

# Fact-checking Literacy of Covid-19 Infodemic on Social Media in Indonesia

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## ABSTRACT

The massive spread of information about COVID-19 hoaxes since 2020 is a problem that any country, including Indonesia, must face. In anticipation of this, the West Java government conducted a fact-checking process using multiplatform Instagram @jabarsaberhoaks. This study aims to identify the fact-checking process that has been carried out by @jabarsaberhoaks accounts using the content analysis method of identifying 334 posts about COVID-19 hoaxes during 2020. The results showed that @jabarsaberhoaks conducted the fact-check by finding data from various hoax themes by checking official sources such as media, authorized agencies, and expert sources nationally and internationally. A note of correction of the clarification results from COVID-19 was published on Instagram. This research finding necessitates stakeholders intensify their campaigns and educate the community on COVID-19 information literacy to understand and respond to the COVID-19 phenomenon adequately.

Keywords: Content Analysis; Fact-Checking Strategy; Jabarsaberhoaks; Misinformation; Misleading.

## ABSTRAK

Masifnya penyebaran informasi tentang hoaks Covid-19 sejak tahun 2020 menjadi masalah yang harus dihadapi oleh negara termasuk Indonesia, guna mengantisipasi hal ini Jawa Barat melakukan proses pengecekan fakta memanfaatkan multiplatform Instagram @jabarsaberhoaks. Penelitian ini bertujuan untuk mengidentifikasi proses pengecekan fakta yang telah dilakukan oleh akun @jabarsaberhoaks dengan menggunakan metode analisis isi mengidentifikasi 334 postingan tentang hoaks Covid-19 selama tahun 2020. Hasil penelitian menunjukkan akun @jabarsaberhoaks melakukan pengecekan fakta melalui proses pencarian data dari berbagai tema hoaks yang ditemukan melalui pengecekan sumber resmi seperti media, instansi yang berwenang, dan sumber ahli baik nasional maupun internasional. Catatan koreksi hasil klarifikasi dari Covid-19 dipublish di Instagram. Implikasi hasil penelitian ini menuntut pemangku kepentingan agar intens mengkampanyekan dan memberikan perhatian dalam mengedukasi literasi informasi Covid-19 kepada masyarakat, sehingga mampu mencerna dan merespons fenomena Covid-19 dengan baik dan bijak.

Kata Kunci: Analisis Isi; Pengecekan Fakta; Misinformasi; Menyesatkan.

## INTRODUCTION

At the beginning of the Covid-19 pandemic, many people doubted the existence of this virus by calling it a conspiracy. This phenomenon cannot be avoided because the spread of the Covid-19 virus is accompanied by an enormous amount of information that develops in hoaxes. Several studies have shown that people do not believe in Covid-19, so they think the pandemic is a hoax. Some people tend not to think deliberately and reflectively. They tend to believe that the pandemic is a hoax, so they ignore social distancing and other health protocols (Stanley et al., 2021). A survey of US adults regarding trust in misinformation about Covid-19 found that protective behavior was overridden, so belief in the information obtained impacted the consequences of this behavior (Hornik et al., 2021). Research in the United States and the United Kingdom shows that different forms of conspiracy beliefs are significantly correlated and have different behavioral implications. While conspiracy beliefs describing the pandemic as a hoax were more strongly associated with a reduction in containment-related behavior, conspiracy beliefs about an evil force intentionally creating viruses were linked to increased self-centered preparatory behavior (Imhoff & Lamberty, 2020). Studies of the degree of politicization and polarization of Covid-19 news in US newspapers and television network news have contributed to polarization in US Covid-19 attitudes (Hart et al., 2020). The rapid Covid-19 information erodes trust in science and misguided individuals in virus prevention and eradication behavior. Therefore, controlling and anticipating this virus must be balanced with eradicating misleading and destructive conspiracy rhetoric (Bolsen et al., 2020; Gruzd & Mai, 2020; Mukhtar, 2021). Another finding suggests a correlation between exposure to fake news on social media and the belief that there is a conspiracy (Xiao et al., 2021).

The mistrust of Covid-19 was fueled by the circulation of false information that has grown on social media, which is called an “infodemic”. An infodemic is when information overload spreads; some are accurate and some are not, making it difficult for people to find reliable sources (Grimes, 2020; Hao & Basu, 2020). Social media plays a role in the widespread dissemination of health knowledge. However, the freedom to spread information irresponsibly on social media results in an abundance of invalid information that is not based on evidence (Samy et al., 2020). Health information is very vulnerable to misinterpretation. This impacts information seekers’ wrong understanding of health (Phillips, 2020). False content includes claims about the prevention or cure of the coronavirus that is claimed by medical authorities, even though they only promote the use and consumption of certain drugs (Moreno & Uhls, 2019). Social media in the context of health communication is like two sides of a coin. This has advantages and disadvantages, especially in the case of hoaxes, that the credibility of the sources is often questioned (Manganello et al., 2020). Other studies have shown that false information that is not based on science and facts is more commonly found to inform public health policy. Another study found that public opinion towards quarantine was the result of misinformation on social media (Pulido et al., 2020). Another study found that public opinion towards quarantine is the result of misinformation on social media (Forati & Ghose, 2021).

Based on hoax mapping report of Covid-19 all year around 2020 from MAFINDO Fact-Checking Committee review and recorded on website [www.turnbackhoax.id](http://www.turnbackhoax.id), Indonesia is a country with the highest spread of Covid-19 hoaxes. The impact is alarming in efforts to handle that pandemic (can see the data on Yustitia & Ashrianto (2020)). The phenomenon is a conflict between public and health workers, who are often slandered as those in the business of the Covid-19 epidemic. Likewise, conspiracy theories that think this Covid-19 is just a global elite setting for business interests make some people unwilling to comply with the health protocols. Hoax with the theme of prevention and treatment that always appears in society with uneven health literacy. Hoaxes related to Covid-19 also trigger the rejection or reluctance of some people and have the potential to thwart the targeted immunization coverage, so these hoaxes have the potential to reduce the level of public trust in the government, health authorities and reduce the level of public acceptance of the Covid-19 vaccine (Hidayah et al., 2020).

A study on the impact of Covid-19 hoaxes in Indonesia has been conducted regarding the perlocution of Covid-19 hoaxes on social media, which thickens sentiment, fosters the wrong perception, satirizes authority, breeds noise, sows fear, grows worried, and breeds gossip (Rahardi, 2020). Other research found that panic buying behavior due to Covid-19 affects attitudes and behavior of the public, especially the head of a family in Indonesia. Generally, the head of the family takes action to buy food in excess quantities due to exposure to hoaxes on social media, especially Instagram (Aprilia et al., 2020). Efforts to handle corona hoax crimes by Indonesian Police include (1)

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Issuance Chief of Police’s Declaration; (2) Covid-19 Response Service, (3) Cyber Patrol, and (4) Socialization about hoaxes on social media (Nuraeni & Hidayat, 2021). In another study, efforts made by the Ministry of Health in dealing with hoaxes circulating in public related to Covid-19 vaccination were to bring health experts to provide information related to the Covid-19 vaccine, which included quality and safety of vaccine as well as the vaccine development process (Çimen, 2021).

Based on information from the Ministry of Communication and Informatics, the distribution of information about hoaxes in Indonesia amounted to 546, as can be seen from the fluctuations in data per month in figure 1. In West Java, on the clarification channel in 2020, there were 900 hoaxes about covid 19.

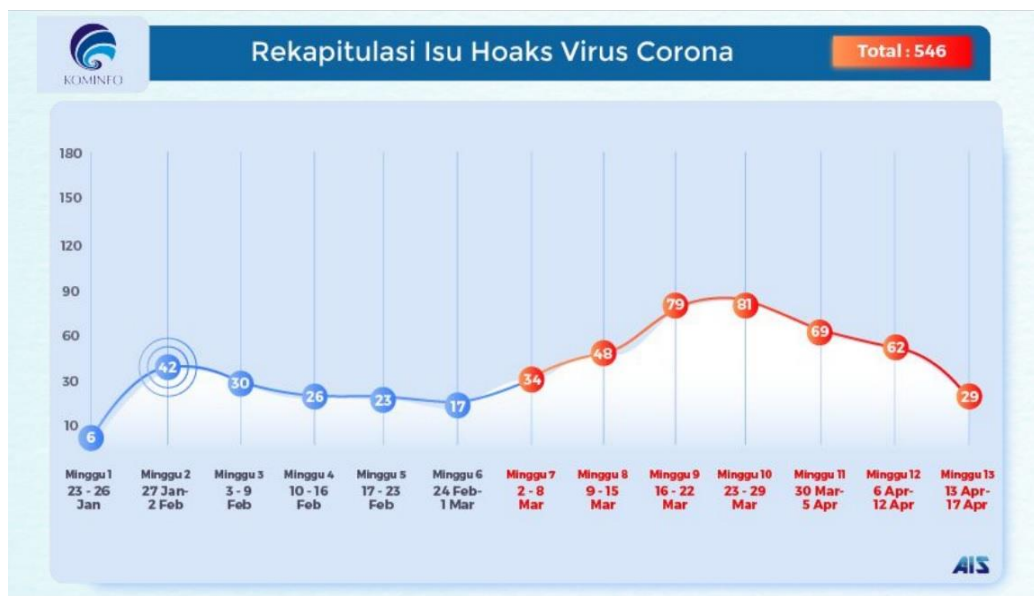


Figure 1. Recapitulation of Corona Virus Hoax Issue (Kominfo RI, 2020)

Based on the previous research, studies were dominated by fake news about the development of Covid-19 on social media (infodemic). The study of infodemic effects on public opinion, whether about suspicion of a conspiracy, distrust of the existence of a virus, or rejecting efforts to prevent and eradicate Covid-19. According to researcher observations, no research discusses how the public delivers literacy education in the fact-checking process to identify hoaxes. Whereas by understanding this process, clarification becomes more valid and accurate, so the public gets a reliable source of information. Therefore, a theme that will be studied in this study focuses on a fact-checking process that is conducted by local government platforms in Indonesia regarding Covid-19 hoaxes on Instagram accounts.

Individual behavior in responding to diverse infodemics suggests that intellectuals are wiser in responding to Covid-19 misinformation by investigating the information they receive (Koetke et al., 2021). Another study states that, in Indonesia, fake news, for the most part, does not pose a danger to people’s health or safety, which causes intangible and immoral losses (Montesi, 2021). A study on the hoax news effect conducted in Indonesia shows that the most widely circulated hoax issues on social media during the Covid-19 pandemic were about SARA (race and religion), health, and politics. These themes significantly affect the public, especially for iGeneration, while hoaxes on health themes tend to have a conative effect (Tenriawali et al., 2020). Potentially dangerous information that spreads in six European countries, namely France, Italy, Norway, Finland, Lithuania, and Estonia, in 2020, includes several typologies such as (1) underestimating protection against viruses, (2) promoting the use of counterfeit (or harmful) medicine against the virus, (3) misrepresenting mechanisms of transmission of the virus, (4) underestimating risks associated with a pandemic, (5) tricking people into buying protection falsely against viruses or revealing confidential information, and (6) compromising suspected virus spreaders through harassment/hate speech (Hansson et al., 2021). Various ways are used by all parties to anticipate the impact of the hoax. Research on efforts to minimize the internet impact in Malaysia has been independently conducted, yet the results have not

been effective in maintaining peace and nation security. Therefore, in the disinformation context, which is dangerous in the Covid-19 pandemic era, it is emphasized that Internet regulation is more appropriate if the social, moral, and cultural order of society is to be maintained (Daud & Ghani Azmi, 2021). This emphasis aligns with a statement that mentions the importance of a culture of civic values to fight fake news. In Indonesia, the use of the similarity cosine method was proposed. This application can produce a classification of hoax indications or facts in the news and display sources that are relevant to the news being tested (Gotama et al., 2020).

Another method, such as engineering feature application, has also been done. The results increased the accuracy of five classification methods of pre-processing, case folding, tokenizing, filtering, and stemming with an accuracy rate of 96.05% (Panjaitan & Santoso, 2021). As Covid-19 proposed in a study, a classification approach method using new tweet features based on natural language processing, machine learning, and deep learning proved to show an accuracy of 79% in detecting fake news. The ensemble classification model effectively detects misleading and fake information about Covid-19 tweets with a cross-validation accuracy of 99.93% (Olaleye et al., 2021). Another recommendation states a need for a firm government presence to provide information and clarify misinformation that appears on various social media. This is confirmed by research that needs to focus on the availability and accessibility of genuine information on health communication, especially in developing countries (Aziz et al., 2020).

Such social media utilization strategies can help educate the public. Research about YouTube content making among health workers about the safety and effectiveness of the Covid-19 vaccine can be a helpful way to increase awareness and willingness of individuals to get vaccinated (Basch et al., 2020). The regulation about social media optimization emphasizes that it should be given, especially on the distributed fact-checking information (Samy et al., 2020). Furthermore, media literacy and awareness about information sources can help in competing with fake news, especially in “infodemics.” Kanozia (2019). Google and some tools such as In-Vid, YouTube Data Performer, and campaigns for media literacy can help eliminate fear and anxiety among people (Charlton, 2020). A public health strategy for information fight and guiding individual behavior through social media is a valuable investment to support the new dissemination of communication science (Ritter et al., 2021).

On the individual side, people must be trained to exercise restraint and to remain vigilant in observing message authenticity (Kanozia et al., 2021). Things that need to be done by governments, such as local authorities, government departments, and public health agencies, must coordinate and synchronize targeted messages to counter misinformation. Therefore, balancing is necessary between freedom of expression and open public discourse, with the presentation of clear and consistent scientific evidence and the continuous promotion of reliable sources relating to pandemic information (Green et al., 2021). Research suggests that governments in many countries take steps to eradicate the Covid-19 infodemic, such as (a) guiding social media companies to remove controversial pandemic content (e.g., India); (b) establishing special units to combat disinformation (e.g., EU, UK), and (c) eradicating fake coronavirus and other harmful public health measures (Radu, 2020; Shahi et al., 2021).

Based on previous research, the urgency of social media in providing digital literacy education about hoaxes to the public needs to be optimized. One of the necessary digital literacy varieties is news literacy about hoaxes. News literacy is the acquisition of 21st-century critical-thinking skills for analyzing and judging the reliability of news and information, differentiating among facts, opinions, and assertions in the media we consume, create and distribute (schooljournalism.org, 2021). News literacy mission is widely recognized as “citizen empowerment” in terms of the critical thinking skills required to evaluate news reports and the ability to identify quality, fact-based information encouraging active participation and engagement among knowledgeable citizens (Kajimoto, M., & Fleming, 2021). In the middle of growing worries about hoaxes of Covid-19 on social media, several studies point to news literacy as a means to increase critical media consumption. Research has shown that news literacy contributes to who views and shares information on social media with those who are more knowledgeable. Individuals with news literacy skills are more skeptical of the quality of information on social media (Vraga & Tully, 2021). Another finding shows that messages containing news literacy can change perceptions and beliefs about misinformation. It is not enough to just display one message; it is necessary to develop customized and targeted news literacy campaigns by displaying many messages and calls to action (Tully et al., 2020). An exciting strategy even suggested that memes on social media are more effective than actual news. Thus, using memes in teaching information literacy can promote information literacy (Ireland, 2018). In current conditions, the actual

media is needed to educate the public about Covid-19. This is important because it can provide confidence and understanding to the public about this virus. Some previous research has shown that knowledge of Covid-19 correlated with trusted news sources. Increasing public knowledge about Covid-19 to maximize dissemination of information and compliance with public health recommendations related to Covid-19, health information providers should consider using the most trusted sources of information for the public and monitor and correct misinformation presented by other sources. Independent content review for accuracy in the media is necessary for a public health emergency to increase knowledge (Sakya et al., 2021). In this case, the role of the state becomes important in educating the public as research suggests that coverage of the Covid-19 pandemic in social media posts by the main news organizations in Brazil, Chile, Germany, Mexico, Spain, the UK, and the US, demonstrates the strong role of the state in building pandemic news (Mellado et al., 2021).

**METHODS**

This study employed a content analysis method with objects from the Instagram account @jabarsaberhoaks, which contained images or information related to how this account was used to clarify the Covid-19 misinformation epidemic. West Java Clean Sweep Hoax (Jabar Saberhoaks) is an official channel established by the West Java Provincial government to verify hoax information/news circulating in public. The analysis unit in this research is a fact-checking process done in 2020. The Analysis unit observed that referring to the fact-checking process according to Alexios Mantzarlis in the Handbook for Journalism Education and Training (Ireton & Posetti, 2018). see Table 1.

**Table 1.** Analysis Unit

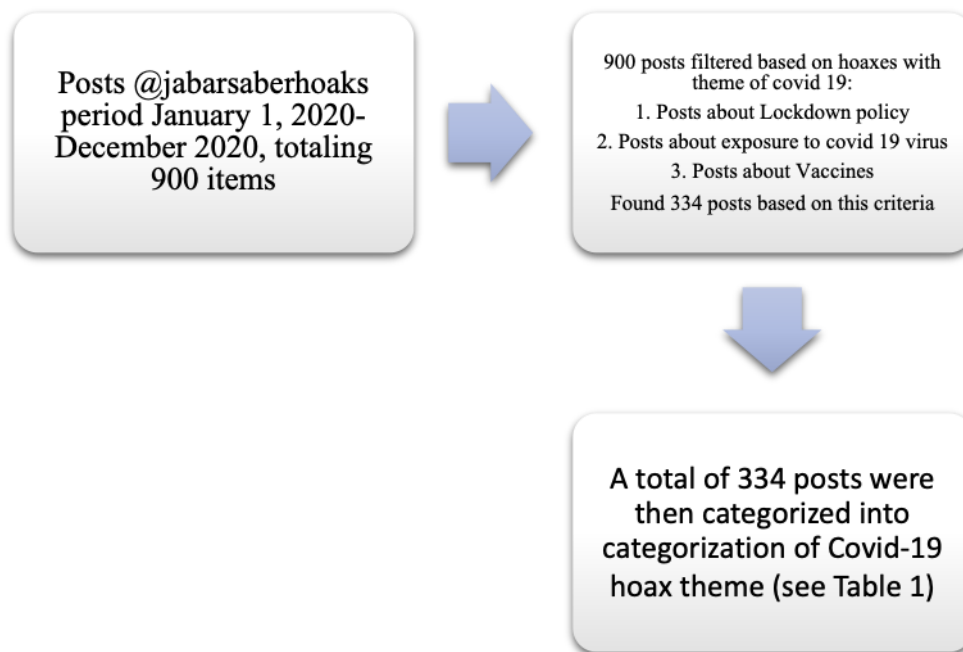
No	Component
1	Finding fact-checkable claims
2	Finding the facts
3	Correcting the record

The content analysis technique is done in this research through content checking on Instagram posts of @jabarsaberhoaks. The first way is to check data on the number of account postings that are limited to January 1st to December 31st, 2020. Based on findings, there are a total of 900 posts. Of 900 posts, researchers classify content based on themes related to information keywords about Covid-19. Based on these indicators, there were 334 posts about hoaxes with the theme of Covid-19, whether it was about lockdown policy, exposure to Covid-19, or vaccines. From these 334 Covid-19 hoaxes, the researchers then classified them by categorizing the scope, as shown in Table 2.

**Table 2.** Covid-19 Hoax Theme Categorization

No	Component
1	Cases of death due to Covid-19
2	Spread and transmission of Covid-19
3	Covid-19 prevention
4	Covid-19 Healing
5	Causes of Covid-19
6	Religion Claims Of Covid-19
7	Covid-19 Effects
8	Covid-19 prediction
9	Lifestyles about Covid-19
10	Exposed to Covid-19
11	Covid-19 Vaccine
12	Conspiracy

The process of collecting research data for more details is described through a flowchart, as shown in Figure 2.



**Figure 2.** Diagram Process of Data Selection

## RESULT AND DISCUSSION

Fact-checking is a method commonly used in the fact-checking process, especially about fake news. The development of misinformation about COVID 19, which spreads through social media, messaging applications, and other media, impacts society because of the speedy nature of information dissemination. Therefore, many irresponsible parties try to manipulate the public by creating and spreading false information. In this condition, the public needs a trusted channel to verify the information. In Indonesia, one of the official channels in charge of verifying information/news circulating in public is @jabarsaberhoaks. This channel provides information and invites the public to actively fight fake news by providing education on the wise use of social media and services that clarify and check issues and information circulating in public. This channel collaborates with agencies, organizations, and institutions operating in the same area. In principle, fact-checking is carried out through the process of selecting claims to be verified and verifying claims that are viral on social media and messaging applications through the following steps.

### Finding Fact-checkable Claims

The results show that the initial process of discovering hoax information claims related to Covid-19 clarification is carried out by prioritizing claims related to urgent public interests, such as the Covid-19 pandemic, which generally consists of claims of information with the potential of endangering the lives or health of many people. Fact-checking is important because research shows that fact-checking efforts are proliferating as a solution to countering fake news, especially during the Covid-19 pandemic. Fact-checking is used to reduce the spread of misinformation and malicious activity. It provides a service by clarifying claims assessment by providing context and background information (Ceron et al., 2021). Detecting fake news quickly can reduce the spread of panic, chaos, and potential health hazards (Vijjali et al., 2020). Based on the research findings, claims of hoax information regarding Covid-19 on @jabasaberhoaks account are pretty diverse, including 12 categories of themes, as shown in Figure 3.

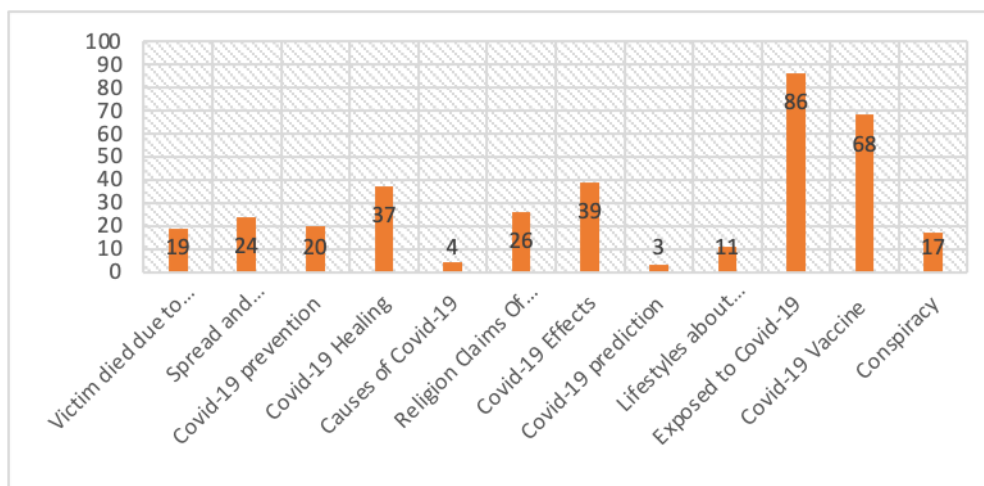


Figure 3. Covid-19 Theme Category

In Figure 3, the most dominant theme is the hoaxes about people exposed to covid-9, such as news about “Video of Women with Seizures in Glodok due to Corona”, “Do not go to the mall, there are Covid-19 raids, you can get Covid-1”, and “Photos of Corona positive patients who run away from hospital are Gojek driver”. These are some examples of issues published on social media and messaging applications without proof. There is much information about people exposed to Covid-19 in society, public officials, and even celebrities. There are also hoaxes about vaccines, such as “4 children died suddenly after being injected with Covid-19 vaccine”, “Indonesia is the only country being the guinea pig of China”, and “Sinovac, which will be administered to 175 million Indonesians, turns out to be a dangerous vaccine”. Several other hoaxes related to Covid-19 healing are “Garlic Boiled Water Heals Corona Virus”, “Cocaine Effective in Destroying Corona Viru”, “Drinking Alcohol Can Kill Corona Viru”, and “Jokowi: Corona Virus, Drinking Bodrex for immediate healing”. Other frowning examples is about Covid-19 as a conspiracy, for instance, “Covid-19 just a common cold and engineering results to make a profit”, “Covid-19 corpses are used as an illicit business for selling kidneys and heart”, “Give Covid-19 Positive Status to Patients, Medical Workers Get Hundreds of Millions of Incentives from Government”. If no preventive measures are taken to deal with these developing hoaxes, it will have a more dangerous impact on the public. The hoaxes will disrupt efforts to handle the pandemic and encourage apathy towards the efforts of government and medical personnel. Consequently, society does not comply with health protocols, and public acceptance of the Covid-19 vaccine will decrease.

**Finding the facts**

The next fact-checking step done by an Instagram account of a local government is done by cross-checking with various parties to find out the truth of the spread of Covid-19 hoax information. The process of checking information claims regarding mis-infodemic is conducted thoroughly. In general, the process follows the flow of verification and source consistency checks (claims of originality), making comparisons with reports from trusted media sources at national and international levels through news agencies and verified media sources, including legitimate journals. Confirmed parties can be seen in Figure 4.





Figure 4. Fact-Finding Mis/Disinformation of Covid-19 by @jabarsaberhoaks

Confirmation of the accuracy of hoax content in the findings of this study was done. For example, to competent institutions at the national level, on the news, “Jokowi Does not Want to Get Vaccine First” was confirmed on the official Youtube of the Presidential Secretariat. An example of confirmation to an international level agency, “Antigen Rapid Test Test Tool Shows Positive When Given Coca Cola” was confirmed at the US Political fact-checking agency. Hoax news about “The Covid-19 vaccine causes more disease than benefits” was confirmed by several international institutes. From the search results reported from *politifact.com*, Dr. Matthew Laurens of the Center for Vaccine Development and Global Health at the University of Maryland School of Medicine stated that the article was misinterpreted in interpreting Pfizer data. Actual data from Pfizer does not support such claims. The research data is already reported in the *New England Journal of Medicine* study. The study included about 46,000 people from the United States, Argentina, Brazil, South Africa, Germany, and Turkey. The study results concluded that the vaccine was safe and had an acceptable side effect profile. The vaccine’s efficacy against Covid-19 was 91.3% through six months of follow-up. In addition, confirmation was also done on statements from expert and authorized parties, such as in the case of hoax information about “How to get a negative swab test result, rinse with betadine or saltwater” confirmed by a national expert, dr. RA Adaninggar then news, “Vaccine Those stored at 80 degrees can manipulate genes” at international level experts such as Prof. Helen Petoussis Harris, a vaccine expert at the University of Auckland. This confirmation process is a preventive effort done by local government accounts in Indonesia, so the public trusts those who handle Covid-19. In this context, the government can inform the public that clarification regarding hoax content has been done through the correct process for accuracy and trustworthiness.

Rapid technological advances in online communication through social media platforms have led to the increasing spread of misinformation and fake news. Fake news is particularly rampant in the current COVID-19 pandemic, causing people to believe false and potentially dangerous claims and stories. Detecting fake news quickly can reduce the spread of panic, chaos, and potential health hazards. This fact-finding study was developed to detect COVID-19 fake news using advanced machine learning models for natural language processing through two models. The first model utilizes a new fact-checking algorithm that picks up the most relevant facts related to users’ claims about



COVID-19 claims. The second model verifies the level of truth in the claim by calculating the textual entailment between the claim and the actual facts taken from a manually curated COVID-19 data set. These data sets are annotated internally and cross-validated to train and evaluate models. The model evaluation is carried out, resulting in the best output based on classic text-based features to a more contextual Transformer-based model called the BERT and ALBERT models for two stages each (Vijjali et al., 2020). The same model was applied to other studies where data-driven automated fake news detection methods applied the Bidirectional Encoder Representations from Transformers model (BERT) Model to detect fake news by analyzing the relationship between headlines and text content of news. This model is considered effective at detecting fake news by analyzing the relationship between headlines and the appropriate body text of news articles. There were no automatic methods available before to assess the validity of news articles in real-time (Jwa et al., 2019).

The COVID-19 pandemic has exposed and accelerated the information and health crisis. Fact-checking emphasizes the importance of information and the fundamental role of fact-checkers in understanding how information flows, why mistakes are made, and how it is eradicated. Fact-checking as ideas and practices emerged in the early twenty-first century and was developed to counter the growing hoaxes. Today, fact-checking is done in a much more complex media context. Fact-checking as idea and practice has a history. The organizations that engage in fact-checking are often interventions in the particular settlement of a country's media, politics, and information (Seaton et al., 2020).

For example, the growing number of fact-checking outlets exists in different countries, different forms of organization, and different self-identifying orientations. However, they all have the same commitment to publicly evaluate the claims of truth made by influential actors such as politicians and, in some cases, the news media. Despite differences in how they work, how they communicate their findings, and how they are funded, they identify with the broader international movement. The two most important forms of fact-checking organizations in Europe are the newsroom model associated with existing news media and the NGO model that operates independently. Both exist in different countries, but with more newsroom-based fact-checking in Western Europe and more NGO-based fact-checking in Eastern Europe. Fact-checkers identify things in different and sometimes diverse ways. Many see themselves as reporters, but others identify as activists or experts, and in some cases, two or all three. Their relationship is partly shaped by their perception of the country's existing political and media systems—the situation in the Nordic countries, with relatively strong news media and relatively higher levels of trust in political institutions, is different from that in the Balkans, with weaker and less independent news media and a more problematic political situation. Whatever the organization's form, research practices, and funding model, all fact-checking outlets still largely rely on the existing news media to publish their work. All have a digital presence on their own websites and various social media channels but also work in sometimes uncomfortable relationships with existing media outlets they aim to influence or provide alternatives (Graves & Cherubini, 2016).

The fact-finding process in Southeast Asia is detailed in a study that states-operated fact-checking in Malaysia, Singapore, and Thailand discovered that site-wide correction methods contribute to preserving the relevance of the constant and ubiquitous threat of fake news. By building a legal framework in the form of law, these countries adopt the critical function of strategic political communication for the official fact-checking of domestic fake news discourse (Schuldt, 2021). Other methods used in this fact-finding process include policymakers taking action to protect citizens and democratic systems from hoax news by labeling fact-checking flags on the news to alert people to misinformation and stimulate critical thinking. The impact of labeling or marking was once made on Amazon Mechanical Turk. The study found that labeling is very powerful in influencing people's judgment by making participants confident in the label given. The results showed that professional fact-checkers or crowdsourcing labeling was equally influential in shaping readers' identification of fake news and encouraging critical thinking (Gaozhao, 2021).

In the Indonesian context, communities are in a fact-checking move based on crowdsourcing mechanisms, where everyone who joins the community participates as an aggregator. Community members can exchange information they encounter in their daily activities and then practice fact-checking and verification, whether the information is true or hoaxes are carried out together. This community activity is also carried out directly in the community, with socialization related to hoaxes. The *Anti-Defamation*, *Hasut*, and *Hoax Forum* are the pioneers in the development of a special website to fight hoaxes, namely *turnbackhoax.id* (Kusumastuti et al., 2017). Fact-checking is one effort to combat hoaxes, especially in digital media. The study of six fact-checking organizations in

Indonesia found that five organizations were built with a newsroom model in the container and discipline of journalism. In contrast, one organization was built organically and independently before it developed into an NGO model (Rahmawan & Adiprasetyo, 2020).

Fact-checking plays an important role in improving public health against misinformation about COVID-19. This process and other strategies for improving public health and science literacy can help reduce vulnerability to misinformation. Clarifying facts with a scientific approach helps people be less likely to receive false information. Educating people about the scientific nature can get people to think about the accuracy of the information they encounter. It can improve their ability to distinguish true and false information and make better decisions about what kind of information they share on social media. This type of motivation can be implemented into social media platforms or public health messages on social media so that the public pays more attention to the content they read; hence, it has an important role in combating misinformation (Chou et al., 2021).

The use of Instagram as a medium of clarification is considered effective. For example, research on government channels conducted in DKI Jakarta showed that strategies, mobilization, action, evaluation, and continuity of utilizing and maximizing Instagram social media to clarify the facts of hoax news could support and facilitate the advocacy communication process carried out (Syah & Darmawan, 2019). In line with that in West Java, through the West Java Channel, Saber Hoaks has a duty and function to verify information or rumors that are not yet clear facts circulating in the community. Verification of information is carried out through confirmation, compilation, and data processing from actual and credible sources or references. The approach taken by the @jabarsaberhoaks when clarifying information indicated to be a hoax is to combine the results of team verification in the field with data collected by the Monitoring and Research Team, testing claims with valid data. This account invites its readers to critically observe hoaxes through the process of tracing credible sources to check the truth of the information. Research is carried out with various methodologies, such as examining the source or origin of claims. If the news source comes from social media, the team will check the account (whether it is verified and consistent). Check the claim was conducted by comparing it with mainstream media coverage, official websites of related institutions, or official social media accounts of institutions or related figures. Confirm directly with the figures or representatives of related institutions, as well as with the authorities. Contact an expert to help interpret the data or context of the problem. After the verification process is carried out, by including supporting evidence @jabarsaberhoaks will provide conclusions related to the claims examined. Conclusions are drawn based on the results of evidence and verification carried out.

### Correcting the record

The next fact-checking process done by @jabarsaberhoaks platform is to give an explanation to the public about clarification result of information by classifying types of hoax information that appear. Publications are submitted through Instagram accounts. Information is also equipped with a verification process by including supporting evidence and channel provides conclusions about claims being examined. The conclusion was drawn based on the results of evidence and verification. The classification put forward regarding the mis/disinformation of Covid-19 can be categorized into seven categories, as shown in Figure 5.

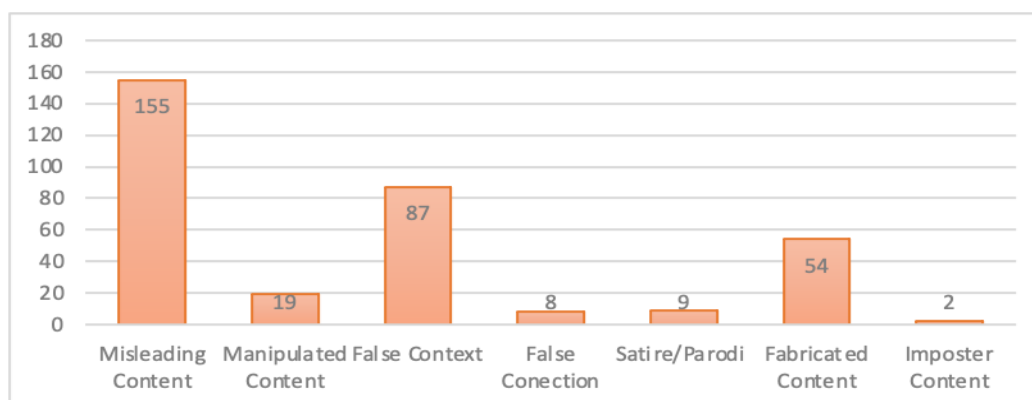


Figure 5. Correcting record Mis/Disinformation of Covid-19

The result of the research shows that misinformation dominates at 55% in general. This news contains twisted information formed by utilizing original information, either in the form of images, official statements, or statistics that are edited so that they do not have any relationship with the original context. The hoaxes with these features are, for example: “Marijuana To Prevent Corona Virus Entering the Lungs”, “Consumption of Turmeric and Temulawak Prone to COVID 19”, and “Jokowi Expands Tourism Events So Many People Die Due to Corona”. Three other categories are quite large, namely false context, content that is presented with wrong narration, and the context in which context is written not in accordance with facts, for example, “Photo: Drinking *Detol* to Prevent Corona Virus, 59 Church Congregants Died,” “Friday Prayers in China Become a Sea of Humans, None of the Muslims in Wuhan Gets Corona Virus.” Another type is manipulated content, which contains edited results from information that has been published by major and credible media, for example, “Vaccines Stored at 80 Degrees Can Manipulate Genes” and “Affected by Covid-19, Sim C (driver’s license for motorcycle) owners will get 900 thousand dollars in assistance”. The other example is fabricated content, the most dangerous type of fake content because that content cannot be accounted for, for example, “Vodka Can Be Used as a Hand Sanitizer” and “Distribution of Free Masks Containing Drugs”. Some examples of this type of hoax can be misleading if the public does not know valid information. Then this local government platform in Indonesia provides clarification through a fact-checking process to provide information to the public regarding correct and accurate information. The Internet is mainly used to access COVID-19 information, and although it is abundant, it is often complex, inconsistent, and contradictory. This “mis-infodemic” has repeatedly revealed low health literacy as it underestimated public health problems. With regard to readability, comprehension, action, accuracy, and consistency, most online COVID-19 information does not meet health literacy best practices and is not accessible to patients seeking this information (Papadakos et al., 2021).

The content analysis on the local government’s official account in Indonesia @jabasaberhoaks shows that the process has followed fact-checking procedure referring to Alexios Mantzarlis in Handbook for Journalism Education and Training, such as finding fact-checkable claims, finding facts, and correcting the record (Ireton & Posetti, 2018). The researchers focus on fact-checking process because this process is important for clarifying information, let alone the validity of Covid-19 news. Several studies have been conducted regarding the fact-checking process, such as history of fact-checking. For example, fact-checking is an idea and practice that emerged in the early twenty-first century, developed as a positive signal to counter growing feelings that information is no longer reliable. Today, fact-checking is a far more complex but increasingly urgent media context. (Seaton et al., 2020) In Indonesia, there are two management models for fact-checking organizations: the Newsroom Model and the NGO (Non-Governmental Organization). Model. (Graves & Cherubini, 2016). Fact-checking practice in journalism is not an exclusive practice due to the proliferation of hoaxes.

In the journalism tradition, fact-checking practices have been done by an editor who acts as a gatekeeper who edits and sorts articles written by journalists before final publication. However, current fact-checking practices that attempt to tackle the current circulation of hoaxes are a distinct activity separate from the internal work of journalistic editors (Rahmawan & Adiprasetyo, 2020). Fact-checking efforts are necessary, although they do not completely address exposure to misinformation. However, some additional steps beyond fact-checking can help mitigate the effects of misinformation in the current pandemic (Chou et al., 2021). Fact-checking is a practice that has become a reflective supplement for the news media in the civic sphere, which may help civic communicative institutions to maintain honesty in a way that contributes to democracy (Luengo & García-Marín, 2020).

Fact-checking Organizations around the world are continuing to fight against misinformation about Covid-19. Various ways of fact-checking can be done either individually or as an institution. In many places, the content itself of the coronavirus appears to encourage most users to do fact checks, which is also supported by organizations that can handle misinformation (Siwakoti et al., 2021). In previous research studies, strategies for detecting health misinformation that emerged can be done by tracking chat replies on social media, which often provide accurate information. This strategy is more efficient than keyword-based searches at identifying Covid-19 misinformation (Kim & Walker, 2020). It yet possesses another challenge. On one hand, fact-checking can help fight fake news, but on the other, few people use it. Low levels of knowledge and unstable emotions make individuals less

able to do fact-checking (Yu & Shen, 2021). Research in the US found awareness of fake news and patterns of active social media use (for example, commenting on content instead of reading it) increased fact-checking of Covid-19 fake news. The study also found that fact-checking helps users identify accurate information about how to protect themselves from Covid-19. These findings highlight the importance of fact-checking to fight Covid-19 fake news and help identify potential interventions (Schuetz et al., 2021).

The urgency of research on fact-checking process is important. As stated in the study, invalid information can have a harmful impact. In addition, the result of this “misinfodemic” becomes a public health problem that is underestimated because most of the online Covid-19 information does not meet health literacy best practices and is not accessible to patients seeking this information (Papadakos et al., 2021). Therefore, in clarifying information, there needs for a fact-checking process. Despite so, of course, this research still has weaknesses and limitations because it only looks at the process. It has not touched on how effective this fact-checking process is for the readers. Thus, it needs confirmation from the public to provide input that the platform created by the government effectively provides valid information regarding Covid-19 hoaxes.

## CONCLUSION

Fact-checking strategy can be an alternative solution to overcoming the spread of hoaxes regarding Covid-19. In this case, Instagram is a helpful medium to provide information literacy education so that people avoid exposure to covid 19 hoaxes. Therefore, stakeholders, including government, health workers, and health observers, can take advantage of the positive use of this media to educate the public. Implications of this research explain how the fact-checking process done by the official online platform of the local government in Indonesia can be useful in providing valid information about Covid-19 to the public through finding fact-checkable claims, finding facts, and correcting records. However, this study needs confirmation from the public on whether the fact-checking process is effective or not in helping obtain valid information. Therefore, more comprehensive research on the effectiveness of fact-checking against false information might be done in the future by considering the shortcomings and advantages of the advanced checking method.

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