

# Journal of Work and Organizational Psychology



https://journals.copmadrid.org/jwop

## Cover Ups and Conspiracy Theories: Demographics, Work Disenchantment, Equity Sensitivity, and Beliefs in Cover-ups

Adrian Furnham<sup>a</sup> and George Horne<sup>b</sup>

<sup>a</sup>Norwegian Business School (BI), Nydalveien, Olso, Norway; <sup>b</sup>University of Bath, United Kingdom

#### ARTICLE INFO

Article history: Received 28 September 2021 Accepted 30 December 2021 Available online 10 February 2022

Keywords: Conspiracy Cover-up Disenchantment Politics Equity sensitivity

Palabras clave: Conspiración Encubrimiento Decepción Política Sensibilidad a la equidad

#### ABSTRACT

Beliefs in cover-ups take the perspective of conspiracy theories. This study examined demographic, ideological, and work-related attitudes (disenchantment, equity sensitivity) and ideas about events being covered up. Over 500 working adults completed a number of questionnaires including beliefs about official cover-ups and conspiracies (CT), work-related disenchantment, sensitivity to equity, personal demography as well as religious and political beliefs. CT and Work Disenchantment measures both had a good internal reliability. Correlations and regressions showed that sex, education, ethnicity and political beliefs, as well as a sense of entitlement and disenchantment at work, predicted beliefs in coverups. Facets of work disenchantment, particularly perceptions of organisational hypocrisy and personal disrespect at work were significantly related to the belief in cover-ups. Research implications and limitations are acknowledged.

### El encubrimiento y las teorías de conspiración: datos demográficos, decepción en el trabajo, sensibilidad a la equidad y creencias en el encubrimiento

#### RESUMEN

La creencia en los encubrimientos parte de la perspectiva de las teorías de conspiración. El estudio analiza las actitudes demográficas, ideológicas y relativas al trabajo (desencanto, sensibilidad a la equidad) y las ideas sobre los hechos que se ocultan. Más de 500 adultos trabajadores cumplimentaron unos cuestionarios sobre la creencia en los encubrimientos y conspiraciones oficiales, la decepción en el trabajo, la sensibilidad a la equidad y la demografía personal, así como las creencias religiosas y políticas. Las medidas de la teoría de la conspiración y de la decepción en el trabajo tenían buena fiabilidad interna. Correlaciones y regresiones han puesto en evidencia que el sexo, la educación, la etnia y las creencias políticas, así como sentirse con derecho y el desencanto en el trabajo predecían la creencia en el encubrimiento. Distintos aspectos de la decepción en el trabajo, como la percepción de la hipocresía por parte de la organización y la falta de respeto personal en el trabajo se relacionaban de un modo significativo con la creencia en los encubrimientos. Se reconocen las implicaciones y limitaciones de la investigación.

Conspiracy theories (CTs) concern the belief that the causes of many major events are due to a "secret plot" by multiple, evil, people with a selfish, devious, political goal in mind (Sunstein & Vermeule, 2009). Various researchers have demonstrated that CTs form part of a "monological" belief system (Walter & Drochon, 2020). That is, many people who have a "conspiracist worldview" happily accept and integrate new CTs on a wide range of issues (Goertzel, 1994; Swami et al., 2011; Wood et al., 2012). There are long lists of conspiracy topics from medicine (Oliver & Wood, 2014a, 2014b) to commerce (Furnham, 2013) as well as those about very specific events (Swami & Furnham, 2012).

Many have suggested that belief in conspiracies serve a psychological function for people who feel powerless, excluded or disadvantaged, to explain events that are difficult to comprehend

(Furnham, 2021a; Sullivan et al., 2010; Sunstein & Vermeule, 2009; Uscinski & Parent, 2014; Walter & Drochon, 2020). There are many studies on individual difference correlates of CTs including ability, ideology, and personality (Douglas et al., 2016; Galliford & Furnham, 2017; Sutton & Douglas, 2020). There has been a great increase of studies on CTs (Barron et al., 2014; Brotherton & French, 2014; Douglas et al., 2016; Imhoff & Lamberty, 2017; van Prooijen et al., 2015). The Covid-19 crisis has also been a fertile time for CTs and there are now a large number of recent papers on the topic (Ahmed et al., 2020; Andrade, 2020; Biddlestone et al., 2020; Georgiou et al., 2020; Haaksonsen & Furnham, in press).

Correlational studies show beliefs in CTs are related to beliefs in pseudoscience (Lobato et al., 2014). Further, the relationship between

Cite this article as: Furnham, A., & Horne, G. (2022). Cover ups and conspiracy theories: Demographics, work disenchantment, equity sensitivity, and beliefs in cover-ups. *Journal of Work and Organizational Psychology*, 38(1), 19-25 https://doi.org/10.5093/jwop2022a2

Correspondence: adrian@adrianfurnham.com (A. Furnham).

demographic (sex, age, education), ideological factors (religion, politics), and conspiracy beliefs has been explored (Sutton & Douglas, 2020; Furnham 2021a; Furnham & Grover, 2021). The results suggest less well-educated people with strong religious beliefs and conservative political views are more likely to endorse both general and specific conspiracy theories (Swami & Furnham, 2012, 2014). There is mixed evidence with regard to sex and age though a number of studies have found men more than women, and older rather than younger people are happy to endorse a range of theories (Galliford & Furnham, 2017).

Those who endorse CTs misattribute a great deal of agency and intentionality to others where it is clearly inappropriate to do so (Douglas et al., 2016; Furnham, 2016). Many suggest that education is the best way to reduce belief in CTs (Bartlett & Miller, 2010). It has also been demonstrated that religious and superstitious people are more likely to endorse CTs (Darwin et al., 2011; Stieger et al., 2013). Douglas et al. (2017) noted that believing in conspiracy theories appears to be driven by motives such as understanding one's environment, being safe and in control of one's environment, and maintaining a positive image of the self and the social group. They argued that research is needed to determine for whom, and under what conditions, conspiracy theories may satisfy key psychological motives.

In this study we examine the relationship between CTs and workplace beliefs. CTs have been linked/theorised to be related to general social alienation (Swami & Furnham, 2014). People who are mistrustful of their government, media, or powerful corporations may also be mistrustful of their boss and even colleagues at work (Furnham, 2013, 2021a). We investigate how mistrust, scepticism, and perceptions of unfairness link with two measures of workplace attitudes. In a salient study, Douglas and Leite (2017) found that belief in CTs about the workplace would be associated with increased turnover intentions, decreased organizational commitment, and job satisfaction. However there remain relatively few specific or well-known CT studies relating to workplace behaviour. We extended this literature by looking at two concepts related to the workplace, exploring the idea that work-related factors also give an insight into those who accept and reject CTs. Becoming alienated in the wider sense often starts in the workplace and may be a good indicator of those prone to CT or cover-up versions of events.

#### **Cover-ups and Conspiracy**

Nearly all researchers attempt to identify particular CTs and then explain who, why, and when people believe in them. Researchers tend to take the perspective of the skeptic or cynic rejecting CTs as misguided myths that fulfill various psychological functions in those who (mistakenly and naively) hold them. Questionnaires usually require participants simply to indicate whether they endorse or agree with a list of specific CTs which may range from the well-known, the widely discredited, to the guite ludicrous (Swami et al. 2017). Few, if any, take the perspective of the CT advocates and theorists themselves who also publish papers and blogs and have dedicated television programs supporting their worldview. Their overall perspective, as one would imagine, is quite different, suggesting that it is the conspiracy theorists who are insightful into the many government and "otherinspired and supported" "cover-ups" which are occurring. No study, as far as we can ascertain, takes this perspective or has attempted to look at the correlates of the "cover-up" viewpoint. This measure is unique because it measures the monological system as an opposed focusing on individual theories, which could include more error variance due to the changes or varying evidence on each item or theory.

One relevant study however is that of Nylan et al. (2016), who found conspiracy beliefs were higher when people were exposed to seemingly redacted documents compared to when they were

exposed to unredacted documents. That is, they believed in coverups when they saw more evidence of them. Certainly, this illustrates that people are very willing to accept cover-ups under particular circumstances. As far as we can ascertain, the cover-up perspective is made up of a number of viewpoints but primarily that it is often governments (and other big institutions) that are responsible for cover-ups, as well as attitudes to pro- and anti-CTs.

In this study we explore demographic, ideological, and work-related beliefs in a group of working adults. We attempted first to replicate other research on big samples (Walter & Drochon, 2020) by looking at sex, education, ethnicity, and personal ideology. We tested specific hypotheses based on the CT literature:

Females endorse the cover-up thesis more than males  $(H_1)$ ; people less educated support cover-up beliefs more than the better educated  $(H_2)$ ; members of minority ethnic groups more than the majority would endorse the cover-up thesis  $(H_3)$ ; again, based on previous work, we assumed that less politically liberal (i.e. more conservative) people support cover-up ideas  $(H_4)$ ; more, rather than less, religious people would endorse the cover-up thesis  $(H_5)$ .

#### **Equity Sensitivity**

We also test the unexplored link between perceptions of justice at work and CTs. Clearly some people are more sensitive to equity issues than others (Huseman et al., 1987). Some people pay a great deal of attention to input-output equity at work (i.e., what you give such as effort and get such as reward) and are thus called "equity sensitive". To achieve "justice" they might adjust their inputs or outputs to get what they see to be fair and equitable. Within the equity sensitive group there are two opposite subgroups: "benevolents", who do not to mind giving more than they receive, and "entitled", who are determined to ensure they put in less effort than others, to make their contribution "fairer".

"Benevolents" believe in giving and are co-operative altruists with the philosophy of "service above self". The "entitled" believe they have a right to others' maximal support and consistently feel indebted. They demand help and support but feel little or no obligation to reciprocate: in other words they believe they should get more and give less. "Entitled" are exploiters and manipulators and seem to always be worried that they are not getting a better deal.

Yiu et al. (2011) called the benevolent "givers" and the entitled "takers", though these terms are not as well known or used as the originals. There is a relevant literature on the positive relationship between narcissism and CTs (Bowes et al., 2020; Furnham & Grover, 2021), which suggests that those who feel entitled, a hallmark of narcissism, will endorse CTs. In short, entitlement may be seen as a sign of sub-clinical or clinical narcissism. We test the hypothesis that belief in the cover-up version of CTs would be positively correlated with being entitled ( $H_6$ ) and negatively associated with being benevolent ( $H_7$ ).

#### **Work Disenchantment**

There is a great deal of interest in work engagement, satisfaction, and commitment but far less on its opposite. Recently, a short measure of work disenchantment has been devised and tested (Furnham & Treglown, 2017). It has five dimensions: first, "organisational lying/hypocrisy", which is an employee's perception that what the organisation says about itself in public is fabricated and untrue: essentially Public Relations (PR). Often, employees who see this in their organisations report being astounded, angry, and outraged; second, "perceived inequity", which is the belief that the workplace is unfair in the ways it selects, rewards, and promotes people having little regard for their talent or contribution; third, "bullying and mistreatment", which is the perception that the serious

mistreatment of staff is widespread, normative, and accepted: that the management style is aggressive and Machiavellian; fourth, "distrust", which is the feeling that the organisation does not trust its own staff and puts into place surveillance systems designed to monitor all aspects of their behaviour; fifth, "broken promises", which concerns explicit expectations not being met.

Disenchanted employees tend to be alienated and resentful and feel excluded and powerless, all of which are the hallmarks of conspiracy theorists (Furnham & Treglown, 2017; Swami & Furnham, 2014). We therefore explore the idea that disenchantment at the facet and total score level is related to CTs. Specifically, we believe that each facet should be related to CTs, but most clearly, organisational hypocrisy ( $H_{\rm g}$ ), as well as the total disenchantment score (Furnham & Treglown, 2017) ( $H_{\rm o}$ ).

#### Method

#### **Participants**

In all, 499 participants finished the questionnaire, 249 men/ males, 250 women/females. All lived and were born in the UK and were currently not studying. Participants ages ranged from 23-86 years (M=38.1, SD=10.8); 418 (84%) were working full-time, 52 (10%) part-time, 11 on zero-hours contracts (2%), and 18 currently not working (3%). In all, 314 (63%) of these 499 had a university degree. The median salary band was '£20,000-40,000' with 285 (57.1%) participants; the next largest was 'under £20,000' with 116 (23.2%), then £40,001-£60,000 with 67 (13.4%) participants. We measured their religious ideology by two questions: "how religious are you?" (from 1 = not at all to 10 = very) with a mean score of 2.62 and by asking their beliefs in life after death which 183 of the 499 (37%) did. We measured their political beliefs of 1 = conservatism to 9 = liberal, and the mean score was 5.62. In all 34 of the 499 (7%) identified themselves as an ethnic minority (BAME) in the UK.

Ethics was sought and obtained (CEHP/514/2017).

Participants gave consent for their anonymised data to be analysed and published.

Measures

**Conspiracy theories and cover ups** (Furnham, 2021b). This is a short six-item questionnaire derived for this study. The statements (see Table 1) were derived from a content analysis of two television channels dedicated to CTs. Responses were on an 8 point agreedisagree scale. The overall alpha for the six items was .82

The Equity Preference Questionnaire (Sauley & Bedeian, 2000) measured the equity sensitivity of participants. Miller (2009) used

a series of CFAs to identify a two-factor model for this scale with, in this study, factors of entitlement ( $\alpha$  = .92) and benevolence ( $\alpha$  = .84). Each item is rated on a 5-point scale from 1 = strongly disagree to 5 = strongly agree. Example items are "I prefer to do as little as possible while getting as much as I can from my employer," "When I am at my job, I think of ways to get out of work," and "I feel obligated to do more than I am paid to do at work."

**Disenchantment.** Employee disenchantment was assessed through the 15-item inventory (see Table 2 for items) (Furnham & Treglown, 2017). Respondents stated the extent to which they agreed with statements on a 10-point Likert scale (1 = strongly disagree, 10 = strongly agree). Totals for the five factors of disenchantment and overall disenchantment were calculated by summing the scores of all relevant items. Internal consistency was high: .84. The reliability of each scale is shown in Table 2. The questionnaire order was the same as in the method section, though there were filler items between the measures.

#### **Procedure**

Ethics approval was sought and received from the appropriate ethics committee (CEHP/514/2017). Participants were recruited online through the website Prolific.ac and they answered online. This website was chosen over its competitors due to its more diverse participant pool and better accessibility with its recruitment filters (Palan & Schitter, 2018; Peer et al., 2017). Participants were filtered according to their answers to demographic questions upon account creation. The filter used selected UK residents who were also born in the UK, participants aged between 23-100, non-students, and those working at least 21 hours each week. Due to the higher number of women on the website, two surveys were used to recruit gender separately, both aiming to recruit 250 participants. For homogeneity, both the sex and gender filters were used in agreement to only select cisgender participants. The questionnaire took an average of 8 minutes and participants were paid £0.85 for their time. Unfinished data cases were removed prior to analysis.

Results

Table 1 shows the cover-up items as well as sex differences. There were significant differences on half the scales, all indicating that females supported the cover-up version of events more than males. However, the effect sizes for these analyses were low with the most significant having a d = 0.29.

The cover-up questionnaire was subjected to a factor analysis: both a principal and varimax rotated analysis revealed two factors

**Table 1.** Gender Differences between Cover-up Theory Items

Item	Gender	M	SD	F	p
1. It is often naïve to believe the official/government version of events	Male	5.61	1.51	0.98	.324
i, it is often flaive to believe the official/government version of events	Female	5.74	1.51		
2. This government is regularly a Machiavellian manipulators of the media	Male	5.59	1.75	0.17	.683
2. This government is regularly a Machiavenian manipulators of the media	Female	5.65	1.62		
3. Most government narratives aim to keep people ignorant and in fear	Male	5.08	1.77	0.47	.494
5. Wost government narratives and to keep people ignorant and in lear	Female	5.19	1.75		
4. Anti-Conspiracy theorists demonise conspiracy theorists and won't take the time and trouble to look at	Male	4.38	1.93	3.66	.056
the evidence.	Female	4.69	1.64		
5. Conspiracy popularisers/theorists aim is to hold those in power to account and reclaim history	Male	4.16	1.95	10.78	.001
5. Conspiracy popularisers/theorists ann is to note those in power to account and rectain history	Female	4.70	1.66		
C this the analysis and earlies of considerable anists who are the storid and	Male	3.30	1.83	6.688	.010
6. It is the mockers and scoffers of conspiracy theorists who are the stupid ones	Female	3.71	1.68		

Note. Scale: 1 = strongly disagree, 8 = strongly agree.

Table 2. Gender Differences between Disenchantment Items

Item	Gender	M	SD	F	p
A. Organisational Hypocrisy (.94)					
1. The way my organisation promotes itself does not align with how it operates	Male	4.02	1.85	1.450	.229
i. The way my organisation promotes tesen does not aligh with how it operates	Female	3.81	2.00		
2. My organisation promotes values it does not adhere to	Male	4.02	1.99	2.380	.124
2. My organisation promotes values it does not duniere to	Female	3.74	2.07		
3. My organisation pretends to be a more ethical or responsible company than it actually is	Male	4.16	2.06	4.640	.032
	Female	3.75	2.14		
B. Disrespect (.86)					
4. My manager puts down me or my colleagues down in front of others	Male	2.34	1.78	0.371	.543
4. My manager pats down me of my concagaes down in fonction of others	Female	2.44	1.98		
5. Others at my organisation have told me my thoughts or feelings or stupid	Male	2.01	1.32	1.090	.298
5. Others at my organisation have total me my thoughts or rectings or stupic	Female	2.15	1.66		
6. My manager puts me down in front of others	Male	2.03	1.62	0.134	.714
o. My manager puts me down in mone of others	Female	2.09	1.78		
C. Broken Promises (.89)					
7. Overall, my organisation has not fulfilled its commitment to me	Male	3.24	1.93	0.033	.856
7. Overall, my organisation has not runnied its committeent to me	Female	3.21	2.12		
8. My agranisation has failed to fulfil an obligation it has to me on more than one accession	Male	3.27	1.97	0.082	.775
8. My organisation has failed to fulfil an obligation it has to me on more than one occasion	Female	3.21	2.16		
9. My manager has made promises they have not kept	Male	3.38	2.133	0.247	.620
9. My manager has made promises they have not kept	Female	3.28	2.250		
D. Distrust (.78).					
10. I know what I say in private with others in my organisation is confidential and won't be used against me	Male	4.85	1.94	0.039	.843
10. I Know what I say in private with others in my organisation is confidential and wort be used against me	Female	4.81	2.05		
	Male	5.23	1.74	0.016	.900
11. My employer is open and upfront with me	Female	5.21	1.98		
	Male	4.94	1.87	1.190	.276
12. I trust the people who are in charge of my organisation and their methods	Female	5.12	1.99		1270
E. Perceived Inequity (.77)					
	Male	5.75	1.60	0.085	.770
13. I am treated too fairly	Female	5.70	1.77		
14. Those who work hard at my organisation are rewarded, whilst those who do not put in enough effort	Male	4.57	1.82	1.700	.193
are reprimanded.	Female	4.34	1.98		
are reprimariaca.					
15. I believe that differences or similarities in employees' salary at my organisation are justified and	Male	4.37	1.86	0.000	.988

**Table 3.** Descriptive Statistics and Pearson Correlations

Variable	М	SD	1	2	3	4	5	6	7	8	9	10	11	12	13	14	15	16	17
1. Sex																			
2. Age	39.89	10.82	090°																
3. Degree	0.63	0.48	.039	214**															
4. Religiousness	2.62	2.49	.082	.099°	.049														
5. Liberalism	5.63	1.91	.065	151**	.226**	070													
6. BAME	0.07	0.25	.031	182**	.160**	.183**	.056												
7. Cover-Up Total	4.82	1.27	.102*	016	159**	.054	.124**	.077											
8. Cover-Up F1	16.42	4.36	.035	052	034	.014	.308**	.050	.839**										
9. Cover-Up F2	12.47	4.60	.135**	.023	230°°	.075	088	.080	.857**	.438**									
10. Dis1: Org Hyp	11.75	5.74	078	.027	028	.028	013	.016	.129**	.096*	.123**								
11. Dis 2: Disresp	6.53	4.53	.033	.029	034	.030	068	.028	.175**	.084	.209**	.450°°							
12.Dis3: Brk Prom	9.79	5.70	016	.059	034	.015	039	010	.119**	.088*	.113°	.683**	.664**						
14.Dis4: Distrust	15.08	4.80	.014	071	.028	021	.020	044	013	005	016	608**	433**	620**					
15.Dis5: Inequal	14.55	4.57	.000	030	072	019	087	130°°	.015	.010	.015	532**	310**	567**	.730**				
16. DisTotal	50.57	9.87	064	.037	065	.024	069	050	.206**	.148**	.200**	.704**	.696**	.748**	203**	068			
17. Entitled	2.90	1.49	266**	108°	016	115°	049	.012	.091*	.071	.083	.260**	.267**	.267**	197**	098°	.286**		
18. Benevolence	5.74	1.22	.319**	.001	.032	.112°	.036	.000	.020	.008	.024	131**	135**	142**	.224**	.119**	079	660°°	

*Note.* Sex coded as 1 = male, 2 = female. Figures in bold are those with the criterion variable: cover-up theories. \*p < .05, \*\*p < .01.

(eigenvalues: 3.24, 1.28; variance: 38.45%, 36.84%). The first three items, referring mainly to government issues loaded on the first factor and the last three items on the second factor, which was about conspiracy theorists. The two factors had satisfactory internal reliability, .85 and

.81, respectively. The two factors were intercorrelated at r =.48.

Table 2 shows the same analysis for the fifteen disenchantment items. There were fewer than chance significant sex differences. Indeed, only one showed a difference with a d < 0.10.

Table 3 shows the correlation between all the major factors in this study. Three demographic factors, three of the disenchantment facets and one of the perceived fairness factors were significant correlates of CTs. The highest correlations were with the disenchantment factors but all correlations were higher than .20. A number of hypotheses were confirmed as the coverup score was significantly correlated with sex  $(H_1)$ , education  $(H_2)$ , liberalism  $(H_4)$ , workplace entitlement  $(H_6)$ , and beliefs

**Table 4.** Regression Models with Cover-up Total Score as the Outcome Variable

		Mod	lel 1		Model 2					
	В	SE	β	t	В	SE	β	t		
Sex	0.229	0.111	.091	2.058*	0.279	0.116	.110	2.401*		
Age	0.002	0.005	.020	0.430	0.000	0.005	003	-0.071		
Degree	-0.575	0.120	220	-4.787**	-0.545	0.118	208	-4.636**		
Religiousness	0.030	0.023	.058	1.286	0.028	0.023	.055	1.245		
Liberalism	0.109	0.030	.163	3.610**	0.123	0.030	.185	4.156**		
BAME	0.444	0.231	.087	1.921	0.490	0.229	.096	2.140*		
Entitled					0.108	0.052	.127	2.092*		
Benevolent					0.073	0.062	.070	1.176		
Dis1.Org Hy					0.030	0.014	.136	2.179*		
Dis2. Disresp					0.039	0.016	.140	2.381*		
Dis3 Brk Pro					0.004	0.017	.018	0.239		
Dis4 Distrus					0.021	0.019	.080	1.131		
Dis5 Ineq					0.029	0.019	.104	1.551		
F		6.5	87			5.7	797			
p		.00	00			.0	00			
Adjusted R <sup>2</sup>		.00	64			.1	12			

Note. Sex coded as 1 = male, 2 = female.

about organisational hypocrisy  $(H_8)$ , as well as the totalled disenchantment score  $(H_{\circ})$ .

Table 4 shows the results of the hierarchical regression. In the first step, demographic and ideological factors were entered, which accounted for 6.4% of the variance. The results indicated that less educated and less liberal females believed in the cover-up theory of events. When the work belief factors were entered the results showed that just over 11% of the variance was accounted for. Specifically, females, without a degree, who were politically conservative, a member of a BAME group felt entitled at work, and experienced organisational hypocrisy and disrespect held stronger cover up views. Education and political views seemed the main determinants of the cover-up perspective.

This analysis was repeated on the two cover-up factors (see Table 5). The regression onto Factor 1, Government issues, was significant. As may be expected, by far the most significant correlate was political beliefs which indicated that less liberal people believed in this factor. The regression onto Factor 2, Conspiracy theorists, was significant: the four most significant predictors were sex, educa-

tion (having a degree) and disenchantment Factor 1 (organisational hypocrisy) and disenchantment Factor 2 (organisational disrespect).

#### Discussion

Unlike nearly all studies in the growing CT literature, this study focused on general cover up perspective. Clearly, cover up is a form of CT where CT supporters argue that governments and powerful bodies are censoring the truth, as well as pouring scorn on those that dare to challenge this view. We explored demographic, ideological, and work-experience correlates and confirmed a number of our hypotheses. Many studies have shown that gender, education, and political views were correlated with CTs: this study showed this is also true of cover-up theories (Swami et al., 2017, 2011). This study showed that less-well educated, females from minority groups and with more conservative (illiberal) political views agreed with the cover-up account of CTs.

It is not clear why there is so often a gender effect in this area though many studies do suggest that females are more prone to CT

Table 5. Regression Models with Cover-up Factor Scores as the Outcome Variables

		Fact	tor 1		Factor 2					
	В	SE	β	t	В	SE	β	t		
Sex	0.285	0.398	.033	0.717	1.384	0.417	.151	3.317**		
Age	-0.004	0.018	010	-0.213	0.006	0.019	.015	0.330		
Degree	-1.012	0.403	112	-2.512*	-2.259	0.422	238	-5.348**		
Religiousness	0.063	0.077	.036	0.816	0.105	0.081	.057	1.303		
Liberalism	0.792	0.102	.346	7.765**	-0.052	0.107	021	-0.485		
BAME	1.058	0.785	.061	1.347	1.885	0.823	.102	2.289*		
Entitled	0.295	0.177	.101	1.661	0.355	0.186	.115	1.909		
Benevolent	0.224	0.212	.063	1.057	0.212	0.222	.056	0.954		
Dis1.Org Hy	-0.071	0.156	094	-0.457	0.265	0.164	.331	1.619		
Dis2. Disresp	-0.066	0.116	069	-0.570	0.310	0.122	.305	2.549*		
Dis3 Brk Pro	-0.075	0.156	098	-0.479	0.112	0.163	.138	0.683		
Dis4 Distrus	-0.082	0.123	091	-0.671	0.219	0.129	.229	1.699		
Dis5 Ineq	0.004	0.147	.004	0.029	0.180	0.154	.180	1.168		
Dis Total	0.137	0.144	.310	0.955	-0.150	0.151	322	-0.996		
F		5.8	349		6.328					
p		.0	00		.000					
Adjusted R <sup>2</sup>		.1	21	.131						

*Note.* Sex coded as 1 = male, 2 = female.

<sup>\*</sup>p < .05, \*\*p < .01.

theories. It may be due to their relative powerlessness to men in some areas of society. It is easier to explain why education and more right-wing conservative social and political views are associated with CTs: as the former is usually associated with scepticism and the latter with distrust, both of which are related to beliefs in CTs. Given these results it may be worth exploring more political views and the subtle distinction between conservatism, dogmatism, and authoritarianism. Whilst these views overlap and are related, it seems that the latter ideas, namely right-wing authoritarianism, may be most related to CTs and beliefs about cover-ups.

This study particularly investigated the relationship between feeling alienated at work and cover-up theories. The results showed that a feeling of being entitled, the idea they are somehow being deprived or unfairly treated (which is associated with basic suspiciousness and possible sub-clinical paranoia and narcissism), is associated with all CTs. Those who are disenchanted at work tend to be unhappy, demotivated, and alienated with feelings of being unfairly dealt with, all of which provide fertile experiences leading to CTs and radical beliefs (Furnham & Grover, 2021; Furnham & Treglown, 2017). The correlation between the totalled disenchantment and CT score was .21 (N= 499, p < .001). The workplace may then be a fertile ground for those wishing to propagate CTs, particularly if they point out how management has redacted certain documents (Nyhan et al., 2016).

The question is whether a propensity to a "cover-up perspective" leads to alienation at work or vice versa; or indeed whether cover-up philosophies are moderator or mediator variables between individual differences and work experience. Certainly, it is known that those wishing to convert or proselytise CT and other radical theories seek out those who seem marginal at and outside the workplace (Furnham et al., 2021a).

#### **Implications**

One implication of this study is using cover-up questions in the ever-growing CT literature to explore the meta-perceptions of CT theorists, that is, what are the arguments of those who endorse theories. Studying their channels, blogs, and publications it is clear they take a strong cover-up perspective, which few researchers have investigated with the exception of Nyhan et al. (2016), where redactions made people aware of cover up. Equally it may prove interesting, just as there is a literature of different areas/types of conspiracy theories (economic, medical, political), to investigate whether there are different types of cover-up theories, or more specifically different cover-up theories for different areas of CTs like military or medical CTs. That is, who does the "covering up", why, and to what extent deserves more exploration.

It is interesting that, at the time of this research (2021), there are a number of conspiracy theories about Covid-19 vaccines which has led to a refusal of some workers to accept vaccinations and which leaves employers with a serious dilemma as to know what to do, for the sake of other workers and the health of the company. Indeed, it may be that anti-vaccinators believe bosses are "covering-up" the truth about the vaccines and related issues. Equally, it would be interesting to know what employers think bosses in general coverup about their company, such as their own salaries and perks, and future plans for the organisation, hence the many calls for more transparency and communication to reduce the concerns of those who believe in cover-ups.

#### Limitations

Like all studies, this had limitations. Other than usual issues about the representative nature of the sample, the psychometric properties of the measures used, and the limits of self-report it would have been most desirable to determine the extent to which participants actually endorsed more common CTs (Swami et al., 2017). That is, what is the correlation between general endorsement of CTs and cover-up theories? Further, it would be interesting to explore the idea that it was not only governments and their agencies (Secret Services) that are involved in cover up but also commercial organisations, religious institutions, and even world bodies. Finally, given our focus on work related factors, it would have been ideal to explore in more detail the respondents' work history.

#### Conflict of Interest

The authors of this article declare no conflict of interest.

#### References

- Ahmed, W., Vidal-Alaball J., Downing, J., & López Seguí, F. (2020). COVID-19 and the 5G conspiracy theory: Social network analysis of Twitter data. *Journal of Medical Internet Research*, 22(5), e19458. https://doi.org/10.2196/19458
- Andrade, G. (2020). Medical conspiracy theories: Cognitive science and implications for ethics. *Medicine, Health Care and Philosophy*, 23(3), 505-518. https://doi.org/10.1007/s11019-020-09951-6
- 505-518. https://doi.org/10.1007/s11019-020-09951-6
  Barron, D., Morgan, K., Towell, T., Altemeyer, B., & Swami V. (2014).
  Associations between schizotypy and belief in conspiracist ideation.
  Personality and Individual Differences, 70, 156-159. https://doi.org/10.1016/j.paid.2014.06.040
- Bartlett, J., & Miller, C. (2010). The power of unreason. Demos
- Biddlestone, M., Green, R., & Douglas, K. (2020). Cultural orientation, powerlessness, belief in conspiracy theories, and intentions to reduce the spread of COVID-19. *British Journal of Social Psychology*, 59(3), 663-673. https://doi.org/10.1111/bjso.12397
- Bowes, S., Costello, T. H., Ma, W., & Lilienfeld, S (2020). Looking under the Tinfoil Hat: Clarifying the personological and psychopathological correlates of conspiracy beliefs. *Journal of Personality*, 89(3), 422-436. https://doi.org/10.1111/jopy.12588
- Brotherton, R., & French, C. (2014). Belief in conspiracy theories and susceptibility to the conjunction fallacy. *Applied Cognitive Psychology*, 28(2), 238-248. https://doi.org/10.1002/acp.2995
- Darwin, H., Neave, N., & Holmes, J. (2011). Belief in conspiracy theories. The role of paranormal belief, paranoid ideation and schizotypy. *Personality and Individual Differences, 50*(8), 1289-1293. https://doi.org/10.1016/j.paid.2011.02.027
- Douglas, K. M., & Leite, A. C. (2017). Suspicion in the workplace: Organizational conspiracy theories and work-related outcomes. *British Journal of Psychology, 108*(3), 486-506. https://doi.org/10.1111/bjop.12212
- Douglas, K. M., Sutton, R. M., Callan, M. J., Dawtry, R. J., & Harvey, A. J. (2016). Someone is pulling the strings: Hypersensitive agency detection and belief in conspiracy theories. *Thinking and Reasoning*, 22(1), 57-77. https://doi.org/10.1080/13546783.2015.1051586
- Douglas K. M., Sutton, R. M., & Cichocka, A. (2017) The psychology of conspiracy theories. *Current Directions in Psychological Science*, 26(6), 538-542. https://doi.org/10.1177/0963721417718261
- Furnham, A. (2013). Commercial conspiracy theories: a pilot study. Frontiers in Psychology, 4, 379. https://doi.org/10.3389/fpsyg.2013.00379
- Furnham, A. (2021a). Just world beliefs, personal success and beliefs in conspiracy theories. *Current Psychology*. Advance online publication. https://doi.org/10.1007/s12144-021-01576-z
- Furnham, A. (2021b). Measuring cover ups [Unpublished manuscript]. Norwegian Business School.
- Furnham, A., & Grover, S. (2021). Do you have to be mad to believe in conspiracy theories? Personality disorders and conspiracy theories. *International Journal of Social Psychiatry*. Advance online publication https://doi.org/10.1177/00207640211031614
- Furnham, A., & Treglown, L. (2017). *Disenchantment: Managing motivation and demotivation at work*. Palgrave.
- Galliford, N., & Furnham, A. (2017). Individual difference factors and beliefs in medical and political conspiracy theories. Scandinavian Journal of Psychology, 58(5), 422-428. https://doi.org/10.1111/sjop.12382
- Georgiou, N., Delfabbro, P., & Balzan, R. (2020). COVID-19-related conspiracy beliefs and their relationship with perceived stress and pre-existing conspiracy beliefs. Personality and Individual Differences, 116, 110201. https://doi.org/10.1016/j.paid.2020.110201
- Goertzel, T. (1994). Belief in conspiracy theories. *Political Psychology*, 15(4), 731-742. https://doi.org/10.2307/3791630
- Haaksonsen, J., & Furnham, A. (in press). COVID-19 Vaccination: Conspiracy theories, demography, ideology and personality disorders. Health Psychology.
- Huseman, R. C., Hatfield, J. D., & Miles, E. W. (1987). A new perspective on equity theory: The equity sensitivity construct. *Academy of Management Review*, 12(2), 222-234. https://doi.org/10.5465/amr.1987.4307799

- Imhoff, R., & Lamberty, P. (2017). Too special to be duped: Need for uniqueness motivates conspiracy theories. *European Journal of Social Psychology*, 47(6), 724-734. https://doi.org/10.1002/eisp.2265
- Psychology, 47(6), 724-734. https://doi.org/10.1002/ejsp.2265
  Lobato, E., Mendoza, J., Sims, V., & Chin, M. (2014). Examining the relationship between conspiracy theories, paranormal beliefs, and pseudoscience acceptance among a university population. Applied Cognitive Psychology, 28(5), 617-625. https://doi.org/10.1002/acp.3042
- Miller, B. K. (2009). Confirmatory factor analysis of the equity preference questionnaire. *Journal of Managerial Psychology*, 24(4), 328-347. https://doi.org/10.1108/02683940910952714
- Nyhan, B., Dickinson, F., Dudding, S., Dylgieri, E., Neiley, E., Pullerits, C., Seog, M., Simpson, A., Szilagyi, H., & Walmsley, C. (2016). Classified or coverup? The effect of redactions on conspiracy theory beliefs. *Journal of Experimental Political Science* 3(2), 109-123. https://doi.org/10.1017/XPS.2015.21
- Oliver, J. E., & Wood, T. J. (2014a). Conspiracy theories and the paranoid style(s) of mass opinion. *American Journal of Political Science*, 58(4), 952-966. https://doi.org/10.1111/ajps.12084
- Oliver, J. E., & Wood, T. J. (2014b). Medical conspiracy theories and health behaviours in the United States. *JAMA Internal Medicine*, *174*(5), 817-818. https://doi.org/10.1001/jamainternmed.2014.190
  Palan, S., & Schitter, C. (2018). Prolific.ac A subject pool for online
- Palan, S., & Schitter, C. (2018). Prolific.ac A subject pool for online experiments. *Journal of Behavioral and Experimental Finance*, 17, 22-27. https://doi.org/10.1016/j.jbef.2017.12.004
- Peer, E., Brandimarte, L., Samat, S., & Acquisti, A. (2017). Beyond the Turk: Alternative platforms for crowdsourcing behavioral research. *Journal of Experimental Social Psychology*, 70, 153-163. https://doi. org/10.1016/j.jesp.2017.01.006
- Sauley, K. S., & Bedeian, A. G. (2000). Equity sensitivity: Construction of a measure and examination of its psychometric properties. Journal of Management, 26(5), 885-910. https://doi. org/10.1177/014920630002600507
- Stieger, S., Gumhalter, N., Tran, U. S., Voracek, M., & Swami, V. (2013). Girl in the cellar: A repeated cross-sectional investigation of belief in conspiracy theories about the kidnapping of Natascha Kampusch. Frontiers in Psychology, 4, 297. https://doi.org/10.3389/ fpsyg.2013.00297
- Sullivan, D., Landau, M. J., & Rothschild, Z. K. (2010). An existential function of enemyship: Evidence that people attribute influence to personal and political enemies to compensate for threats to control. *Journal* of Personality and Social Psychology, 98(3), 434-449. https://doi. org/10.1037/a0017457

- Sunstein, C. R., & Vermeule, A. (2009). Conspiracy theories: Causes and cures. *Journal of Political Philosophy*, 17(2), 202-227. https://doi.org/10.1111/j.1467-9760.2008.00325.x
- Sutton, R., & Douglas, K. (2020). Conspiracy theories and the conspiracy mindset: Implications for political ideology. *Current Opinion in Behavioral Sciences*, 34, 118-122. https://doi.org/10.1016/j.cobeha.2020.02.015
- Swami, V., Barron, D., Weis, L., Voracek, M., Stieger, S., & Furnham, A. (2017). An examination of the factorial and convergent validity of four measures of conspiracist ideation, with recommendations for researchers. *Plos One*, 12(2), e0172617. https://doi.org/10.1371/journal.pone.0172617
- Swami, V., Coles, R., Stieger, S., Pietschnig, J., Furnham, A., Rehim, S., & Voracek, M. (2011). Conspiracist ideation in Britain and Austria: Evidence of a monological belief system and associations between individual psychological differences and real-world and fictitious conspiracy theories. British Journal of Psychology, 102(3), 443-463. https://doi.org/10.1111/j.2044-8295.2010.02004.x
- Swami, V., & Furnham, A. (2012). Examining conspiracist beliefs about the disappearance of Emilia Earhart. *Journal of General Psychology*, 139(4), 244-259. https://doi.org/10.1080/00221309.2012.697923
- Swami, V., & Furnham, A. (2014). Political paranoia and conspiracy theories. In J.-P. Prooijen & P. A. M. van Lange (Eds.), Power politics, and paranoia: Why people are suspicious of their leaders (pp. 218-236). Cambridge University Press.
- Uscinski, J. E., & Parent, J. M. (2014). *American conspiracy theories*. Oxford University Press.
- van Prooijen, J.-W., Krouwel A., & Pollet T. (2015). Political extremism predicts belief in conspiracy theories. *Social Psychology and Personality Science*, 6(5), 570-578. https://doi.org/10.1177/1948550614567356
- Walter, A. S., & Drochon, H. (2020). Conspiracy thinking in Europe and America: A comparative study. *Political Studies*, 1-19. https://doi.org/10.1177/0032321720972616
- Wood, M. J., Douglas, K. M., & Sutton, R. M. (2012). Dead and alive: Beliefs in contradictory conspiracy theories. *Social Psychological and Personality Science*, 3(6), 767-773. https://doi.org/10.1177/1948550611434786
- Science, 3(6), 767-773. https://doi.org/10.1177/1948550611434786
  Yiu, T. W., Keung, C. W., & Wong, K. L. (2011). Application of equity sensitivity theory to problem-solving approaches in construction dispute negotiation. Journal of Management in Engineering, 27(1), 40-47. https://doi.org/10.1061/(ASCE)ME.1943-5479.0000031