usage is defined as “the automaticity in consumption and use of the social media platform that develops as individuals repeatedly and routinely access, interact, and utilize Facebook because of the gratifications received from such action” (Vishwanath, 2014, p.85). It manifests in the form of repeated social media consumption on a long-term and stable basis without conscious contemplation. Existing research approaches social media usage through “usage frequency,” “motives,” and “automaticity”, which are regarded as the necessary foundation for habitual usage to occur (LaRose, 2010).

Whether habitual social media users are more likely to fall victim to online deception is not adequately discussed, because so far a great deal of scholarly attention has been paid to user habits instead of possible obnoxious consequences to which they could lead (Chittaro & Vianello, 2013; Chen & Kim, 2013). Present studies point out that habitual Facebook users are vulnerable to certain types of online deception such as phishing and social media scams. The former is usually done by imposters approaching targeted individuals and cheating them out of their belongings or into sexual services. The latter is often committed by online friends stealing passcodes or valuable information like credit card details from targets via everyday chats and interaction. LaRose (2010) explains one reason why habitual social media users fall victim to online

deception so easily is that once user behaviour is fixed and habitual, it is tightly associated with being predictable and patterned, and it involves little conscious reflection, no matter when the behaviour takes place.

Among the limited studies that focus on habitual social media usage and its association with victimisation and deception, very small numbers of them include fake news into discussions of online deception, which is also designed to fool and trick social media users into taking certain actions aligned with schemers' benefits. To fill this gap, our study casts light on whether habitual social media usage leads to experiences of forwarding and receiving fake news as well as disappointment at the elections results in the setting of Taiwan's local elections at end-2018.

Fear of missing out (FOMO)

As the potential reasons for users to share disinformation, accidentally and intentionally, are largely social, FOMO appears to be a pretty useful predictor of experience with fake news and is defined as anxiety over being socially peripheral, absent, disconnected, or short of experiences with other people, especially peers, friends, and family (Przybylski, Murayama, DeHaan, & Gladwell, 2013). According to Beyens, Frison, and Eggermont (2016), far from morbidity, FOMO is an intrinsic mental need to feel accepted in society and to develop benign relationships and interactions. It often concurs with certain social behaviours such as constantly following and seeking others' activities with a desire to be involved.

With an eye to increasing the opportunities for fitting in, the intense feeling of insufficiency tends to bring about intemperance and overtly low spirits. Dykman (2012) pointed out that 83% of subjects believed their lives have gone into so-called overdrive. They have changed their purchasing habits and started overbuying more expensive products on account of apprehension over social exclusion and losing updates on the latest online commercial information. After absorbing more product information online, they also kept buying more, but barely felt better and more socially secure, thus continuing the vicious circle. Similarly, Alt (2015) demonstrated that subjects with high FOMO scores overuse smartphones in order to always feel connected, giving rise to problematic Internet usage, excessive impetuosity, and reassurance seeking. Failing to contain excessive behaviour frequently augments negative emotions and moods such as social media fatigue, disappointment at unexpected information, obsessiveness, and

disappointment, because FOMO “undermines the sense that one has made the best decisions in life” (p.1842); such reinforced noxious emotional feelings might further compel excessive behaviour. Taking into account the aforementioned literature, our first question is raised as follows.

RQ1: Do user motives, FOMO, use time of the Facebook News Feed, habitual usage of the Facebook News Feed, self-estimated news literacy, and device usage contribute to fake news experiences?

Political information and fake news

People’s principal political information sources vary with time. In the 19th century newspapers first developed prominent partisanship and began defending particular parties and policies, and this was seen as a sign that power was concentrated in the hands of the few; then radio and TV replaced newspapers in the 20th century and recreationalised political debates, signifying that media companies had magnified their power over public opinions. Since 2000, online news and digital media have grown into the main public channel of political information, vitalised by a great diversity of public political views and discussions (Pariser, 2011; Lang & Lang, 2002).

Allcott and Gentzkow (2017) offered why social media and their users are especially more subject to political fake news and its propagation than other old-time media. First, social media drastically diminishes the fixed expenses of exploring and entering a market to produce and promote content. Particularly for anyone with a desire to be a political influencer, it is imperative to run a reputation on a long-term basis and cultivate a niche of audience/potential supporters, and social media provide a stage for them to create eye-catching, or even sensational, political content. On top of that, in order to fit in with social-media-wise devices and windows, the information uploaded tends to be so sliced and fragmented such that it becomes highly unfeasible for viewers to tell and authenticate its veracity upon first sight. In addition, social circles are quite ideologically segmented that they turn into individual online “echo chambers” or so-called “filter bubbles.” Platforms like Facebook even encourage users to publicise their political preferences or ideological positions in their profiles so as to reinforce online circles of like-minded users, implying that users are more unlikely to see evidence against content they have falsely believed.

Horne and Adali (2017) analysed the election dataset of BuzzFeed, which had

collected online news over the nine months before the 2016 U.S. presidential election. By authenticating the veracity of the collected news stories with major political fact-checking sites like Snopes.com, they were categorised into three types: real, fake, and satirical (a synthesis with some parts real and some made up). Through performing lexical and grammatical analyses with natural language processing to deconstruct the syntax, rhetoric styles, titles, texts, and grammatical components, they argued that political fake and real news were in essence different. For instance, compared with real news titles, fake news titles were much longer, using simpler vocabulary, more pronouns/past tense/phrasal verbs, and fewer stopwords and technical terms and nouns. Furthermore, fake news titles were significantly more likely to be capitalised, possibly for the sake of inflaming and dramatising readers' emotions. When it comes to content, fake news was much shorter than real news, using fewer analytical words, punctuation, and quotes, but employing far more pronouns, adverbs, redundancies, and self-referential such as we, us, and you. The features lowered down the educational requirements to read fake news.

It is thus concluded that “real news persuades through arguments, while fake news persuades through heuristics. Fake news places a high amount substance and claims into their titles and places much less logic, technicality, and sound arguments in the body text of the article. The body of fake news articles add relatively little new information, but serves to repeat and enhance the claims made in the title. The fake content is more negative in general” (Horne & Adali, 2017, p.765). Fake news appeals to an audience by using simple heuristics to evaluate information reliability, whereas real news builds persuasion through its content where substantial arguments, evidence, and logic are mainly presented, with titles as succinct as possible (Wang, Ramachandran, & Chaintreau, 2016).

The 2016 U.S. presidential election news study by Groshek and Koc-Michalska (2017) explored voters' social media usage, in which they used social media as the major source of political information, pointing out that their usage could be categorised as active participation and passive participation. The former includes co-production and two-way communication and interaction, whereas the latter encompasses receiving, reading, and consuming. While active usage is positively related to expression of social identity, passive usage is inversely associated with knowledge. Social media activities also have no significant influence on voters' recall of candidates, but rather their vote

choices. Finally, devices where users have engaged in social media to consume political information matter to users' attitudes. Findings reveal that users turn uncivil and unconcerned about common social manners and are reluctant to be approached by political information in discordance with their opinions when absorbing political news on social media via mobile devices. Grounded on the aforementioned literature, our second research question is proposed below.

RQ2: Do user motives, FOMO, use time of the Facebook News Feed, habitual usage of the Facebook News Feed, self-estimated news literacy, device usage, and fake news experience relate to voters' disappointment at election outcomes?

Algorithms and filter bubbles

Research indicates that online fake news circulates farther and more efficiently due to the almost impervious individual filter bubbles created by social media's algorithms; algorithmic risks incited by online filter bubbles lie in confinement to users' information diversity (Figueira & Oliveira, 2017). Social media algorithms shackle information diversity in three dimensions. "The first dimension is source diversity, which is diversity in terms of outlets (cables and channel owners) or program producers (content owners). Content diversity consists of diversity in format (program-type), demographic (in terms of racial, ethnic, and gender), and idea-viewpoint (of social, political and cultural perspectives). The third dimension, exposure diversity, deals with audience reach and whether users have actually consumed a diverse set of items" (Bozdag, Gao, Houben, & Warnier, 2014, p.407).

It has constantly been believed that content and exposure diversity can be secured by elevating source diversity. Therefore, American and European societies have been endeavouring to guarantee better source diversity by ensuring adequate competitions in the markets through the establishment of antitrust regulations. Nevertheless, despite the tremendous endeavours and enormous market competition, no compelling evidence has yet been found that a highly diverse supply of media content can counteract media monopolies and low content diversity (Karppinen, 2013; van Cuilenburg, 2002).

It is advocated that algorithms should be viewed as gatekeepers of journalism and no longer facilitators. Social media algorithms contribute to news personalisation and fragmentation. "Though users can seek out such sources on their own, algorithms may

contribute to such polarization by directing users, in their searches and via their social media feeds, to certain news sources over others—presumably leading people to those sources that more closely align with their personal interests as registered in previous online activity” (Nechushtai & Lewis, 2019, p.300).

It is indeed inconclusive about whether the algorithmic risks of news personalisation and fragmentation are overblown, because there are studies noting while online news is frequently accused of exposing readers to biased and polarised information, especially political ones, print news also has robust motives to feed polarised news to readers and attracts niche audiences as homogeneous as online news does (Bruns, 2018; Fletcher & Nielsen, 2017; Zuiderveen Borgesius et al., 2016). Moreover, there is salient evidence seen that social media users choose to stay in filter bubbles, neither forced nor lured by algorithms (Stroud, 2011). At the same time, researchers have raised concern over social media algorithms as news gatekeepers that “on the one hand, they represent unprecedented consolidation in news distribution, as an oligo- poly of technology companies—Facebook and Google especially—controls the vast majority of news sharing and digital advertising, and on the other hand, they represent an unprecedented splintering of news distribution across a seemingly limitless number of devices, feeds, apps, and social contexts” (Nechushtai & Lewis, 2019, p.300). To sum up, considering the divergent voices over the controversial role of news-recommending algorithms, we present the following research questions in order to fill the gap in the literature.

RQ3: How are fake news experience and disappointment at election results associated with the perceived risks of Facebook algorithmic biases?

RQ4: How are the perceived algorithmic risks, fake news experience, and disappointment at election results associated with perceived trust of the Facebook News Feed?

Fake news regulations

Institutes across the globe are seeking optimal ways to deal with online fake news and its impacts on democracy. Figueira and Oliveira (2017) discussed feasible methods in the near future, including human intervention (manual verification, fact-checking sites, and collaborative reports of false articles), algorithmic detection (using artificial

intelligence (AI) and machines to decide what is correct and fabricated as well as who is spreading them), and fake news task teams organised by social media companies. However, the methods all point out the core challenge that freedom of speech and privacy would be massively jeopardised if the responsibility and power to cope with online fake news are largely trusted to machines and corporates.

What are then the government's and audience's roles in this circumstance? The answer is in dispute. The Malaysian parliament is enacting a new law to crack down on fake news diffusion; "the penalty for those disseminating fake news is a maximum fine of 500,000 ringgit (approximately £90,000) and up to six years in jail" (Priday, 2018). The India government was about to enforce a rigorous law of suspending the accreditation of journalists propagating fake news, but soon froze it owing to the protests of media and human rights. Germany passed a hate speech law to arrest people conducting online dissemination of information against any specific social group. Although not tailor-made for fighting disinformation, it is believed that online disinformation would still be curtailed since its common purpose is to inflame social divisions. The UK government has been evaluating whether to establish a fake news unit merely dedicated to arresting people passing online disinformation with intentions to interfere with elections on the condition that freedom of speech is intact or minimally compromised. Across the pond, the U.S. government and its society are forever dragged into the debate over constitutional issues in this regard, with the 1st Amendment refraining any institutional power by design from infringing on people's freedom of speech and privacy, and hence the government currently leans towards relying on social media's own self-discipline as avoids any governmental intervention. By and large, explorations of the most suitable regulation or method of tackling online fake news are still underway around the world, and for the time being there is no ideal way. Therefore, we aim to understand Taiwanese people's preferred regulations and intention to keep using Facebook as a chief political information source. Consequently, the remaining research questions are raised as follows.

RQ5: Do the perceived risks of algorithmic biases and perceived trust affect the intention to keep using the News Feed as a main source of political and electoral information?

RQ6: Do the perceived risks of algorithmic biases and perceived trust affect fake news regulation preference?

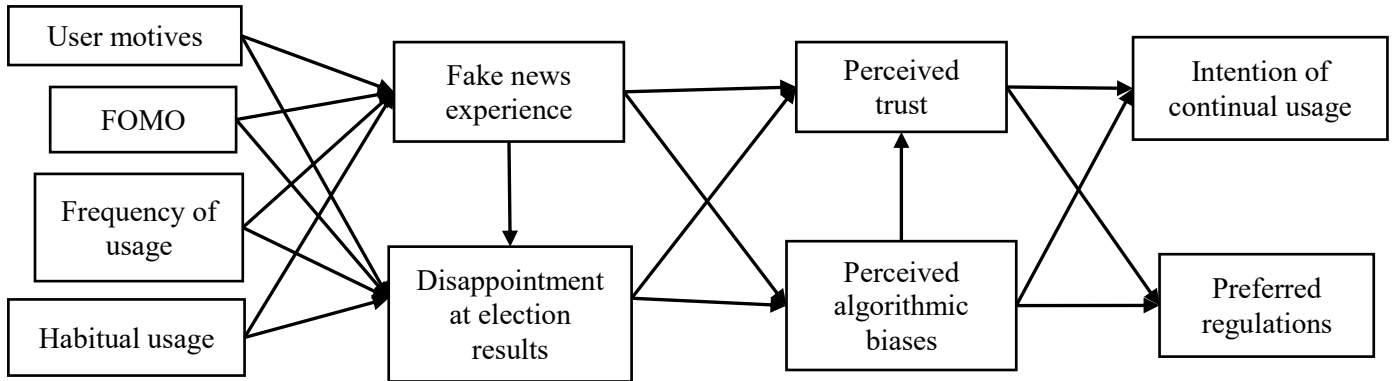


Figure 1. Research model

Method

Sample

Our sample of 1453 participants is made up of 825 males (56.78%), 622 females (42.81%), and 6 who identified a “other.” The average age is 30 (sd=7.89), and the median age is 28. Among the 1453, 933 had received or were undergoing undergraduate education (64.21%), and 418 had received or were undergoing postgraduate education (28.77%). Of all participants, 1108 are unmarried (76.26%), 261 are married (17.96%), and 67 live with their partners (4.61%). Of the entire sample, 848 work full time (58.36%), 372 are students (25.60%), 109 are unemployed job seekers (7.5%), and 73 work part time (5.02%). In terms of monthly family income, the average income is around NT\$70001-80000 (sd=5.41), and the median is NT\$50001-60000. Politically, 417 of the subjects (28.7%) prefer the “White Force” (Wen-Je Ko, current Mayor of Taipei); 372 consider themselves neutral (25.6%); 249 identify with the New Power Party (17.14%); 205 support the DPP ruling party (14.11%); 86 favour the principal opposing party, KMT (5.92%); 68 lean towards the Taiwan Radical Wings (4.68%); and 44 follow the Social Democratic Party (3.03%). When it comes to permanent residences of the participants, the percentages for the six municipal cities of Taiwan are as follows: 26.36% (Kaohsiung), 14.66% (Tainan), 11.98% (New Taipei), 11.70% (Taipei), 10.81% (Taichung), and 5.51% (Taoyuan). The remaining 18.98% cover the 16 non-municipal

regions of Taiwan. Apart from 250 (17.21%) being uncertain, up to 833 subjects (57.33%) denied that their voting preferences in Taiwan's 2018 local elections were influenced by fake news, while 370 subjects (25.46%) admitted that fake news impacted theirs.

Procedure and Measures

Looking into the impacts that the Facebook News Feed and online disinformation caused on Taiwan's 2018 local elections, our survey was officially circulated via Facebook, LINE, Dcard (likely one of Taiwan's largest local Internet forum) by the judgemental sampling method on December 21, 2018. Up until January 18, 2019 when all online access to the survey was officially cut off, for nearly one month this study received a total of 2439 feedback samples. With a completion rate of 60%, eventually 1453 valid feedbacks were utilised after unqualified and unfinished ones were excluded. Items employed in the survey are appended to this paper.

User motives. Thirteen items from Considine and Cormican (2016), based on the Technology Acceptance Model (TAM), were utilised to assess laypeople's accommodation to and acceptance of technology and were adapted to investigate subjects' gratification with the Facebook News Feed's customisation (three items), enjoyment (three items), ease of use (four items), and usefulness (three items), under a 5-point Likert scale from "highly disagree" to "highly agree." Items for each factor were averaged to get *perceived customisation* ($\alpha = .75$, mean=3.39, sd=.71), *enjoyment* ($\alpha = .82$, mean=2.90, sd=.72), *ease of use* ($\alpha = .84$, mean=3.74, sd=.70), and *usefulness* ($\alpha = .81$, mean=2.87, sd=.72); a higher value stands for higher gratification.

Habitual Facebook News Feed usage. Four items were adopted from Facebook habitual use research (Wohn & LaRose, 2014) to analyse users' adherence to the News Feed, i.e. "Browsing the News Feed has become my everyday routine" and "Not browsing the News Feed for a short while, I feel insulated," with a 5-point Likert scale from "highly disagree" to "highly agree." Items were averaged to get *habitual usage* ($\alpha = .90$, mean=3.12, sd=1), and a higher value means higher clinginess to the News Feed.

Fear of missing out. Ten items were borrowed from the FOMO study of Przybylski et al. (2013) to see if peer pressure arising from social media users comparing themselves with their contacts in order to assimilate or stay in sync pushed them to keep

using the News Feed, with a 5-point Likert scale from “highly disagree” to “highly agree.” Items were averaged to get *anxiety* ($\alpha = .93$, mean=2.34, sd=.93) and *peer recognition* ($\alpha = .78$, mean=3.05, sd=.78); a higher value stands for greater anxiety over being left out in social life or greater fear of not earning peer recognition.

Fake news experience. Four items were employed to understand Facebook users’ experience of sharing and being shared with fake news (e.g. “Up until the local mayor elections in late November 2018 you had shared a story via Facebook with your friends that turned out to be fake news), with a 5-point Likert scale from “highly disagree” to “highly agree.” Items were averaged to get *sharing fake news* ($\alpha = .63$, mean=2.05, sd=.97) and *being shared with fake news* ($\alpha = .85$, mean=3.44, sd=1.27); a higher value stands for more experience of sharing or receiving fake news (from friends).

Intention of future use. Three items were adapted from the e-commerce repurchase intention research of Kim et al. (2009) to fathom users’ intention to keep using the News Feed as their main source of political and electoral information, with a 5-point Likert scale from “highly disagree” to “highly agree.” Items were averaged to get *intention of future use* ($\alpha = .96$, mean=2.70, sd=1.04), and a higher value means higher inclination to keep using the News Feed as a main source of political and election information.

Perceived risks of algorithmic biases. To characterise risks of algorithmic biases, six items were developed for participants to answer if they perceived the News Feed was further circumscribing their chance to see reliable and contextually thorough information, with a 5-point Likert scale from “highly disagree” to “highly agree.” Items were averaged to get *decontextualisation* ($\alpha = .78$, mean=3.83, sd=.79) and *untruthfulness* ($\alpha = .83$, mean=3.51, sd=.84); a higher value stands for stronger perceptions of algorithmic biases pushing decontextualised or untruthful news.

Trust. Ten items were borrowed from Nicolaou and McKnight’s information quality research (2006) to assess users’ trust in the content-recommending mechanisms the News Feed depends on, with a 5-point Likert scale from “highly disagree” to “highly agree.” Items were averaged to get *user interest prioritisation* ($\alpha = .73$, mean=2.71, sd=.73) and *competence* ($\alpha = .92$, mean=2.59, sd=.83); a higher value stands for more robust faith in the News Feed’s commitment to putting users’ interest above its own or in the News Feed’s capability of recommending information.

Five items were provided to participants to answer if they supported the idea of

regulating fake news, and in their eyes who should regulate fake news, the government through its administrative power, the court, social media through self-discipline, or a third party (e.g. NGOs, experts, and academic institutes), with a 5-point Likert scale from “highly disagree” to “highly agree.”

Results

Subjects’ Facebook usage shows certain prominent characteristics. In terms of use time, on average subjects spend 76 to 90 minutes browsing the News Feed every day (median = 46 to 60 minutes, $sd=6.26$), and with sleep time deducted they check the News Feed every 180 minutes (median=120 minutes, $sd=6.20$) on a daily basis. Speaking of preferred devices to access the News Feed, smartphones are most favoured (mean=4.19, $sd=.94$, median=4), followed by PCs/notebooks (mean=3.16, $sd=1.03$, median=3), while tablets are least preferred (mean=1.54, $sd=.87$, median=1).

Table 1 demonstrates subjects’ feedbacks over regulation preferences and self-reported fake news experience. Over 60% deny they forwarded fake news to Facebook friends before the elections, whereas below 10% admitted they did. By contrast, only about 20% deny they received fake news from Facebook friends, while nearly 60% agreed they did. When it comes to regulation preferences, the idea to regulate and impose sanctions against online fake news is embraced by nearly 85%, whereas merely 6% oppose the idea. Among the four options provided, the proposition that the court should intervene and apply penalties is most supported (mean=4.08, $sd=1.07$). The second most favoured regulation is intervention and investigation by a 3rd party (mean=3.95, $sd=1.05$). Tackling fake news issues through social media’s self-discipline is least supported (mean=3.66, $sd=1.25$).

Table 1. Descriptive statistics of subjects' regulation preferences and experience

	Highly Disagree (%)	Disagree (%)	Neutral (%)	Agree (%)	Highly Agree (%)	Mean	Sd	Median
Inclination for regulations	2.62	3.51	8.81	29.66	55.40	4.32	0.96	5.00
Gov	6.95	9.43	20.99	25.67	36.96	3.76	1.24	4.00
Court	3.79	5.02	15.76	30.56	44.87	4.08	1.07	4.00
Self-discipline	7.36	13.01	17.41	30.97	31.25	3.66	1.25	4.00
3 rd party	3.17	6.81	18.72	34.34	36.96	3.95	1.05	4.00
Forwarding exp	31.70	30.20	28.30	7.20	2.50	2.05	0.97	2.00
Receiving exp	10.70	10.90	18.70	33.00	26.50	3.44	1.27	4.00

Exploratory factor analysis was conducted to inspect content validity. Q25, Q26, Q28, and Q55-57 were removed due to cross-loading. In the end, we name 14 extracted factors confirmed by the reliability test as follows: (1) customisation, (2) enjoyment, (3) ease of use, (4) usefulness, (5) habitual use of the Facebook News Feed, (6) anxiety, (7) peer recognition, (8) sharing Facebook fake news, (9) being shared with Facebook fake news, (10) intention of future use (of the Facebook News Feed as the main source of political or electoral news), (11) decontextualisation, (12) untruthfulness, (13) user interests' prioritisation, and (14) competence (Table 2).

Table 2. EFA and reliability test outcomes

Factors	Items	EFA							Cronbach's α
		(1)	(2)	(3)	(4)	(5)	(6)	(7)	
Customisation	6	.83							
KMO=.70	7	.82							.75
	8	.80							
Enjoyment	9		.83						
KMO=.71	10		.88						.82
	11		.86						
Ease of use	12			.70					
KMO=.80	13			.56					.84
	14			.73					
	15			.72					
Usefulness	16				.87				
KMO =.71	17				.86				.81
	18				.83				
Habitual usage	19					.84			
KMO =.83	20					.85			.90
	21					.91			
	22					.90			
Anxiety	23						.94		
KMO=.75	24						.94		.93
Peer recognition	27							.70	
KMO =.75	29							.74	
	30							.65	.78
	31							.74	
	32							.72	

Table 2. EFA and reliability test outcomes (cont'd.)

Factors	Items	EFA							Cronbach's α
		(8)	(9)	(10)	(11)	(12)	(13)	(14)	
Sharing FB fake news	33	.91							.63
KMO = .60	34	.79							
Being shared with FB fake news	35		.91						.85
KMO = .60	36		.92						
Intention of future usage	40			.95					.96
KMO = .78	41			.97					
	42			.96					
Decontextualisation	43				.82				.78
KMO = .70	44				.83				
	45				.85				
Untruthfulness	46					.84			.83
KMO = .72	47					.87			
	48					.88			
User interests' prioritisation	51						.76		.73
KMO=.83	52						.57		
	53						.82		
	54						.68		
Competence	58							.84	.92
KMO=.83	59							.92	
	60							.91	

RQ1: Do user motives, FOME, use time of the Facebook News Feed, habitual usage of the Facebook News Feed, self-estimated news literacy, and device usage contribute to fake news experiences?

According to our multiple regression analysis (Table 3 & Figure 2), FOMO, both anxiety ($\beta = .121, p = .000$) and peer recognition ($\beta = .097, p = .001$), as well as the use of tablets ($\beta = .106, p = .000$) are positively related to the experience of sharing fake news, whereas self-estimated news literacy ($\beta = -.240, p = .000$) is inversely related. None of the user motives, habitual use and use time of the Facebook News Feed, and the uses of phones and computers have significantly anything to do with the fake news sharing experience.

Peer recognition (FOMO) ($\beta = .105, p = .001$), self-estimated news literacy ($\beta = .063, p = .015$), habitual use of the Facebook News Feed ($\beta = .148, p = .000$), and ease of use (motive) ($\beta = .083, p = .005$) have a direct bearing while usefulness ($\beta = -.133, p = .000$) has a negative bearing on the experience of being shared with fake news by online friends. Device usage is irrelevant.

RQ2: Do user motives, FOMO, use time of the Facebook News Feed, habitual usage of the Facebook News Feed, self-estimated news literacy, device usage, and fake news experience relate to voters' disappointment at election outcomes?

Habitual usage of the Facebook News Feed ($\beta = .087, p = .014$), the use of tablets ($\beta = .064, p = .013$), and experience of being shared with fake news ($\beta = .185, p = .000$) are positively associated, while enjoyment ($\beta = -.071, p = .045$) and self-estimated news literacy ($\beta = -.058, p = .033$) are inversely associated with post-election disappointment. FOMO has no bearing on the disappointment (Table 3 & Figure 2).

RQ3: How are fake news experience and disappointment at the election results associated with the perceived risks of algorithmic biases?

Being shared with fake news ($\beta = .333, p = .000$) and post-election disappointment ($\beta = .073, p = .004$) are directly related to the perceived algorithmic risks of decontextualisation, while experience of sharing ($\beta = .088, p = .001$) and being shared with fake news ($\beta = .270, p = .000$), as well as post-election disappointment ($\beta = .087, p = .001$) all have a positive bearing on the perceived algorithmic risks of untruthfulness (Table 4 & Figure 3).

RQ4: How are the perceived algorithmic risks, fake news experience, and disappointment at election results associated with perceived trust of the News Feed?

The experience of sharing fake news relates directly ($\beta = .178, p = .000$) whereas experience of being shared with fake news ($\beta = -.069, p = .020$) relates inversely to the perceived trust of user interests' prioritisation. The perceived risks of algorithmic biases and post-election disappointment are extraneous to perceived trust (Table 4 & Figure 3).

Post-election disappointment ($\beta = -.079, p = .003$) and the perceived algorithmic risks of untruthfulness ($\beta = -.108, p = .007$) are negatively associated with the perceived trust of competence, while experience of sharing fake news is directly related ($\beta = .165, p = .000$) (Table 4 & Figure 3).

RQ5: Do perceived risks of algorithmic biases and perceived trust affect the intention to keep using the News Feed as a main source of political and electoral information?

Perceived trust of user interests' prioritisation ($\beta = .192, p = .000$) and perceived trust of competence ($\beta = .113, p = .000$) have a positive bearing, whereas the perceived algorithmic risks of untruthfulness ($\beta = -.250, p = .000$) have an inverse bearing on the intention of continuing to use the Facebook News Feed (Table 5 & Figure 4).

RQ6: Do perceived risks of algorithmic biases and perceived trust affect fake news regulation preference?

The perceived trust of user interests' prioritization relates directly to the inclination for fake news regulations ($\beta = .066, p = .027$) and, at the same time, preferred regulators as follows: the government ($\beta = .109, p = .000$), the court ($\beta = .086, p = .004$), and self-discipline of social media ($\beta = .119, p = .000$), while the perceived trust of competence merely has an inverse bearing on the inclination for fake news regulations ($\beta = -.060, p = .045$) and nothing to do with regulator preferences (Table 5 & Figure 4).

The perceived algorithmic risks of decontextualisation are positively associated with the inclination for regulations ($\beta = .131, p = .001$) and regulator preferences for the court ($\beta = .117, p = .003$) and a third party ($\beta = .148, p = .000$); the perceived algorithmic risks of untruthfulness relate directly to the inclination for regulations ($\beta = .161, p = .000$) and regulator preferences for the government ($\beta = .240, p = .000$) and the court ($\beta = .148, p = .000$) (Table 5 & Figure 4).

Table 3. Multiple regression outcomes

	Sharing		Being shared		Disappointment at election results	
	Beta	p value	Beta	p value	Beta	p value
Customisation	.012	.700	.051	.101	.015	.631
Enjoyment	.039	.245	-.062	.075	-.071*	.045
Ease of use	-.031	.282	.083**	.005	-.005	.871
Usefulness	-.036	.313	-.133***	.000	.004	.920
Anxiety	.121***	.000	-.010	.737	-.004	.889
Peer recognition	.097**	.001	.105**	.001	.002	.939
Self-estimated news literacy	-.240***	.000	.063*	.015	-.058*	.033
Use time of FBNF	.039	.154	.039	.173	.046	.108
Habitual use of FBNF	.054	.106	.148***	.000	.087*	.014
Phones	.027	.320	.042	.144	-.002	.957
Computers	-.030	.261	.018	.502	-.034	.213
Tablets	.106***	.000	.027	.293	.064*	.013
Sharing					-.028	.337
Being shared					.185***	.000
Adjusted R ²	.131		.067		.049	
R ² change	.139		.075		.058	

Note: * $p < .05$, ** $p < .01$, *** $p < .001$

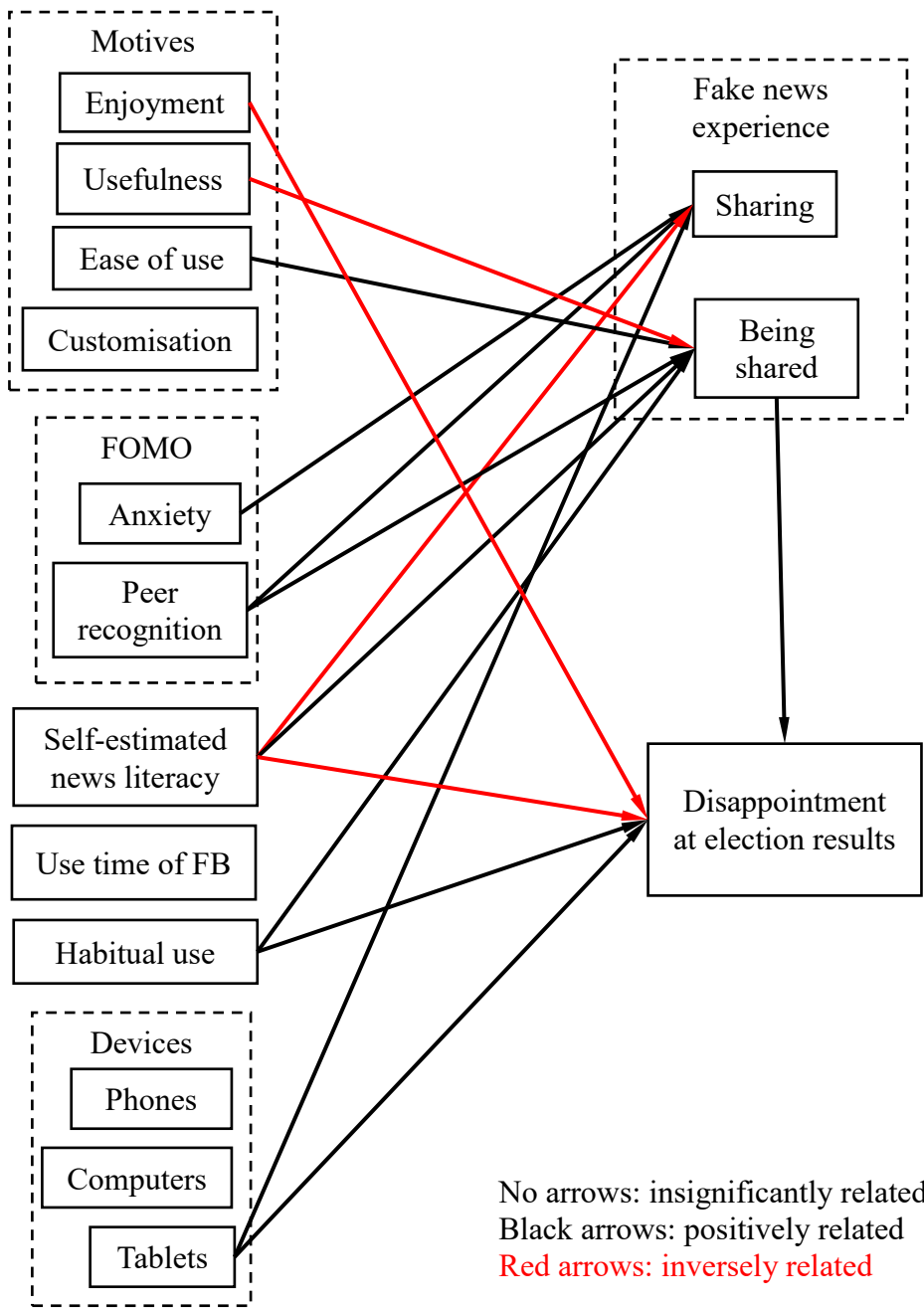


Figure 2. Relationships among motives, FOMO, news literacy, Facebook usage, devices, fake news experience, and disappointment at election results.

Table 4. Multiple regression outcomes

	Decontextualisation		Untruthfulness		User interests prioritisation		Competence	
	Beta	p value	Beta	p value	Beta	p value	Beta	p value
Sharing	.030	.248	.088**	.001	.178***	.000	.165***	.000
Being shared	.333***	.000	.270***	.000	-.069*	.020	-.057	.050
Disappointment at the election results	.073**	.004	.087**	.001	-.005	.848	-.079**	.003
Decontextualisation					-.076	.059	-.068	.090
Untruthfulness					-.055	.166	-.108**	.007
Adjusted R ²	.132		.113		.038		.055	
R ² change	.134		.115		.042		.058	

Note: * $p < .05$, ** $p < .01$, *** $p < .001$

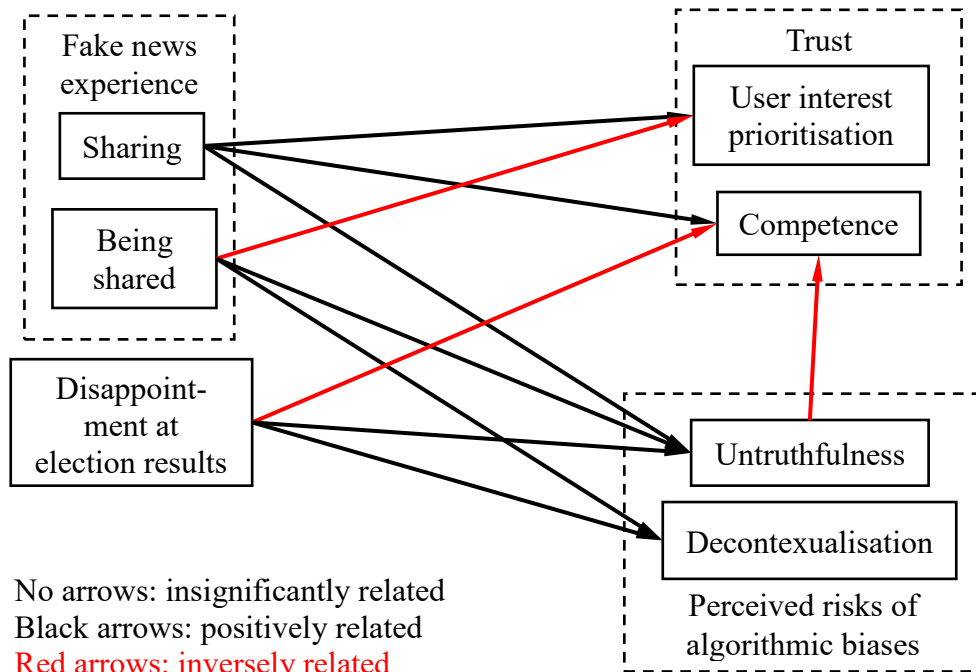


Figure 3. Relationships among fake news experience, disappointment at election results, trust, and perceived algorithmic risks.

Table 5. Multiple regression outcomes

	Intention of future use of FBNF		Inclination for regulations		Gov		Court		Self-discipline		3 rd party	
	Beta	p	Beta	p	Beta	p	Beta	p	Beta	p	Beta	p
User interests prioritisation	.192***	.000	.066*	.027	.109***	.000	.086**	.004	.119***	.000	.036	.245
Competence	.113***	.000	-.060*	.045	-.016	.590	-.040	.185	.035	.254	-.012	.694
Decontextualisation	.059	.118	.131**	.001	.048	.220	.117**	.003	.037	.360	.148***	.000
Untruthfulness	-.250***	.000	.161***	.000	.240***	.000	.148***	.000	.061	.128	.047	.235
Adjusted R ²	.128		.078		.080		.063		.022		.032	
R ² change	.130		.080		.082		.065		.025		.035	

Note: * $p < .05$, ** $p < .01$, *** $p < .001$

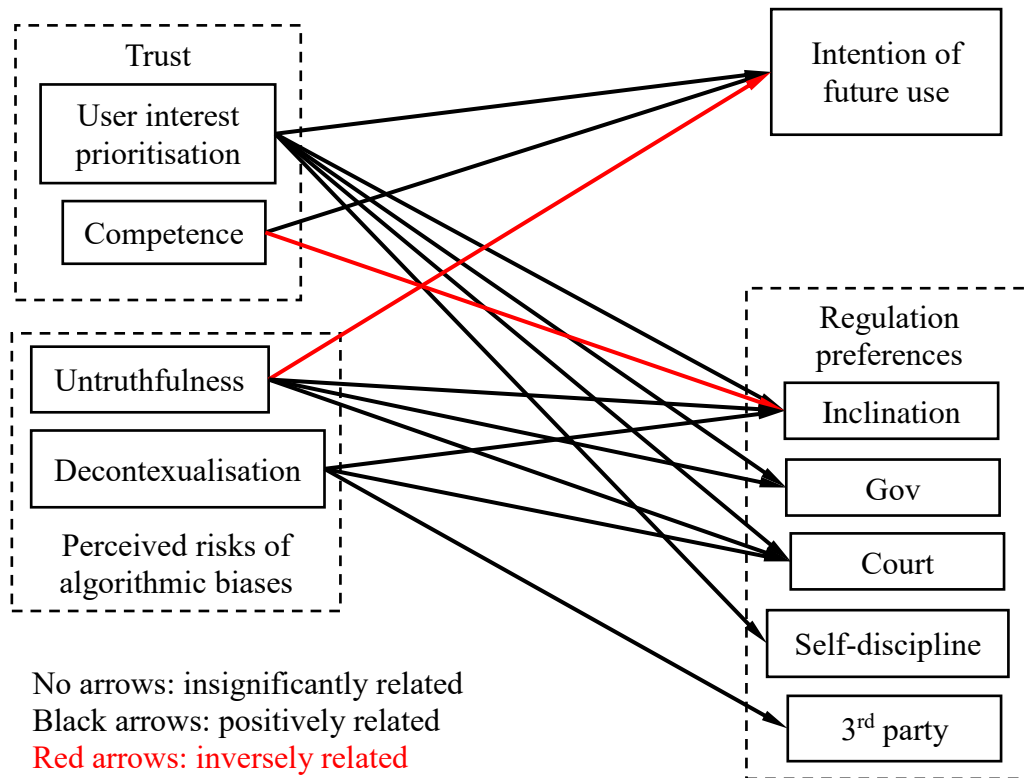


Figure 4. Relationships among trust, perceived algorithmic risks, intention of future usage, and regulation preferences.

Discussions

Our findings square mostly with our anticipations and partially with previous research (Bertot, Jaeger, & Grimes, 2010; Mintz, 2012; Chen et al., 2015). To start with, user motives indeed are salient predictors of users' experience of receiving fake news,

which is deterred by usefulness and galvanised by ease of use. In other words, users who find the News Feed more useful feel more unlikely to receive online fake news from friends, whereas those who find it easy to use tend to receive fake news. Surprisingly, none of the motives can predict fake news sharing experience. Nonetheless, users who are more satisfied with the enjoyment brought by Facebook are more disinclined to feel disappointed at the election results. One of the most possible reasons for that is they use the News Feed more for recreational purposes such as following friends' or idols' news and watching funny pet videos compared to other serious uses (e.g. reading political news, checking government officials' speeches, or browsing international issues).

FOMO is an effective predictor of fake news experience, but an ineffective predictor of users' reaction to the election results. Users anxious about missing out are prone to share fake news, and those longing for peer recognition tend to both share and receive fake news, because sensational negative news like dramatic disinformation has convenient social effects; it sparks conversations for breaking ice at social events, efficiently prolongs small talks, and impresses participants (Chen et al., 2015; Przybylski et al., 2013; Alt, 2015). Seeing that users with FOMO mainly value the social utility of the News Feeds and fake news rather than the serviceability as a tool of political communication, it is of little astonishment that FOMO is irrelevant to disappointment at the election results.

Self-estimated news literacy, by contrast, can predict fake news experience and election result disappointment at once. Users rating themselves higher in news literacy perceive a higher tendency to receive fake news and lower tendencies to forward fake news and to feel disappointed with the election results. However, what needs to be bared in mind is that self-estimated news literacy is highly subjective; according to previous studies, subjects usually overestimate their own capability of recognising real news and fail to detect the 3rd-person effect exercised upon them and thus biasedly believe others are more susceptible to fake news.

When it comes to Facebook News Feed usage, whereas usage time is insignificant, we find that subjects' habitual usage exposes them to receiving fake news and being disappointed at the election results. In line with existing research (Groshek and Koc-Michalska, 2017; Wang et al., 2016), our findings also prove that tablet users tend to be aggressive and more engaged as social media news consumers, in comparison with PC

and phone users; tablet users are more motivated to forward fake news and more likely to feel disappointed at the election results. These findings seem counterintuitive, because tablets are much less used than PCs and smartphones. Device preferences and tendencies of sharing fake news might have much to do with “social situations” according to Vorderer, Krömer, & Schneider (2016). They proposed that users’ choices of Internet access and levels of online connectedness are dependent upon social situations. Their study pointed out among a total of 178 subjects, that 72.5% accessed the Internet via limited data plans and 62.9% also accessed the Internet via mobile devices connected through Wi-Fi. Moreover, users alternate between Android devices, iPhones, and tablets. Their device choices are also related to online activity types and social situations in which they are involved. As pointed out in the study, when spending intimate moments with sex partners, users avoid being online (e.g. web browsing) and socialising (e.g. sharing information with online friends). When commuting, users long for socialising online more than just browsing. Alone in their bathrooms, users tend to be online, but with minimal online socialising. Likewise, in our case, despite tablets being much less used, subjects with tablets use them, very possibly because they inherently are active sharers keen on exhibiting and sharing things with others, and tablets facilitate such needs. Therefore, albeit in the relative minority, tablet users are significantly more apt to share fake news than PC or smartphone users.

Both fake news experience and election result disappointment significantly predict subjects’ trust and risk perceptions of algorithmic biases of the News Feed. Interestingly, the experience of sharing fake news in fact reinforces subjects’ trust in the News Feed’s competence and prioritisation of their interests while also elevating the risk perceptions that its algorithms are keeping them away from trustful news. By contrast, the experience of receiving fake news weakens subjects’ trust in the News Feed’s commitment to prioritising user interests and galvanises their risk perceptions that its algorithms are feeding them rising amounts of news with low credibility and contextuality. Similarly, election result disappointment also tempers subjects’ trust in the News Feed’s competence and increases their risk perceptions of the algorithmic biases automatically delivering more and more unreliable and contextually incomplete information. Taken together, these findings conspicuously demonstrate Facebook users’ paradox and inclination to externalise responsibilities with fake news propagation. In spreading fake news by themselves, their faith in Facebook’s competence and

management commitment grows. However, when receiving fake news, they blame Facebook's algorithmic biases for laying them open to more deceiving and decontextualised information, as well as its failure to deliver the management commitment of user interests first. These attitudinal contradiction and inclination to shun personal responsibilities have not yet been clearly captured and presented by existing research.

Finally, trust predicts subjects' intention of future Facebook usage, and both trust and risk perceptions of the algorithmic biases predict subjects' fake news regulation preference. Faith in the News Feed's competence and its commitment to user interests both contribute mainly to subjects' willingness to keep using it as a principal political or electoral news source, whereas perceived algorithmic risks of untruthful news delivery assuages it. Next, subjects' inclination for fake news regulations is largely supported by their trust in the News Feed's commitment of user interests first and then the perceived algorithmic risks and untruthful and decontextualised news feed. Among the possible regulations, legal intervention is the most supported, followed by governmental intervention through its administrative resources. The least supported regulations are self-discipline of social media and 3rd-party intervention, respectively supported by trust (user interests' prioritisation) and the perceived algorithmic risks of decontextualisation. The findings illustrate that the public opinions in Taiwan currently lean towards the government and the legal system to intervene and regulate fake news production and diffusion.

This study has a few limitations. The foremost one is that objective evaluations of fake news are absent. Many of our subjects provided feedbacks that they felt it hard to judge a news story and believed that a great number of news consumers would stigmatise a new story as fake news, simply because they did not like it or the news story collided with their opinions. In other words, when subjects were answering the survey, the fake news experience reported by them might not be as reliable. In addition, the survey-based investigation is mostly built upon self-appraisals such as self-estimated news literacy and perceived algorithmic biases that are highly susceptible to the confirmation trap. Various research has suggested they are frequently overestimated, and that out of 3rd-person effects the subjects often falsely impute fake news propagation to others they believe are inferior to them in terms of news literacy and taste. Although this study hardly offers objective assessments of fake news and users'

capability of recognising it, our findings make unique contributions to characterising subjects' attitudinal paradox and their affinity to externalise responsibilities that took place when they reported how their experience of forwarding and receiving fake news respectively affected their trust and risk perceptions of algorithmic biases. Last but not least, our results also manage to present how the two antithetic variables (trust and risk perceptions) sway subjects' inclination for fake news regulations and their regulation preferences.

Appendix. Major items employed in the study

Perceived customisation

- The Facebook News Feed understands my specific needs
- The Facebook News Feed has my best interests at heart
- The Facebook News Feed has features that are personalized for me

Perceived enjoyment

- I have fun using the Facebook News Feed services.
- Using the Facebook News Feed services provides me with a lot of enjoyment.
- I enjoy using the Facebook News Feed services.

Perceived ease of use

- Learning to operate the Facebook News Feed is easy for me.
- I find it easy to get the Facebook News Feed to do what I want it to do.
- It is easy for me to become skillful at using the Facebook News Feed.
- I find the Facebook News Feed easy to use.

Perceived usefulness

- Using the Facebook News Feed is very useful to my life in general.
- Using the Facebook News Feed is helpful to improve my performance in general.
- Using the Facebook News Feed is helpful to enhance effectiveness of my life in general.

Habitual usage of the Facebook News Feed

- Browsing the Facebook News Feed has become my everyday routine.
- Not browsing the Facebook News Feed for a short while, I feel insulated.
- I believe my habitual use of the Facebook News Feed is too fixed to change.
- I naturally start browsing the Facebook News Feed without thinking.

Fear of missing out

- I fear others have more rewarding experiences than me.
- I fear my friends have more rewarding experiences than me.
- I get worried when I find out my friends are having fun without me.
- I get anxious when I do not know what my friends are up to.
- It is important that I understand my friends "in jokes".
- Sometimes, I wonder if I spend too much time keeping up with what is going on.
- It bothers me when I miss an opportunity to meet up with friends.

- When I have a good time it is important for me to share the details on Facebook.
- When I miss out on a planned get-together it bothers me.
- When I go on vacation, I continue to keep tabs on what my friends are doing by browsing the Facebook News Feed.

Fake news experience

- Up until the local mayor elections in late November 2018, I had shared a story with my friend(s) via Facebook that turned out to be fake news.
- Up until the local mayor elections in late November 2018, I had believed a story on Facebook that turned out to be fake news.
- Up until the local mayor elections in late November 2018, my friend(s) had shared a story with me via Facebook that turned out to be fake news.
- Up until the local mayor elections in late November 2018, my friend(s) had believed a story on Facebook that turned out to be fake news.

Intention of future use

- After the local mayor elections in late November 2018, I will keep using the Facebook News Feed as my main source for political or electoral information.
- After the local mayor elections in late November 2018, I expect to keep using the Facebook News Feed as my main source for political or electoral information.
- After the local mayor elections in late November 2018, I intend to keep using the Facebook News Feed as my main source for political or electoral information.

Risks of algorithmic biases

- The Facebook News Feed recommends to me lots of decontextualised information.
- The Facebook News Feed limits my chance to reach thorough information.
- It is hard to see contextually comprehensive information on my Facebook News Feed.
- The Facebook News Feed recommends to me lots of false information.
- The Facebook News Feed limits my chance to reach true information.
- It is hard to see reliable information on my Facebook News Feed.

Trust

- I believe that the Facebook News Feed acts in my best interest.
- If I reveal my preferences, the Facebook News Feed appears to do its best to help me.
- The Facebook News Feed is interested in my well-being, not just its own.
- The Facebook News Feed is truthful in its services for me.
- I would characterize the Facebook News Feed as honest.
- The Facebook News Feed keeps its commitments.
- The Facebook News Feed is sincere and genuine.
- The Facebook News Feed is competent and effective at providing its services.
- The Facebook News Feed performs its role in recommending content very well.
- Overall, the Facebook News Feed is a capable and proficient content recommender.

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