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DECOLONIZING NEWSMAKING ON YOUTUBE: THE CASE OF CLIMATE JOURNALISM DURING THE COP26 SUMMIT

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The 2021 United Nations Climate Change Conference (COP26) was a mega event of climate politics, attracting media coverage from around the world. The summit was a central forum for the negotiations of sustainable futures, climate justice and decoloniality. Leaders from all parts of the world gathered in Glasgow between October 31st and November 12th, 2021. The prime goal that the leaders envisioned was to limit global warming to 1,5 degrees Celsius in the foreseeable future. While the climate summit was extensively covered by numerous TV networks and discussed in a myriad of newspapers, the video-sharing platform YouTube served as a further arena where debates about the global event were broadcasted. Based on a comprehensive analysis of digital data retrieved from YouTube, we raise the following questions: To what extent were professional news corporations involved in the coverage of the 2021 Climate Change Conference on YouTube? Which actors are given the opportunity to drive the meaning of terms and debates associated with the summit COP26 on this platform from a central position in their network?

This paper is based on an investigation into the technosocial dynamics of distributing news within the platform ecologies of the Anthropocene. Recent climate disasters, such as bush fires, flooding and landslides, have been controversially debated on the Internet. This study contributes to understandings of the role of YouTube in newsmaking and climate change communication. The presented research also informs discussions on campaigns of misinformation. We retrieved relational data from the Application Programming Interface (API) v3 of YouTube. Using the software NodeXL for the data

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collection, the query 'COP26' was run. We center our study on network analysis, to investigate how the clustering of YouTube channels evolved during the summit COP26. The data was used to generate a visualization of a comment network and to create network centrality metrics.

The digital traces of activities that users leave on YouTube and other platforms can shed light on their platform practices, social relationships, and connectedness within online communities. In this investigation, we explore the traces of comments and replies to comments, which YouTube users leave under the title and date of a YouTube clip. Such comments provide critical insights into how users interact on YouTube. The post-video discussions can be examined to establish the structure of the network (Shapiro and Park, 2018). Gathered with the search query 'COP26', the data set for this investigation contains 17,439 nodes, which represent channels, and 32,172 edges, which represent comments. Furthermore, the network entails 70 connected communities. Three core metrics of network analysis were created in Gephi to assess the popularity of the network nodes: in-degree, out-degree, and PageRank. By calculating the in-degree of a YouTube channel, its relative influence can be established in terms of comments received for its posted videos. Numerous professional news corporations secured a high ranking in the in-degree analysis of the comment network of COP26 (see Table 1). The YouTube channels of BBC News, DW News, and Sky News received the highest scores. In other words, they are the YouTube accounts who attracted the most comments for their videos published during the data collection period. Nodes with a high in-degree can be considered hubs within a given network (Himmelboim et al., 2017). In the out-degree analysis for the researched network, climate activists and hobbyist journalists ranked high (see Table 1). The 20 top YouTube accounts which were identified through this metric published the most comments within the researched network. This outcome also indicates that established news corporations were not among the YouTubers who extensively commented on YouTube videos since they prioritized the publishing of already aired TV content or launched livestreams on the platform to reach out to wider audiences. Finally, the PageRank analysis provides a list of the most central actors in this comment network (see Table 1). The PageRank algorithm is used as a measure for the identification of opinion leaders in social network analysis. This type of centrality measures a node's importance or influence in a given network while considering the importance of its neighbors (Golbeck, 2013). An analysis of the PageRank scores for the researched comment network shows that the YouTube coverage of the mega event was dominated by established news corporations, such as BBC News, DW News, and Sky News. Furthermore, the list of the top five broadcasters for this YouTube comment network underlines the global significance of the summit as it includes professional news corporations from Britain, Germany, India, and the USA. Crucially, the YouTube channels of professional news corporations were in positions of high importance within the researched network and can be considered highly influential nodes that exerted their authorities within their connected communities. The network graph of the researched comment network illustrates how popular YouTube accounts are connected with other YouTube users (see Figure 1). Several clusters could be identified within the comment network.

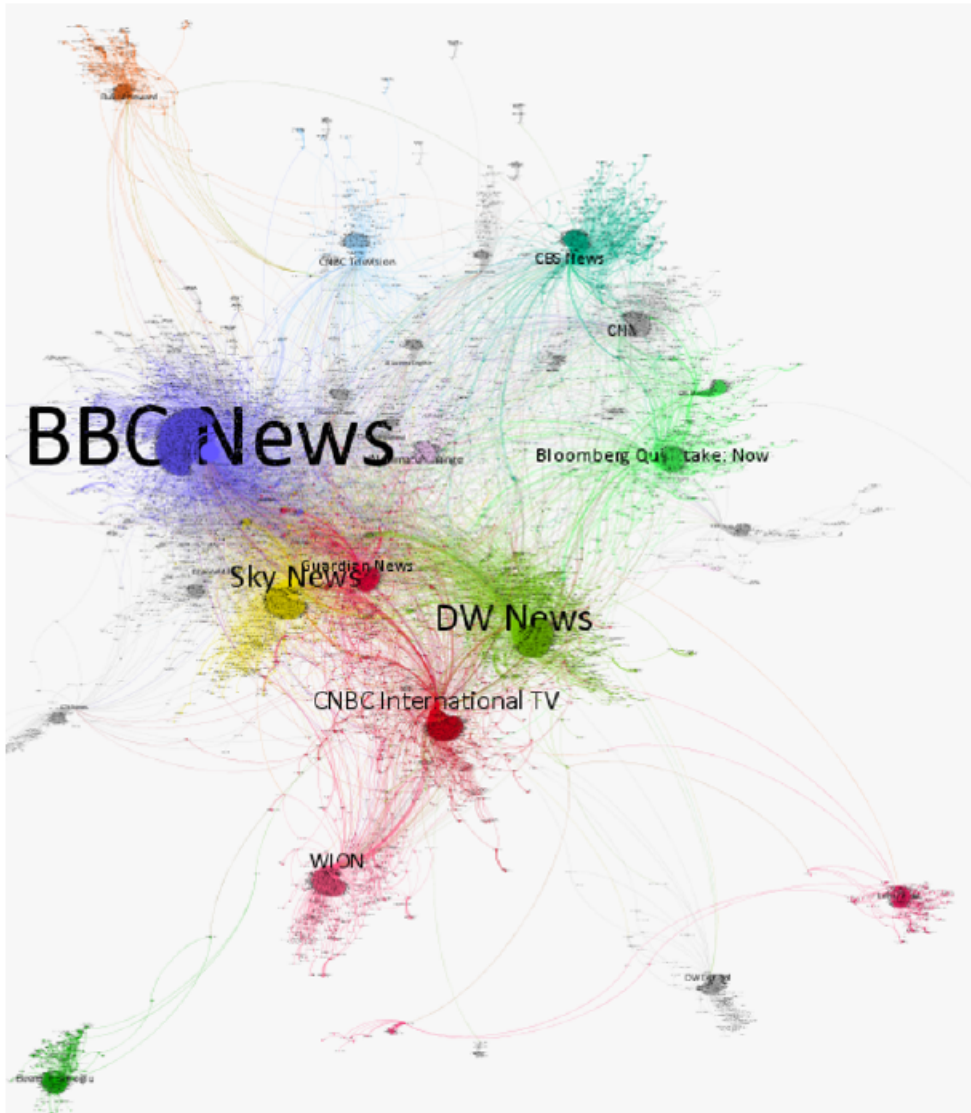


Figure 1: Graph of the YouTube Comment Network.

S.No.	Pagerank		In-Degree		Out-Degree	
	Label	Pageranks	Label	indegree	Label	outdegree
1	BBC News	28126	BBC News	3636	Xavier Zacheriah	45
2	DW News	12222	DW News	1590	Wolfie Street	39
3	Sky News	10182	Sky News	1498	Bink Willans	39
4	CNBC Internationals TV	8044	CNBC International TV	1076	Human Rights	36
5	WION	6622	WION	855	Mert	35
6	Bloomberg Quick-take: Now	5492	Bloomberg Quick-take: Now	726	spillarge	30
7	CNN	5036	CNN	718	AllTogetherNow	29
8	CBS News	4896	CBS News	690	Peter Bills	29
9	Guardian News	4747	Guardian News	666	ADAM ISKANDAR	26
10	UN Climate Change	3471	UN Climate Change	492	KRISHNKANT SINGH	23
11	CNBC Television	3201	CNBC Television	455	Public Public	23
12	Ekrem İmamoğlu	3133	Ekrem İmamoğlu	382	Bob Mule	23
13	Russell Howard	2499	Channel 4 News	334	daddymulk	22
14	LeHuffPost	2406	DW Español	292	Naveen Kumar	22
15	DW Español	2311	Russell Howard	279	SSNNNAAKKEEE!	21
16	Channel 4 News	2176	LeHuffPost	277	jean-claude schwartz	21
17	CBS Mornings	1685	Financial Times	270	{JS}	20
18	Financial Times	1681	CBS Mornings	255	Marvin Westmaas	19
19	CNBC Internationals	1237	Al Jazeera English	170	Gent X	19
20	CTV News	1235	Yahoo Finance	156	TÜRKIYE NİMVATANIM	19

Table 1: Pagerank, In-degree, and Out-degree scores for the 20 top YouTube Channels.

The COP26 event epitomizes a transmission of professional TV formats to the participatory platform and its infiltration with TV news content. Based on a comprehensive analysis of the researched comment network, we argue that professional news corporations acted as opinion leaders during the coverage of the 2021 Climate Summit on YouTube. Journalists combining discourses of climate justice with claims for decolonialization found their voice during COP26. One of their main arguments for acknowledging colonial pasts in climate change communication emphasizes the longstanding carbon footprints of Western countries. The limitations of the investigation into the YouTube coverage of COP26 primarily concern the data collection constraints of the platform. The social network data for this investigation entailed information on YouTube channels and comments to their videos. Other crucial features of the platform, such as metrics about the watch-time of videos and the ‘thumb up’ endorsements, were not considered during the data analyses. The theoretical implications of this investigation relate to the formation of a diverse, global transmedia ecology, within which claims for climate justice are increasingly negotiated. On a practical level, this study implies that climate change activism should be tailored for the global audiences congregating on digital platforms and its findings are highly beneficial for practitioners who engage in political campaigns on digital platforms. Future investigations into the negotiations of climate change at mega events can further assess the formation of Anthropocene media and climate action on digital platforms. Furthermore, we also call for further mixed-method research combining in-depth analyzes of situated media practices with digital methods, such as computational network analysis and natural language processing techniques.

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