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Original Research

COVID-19 media fatigue: predictors of decreasing interest and avoidance of COVID-19–related news

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ABSTRACT

Objectives: COVID-19–related news is important for adherence to public health measures. We examined predictors of interest and avoidance of COVID-19 news in Lithuania.
Study design: This is an online survey.
Methods: An online survey was conducted between October and December 2020 targeting the general population in Lithuania. Participants rated their interest and avoidance of news about the COVID-19 pandemic, with possible answers ranging from 'completely agree' to 'completely disagree'. The participants were also evaluated for symptoms of depression (Patient Health Questionnaire-8), anxiety (Generalized Anxiety Disorder-7), post-traumatic stress (Impact of Event Scale-Revised) and COVID-19 fear (COVID-19 Fears Questionnaire).
Results: In total, 1036 participants (83% women) completed the survey. The results indicated that 37% of participants were losing interest in COVID-19 news, 32% had started avoiding COVID-19 news and 26% had stopped following news about COVID-19. In the multivariate regression analyses, younger age, greater post-traumatic stress symptoms, less fear of COVID-19 and less frequent use of healthcare professionals for COVID-19 information were independent predictors of decreasing/diminished interest and avoidance of COVID-19 news (all *P*-values <0.005). More frequent use of friends/relatives for COVID-19 information was associated with increasing avoidance and diminished interest in news about COVID-19, while more frequent use of internet news portals for COVID-19 information predicted decreasing/ diminished interest in news about COVID-19, independently from other factors considered in this study.
Conclusions: Decreasing/diminished interest and avoidance of news about COVID-19 are common and are associated with younger age, greater post-traumatic stress symptoms, less fear of COVID-19 and less frequent use of healthcare professionals for COVID-19 information.

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Introduction

The COVID-19 outbreak started in December 2019 in Wuhan, China, and quickly spread worldwide causing a pandemic that has resulted in unprecedented global health and social and economic challenges.[1,2] The COVID-19 pandemic continues to evolve, effective treatment options remain limited and mortality rate is high in vulnerable populations. It is estimated that the COVID-19 pandemic will remain the major public health threat in the near future.[3,4]

Social and public health strategies, such as social distancing and wearing masks, are aimed to control the spread of the virus and are recommended even with increasing vaccination rates.[5,6] Effective communication about the COVID-19 pandemic is important for raising awareness and maximising adherence to social and public health strategies.[7] Indeed, news about the COVID-19 pandemic continues to predominate the media agenda worldwide.[8] The COVID-19 pandemic is evolving in unprecedented times of global adoption of information technologies that are gaining increasing weight and continue to change the

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landscape of communication channels in use. Indeed, digital communication platforms have become important sources of information during the COVID-19 pandemic.[9]

News about the COVID-19 pandemic in traditional and social media outlets is polarised and heavily weighted towards negative stories about the pandemic that elicit negative emotions.[10–13] For example, a study that examined 41,208 headlines of English news sources between January and June 2020 found that the majority of news headlines evoked negative sentiments.[10] Fear, anticipation, sadness and anger were the main emotions evoked by the news headlines. Constant exposure to threatening topics can increase the risk of adverse physical and mental health problems.[14,15] Sustained exposure to typically negative news about COVID-19 across media outlets can increase the level of stress and cause desensitisation to COVID-19, which can subsequently result in suboptimal adherence to social and public health guidelines of the COVID-19 pandemic.[16,17] Therefore, it is important to identify factors associated with decreasing interest and avoidance of COVID-19–related news to optimise communication strategies and adherence to public/social recommendations.

The aim of this study was to examine the incidence and predictors of decreasing interest and avoidance of COVID-19–related news.

Methods

Participants and procedures

An online survey was conducted between October 1 and December 20, 2020. Participants from the general population were invited via e-mail invitations, online forums and social network communities and also by using snowball sampling. Only participants who were fluent in Lithuanian and aged ≥18 years were invited in the study. Respondents were required to register in the study portal https://covid-dt.proit.lt/apie-projekta/#PROJEKTAS by entering their mobile phone number, which prompted activation of the study questionnaires. All participants gave informed consent before proceeding to an online questionnaire. The survey took approximately 15 min to complete. The study protocol and its consent procedure were approved by the Bioethics Committee, Kaunas, Lithuania.

Questionnaires

Interest and avoidance of COVID-19 news

Study participants were asked to rate interest ('Losing interest in COVID-19 news' and 'Stopped following news about COVID-19') and avoidance ('Started to avoid news about COVID-19') of news about the COVID-19 pandemic. The participants rated each statement on a five-point Likert-type scale, with possible answers ranging from 'completely agree' to 'completely disagree'. Participants who rated each statement as either agree or strongly agree were considered losing interest, stopped following or avoided news about COVID-19.

Demographic and health status

The respondents were asked about their gender (male or female), age (18–25 years, 26–40 years, 41–60 years or ≥61 years) and living area (urban or rural). The presence of pre-existing medical conditions was assessed using the following question: 'Do you have any pre-existing medical conditions?', with possible answers of 'yes' or 'no'. Self-perceived health status was evaluated by asking 'How is your health in general?', with possible answers 'very good', 'good', 'fair', 'bad' or 'very bad'.

Depressive and anxiety symptoms

Depressive symptom severity was evaluated using the 2-item and 8-item Patient Health Questionnaires (PHQ-2 and PHQ-8, respectively).[18,19] Respondents scoring ≥10 on PHQ-8 were considered having moderate to severe depressive symptoms.[19,20] Anxiety symptom severity was evaluated using the 2-item and 7-item Generalized Anxiety Disorder questionnaires (GAD-2 and GAD-7, respectively).[21,22] GAD-7 is widely used for assessment of anxiety symptom severity in the general population with good psychometric properties. Respondents were considered having anxiety symptoms if they scored ≥10 on GAD-7.[22]

Post-traumatic stress

Distress caused by traumatic events was evaluated using the Impact of Event Scale-Revised (IES-R).[23] The IES-R is a 22-item scale, with all items rated from 0 (not at all) to 4 (extremely). The IES-R total scores ranged from 0 to 88, with a higher score indicating greater psychological impact. A score of ≥33 has been shown to indicate high probability of diagnosis of post-traumatic stress disorder.[24]

COVID-19 fear

The COVID-19 Fears Questionnaire for Chronic Medical Conditions (CFQCMC) was used to evaluate fear of COVID-19.[25] The questionnaire evaluates fear of social isolation, treatment of pre-existing conditions during the pandemic and risk of COVID-19 complications due to pre-existing conditions. Respondents rate each statement that describes their experience on a typical day in the last week on a 5-point numerical scale, ranging from 1 (not at all) to 5 (extremely). The CFQCMC total scores ranged from 10 to 50, with a higher score indicating greater fear of COVID-19.

Statistical analyses

We investigated predictors of interest ('Losing interest in COVID-19 news' and 'Stopped following news about COVID-19') and avoidance ('Started to avoid news about COVID-19') of news about COVID-19 by performing multivariate binary regression analyses considering demographic variables, health behaviours, frequency of COVID-19 information channel use, presence of moderate to severe depressive symptoms (PHQ-8 score ≥10), anxiety symptoms (GAD-7 score ≥10), comorbid depressive/anxiety symptoms (PHQ-8 and GAD-7 scores ≥10), post-traumatic stress symptoms (IES-R score ≥33) and COVID-19 fear (CFQCMC score >20). The results are presented as odds ratios (ORs), 95% confidence intervals (CIs) and P-values.

Statistical analyses were performed in IBM SPSS Statistics for Windows, version 27.0 (Armonk, NY: IBM Corp). For all statistical tests, a P value of <0.05 was considered statistically significant. Descriptive statistics are presented as the mean and standard deviation for continuous variables and number (percent) for categorical variables.

Results

The majority of study participants were women (83%), were living in urban areas (73%) and were aged ≤40 years (63%) (see Table 1). Perceived health status was good or very good for 66% of respondents, and 26% had a pre-existing condition. Thirty-seven percent of respondents reported that they were losing interest in news about COVID-19, 32% started avoiding news about COVID-19 and 26% stopped following news about COVID-19 (Table 2).

In the multivariate regression models (see Table 3), decreasing interest in news about COVID-19 was predicted by younger age (OR = 0.549 [95% CI = 0.472–0639]; P < 0.001), symptoms of post-traumatic stress (OR = 1.439 [95% CI = 1.020–2.031]; P = 0.04), less fear of COVID-19 (OR = 0.521 [95% CI = 0.387–0.702]; P < 0.001) and more frequent use of healthcare professionals (OR = 0.848 [95%

CI = 0.730−0.985]; P = 0.03) and internet news portals (OR = 0.848 [95% CI = 0.730−0.985]; P < 0.001) for COVID-19 information.

Avoidance of COVID-19 information was predicted by younger age (OR = 0.825 [95% CI = 0.709−0.959]; P = 0.012), significant symptoms of post-traumatic stress (OR = 1.918 [95% CI = 1.368−2.688]; P < 0.001), less fear of COVID-19 (OR = 0.598 [95% CI = 0.444−0.807]; P < 0.001), more frequent use of friends/relatives (OR = 1.310 [95% CI = 1.101−1.559]; P = 0.002) and less frequent use of healthcare professionals (OR = 0.711 [95% CI = 0.610−0.829]; P < 0.001) for COVID-19 information, independently from other variables considered in the multivariate regression model.

Diminished interest in news about the COVID-19 pandemic was associated with younger age (OR = 0.706 [95% CI = 0.595−0.838]; P < 0.001), significant symptoms of post-traumatic stress (OR = 1.660 [95% CI = 1.137−2.105]; P = 0.005), less fear of COVID-19 (OR = 0.490 [95% CI = 0.351−0.685]; P < 0.001), more frequent use of friends/relatives for COVID-19 information (OR = 1.435 [95% CI = 1.185−1.739]; P < 0.001) and less frequent use of healthcare professionals (OR = 0.584 [95% CI = 0.488−0.698]; P < 0.001) and internet news portals (OR = 0.653 [95% CI = 0.554−0.770]; P < 0.001) for COVID-19 information.

Discussion

We found that one-third of the respondents were losing interest and/or had started avoiding news about the COVID-19 pandemic and 26% had stopped following news about COVID-19. Younger age, greater symptoms of post-traumatic stress, less fear of COVID-19 and less frequent use of healthcare professionals for COVID-19 information were associated with greater risk of decreasing/diminished interest and avoidance of news about COVID-19, independently from sociodemographic and health variables considered in this study. More frequent use of friends/relatives for COVID-19 information predicted greater risk of avoidance and diminished interest in news about COVID-19, while more frequent use of internet news portals for COVID-19 information predicted decreasing/diminished interest in news about COVID-19, independently from other factors considered in this study.

One-third of the study participants were losing interest and were avoiding news about the COVID-19 pandemic. These findings suggest that COVID-19−related fatigue can result in desensitisation and avoidance of news about the pandemic. As per the World Health Organization (WHO), pandemic fatigue is defined as 'distress which can result in demotivation to follow recommended protective behaviours, emerging gradually over time and affected by a number of emotions, experiences and perceptions' and is increasingly reported worldwide.[26] Avoidance and denial are commonly used coping strategies at times of stress that help to reduce stress levels in the short term; however, these defensive strategies can decrease the capacity to effectively handle stressors in the long run.[27,28] Avoidance and denial of COVID-19−related information has been associated with reduced compliance to public health measures, which may subsequently contribute to the spread of the disease.[5,6] It is important to maintain public interest and awareness about the pandemic to optimise adherence to public health measures. Further studies should examine the association between interest in COVID-19 news and adherence to public health measures that are aimed to decrease the spread of the virus.

Younger individuals were more likely to lose interest and avoid news about COVID-19. Older age is an important risk factor for severe illness and greater complications and mortality risk from COVID-19.[29] Our findings suggest that the more vulnerable elderly individuals maintain interest in news about the COVID-19 pandemic and thus may be more compliant with public health measures. Indeed, lower compliance with COVID-19 public health measures in younger individuals has been reported in Italy,[30] the US[31] and the UK.[32] It is important for younger individuals to maintain interest in COVID-19 news to optimise their adherence to public health measures.

Greater post-traumatic stress symptoms were associated with decreasing interest and increasing avoidance of news about the COVID-19 pandemic, whereas greater fear of COVID-19 was associated with more sustained interest in news about COVID-19. It is now well established that the COVID-19 pandemic causes significant stress. For example, the pooled prevalence rate of post-traumatic stress during the COVID-19 pandemic in the general population has been estimated to be 24%.[33] Prolonged exposure to largely negative and distressful content about the COVID-19 pandemic across media channels can increase perceived stress, resulting in desensitisation and avoidance of the stressful stimuli.[34]

Table 1
Demographic and clinical characteristics of the study participants.

Characteristics	n	%
Age		
18−25 years	379	36.7
26−40 years	270	26.1
41−60 years	325	31.4
≥61 years	60	5.8
Gender		
Men	176	17.0
Women	858	83.0
Living area		
Urban	756	73.1
Rural	278	26.9
Perceived health status		
Very good	152	14.7
Good	532	51.5
Fair	303	29.3
Bad	41	4.0
Very bad	6	0.6
Pre-existing conditions		
None	659	63.7
Pulmonary	120	11.6
Obesity	23	2.2
Diabetes	83	8.0
Mental health	8	0.8
Other	141	13.7

Table 2
Interest in news about the COVID-19 pandemic.

Interest level	n	%
Losing interest in COVID-19		
Completely disagree	66	6.4
Disagree	227	22.0
Neither agree nor disagree	355	34.3
Agree	254	24.6
Completely agree	132	12.8
Started avoiding news about COVID-19		
Completely disagree	105	10.2
Disagree	276	26.7
Neither agree nor disagree	319	30.9
Agree	224	21.7
Completely agree	110	10.6
Stopped following news about COVID-19		
Completely disagree	155	15.0
Disagree	342	33.1
Neither agree nor disagree	265	25.6
Agree	171	16.5
Completely agree	101	9.8

Table 3
Predictors of changing interest in COVID-19–related news: multivariate stepwise regression.

Predictor	Losing interest in COVID-19 news (OR [95% CI])	Started to avoid news about COVID-19 (OR [95% CI])	Stopped following news about COVID-19 (OR [95% CI])
Gender	0.366	0.958	0.433
Age	**0.549 [0.472–0639]; *P* < 0.001**	**0.825 [0.709–0.959]; *P* = 0.012**	**0.706 [0.595–0.838]; *P* < 0.001**
Living area	0.907	0.287	0.628
Depression	0.307	0.662	0.586
Anxiety	0.385	0.856	0.596
Post-traumatic stress	**1.439 [1.020–2.031]; *P* = 0.04**	**1.918 [1.368–2.688]; *P* < 0.001**	**1.660 [1.137–2.105]; *P* = 0.005**
Fear of COVID-19	**0.521 [0.387–0.702]; *P* < 0.001**	**0.598 [0.444–0.807]; *P* < 0.001**	**0.490 [0.351–0.685]; *P* < 0.001**
Poor perceived health	0.284	0.862	0.941
Pre-existing conditions	0.844	0.519	0.121
COVID-19 information channels			
Friends and relatives	0.121	**1.310 [1.101–1.559]; *P* = 0.002**	**1.435 [1.185–1.739]; *P* < 0.001**
Healthcare professionals	**0.848 [0.730–0.985]; *P* = 0.03**	**0.711 [0.610–0.829]; *P* < 0.001**	**0.584 [0.488–0.698]; *P* < 0.001**
Government institutions	0.200	0.183	0.386
Politicians	0.901	0.737	0.292
TV	0.987	0.955	0.171
Radio	0.662	0.560	0.129
Traditional press	0.226	0.2755	0.696
Internet news portals	**0.848 [0.730–0.985]; *P* < 0.001**	0.228	**0.653 [0.554–0.770]; *P* < 0.001**
Social networks	0.699	0.429	0.665
International organisations	0.121	0.530	0.175
Foreign press	0.901	0.292	0.823
Influencers	0.987	0.996	0.286

Bold indicates significant association; 95% CI values and *P*-values are provided for these predictors.
CI, confidence interval; OR, odds ratio.

Decreasing the burden of negative and distressing information about the COVID-19 pandemic in media outlets could potentially help to decrease the levels of stress and maintain public interest in COVID-19 news.

More frequent use of friends/relatives for COVID-19 information and less frequent use of healthcare professionals and internet news portals for information about the COVID-19 pandemic were associated with decreasing interest and avoidance of news about COVID-19. Other information channels that were examined in this study were not associated with avoidance and interest in the news about COVID-19. Professional organisations (e.g., the WHO and the Centers for Disease Control and Prevention) and healthcare professionals were identified as the most reliable sources about the COVID-19 pandemic.[35–37] Indeed, physicians were considered to be the most trusted sources of information about health, even before the COVID-19 pandemic.[38] It is important to use healthcare professionals to convey information about the COVID-19 pandemic to optimise interest in the pandemic and public awareness. On the other hand, greater utilisation of secondary interpersonal information sources, such as friends and relatives, can include emotional content that can increase the risk of COVID-19 fatigue and decrease interest in news about the pandemic. Interpersonal sources (i.e., friends and family members) are frequently used sources of health information that can be important for health behaviours.[39,40] It is important to better understand the association between utilisation of information sources and behaviours during the COVID-19 pandemic.

Our study has several limitations that should be acknowledged. The online survey was subjected to selection bias because the majority of respondents were women and aged ≤40 years. However, we found that increasing age and greater fear of the virus were associated with sustained interest in COVID-19 news, and younger age was implicated as a risk factor for non-adherence to public/social pandemic control measures. Cultural differences, as well as epidemiological and media content variations across countries, should be considered when interpreting our results. Content analysis of news outlets in relation to COVID-19 media fatigue and avoidance should be considered to optimise public interest in COVID-19–related news. The large sample size and use of well-validated questionnaires are important strengths of our study, thus fortifying reliability of our study findings.

Conclusions

One-third of respondents were losing interest and/or had started avoiding COVID-19 news, and 26% had stopped following news about COVID-19. Younger age, greater symptoms of post-traumatic stress, less fear of COVID-19 and less frequent use of healthcare professionals for COVID-19 information are associated with decreasing/diminished interest and avoidance of news about COVID-19. More frequent use of friends/relatives and less frequent use of internet news sources are also associated with avoidance/diminished interest and decreasing/diminished interest in news about COVID-19, respectively. Studies exploring the association of interest in COVID-19 news with adherence to public and social health measures are warranted to optimise control of the virus spread.

Author statements

Competing interests

None declared.

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