Comunicación Sociedad

Universidad de Guadalajara

Watching the watchers: analysis of ideological biases in the contents analyzed by reference fact-checking agencies in Spain & Portugal

Vigilando al vigilante: análisis de los sesgos ideológicos en los contenidos analizados por las agencias verificadoras de referencia en España y Portugal

Observando o Observador: Análise de Vieses Ideológicos em Conteúdo Analisado por Principais Agências de Apuração de Fatos na Espanha e em Portugal DOI: https://doi.org/10.32870/cys.v2025.8900

> BORJA VENTURA-SALOM¹ https://orcid.org/0000-0001-5152-1357 ROBERTO GELADO MARCOS²

> > https://orcid.org/0000-0002-4387-5347

Verification agencies emerge as new communicative actors against disinformation fueled by digitalization. The fact that they replicate typical media procedures in terms of content selection and competitive logic for the audience makes it pertinent to analyze whether, as in the case of the latter, there are biases that condition their task. A methodological triangulation of in-depth interviews, a descriptive quantitative approach and an analysis of the content analyzed by the five main fact-checking agencies of Spain and Portugal is proposed in order to confirm the existence of ideological biases of the content that is

KEYWORDS: fact-checking, biases, ideology, Spain, Portugal.

Las agencias de verificación emergen como nuevos actores comunicativos contra una desinformación espoleada por la digitalización. El hecho de que repliquen procedimientos típicos de los medios en cuanto a selección de contenidos y lógica competitiva por la audiencia hace pertinente analizar si, como sucede con estos, existen sesgos que condicionen su labor. Se propone una triangulación metodológica de entrevistas en profundidad, aproximación cuantitativa descriptiva y análisis del contenido analizado por las cinco principales agencias de verificación de España y Portugal para confirmar la existencia de desequilibrios ideológicos de los contenidos desmentidos.

As agências de fact-checking estão emergindo como novos atores comunicativos contra a desinformação alimentada pela digitalização. O fato de replicarem procedimentos típicos da mídia em termos de seleção de conteúdo e lógica competitiva por audiência torna pertinente analisar se, como ocorre com os veículos de comunicação, seu trabalho é influenciado por vieses. Uma triangulação metodológica de entrevistas em profundidade, uma abordagem quantitativa descritiva e análise de conteúdo analisada pelas cinco principais agências de fact-checking da Espanha e de Portugal é proposta para confirmar a existência de desequilíbrios ideológicos no conteúdo que desmascaram.

PALAVRAS-CHAVE: verificação de fatos, vieses, ideologia, Espanha, Portugal.

PALABRAS CLAVE: fact-checking, sesgos, ideología, España, Portugal.

How to cite:

Ventura-Salom, B. & Gelado Marcos, R. (2025). Watching the watchers: analysis of ideological biases in the contents analyzed by reference fact-checking agencies in Spain & Portugal. Comunicación y Sociedad, e8900. https://doi.org/10.32870/cys.

- Universidad San Pablo-CEU, CEU Universities, Spain. borja.venturasalom@ceu.es
- Universidad San Pablo-CEU, CEU Universities, Spain. roberto.geladomarcos@ceu.es Submitted: 09/02/24. Accepted: 04/02/25. Published: 06/18/25.

INTRODUCTION

Technology has become an enabling tool that significantly contributes to universalizing content creation. Entry limitations typical of previous eras, such as the need for audiovisual broadcasting licenses, the requirement for large investments and infrastructure, or geographical and language limitations, amongst others, have been reduced to the point of almost disappearing, with the important exception of the digital gaps in access, competition, and use (Van Dijk, 2017), which became especially evident during the Covid-19 pandemic in 2020. Nonetheless, the multiplication of content also has negative effects. On the one hand, the existence of more voices does not imply greater plurality if they only serve to repeat dominant narratives, quite the contrary, as Cornellà (2000) pointed out when he first spoke of "infoxication". On the other hand, this multiplication of broadcasters does not necessarily imply better information, in terms of completeness, reliability, or contextualization. Along with these negative effects, there is also a risk: the multiplication of the speed and reach of content, not only of truthful information, but also of disinformation narratives. While it is true that this has always existed, it is thanks to this multiplication of sources and content that it reaches its peak. Disinformation now spreads massively and instantly, permeating not only public information environments -political discourse or media content- but also private spheres, such as messaging platforms.

For all these reasons, various independent verification platforms have emerged in recent years as new players in the information ecosystem. It is no coincidence that this emergence coincides with a progressive deterioration of public trust in the media in general (Reuters Institute, 2024): if distrust and disinformation go hand in hand, external verification emerges as a possible lifeline. However, the dilemma of trust no longer affects only the media, but also communication in general, including social media and messaging platforms.

Thus, a function that was supposedly implicit in the routine work of the media has ended up being partially outsourced to other entities that act as watchdogs of information, not only of the media, but also of political discourse, frequent rumors, and emerging trends. In addition,

as actors in this ecosystem, they also behave competitively, striving to give their output greater reach in order to achieve a larger audience. This logic leads them to behave in a manner similar to the media, for instance, delivering their verdicts in a recognizable tone and style that distinguishes them, or selecting what content to publish based on certain criteria and reach results.

It is therefore pertinent to consider whether fact-checkers' decisions and actions can be influenced and compromised by these practices. For example, whether only misinformation is debunked, which would coincide with media's tendency to address conflictual issues to capture audiences (Muddiman & Scacco, 2023), or if the ideological overtones of the verdicts issued are balanced between the left and the right. If not, whether this occurs naturally –because there is more disinformation on one side than the other– or because there is a bias in the selection of what is fact-checked.

STATE OF THE ART AND THEORETICAL FRAMEWORK

The problem of disinformation

Information disorders have emerged as one of the most unavoidable aspects when it comes to understanding and explaining modern mass communication. Although the phenomenon of disinformation is far from new -there are examples of far-reaching information disruptions that date back centuries- it is no less true that the Internet in general, and social media in particular, have provided spurious content with a platform through which to multiply its impact and speed of dissemination. It is not so much the phenomenon itself, but rather the speed –the immediacy to which the old media aspired arrived with the Internet era- and the reach -the traditional point-to-mass model has been replaced by one in which receivers are, in turn, potential mass transmitters as well, which has irreversibly changed its former passivity (Rosen, 2012). Thus, many authors have highlighted the rise of the disinformation phenomenon in recent years (Borges do Nascimento et al., 2022; Chen et al., 2023; Navarro-Sierra et al., 2024). Furthermore, special emphasis has frequently been placed on two political milestones as key events in understanding the subsequent proliferation of the disinformation phenomenon and its impact on the public sphere: the referendum to leave the European Union that took place in the United Kingdom in 2016, and the US presidential elections of that same year (Allcott & Gentzkow, 2017; Alonso-López et al., 2021; Paniagua et al., 2020). This has led several researchers to also express concern about the effects of information disorders on audiences of millions, a fear that has become particularly evident after the subsequent impact of the Covid-19 pandemic (Salaverría et al., 2020).

Not few authors have warned of the coexistence of the phenomenon of disinformation with other phenomena that are currently assumed to be related, such as institutional discredit (Roniger & Senkman, 2019) or polarization (Ekström et al., 2020). Academic interest in information disorders has also stimulated a conceptualization effort—with authors such as Wardle and Derakshan (2017), and Kapantai et al. (2020) standing out—aimed, amongst other things, at making the problem visible and clarifying possible strategies to specifically and effectively combat each of its aspects.

Fact-checking as a mechanism to counter information disorders

It is in this context that professional initiatives, especially fact-checking, have developed widely and "have proven effective in reducing the acceptance and credibility of misinformation and disinformation" (Hameleers, 2023, p. 7). For authors such as Singer (2018), this practice requires fact-checkers "to see themselves as both an extension of traditional journalism and, in many ways, a correction to it" (p. 1079). Indeed, there are defenses of the effectiveness of these institutions, based on results that invite us to consider their ability to counter disinformation (Fridkin et al., 2015; Luengo & García Marín, 2020) and even discourage potential future sources from continuing to spread it. However, some academic research aimed at clarifying the phenomenon of fact-checking by evaluating its effectiveness has shown reluctance to acknowledge the modifying power of verification due to the influence of phenomena such as cognitive dissonance (Chan et al., 2017). Relatedly, polarized environments have been found to deter the corrective power of disinforming messages (Vraga & Bode, 2020).

Phenomena such as confirmation bias (Batista et al., 2022; Ecker et al., 2014; Kappes et al., 2020) have indeed focused a significant amount of academic attention on assessing the real possibility that tools such as verification can counteract the effects of disinformation. To a lesser extent, there has also been research –such as that by García-Marín et al. (2023), Baptista et al. (2022), Lowrey (2017) or Marietta et al. (2015)— that has addressed the problem of ideological biases, not so much of the recipients, but of the fact-checkers themselves. It is in this less addressed research niche that the present study is framed, with the intention of shedding light on the existence or lack of ideological biases in the material verified by the reference fact-checkers of two countries, Spain and Portugal, which have already been investigated comparatively in previous studies on fact-checking, such as those of Baldi and Ballesteros-Aguayo (2023) or Jerónimo and Sánchez (2023).

OBJECTIVES AND METHODOLOGY

The main objective of this research is to determine whether there are potential biases in fact-checking agencies and, if so, to quantify and identify them. In this regard, the contribution of Rodrigo-Ginés et al. (2024) is supportive in identifying the most common biases in the media, which they organize into two large groups: the first, based on context, includes selection, coverage, and coding biases; the second, based on the author's intentions, includes ideological and treatment biases. The operational similarities between media and fact-checking agencies make this classification equally relevant.

Our proposal aims to confirm whether biases exist based on the prior perceptions of the actors and the fact-checks they ultimately publish. This will serve as a starting point for future research to identify where these hypothetical biases might lie in the process. Specifically, and as secondary objectives, we will look for potential conflict biases (whether more content is denied than confirmed), ideological biases (whether more left- or right-wing content is verified), and what possible variables may account for both biases (whether there is a greater or lesser incidence in either case depending on the verifier or the type of verdict). The sample for this research is defined by the fact-checking agencies in Spain and Portugal that are part of the Iberifier Plus hub, a project designated by the European Commission to combat disinformation, and that is certified by the International Fact-Checking Network (IFCN), which guarantees comparable standards in their professional practice. These are the Spanish fact-checkers EFE Verifica, Maldita.es, Newtral, and Verificat, as well as the Portuguese agency Polígrafo. In order to meet the stated objectives and limit the sample presented, the research design follows a methodological triangulation scale, that is, each method justifies the application of the next, which in turn aims to clarify the previous one.

First, in-depth interviews were conducted to measure the perception of these potential biases with a representative from each of the Iberian fact-checkers studied, designated by the fact-checking institutions themselves. These representatives were asked questions related to their work and, specifically, their own perception of the biases they might have. The interviews were conducted online via the Microsoft Teams platform between November 27 and December 13, 2023, and lasted approximately 15 minutes. The five interviewees were selected by the fact-checking agencies studied based on their professional experience and positions held. Secondly, a quantitative analysis of the fact-checks published by each of the selected fact-checkers was conducted, aiming to provide objective data to contrast and provide meaning to the interviews. Records from the last full calendar year available, in this case 2023, were used. For this purpose, a repository of fact-checks contained in a database resulting from the Iberifier project was used. Access to the database was achieved through an API created in collaboration with the fact-checkers. The resulting database comprised a total of 2 323 fact-checks, tabulated using criteria agreed upon by the fact-checkers to unify the collected variables -headline, date, source, topic, formats, and verdict, amongst others-, the categories - "False alert", "False quote", "Manipulated content", "False context / False information", "Invent", "Satire", "Hoax", "Not specified", or "Other"-, and the verdicts -"True", "Misleading", "Manipulated", "False", "Not verifiable", "No evidence", or "Explainer".

Thirdly and finally, a content analysis was conducted to provide context for the fact-checks, with the aim of determining, taking into account the topic, meaning, and tone, what type of narrative was being debunked. To this end, each verification was tabulated based on whether the subject or content responded to interests or actions identifiable with the "left", the "right", or whether such a distinction was "not applicable", for example, denials referring to generic scams that encompass several denials of different kinds, or issues of diffuse scope.

The quantitative approach and content analysis were carried out by constructing a custom-designed data collection form (see Appendix). This allowed for the collection of identifying data (caption, headline, date, fact checker, and URL) and content data (source and type of disinformation and the fact checker's verdict) for each of the verified stories provided by the API. A third block was added to analyze potential biases (the target of the disinformation, which ideology it benefits, and contextual notes). The data obtained were subsequently processed using Google Forms for joint incorporation into a digital spreadsheet.

The three methods applied have a long tradition in social research. In the case of the interviews, they were conducted to find, through the interaction between the researcher and the stakeholders, specific answers regarding the object of study (Lanuez & Fernández, 2014) that would serve to identify relevant milestones. Second, the quantitative approach sought to objectify the incidence of these phenomena through particular features found in the sample, which is applied, in the words of Guevara et al. (2020), "when one wishes to describe, in all its main components, a reality" (p. 165). Finally, content analysis is, according to Krippendorff (2002), a research technique that aims to draw, from structured data, "reproducible and valid inferences that can be applied to their context" (p. 28), which helped to explain the statements made in the interviews and the quantitative data.

RESULTS

Interviews to the fact-checkers

As anticipated in the methodological section, our research first revealed the fact-checking professionals' self-perception regarding the potential biases that might exist within the fact-checking agencies themselves. Based on previous studies, such as that by Baptista et al. (2022), the five

fact-checkers (selected by the fact-checking agencies themselves based on their experience and positions held) were asked a first question about whether or not they observed political biases in some fact-checking platforms. If the answer was affirmative, but not argumentative, the plan was to delve deeper into a second question that would address what they saw as those biases. And, whether the answer was affirmative or negative, if it did not address the intensification of the phenomenon around periods of high news activity, such as electoral processes, the fact-checkers were specifically asked about this issue. Generally speaking, it can be said that the fact-checkers interviewed deny, outright, that bias influences their work in the profession they belong to. However, they also introduced interesting nuances that are worth considering. EFE Verifica suggests, for example, that fact-checkers "are subjects, therefore, simply the fact of selecting is influencing our way of thinking, but I believe that verification work in Spain is very honest". Along similar lines, Verificat states they belief:

Quite a bit in the work that fact-checking agencies do. And they tend to be quite rigorous. Obviously, there may be some bias, because verifications are done by people; but the very fact that so many people have to be involved when it comes to issuing a verdict also makes it possible to neutralize biases.

Along similar lines, Newtral asserts that "we all have our opinions on things, [but the work of the fact-checking coordination] is to prevent these biases from proliferating". They also argue that there are issues that are not debatable –figures, dates, etc.— and they aim to focus fact-checking on this. "Then there may be other issues that are more debatable, but there we might write an explanatory piece or share what is known ... I think biases exist, but our job is to try to reduce them to a minimum".

In relation to this prevention of bias, the counterbalancing of the verification networks alluded to by Maldita.es is also interesting, since membership "in international organizations [entails] a methodology and a series of commitments. There you already have a policy of neutrality". This does not mean that the production of fact-checks

yields an equalized balance between misinformation of one persuasion and another, something with which a majority of the fact-checkers interviewed seem to agree. They continue to explain, in this sense:

It is true that if you start verifying in the United States, being totally impartial, you will surely refute Donald Trump's side more than Biden's side. I mean, it does not mean that the Democrats do not lie ... but if Trumpism is practically being strengthened by disinformation, if you start fact-checking, you will surely refute Trump much more.

Therefore, at Maldita.es they believe that if you do:

a purely numerical analysis of how much the fact-checkers debunk one side and how much they refute the other, then you may also be starting from an incorrect premise, that "there is the same amount of disinformation on both sides of the political spectrum".

In a similar vein, EFE Verifica agrees that it is unwise to try to generate balanced production based on the ideological orientation of disinformation disseminators, "because some spread more disinformation than others ... there is evidence that some have developed disinformation strategies ..." Drawing a parallel with the quote that said "democracy does not consist of giving Nazis a minute to explain themselves and Jews a minute to explain themselves", they continue, "fact-checking cannot always be neutral because not everyone spreads disinformation equally". "Neutrality in this", they conclude, "doesn't work; you have to be honest".

Polígrafo, in line with other fact-checkers who use a similar approach, refuses to judge the work of their colleagues; but they do highlight a tendency toward politicization that transcends fact-checkers and extends to the entire media landscape. "Sometimes they go too far; [the media] try to be militant for a cause, and this leads to errors ... I wouldn't say bias, but there is a tendency". For this fact-checker, "the media is becoming something similar to propaganda, and even [when what you say] is true, we have to maintain a certain distance and be skeptical". These patterns are seen during election periods, but in general:

It happens at times when society is mobilized or focused on something. It happened during the pandemic, at the beginning of the war in Ukraine ... it's something that impacts or manages to attract the interest of the entire society and has a great impact on it.

Quantitative approach

As explained in the methodology section, once the impressions of the interviewees representing each of the fact-checking agencies were collected, a database of their work was created. During the calendar year analyzed, which runs from January 1 to December 31, 2023, both days inclusive, the five fact-checking agencies analyzed published a total of 2323 verifications of various kinds. At this point, a quantitative approach to the verified content was carried out to provide a description that would allow for its dimensionality (Figure 1).

In this regard, the first thing to be observed is an unequal distribution among the five fact-checking agencies, as two-thirds of the sample correspond to the publications of two of them (Newtral, with 919, and Maldita.es, with 806, totaling 39.56% and 34.7%, respectively). The publication frequency, and therefore the contribution of Polígrafo (with 326 verifications, 14.03 % of the total), EFE Verifica (172, 7.4 %), and Verificat (100, 4.3%) are lower. Through this quantitative approach to the content under analysis, it is pertinent to address the impact of each fact-checking agency on both the category of content published and the type of verdict issued, beyond its weight in the total sample. Of all the categories, the most common is "False context / False information", which accounts for, in order, 80.81% of EFE Verifica's content, 36.24% of Newtral's content, 27.61% of Poligrafo's content, and 20.22% of Maldita.es' content. A lower incidence is only observed in Verificat, at 7%. Following this category are other notable categories, such as "False quote", which appears in 59.51% of Poligrafo's content and 22.09 % of Newtral's content.

There are also other notable categories for fact-checkers to consider. For example, in the case of Newtral, "Invented content" accounts for 20.13%, and "Manipulated content" accounts for 12.3%. Meanwhile, on Maldita.es, the prevalence of "Scam" stands out, accounting for 12.43% of the content, although the majority –54.71%— is categorized

FIGURE 1
ANATOMY OF VERIFICATIONS: TOTAL DISTRIBUTION AND PERCENTAGE
BY CATEGORY AND VERDICT

Distribution						
919		8	06	326	172 100	
				■ EFE		
	Newtral	Maldita.es	Polígrafo	Verifica	Verificat	
By category						
False content	0.87	0.12	2.15	0.58	2.00	
False quote	22.09	1.36	59.51	1.74	2.00	
Manipulated	12.30	6.33	5.52	7.56	3.00	
content						
False Ctxt. / Inf.	36.24	20.22	27.61	80.81	7.00	
Invent	20.13	3.97	0.92	0.58		
Satire	0.54	0.74		2.33		
Scam	4.24	12.53	1.84		2.00	
Unspecified					84.00	
Other	3.59	54.71	2.45	6.40		
By verdict						
True	0.33	17.49	0.92			
Misleading	20.35		1.84	2.33	7.00	
Manipulated			4.29	6.40		
False	59.85	63.40	90.49	77.91	22.00	
Not verifiable					19.00	
No evidence		1.49		2.33		
Explainer	19.48	17.62	2.45	11.05	52.00	

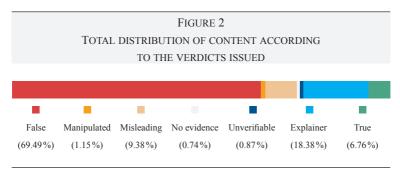
Source: The authors.

as "Other". Finally, it is noteworthy that on Verificat 84% of the total is categorized as "Unspecified".

Finally, it is also interesting to address the distribution of content based on the verdict issued, an aspect considered in the objectives described. In a general approximation (Figure 2), and taking into account that the sample is strongly influenced by the predominance of publications from Newtral and Maldita.es, a significant imbalance is

observed: 69.49% of the verdicts are "False", compared to just 6.76% that are "True".

The imbalance is even greater if the negative verdicts are grouped together –"False" itself, along with "Manipulated" and "Misleading"–reaching 80%. The remainder of the sample would comprise verdicts that are essentially neither negative nor positive, specifically "Explainer" (18.38% of the total), "Not verifiable" (0.87%), and "No evidence" (0.74%).



Source: The authors.

Analyzing the distribution of verdicts by fact-checker, it is observed that the majority of "False" is almost monopolistic on Polígrafo, with 90.49% of its publications; as well as the majority on EFE Verifica, with 77.91%; Maldita.es, with 63.4%, and Newtral, with 59.85%, in addition to 22% on Verificat, the only one where it is not the majority verdict.

In contrast, it is striking that the "True" verdict is found in only 17.49% of the content on Maldita.es, the fact-checker that most frequently uses it, falling to 0.92% of the content on Poligrafo, and 0.33% on Newtral, while EFE Verifica and Verificat have not recorded any cases. At the individual fact-checker level, it's worth highlighting some specific incidents, such as Newtral, which reported 22% of its verified content as "Misleading", or Verificat, which considered 19% of its content "Not verifiable", the only fact-checker to use this verdict.

The "Explainer" verdict deserves special mention. This does not correspond to a verdict per se, but rather to a type of explanatory content

created by the fact-checkers to provide context. This resource was used by Verificat in the majority of its content (52%), with significant incidents also occurring in Newtral (19.48%) of its content), Maldita.es (17.62%) and EFE Verifica (11.05%).

CONTENT ANALYSIS

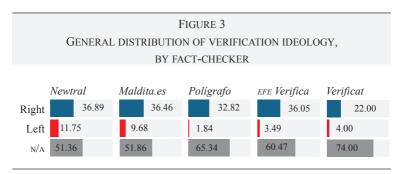
The content analysis applied to the 2 323 verifications that make up the sample reveals different types of publications by the fact-checkers. Most are political, social, or economic in nature and are dedicated to refuting, qualifying, or, to a lesser extent, confirming claims contained in politicians' speeches, media headlines, or messages on social media and messaging platforms. Others, numerous but less prevalent, focus on warning about potential hoaxes or scams targeting the public. This investigation focuses primarily on the former, as they are the ones that most directly express an ideological position.

Within this heterodox set of publications, there is a significant number of disinformation articles referring to broad and complex arguments, in some cases recurring over time, and of an international nature. Rather than specific hoaxes, these are pieces of more elaborate narratives that mostly display lines of discourse that coincide on recognizable points: opposition to immigration, opposition to globalism, environmental denialism, anti-scientism, and criticism of minorities —sexual, gender, or any other type— amongst other issues close to the discourse of the international alt-right.

These narratives are embodied in specific pieces of disinformation that, together, are woven into multifaceted and interconnected discourses. For example, one can criticize State interventionism for its financial support of gender policies, while simultaneously denouncing the alleged abuse of a transgender person in a women's sports competition. There are similar examples in many areas: linking immigration with crime and receiving State aid, and the squandering of public resources by the State to buy immigrant votes. Or, to cite another example, pointing to electric cars as major polluters, denying climate change due to a cold snap, and claiming that governments and supranational organizations want to restrict the consumption of animal meat to promote the consumption of insects.

The specificity of these narratives adapts to different news events, as well as to local specificities. Thus, for example, criticism of immigration reflected in Spanish fact-checks tends to focus on North Africans and Latinos, while Portuguese fact-checks focus on sub-Saharan Africans. Similarly, in Portugal, critical narratives about the country's image or development are common, while in Spain they focus on issues more closely linked to political polarization.

Alongside these broad narratives, especially in the case of Spanish fact-checks, there are reactive local publications; that is, fact-checks issued in response to recent statements or publications that are highly oriented toward national news. There is also a significant amount of disinformation from foreign countries that varies depending on current events, for example, the invasion of Ukraine, the unrest in France, or the Israeli offensive on Gaza. Through content analysis, the registered publications were classified based on whether the verified arguments respond to a left-wing or right-wing ideology or whether such a classification would not be applicable (N/A), that is the case in most cases. Within the content that does reflect an ideological tendency, a first structural bias is already observed: between 22% and 38% of it is consistent with a right-wing tendency, while left-wing content is reflected in only between 1.84% and 11.75% of cases (Figure 3).



Source: The authors.

In fact, the two fact-checking agencies with the highest publication volume are precisely those with the lowest "does not apply" rates, highlighting incidences that, despite being greater, do not obscure this

imbalance: in the case of Newtral, 36.89% of the verified content is right-wing, compared to 11.75% left-wing; while at Maldita.es the gap rises to 38.46% versus 9.68%. In both cases, the difference is between three and four times greater. To further analyze the results, a second measurement was performed, which included only content with a clear ideological bias -ignoring publications labeled as "not applicable" – and quantifying the bias by subtracting the resulting percentage of left-wing content from that of right-wing content on a scale ranging from -1 to +1, where -1 represents 100% of published content with a left-wing bias, +1 represents 100% of published content with a rightwing bias, and 0 represents an even distribution. The overall mean for all content was 0.61, designated as the reference mean for the detailed distribution of results. Once the overall mean was known, the calculation was estimated individually for each fact-checker, each category of published content, and each type of verdict (Figure 4). The initial interpretation of the data is that all measurements yield positive values, indicating that in all cases there are more fact-checks of content with right-wing ideologies than left-wing ideologies.

Certain differences are observed between the fact-checkers. This is the case, for example, with Newtral and Maldita.es, which, in addition to publishing the most content, show the least pronounced bias within the imbalance, with values of 0.52 and 0.6, respectively. Verificat, the one with the lowest publication rate, is close behind with a value of 0.69. The two fact-checkers with the highest publication bias are EFE Verifica, with a value of 0.82, and Polígrafo, with 0.89.

The differences are greater when looking at the publication category, but in this case, it is worth considering the number of items in each. Thus, the "False alert" and "Scam" categories show a value of 1—the farthest right possible—but it should be noted that in these cases the samples are only three and one item, respectively. The same is true for the categories "Satire" (12 items) and "Unspecified" (17 items), which obtained values of 0.17 (the lowest bias of all) and 0.76, respectively.

The remaining categories are more representative, from the least biased ("Manipulated content", with a value of 0.21 for 73 cases), to "Invented" (0.77 for 113), to "False quote" (0.41 for 239), to "Other" (0.69 for 276), and to "False context / False information" (0.75 for

FIGURE 4

LOCATION IN LEFT-RIGHT RANGE OF THE INCIDENCE OF FACT-CHECKS



Source: The authors.

308). It so happens that, with the exception of "Invented", the greater the number of items, the greater the right bias.

Regarding the analysis focused on verdicts, it is again observed that some have a sample size too small to be taken into account in the resulting values: these are "Not verifiable" (with only one element), "Manipulated" (with six), and "No evidence" (with seven). Aside from these, and in order of incidence, there are "True" (with 47 elements for a value of 0.53), "Misleading" (with 142 and a value of 0.23, close to equilibrium), "Explainer" (with 182 and a value of 0.79), and "False" (with 657, almost two-thirds of the resulting sample and a value of 0.65).

DISCUSSION

The rise of disinformation and its consequences for the health of democracies highlights the importance of fact-checking agencies in the current communications landscape. Nevertheless, the participation of these fact-checkers responds, as is the case with the media, to competitive logics for audience capture. This leads to significant imbalances amongst them, for instance, in the amount of content they publish and the approach they give to it, as well as the topics they cover, which do not always coincide. These logics do not, however, undermine the critical importance of their work in revealing disinformation practices that seek to influence public opinion, as previously pointed out by authors such as Luengo and García Marín (2020) and Fridkin et al. (2015).

At this point, several fundamental questions arise, once the conflict and ideological imbalances are confirmed, which could shed light on future research. For example, whether the conflict approach, which denotes a more reactive tendency toward disinformation than a proactive one in prevention, is the most appropriate strategy for combating disinformation. In this regard, it is worth considering whether a higher incidence of confirmations—expressed in this case as positive verdicts of "true" or, at least, "true with nuances"—could represent a useful and constructive contribution, or, on the contrary, not. It is quite possible that, in a context of massive disinformation, the role of fact-checkers should focus on countering rather than proposing, and on debunking rather than educating about the reliability of information.

However, the most pressing question in light of the results lies in clarifying the reason behind the imbalances detected, as previously indicated: whether it is due to the fact that the scope of right-wing disinformation is much greater than that of left-wing disinformation, and in that case, the selection is correct, and the bias is structural. Or, on the contrary, if it is due to the fact-checkers' own selection bias, which could be focusing more on one side of the ideological axis than the other. In the interviews, the fact-checkers themselves point to this nuance to explain that such a fact might not be due to bias but rather the logical consequence of a reality: the fact that there is more disinformation of one persuasion than another makes an imbalance inevitable.

Authors such as Baptista et al. (2022), Lowrey (2017), and Marietta et al. (2015) have previously addressed biases in fact-checkers themselves, but the question must go beyond identifying them and focus on whether or not they respond to a structural and justified motive.

In this sense, it would also be worth proposing, as a limitation of this work and a possible line of future research, to continue delving into in-depth interviews with fact-checkers and making them a central element of the research and not just an exploratory technique. The recent research by García-Marín et al. (2023) analyzed Newtral's treatment of Spanish political parties and concluded that no significant differences were observed, but that there was a higher incidence of fact-checks against the Popular Party that "could indicate a selection bias" (p. 220), which our research also points to.

Finally, given the geographical scope of the proposed research, it would be interesting to conduct similar analyses in other European regions and other continents to determine whether the same imbalances exist globally. If they are replicated with a similar incidence, it would be worth asking whether this could be due to widespread biases in the sector, although they could also point to the existence of far-reaching right-wing disinformation narratives. This would open interesting lines of research into the possible existence of a disinformation phenomenon linked to a particular ideology, delving into its possible connections and coordination on a global scale.

CONCLUSIONS

This research aimed to determine whether bias exists in the work of leading fact-checkers in Spain and Portugal. To provide context, three secondary objectives were defined. The first was to determine whether a conflict bias existed, meaning that the verdicts issued contained a significantly higher proportion of denials than confirmations. A quantitative approach to content demonstrates an unequal distribution of verifications across several dimensions. First, from the fact-checkers, with Newtral and Maldita.es accounting for almost three-quarters of the total. Second, with categories such as "False context / false quote" and "Manipulated content", which are the most common categories in the verdicts. Third and finally, in line with what Muddiman and Scacco (2023) pointed out, there is a very notable incidence of content with a "False" verdict, accounting for up to 80% of the total, including the "Manipulated" and "Misleading" verdicts. "True" barely reaches 6.76% of the total.

The second secondary objective was to analyze whether there were ideological biases in the disinformation studied, in this case, whether more right-wing disinformation than left-wing disinformation was debunked. In this sense, the interviews confirm that there is, even amongst the fact-checkers themselves, a perception that much more right-wing than left-wing content is fact-checked. The subsequent quantitative approach and content analysis confirm not only that such a right-wing imbalance exists, but also that it is widespread, not only across all fact-checkers but also regardless of the categorization of the disinformation or the verdict issued, in line with what has been detected in other countries where political disinformation was widespread (Allcott & Gentzkow, 2017; Alonso-López et al., 2021).

The third secondary objective sought to analyze which variables account for both imbalances –the fact that there are more denials than confirmations, and more disinformation narratives processed from the right than from the left– specifically, whether they occur with greater or lesser incidence depending on the fact-checker or the type of verdict. Two striking trends are observed at this point: on the one hand, it is generally the case, although not always, that the greater the number of verified ele-

ments, the greater the right-wing tilt. On the other hand, it is observed that the "True" verdicts present a lower imbalance (0.53) than the "False" ones (0.65), and much lower than the "Explainer" ones (0.79), which would indicate that the "True" ones are slightly more transversal towards the left, and that the agencies use more explanatory genres, especially to provide context about broad right-wing narratives.

FUNDING

This work was supported by the Iberifier Plus project, co-funded by the European Commission under the Call DIGITAL-2023-DEPLOY-04, European Digital Media observatory (EDMO) – National and multinational hubs, grant number: Iberifier Plus – 101158511, and has been supported by the Vice-Rectorate for Research, Transference, and Scientific Dissemination of CEU San Pablo University.

Bibliographic references

- Allcott, H., & Gentzkow, M. (2017). Social media and fake news in the 2016 election. *Journal of Economic Perspectives*, 31(2), 211-236. https://doi.org/10.1257/jep.31.2.211
- Alonso-López, N., Sidorenko-Bautista, P., & Giacomelli, F. (2021). Beyond challenges and viral dance moves: TikTok as a vehicle for disinformation and fact-checking in Spain, Portugal, Brazil, and the USA. *Anàlisi: Quaderns de Comunicació i Cultura*, *64*, 65-84. https://doi.org/10.5565/rev/analisi.3411
- Baldi, V., & Ballesteros-Aguayo, L. (2023, June 14-46). *Bulos, IA y fact-checking en Portugal y en España: alfabetización mediática como antidoto contra la posverdad*. Congreso Internacional sobre Posverdad, Universidad de Granada, Granada, Spain. https://hdl. handle.net/10630/30770
- Baptista, J.-P., Jerónimo, P., Piñeiro-Naval, V., & Gradim, A. (2022). Elections and factchecking in Portugal: the case of the 2019 and 2022 legislative elections. *Profesional de la Información*, 31(6), e310611. https://doi.org/10.3145/epi.2022.nov.11
- Batista, F., Bueno, N. S., Nunes, F., & Pavão, N. (2022). Fake News, Fact Checking, and Partisanship: The Resilience of Rumors in the

- 2018 Brazilian Elections. *The Journal of Politics*, *84*(4), 2188-2201. https://doi.org/10.1086/719419
- Borges do Nascimento, I. J., Pizarro, A. B., Almeida, J. M., Azzopardi-Muscat, N., Gonçalves, M. A., Björklund, M., & Novillo-Ortiz, D. (2022). Infodemics and health misinformation: a systematic review of reviews. *Bulletin of the World Health Organization*, 100(9), 544-561. https://doi.org/10.2471/BLT.21.287654
- Chan, M. S., Jones, C. R., Jamieson, K. H., & Albarracin, D. (2017). Debunking: A Meta-Analysis of the Psychological Efficacy of Messages Countering Misinformation. *Psychological Science*, *28*(11), 1531-1546. https://doi.org/10.1177/0956797617714579
- Chen, S., Xiao, L., & Kumar, A. (2023). Spread of misinformation on social media: What contributes to it and how to combat it. *Computers in Human Behavior*, *141*, 107643. https://doi.org/10.1016/j.chb.2022.107643
- Cornellà, A. (2000). *Cómo sobrevivir a la infoxicación* [Transcription]. Conferencia del Acto de Entrega de Títulos de los Programas de Formación de Posgrado de la UOC. https://bit.ly/4eXWzo2
- Ecker, U. K. H., Lewandowsky, S., Fenton, O., & Martin, K. (2014). Do people keep believing because they want to? Preexisting attitudes and the continued influence of misinformation. *Memory & Cognition*, 42, 292-304. https://doi.org/10.3758/s13421-013-0358-x
- Ekström, M., Lewis, S. C., & Westlund, O. (2020). Epistemologies of digital journalism and the study of misinformation. *New Media and Society*, 22(2), 205-212. https://doi.org/10.1177/1461444819856914
- Fridkin, K., Kenney, P. J., & Wintersieck, A. (2015). Liar, liar, pants on fire: How fact-checking influences citizens' reactions to negative advertising. *Political Communication*, *32*, 127-151. https://doi.org/10.1080.10584609.2014.914613
- García-Marín, D., Rubio-Jordán, A. V., & Salvat-Martinrey, G. (2023). Chequeando al fact-checker: prácticas de verificación política y sesgos partidistas en Newtral (España). *Revista de Comunicación*, 22(2), 207-223. https://doi.org/10.26441/RC22.2-2023-3184
- Guevara, G., Verdesoto, A., & Castro, N. (2020). Metodologías de investigación educativa (descriptivas, experimentales, participativas, y de investigación-acción). *RECIMUNDO*, 4(3), 163-173. https://doi.org/10.26820/recimundo/4.(3).julio.2020.163-173

- Hameleers, M. (2023). The (Un)Intended Consequences of Emphasizing the Threats of Mis- and Disinformation. *Media and Communication*, *11*(2), 5-14. https://doi.org/10.17645/mac.v11i2.6301
- Kapantai, E., Christopoulou, A., Berberidis, C., & Peristeras, V. (2020). A systematic literature review on disinformation: Toward a unified taxonomical framework. *New Media & Society*, *23*(5), 1301-1326. https://doi.org/10.1177/1461444820959296
- Kappes, A., Harvey, A., Lohrenz, T., Montague, P. R., & Sharot, T. (2020). Confirmation bias in the utilization of others' opinion strength. *Nature Neuroscience*, *23*(11), 130-137. https://doi.org/10. 1038/s41593-019-0549-2
- Krippendorff, K. (2002). *Metodología de análisis de contenido. Teoría y práctica*. Paidós.
- Jerónimo, J., & Sánchez, M. (2023). Jornalistas Locais e Fact-Checking: Um Estudo Exploratório em Portugal e Espanha. *Comunicação e Sociedade*, 44, 1-18. https://doi.org/10.17231/comsoc.44(2023).4553
- Lanuez, M., & Fernández, E. (2014). *Metodología de la Investigación Educativa*. IPLAC.
- Lowrey, W. (2017). The emergence and development of news fact-checking sites: Institutional logics and population ecology. *Journalism Studies*, *18*(3), 376-394. https://doi.org/10.1080/146167 0X.2015.1052537
- Luengo, M., & García-Marín, D. (2020). The performance of truth: politicians, fact-checking journalism, and the struggle to tackle Covid-19 misinformation. *American Journal of Cultural Sociology*, 8(3), 405-427. https://doi.org/10.1057/s41290-020-00115-w
- Marietta, M., Barker, D. C., & Bowser, T. (2015). Fact-checking polarized politics: Does the fact-check industry provide consistent guidance on disputed realities? *The Forum*, *13*(4), 577-596. https://doi.org/10.1515/for-2015-0040
- Muddiman, A., & Scacco, J. M. (2023). The Influence of Conflict News on Audience Digital Engagement. *Journalism Studies*, 25(3), 278-298. https://doi.org/10.1080/1461670X.2023.2296028
- Navarro-Sierra, N., Magro-Vela, S., & Vinader-Segura, R. (2024). Research on Disinformation in Academic Studies: Perspectives through a Bibliometric Analysis. *Publications*, *12*(2), 14. https://doi.org/10.3390/publications12020014

- Paniagua, F., Seoane, F., & Magallón-Rosa, R. (2020). Anatomía del bulo electoral: la desinformación política durante la campaña del 28-A en España. Revista CIDOB d'Afers Internacionals, 124, 123-145. https://doi.org/10.24241/rcai.2020.124.1.123
- Reuters Institute. (2024). *Digital News Report 2024*. https://bit. ly/3RYGQvs
- Rodrigo-Ginés, F. J., Carrillo-de-Albornoz, J., & Plaza, L. (2024). A systematic review on media bias detection: What is media bias, how it is expressed, and how to detect it. *Expert Systems with Applications*, 237(C), 121641. https://doi.org/10.1016/j.eswa.2023.121641
- Roniger, L., & Senkman, L. (2019). Senses of Self: Approaches to Pre-Reflective Consciousness. *ProtoSociology*, *36*, 542-569.
- Rosen, J. (2012). The People Formerly Known as the Audience. In M. Mandiberg (Ed.), *The Social Media Reader* (pp. 13-16). New York University Press.
- Salaverría, R., Buslón, N., López-Pan, F., León, B., López-Goñi, I., & Erviti, M. C. (2020). Desinformación en tiempos de pandemia: tipología de los bulos sobre la Covid-19. *Profesional de la Infor-mación*, 29(3), e290315. https://doi.org/10.3145/epi.2020.may.15
- Singer, J. B. (2018). Fact-checkers as entrepreneurs: Scalability and sustainability for a new form of watchdog journalism. *Journalism Practice*, *12*(8), 1070-1080. https://doi.org/10.1080/17512786.201 8.1493946
- Van Dijk, J. A. G. M. (2017). Digital divide: Impact of access. *The international encyclopedia of media effects*, *I*, 1-11, https://doi.org/10.1002/9781118783764.wbieme0043
- Vraga, E., & Bode, L. (2020). Correction as a solution for health misinformation on social media. *American Journal of Public Health*, 110(3), S278-S280. https://doi.org/10.2105/AJPH.2020.305916
- Wardle, C., & Derakhshan, H. (2017). *Information disorder. Toward an interdisciplinary framework for research and policy making* [Council of Europe report DGI (2017)09]. https://bit.ly/3SpxuZN

PROFILES

Borja Ventura-Salom

PhD in Journalism (Universidad Carlos III de Madrid, UC3M), MA in Media Research (URJC) and BA in Journalism (UCH). Lecturer at the Department of Journalism and Digital Narratives at San Pablo-CEU University (USP). Accredited as a doctoral collaborating professor by ANECA. Director of the Master's Degree in Digital Design and UX/UI at USP-CEU. Professor of the Master's Degree in Data Analysis and Disclosure and the Master's Degree in Corporate Communication, Politics and Lobbying, both at USP. Researcher at Iberifier Plus, a digital media observatory in Spain and Portugal promoted by the European Commission. Member of the technical editorial board of the journal *index.comunicación* (Scopus Q1). He has worked in media such as *Yorokobu*, *Atresmedia*, *elEconomista*, 20Minutos, Tiempo, ElDiario.es or Jot Down, among others.

Roberto Gelado Marcos

Senior lecturer in Journalism and Digital Narratives at CEU San Pablo University (Spain), with two six-year research periods from ANECA CNEAI (National Commission for the Evaluation of Research Activity). He holds a PhD in Communication and Strategic Management, MA in Gobal Media, BA in Journalism, and BA in Translating and Interpreting. He has been a lecturer since 2005 in the fields of communication theory, history of communication, film language, scriptwriting, communication ethics, rhetoric, political communication, leadership and communication skills. From September 2021 he is the PI of the USPCEU node in Iberifier, hub funded by the European Commission through the 2020 CEF Telecom Call – European Digital Media Observatory.

ANNEX

	FIGURE 5		
	DATA COLLECTION FOR	RM	
A. IDENTIFICATION	B. DATA	C. BIAS	
SCREENSHOT	V5. Disinformation source Article Facebook Picture Instagram URL Telegram Video X/Twitter Other Witter Other Other Other Other Other Other Other Other Other Other Other Other Other	V8. Who is it targeting to? (multiple) Community: Company: Institution: Country: Political Party: Individual: Religion:	
VI. Fact-check headline	····· 🛮 Satire		
V2. Date of publishing:/	☐ Other ☐ Not specified V7. Fact-checker verdict	Other: V9. To which ideology benefits?	
V4. Fact-checker: EFE Verifica Maldita.es Newtral Verificat Poligrafo	☐ Misleading ☐ Explainer ☐ False ☐ Manipulated ☐ Not verifiable ☐ No evidence ☐ True	Right Left N/A V10. Observations and context notes	

Source: The authors.