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INDIAN MEDIA SHOWS A POSITIVE SCIENTIFIC COVERAGE IN NATION MAKING DURING PANDEMIC COVID-19 SITUATION: A PEDAGOGIC STUDY OF NEWSPAPERS OF 10 METRO CITIES

¹Ratul Datta¹ (*Communicating author*), ²Prof. Dr. Tapati Basu D.Litt.

¹Ph.D. Research Scholar, ²Ex Professor and Ex HOD

^{1,2}Department of Journalism and Mass Communication, University of Calcutta

¹Address for communication: 64/A, DR NILMONI SARKAR STREET, FLAT-D/3, KOLKATA-700090

Abstract: The World Health Organization (WHO) has already declared the corona virus outbreak as global pandemic of international concern and to curb the scourge of the disease 2019-nCoV acute respiratory disease, Government of India already declared national lockdown-1 for 21 days on 24th March, 2020. In consecutive ways, nation shows 4 phased lockdown with 3 phased unlock period. Meanwhile, Indian newspapers have already boosted up with this coverage and have shown the proliferated enhancement of space share of positive scientific coverage and always discarded fake news. Here, in this research paper, 10 major circulated English newspapers were selected from 10 metropolitan cities and space share along with total no of science news were analyzed. 10 metro cities are Delhi, Kolkata, Mumbai, Chennai, Guwahati, Bhubaneswar, Bangalore, Jaipur, Chandigarh and Srinagar. Also 10 selected sample newspapers are The Hindustan Times for Delhi, The Telegraph for Kolkata, The Hindu for Chennai, The Times of India for Mumbai, The Assam Tribune for Guwahati, The New Indian Express for Bhubaneswar, Deccan Herald for Bangalore, The Indian Express for Jaipur, The Tribune for Chandigarh and lastly Kashmir Times for Srinagar. It has been found that; space share of science news has already risen to 64 percent and is still increasing. Another findings has shown that media is giving more attention to publish unscientific advertisements as well as given more emphasis to adjust to a new neo-normal life with social distancing, work from home and virtual meetings for future nation building.

Index Terms – WHO, Covid, Corona, Lockdown, newspaper, unlock period, media, respiratory disease

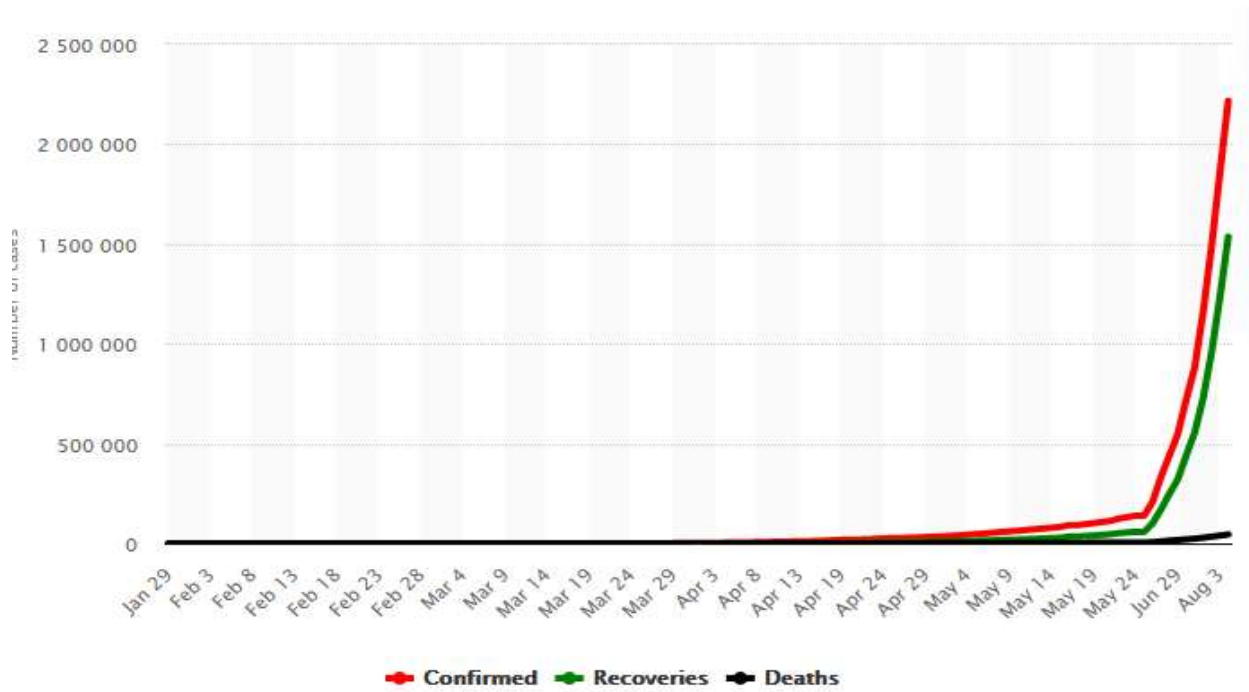
1. INTRODUCTION AND BACKGROUND:

In this most timely research work in India, it is not the only intension to find the present scenario of Covid-19 pandemic, but also to find out how science journalism can dominate the whole media market, to aware and to build up the nation and how a media can play crucial role against fake news. This study will also help the upcoming and budding media professionals to show the new way of nation making jobs through mass media and it has again been proved that science cannot be decayed and wiped off. This study will also show the way how media plays the perfect role of 4th pillar of democracy regarding mass communication of global scientific pandemic issues to the remote villages-panchayats.

It is to be mentioned that everywhere, in every corner of newspapers there has been a reflection to reach science communication to every common people from children to students, from farmers to workers, from vegetable sellers to doctors-media professionals etc. Corona epidemic has again proved the fact that sustainable development is closely related to science journalism and every people in every corner should be aware of that for inclusive growth where nation building is the only backbone. It is also proves again that science journalism is very much needed and the country like India, political news, crime news, sports news, financial news and even entertainment news should not dominate science news. In this regard, to cater scientific news on 2019-nCoV, media of India has become very pragmatic, realistic, timely bounded, updated and also crucial weapon.

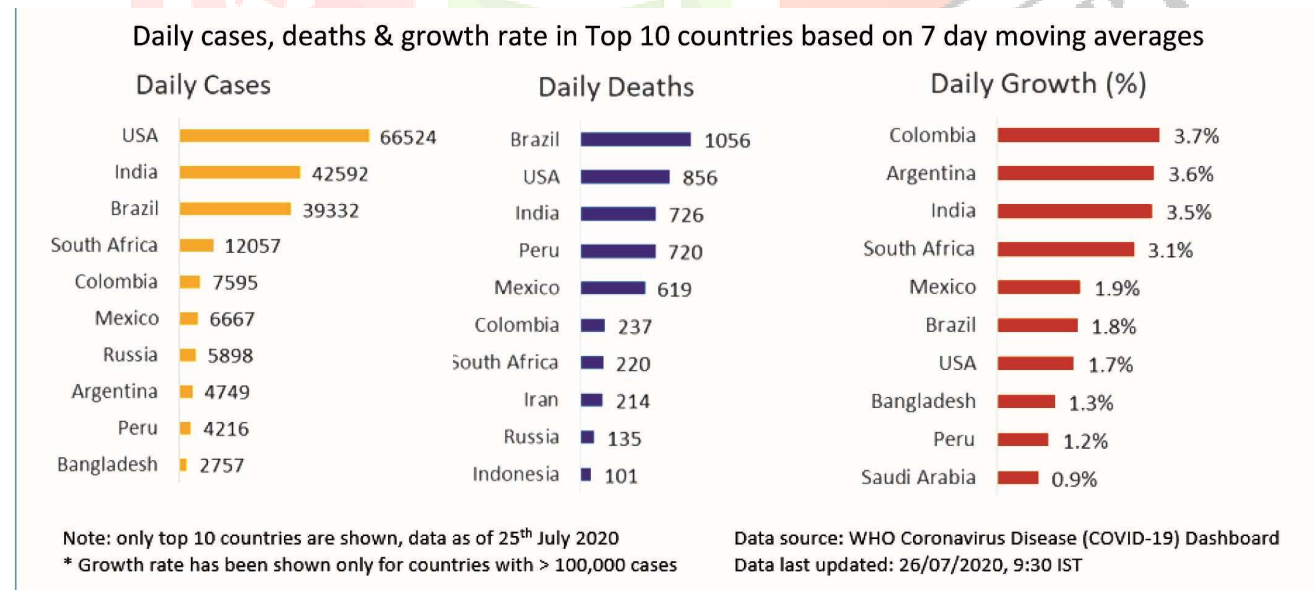
If timeline development of Covid-19 in India and globally is considered, it is found that, on (i) 11th March, 2020 World Health Organization (WHO) declared this epidemic as pandemic (ii) On that very day, under the direction of Prime Minister of India, high level ministry group was constituted to close monitor of this outbreak (iii) On 14th March, 2020 totally 84 positive cases were confirmed in India including 2 deaths. On that day, 13 states have already been reported with Covid-19 cases. On that day, globally, 1 lakh 32 thousand 758 cases were become positive with 4955 deaths. (iii) Janata Curfew was already called for and on 22nd March, 2020 i.e. just before the national lockdown declaration in the history of India, total figure of India was raised to 360 in total with 7 deaths and 23 states were already been affected. iv) For the 1st time in Indian history, National Lockdown-1 was declared for 21 days under section 6(2) (i) of

Disaster Management Act, 2005. On that day, India had 909 active cases with 19 deaths in 27 states and union territories. On that very day, globally, 20, 834 death figure was confirmed along with 4,46, 684 positive cases v) After video conferencing and consultation with all chief ministers of every state of this country, Prime Minister declared the extension of National Lockdown-1 to National Lockdown-2, till 3rd May, 2020. vi) Phase-2 lockdown occurred from 15th April 2020 to 3rd May, 2020 for 19 days vii) 3rd phase lockdown declared from 4th May 2020 to 17th May, 2020, for 14 days and lastly, for 4th phase, from 18th May, 2020 to 31st May 2020 i.e. for 14 days again viii) Consecutive 3 unlock period nation has faced from 1st June to 30th June, 1st July to 31st July and 1st August to 31st August 2020. Hence, in this long lockdown and unlock period, nationwide medias has played crucial role regarding coverage of covid-19 related news.



Graph 1 showing continuous increase of CCovid-19 cases in India with recovery and death cases

2. COVID-19 AND THE MEDIA: THE ROLE OF JOURNALISM IN A GLOBAL PANDEMIC



Graph 2 showing continuous increase of CCovid-19 cases, deaths and growth in India with comparison to other countries

The COVID-19 pandemic is disrupting every industry. For the media sector, coronavirus creates both opportunities and challenges. To inform the public during these uncertain times, newsrooms across the country have made pandemic coverage a priority. But the ever-changing and sometimes unverified nature of COVID-19 data being released has left journalists and researchers with challenges in providing accurate information to the public. However, even though a majority of Indian media is under corporate control, there are many counter-voices both within and outside this grouping. The centre sought a direction from the Supreme Court on 31 March that, no

electronic/print media /web portal or social media shall print/publish or telecast anything without first ascertaining the true factual position from the separate mechanism provided by the Central Government.

Many of these alternate counter-voices have raised genuine issues of social concern during the pandemic outbreak. The prevalence of international media on the internet and small media organisations in the country has played an important role in disseminating factual and more nuanced information, but unfortunately, these platforms do not have the vast access that big corporate media platforms are privy to. Most of the non-English mainstream media—both print and electronic—was seen to be playing a role that was far from responsible during the outbreak. On the one hand, social distancing has led to a spike in at-home media consumption, and growing numbers are turning to news providers for timely and trusted information on the crisis. At the same time, some of the most valuable broadcast content – such as live sports – is being postponed or cancelled, leading to spending reallocations by advertisers and a subsequent drop in income for media companies.

3. INDIA VERSUS BHARAT DICHOTOMY AND MEDIA SHOWS GREATER ACCOUNTABILITY TO BUILD NATION

If India lives in its sprawling urban metropolises, then Bharat resides in its towns, small cities, and villages. While livelihoods across the country have been affected by this pandemic, there is a greater proportion of Bharat that will feel every incremental expenditure over the next few months. Migrant populations and small-and-medium size businesses have been particularly impacted. M&E, historically assumed to be income inelastic, could see reduction in spends and even become aspirational for many. In urban – more affluent – India, while the consumption of outdoor entertainment will likely decline, higher at-home consumption of television, digital and gaming sections could offset this trend.

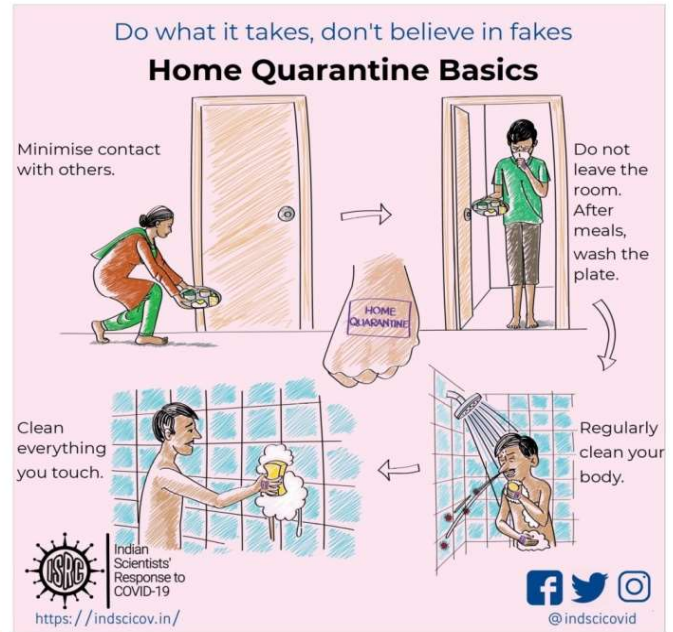


Diagram 1: Home quarantine basics published in media

The role of larger media as observed during the pandemic, however, is not an overnight shift. It has been visible for some time now. The media has seen phenomenal growth during the last three decades, and India has become one of the biggest media markets in the world. The alliance between predominant religious fundamentalism and neo-liberalism has also shaped it. Profit, the promotion of majoritarian views, and the exclusion of marginalised voices have become its main features. What should the role of governments be in such a situation, and what is it that journalism is meant to do? This is the time to introspect and examine the role of capitalism, state, and the media to avoid creating a future that threatens to destabilise democracy. Will this pandemic radically change society and governance models? Will the increased surveillance and policing become the new normal, or will we see increased efforts of building solidarity and cooperation? Our media needs to introspect and pose these questions.

4. FAKE NEWS AND ROLE OF MEDIA ALONG WITH WHO AND GOVT OF INDIA

The rise of fake news around the COVID-19 pandemic has been unprecedented, leading to fact checkers and health advisors working round the clock to provide accurate information on the disease. Since the beginning of the outbreak, BOOM has published 178 fact checks on misinformation/disinformation around the pandemic. An analysis of our stories revealed that a bulk of the COVID-19-related fact checks were on communal rumours, most of which were false allegations against Muslims, of purposefully spreading the virus. These messages appeared in April, after several members of the Tablighi Jamaat - an Islamic Missionary group, tested positive for the virus following a massive congregation in Delhi in March. We also found evidence suggesting that the number of fact checks published by us had a positive correlation with the number of COVID-19 cases in the country. During this period, as the number of cases grew, so did the number of pandemic-related fact checks by BOOM. While most of the false or misleading claims

FACT: Studies show hydroxychloroquine does not have clinical benefits in treating COVID-19

Hydroxychloroquine or chloroquine, a treatment for malaria, lupus erythematosus, and rheumatoid arthritis, has been under study as a possible treatment for COVID-19. Current data shows that this drug does not reduce deaths among hospitalised COVID-19 patients, nor help people with moderate disease.*

The use of hydroxychloroquine and chloroquine is accepted as generally safe for patients with malaria and autoimmune diseases, but its use where not indicated and without medical supervision can cause serious side effects and should be avoided.

* More decisive research is needed to assess its value in patients with mild disease or as pre- or post-exposure prophylaxis in patients exposed to COVID-19.

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were circulated with videos (35%), there was also a significant number of text messages (29.4%) being shared with fake cures, treatments or quotes from celebrities, along with images (29.4%) that were either misrepresented or doctored.



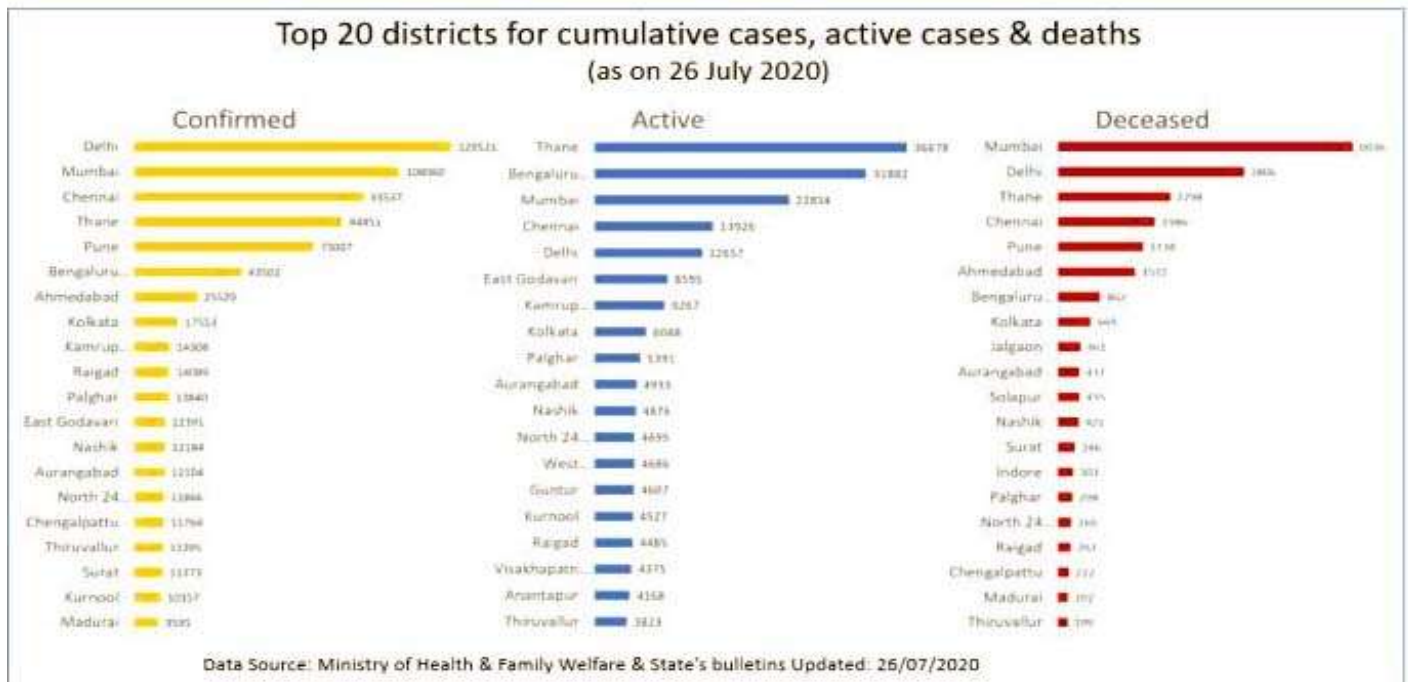
COVID-19 is a serious threat to the nation and therefore many rational measures and “honest conversations” must be expected from the government, which cannot be beyond the critical radar of journalism. The government has created a Prime Minister's Citizen Assistance and Relief in Emergency Situations (PM-CARES) Fund to combat the pandemic and many business corporations and common people have contributed to this fund. But, many questions have also been raised about the need for this fund, as the Prime Minister Relief Fund had already been working from 1948 onwards for such situations (Hindu 2020; Mody 2020). All these issues demand serious journalistic investigation in public interest.

The pandemic is also threatening an already-deteriorating economy, which also demands a thorough investigation beyond the official narratives. The media, however, has worries related to its own economic situation. Print media, especially, is dealing with a resource crunch, dwindling advertisements, and worries of reduction in circulation and readership. With concerns of job security, inadequate resource support, and abuses faced by the police, many journalists are putting their health at stake to cover the COVID-19 situation. This scenario does little to add to the morale of honest and responsible journalists. Some media houses have already begun cutting wages; an extension in the lockdown can create a new crisis in Indian journalism.

Diagram 2: Home quarantine basics published in media

5. RESEARCH METHODOLOGY AND RESEARCH DESIGN

Graph 3 showing confirmed, active and deceased figure of Covid-19 cases in different cities of India



It is a formulative as well as applied research work as under different scientific formulation, space share of different science news on COVID-19 were collected, analyzed, categorized and formulated statistically. It is also a social research as various factors and variables are very much related to social development. This research is empirical as it is based on different measurement analysis. It is also a comparative research work as this research shows the comparative study among some factors. Time period for this research work was considered as 3 Lockdown Period i.e. from 24th March, 2020 to 31st May, 2020 i.e. 68 days and then 4 unlock period, from 1st June to 10th August i.e. 71 days. For sample survey, 10 major metro cities, Delhi, Kolkata, Mumbai, Chennai, Guwahati, Bhubaneswar, Bangalore, Jaipur, Chandigarh and Srinagar were considered. Also 10 selected sample newspapers are The Hindustan Times for Delhi, The Telegraph

for Kolkata, The Hindu for Chennai, The Times of India for Mumbai, The Assam Tribune for Guwahati, The New Indian Express for Bhubaneswar, Deccan Herald for Bangalore, The Indian Express for Jaipur, The Tribune for Chandigarh and lastly Kashmir Times for Srinagar.

6. STATISTICAL ANALYSIS AND THEORETICAL FRAMEWORK OF RESEARCH

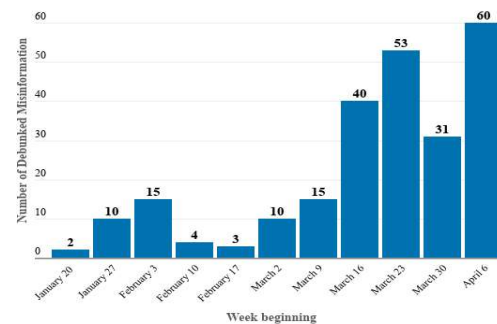
It is always found in almost all newspapers of India, that, on an average, political news, followed by sports news, crime news, entertainment news, news on administrative decisions etc dominate science news and hence, within this time period, all day, all newspapers were analyzed and space share were measured according to columne-cm. Then space share of science news on Covid-19 were compared with other types of news and were tabulated below in table 1. Also table 2 will show the comparative percentage of space share of 10 different types of scientific news on Covid-19 in 3 consecutive weeks of National Lockdown-1 in India.

Table 1: Comparative percentage of space share of 10 different types of scientific news on Covid-19 in

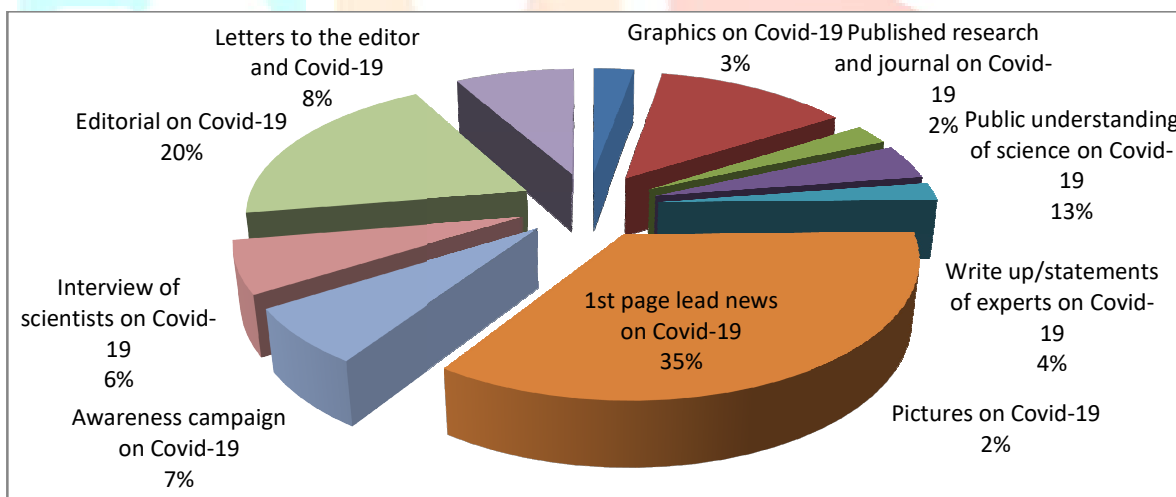
National Lockdown 1-3 and Unlock period 1-3

Graphics on Covid-19	7.2	1 st page lead news on Covid-19	91.2
Public understanding of science on Covid-19	34.7	Awareness campaign on Covid-19	17.8
Published research and journal on Covid-19	6.5	Interview of scientists on Covid-19	16.6
Write up/statements of experts on Covid-19	11.1	Editorial on Covid-19	51.6
Pictures on Covid-19	5.6	Letters to the editor and Covid-19	21.3

Increase In The Number of (Debunked) Misinformation
January to April 2020



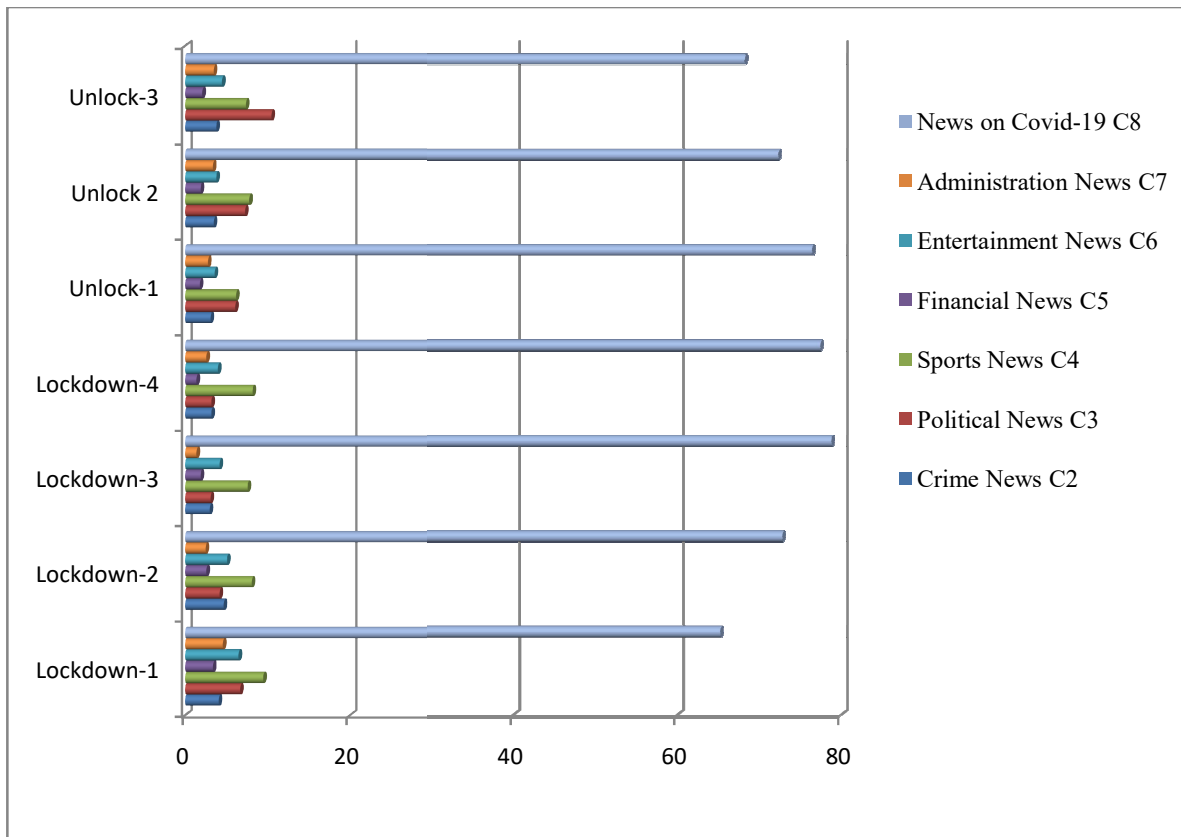
Sources: Study on Misinformation (Released on April 18, 2020)



Graph 4: Pie diagram showing comparative percentage of space share of 10 different types of scientific news on Covid-19 in National Lockdown 1-3 and Unlock period 1-3

Table 2: Comparative space share of scientific news on Covid-19 along with other types of news in National Lockdown 1-3 and Unlock period 1-3

	Crime News C ₂	Political News C ₃	Sports News C ₄	Financial News C ₅	Entertainment News C ₆	Administration News C ₇	News on Covid-19 C ₈
Lockdown-1	4.1	6.7	9.5	3.4	6.5	4.6	65.2
Lockdown-2	4.7	4.2	8.1	2.6	5.1	2.5	72.8
Lockdown-3	3.0	3.1	7.6	1.9	4.2	1.4	78.8
Lockdown-4	3.2	3.2	8.2	1.4	4.0	2.6	77.4
Unlock-1	3.1	6.1	6.2	1.8	3.6	2.8	76.4
Unlock 2	3.5	7.3	7.8	1.9	3.8	3.4	72.3
Unlock-3	3.8	10.5	7.4	2.1	4.5	3.5	68.2



Graph 5: Bar diagram showing comparative space share of scientific news on Covid-19 along with other types of news in National Lockdown 1-3 and Unlock period 1-3

Table 3: Analysis of Variance Table and F-Test

Model		Sum of	Mean		Prob	Reject	Power
Term	DF	Squares	Square	F-Ratio	Level	Equal	($\alpha=0.05$)
Between (C1)	2	92.90667	46.45333			Means?	($\alpha=0.05$)
Within (Error)	0	0					
Adjusted Total	2	92.90667					
Total	3						

Table 4: Welch's Test of Means Allowing for Unequal Variances

Model	Numerator	Denominator		Prob	Reject Equal Means?
Term	DF	DF	F-Ratio	Level	($\alpha=0.05$)
Between Groups	2	∞	0.0000	1	No

Table 5: Kruskal-Wallis One-Way ANOVA on Ranks

Hypotheses				
H0: All medians are equal. H1: At least two medians are different.				
Test Results				
Chi-Squared	Prob	Reject H0?		
Method	DF	(H)	Level	($\alpha=0.05$)
Not Corrected for Ties	2	2.0000	0.3678795	No
Corrected for Ties	2	2.0000	0.3678795	No
Number Sets of Ties	0			
Multiplicity Factor	0			

Table 6: Normal Scores Tests

Hypotheses

H0: All group data distributions are the same.

H1: At least one group has observations that tend to be greater than those of the other groups.

Results**Chi-Squared****Test**

Test	Prob DF	Reject H0? (H)	Level	($\alpha=0.20$)
Terry-Hoeffding - Expected Normal Scores	2	2.0000	0.3678795	No
Van der Waerden - Normal Quantiles	2	2.0000	0.3678795	No

7. RESULTS AND DISCUSSION:

From the above tables and graphs it has been found that, there has been a stiff increase of percentage of space share of science news, only due to Covid-19 and people have aggressively read all those news based on science and hence all other types of news like crime-political-sports-financial-entertainment-administration related news have shared very small portion of space in newspapers compared to science news. Also, Graphs have shown that in consecutive national lockdown 1-3, followed by unlock period 1-3, percentage of space share of science news has drastically increased and other types of news have decreased drastically. Graph also has shown that, in almost all day, 1st page lead news was on Covid-19 and science news have reached more than 90 percent of space share. It has also been found that, more than 50 percent editorials (51.6 percent space share) were on Covid-19 i.e. science. Within this national lockdown-1, more than 20 percent letters to the editor (21.3 percent) were on science journalism related and public understanding of science related articles-materials etc have achieved nearly one-third of space (34.7 percent).

Then one-way ANOVA Test was done to find whether the survey or the experimental results were significant. It has helped to figure out it is needed to reject the null hypothesis or accept the alternative hypothesis and Graph has shown the normality test with plots of mean section. From Table-4 and Table-5. It has been found that, medians are not significantly different and the null hypothesis are been accepted.

8. Conclusion:

From the above charts and diagrams along with statistical analysis of ANOVA test, it has been found that, Covid-19 like global pandemic has shown the way to the media professionals that, science journalism is still very important for nation building and relevant and should provide more space daily in newspapers, everyday for total sustainable development of the nation. It has been proved that, science journalism has not been decayed, but situation has shown again that it should be increased.

References:

- 1) 9) Bader, R.G. (1990). *How science news sections influence newspaper science coverage: A case study*. Journalism Quarterly, 67, 88-89.
- 2) 16) Biswas, S. (2012). *Why are India's Media under fire?* BBC News India. Retrieved 12 March 12, 2013, from <http://www.bbc.co.uk/news/world-asia-india-16524711>
- 3) 1. Cohen, J. (1988). *Statistical power analysis for the behavioral sciences*. 2nd Edn. Lawrence Erlbaum, Hillsdale, New Jersey. 567 pp.
- 4) WHO Reports on Covid 19 Novel Coronavirus