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A qualitative exploration of the impact of COVID-19 on individuals with eating disorders in the UK

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1 A Qualitative Exploration of the Impact of COVID-19 on Individuals with Eating
2 Disorders in the UK

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27 Disorders in the UK

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30 Running Title: Impact of COVID-19 on people with eating disorders

31

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47

48 Abstract

49 COVID-19 may have substantial impact on the mental health at a population level,
50 but also has the potential to significantly affect those with pre-existing mental health
51 difficulties such as eating disorders. This qualitative study explores the impact of
52 COVID-19 and associated public health measures on adults with eating disorders
53 within the UK. We conducted 10 in depth interviews with adults (24-38 years) with a
54 self-reported eating disorder during lockdown. Data were analysed using an
55 inductive thematic analysis approach. We identified core themes related to social
56 restrictions (social isolation, changes in accountability to others, and increased
57 responsibility for self and others), functional restrictions (lack of routine and
58 structure, a need to intentionally plan activity, a desire for secrecy particularly
59 around food shopping) and restrictions in access to mental health services. Overall,
60 the impact of the lockdown was experienced as a catalyst for either increased
61 disordered eating behaviours or for a drive for recovery, depending on individual
62 circumstances going into these restrictions. This study is the first in depth interview
63 approach with adults with mixed eating disorder presentations in the UK. Findings
64 have important implications for post lockdown intervention care and practice.

65 Keywords

66 Coronavirus, COVID-19, eating disorders, qualitative, thematic analysis, lockdown

67 1. Introduction

68 Coronavirus disease 2019 (COVID-19) is a global pandemic with far-reaching
69 consequences for the physical and mental health of the population, leading to the
70 World Health Organisation (WHO) declaring it a Public Health Emergency of
71 International Concern in January 2020. The significant morbidity and rapid
72 spread of the virus has led to the activation of various levels of public health
73 measures, including “lockdown” in a high proportion of countries and physical
74 distancing measures to prevent transmission, resulting in unprecedented impacts on
75 social interactions, employment and the world economy. While the impact of the
76 pandemic, and associated management, on mental health is not yet fully known, the
77 potential for psychological distress is significant, as a result of the effects of social
78 isolation, the economic fallout, grief and trauma for survivors (Reger, Stanley, &
79 Joiner, 2020). Initial reports indicate increased levels of distress and anxiety among
80 the general population (Wang et al., 2020) and specific concern has been noted for
81 the potential impact on vulnerable populations, including those with pre-existing
82 mental health difficulties (Holmes et al., 2020).

83

84 One particularly vulnerable group in this context may be those with eating
85 disorders. The effects of the COVID-19 lockdown on individuals with an eating
86 disorder could be broad ranging. While there may be potential for some protective
87 consequences – e.g., reduced interpersonal triggers such as face-to-face body-based
88 social comparisons (Cooper et al., 2020), increased opportunity of support from
89 loved ones (Murphy, Calugi, Cooper, & Dalle Grave, 2020), or services embracing
90 new technology in the delivery of psychological therapies (Murphy et al., 2020) – the
91 overwhelming concern within the field is the potential for severe, adverse impacts
92 (Weissman, Bauer, & Thomas, 2020). Initial small scale pilot data from Spain
93 indicates worsening of the mental health of individuals with an eating disorder
94 including a deterioration in eating disorder symptomology for one third of
95 respondents (Fernández-Aranda et al., 2020) and in a large scale survey in Australia
96 conducted within the first few weeks of the pandemic, a significant proportion of
97 individuals who self-identified as having an eating disorder (n=180) reported an

98 exacerbation of restricting, binge eating, purging and exercise behaviours, relative to
99 before COVID-19 (Phillipou et al., 2020).

100

101 Rodgers and colleagues (2020) outline three pathways that may either precipitate
102 the development of disordered eating during the pandemic, or exacerbate existing
103 difficulties. The first involves the impact of disruption and restrictions to
104 daily activities as a result of public health interventions aimed at reducing
105 transmission of COVID-19. This includes public restrictions on exercise, grocery
106 shopping and concerns around scarcity of specific foods. These restrictions may
107 be highly provoking for individuals with rigid and inflexible exercise or eating
108 patterns, for example, by increasing the perceived need to stockpile food,
109 and associated risk of binge episodes (Touyz, Lacey, & Hay, 2020). This pathway also
110 highlights the potential for reduced social support, including restrictions in access to
111 treatment as a consequence of limitations placed on traditional face-to-face
112 treatment as a result of social distancing (Touyz et al., 2020) and restructuring
113 and reorientation of health services to prioritise the management of COVID-19
114 (Davis et al., 2020).

115

116 The second pathway relates to the effects of media (Rodgers et al., 2020). The
117 authors propose that social distancing may lead to an increased use of social media
118 and consequently enhanced exposure to harmful eating and appearance-related
119 content (e.g. review by Holland & Tiggemann, 2016), and to stressful and traumatic
120 world events which has been shown to negatively impact eating behaviours
121 (Rodgers, Franko, Brunet, Herbert, & Bui, 2012). In addition, the increased necessity
122 to use video-conferencing may be distressing for individuals with body avoidance.

123

124 The final pathway relates to fear of contagion, which may in turn lead to an increase
125 in restrictive eating patterns and orthorexia-based cognitions, alongside increased
126 levels of general stress and emotional distress, increasing the risk of disordered
127 eating patterns (Rodgers et al., 2020). Other authors also highlight the potential
128 financial impact of the pandemic, inclusive of reduced capacity for carers to support
129 individuals with eating disorders, due to the need to increase working hours (Davis

130 et al., 2020) or the impact on food insecurity on financial ability to purchase “safe”
131 or binge foods (Touyz et al., 2020; Weissman et al., 2020).

132

133 These theoretical pathways provide a useful framework to explore the potential
134 impact of COVID-19 and its management on those with eating disorders. Given the
135 rapidly changing environment, to date these mechanisms and pathways are largely
136 hypothesised, with relatively little literature based on those with lived experience of
137 an eating disorder. There are increasing calls for researchers to understand the
138 psychological, social and neuro-scientific effects of the COVID-19 pandemic on
139 mental health in collaboration with those with lived experience (Holmes et al.,
140 2020). In this study we therefore aim to contribute to this growing body of work by
141 exploring the experience of adults affected by eating disorders during the COVID-19
142 pandemic in the UK using in depth interviews.

143

144 2. Methods

145 This study is reported in line with the COREQ guidance (Consolidated criteria
146 for REporting Qualitative research) (Tong, Sainsbury, & Craig, 2007). Ethical approval
147 was provided by the University of Edinburgh (Ref: STAFF181, 05/06/20).

148

149 2.1 Participants and Sampling

150 Purposive sampling was used to recruit adults living in the UK who self-identified
151 as experiencing an eating disorder. Due to international differences in how
152 governments approached the pandemic, our study only included UK residents.
153 Advertisements for the study were posted on social media, mainly Twitter and
154 Facebook. All advertisements provided a study link to a participant information
155 sheet, to inform potential participants about the aim of the study, to verify eligibility
156 criteria and to obtain informed consent to be contacted. Participants were asked
157 to provide an email address to be contacted to schedule a one-time interview
158 alongside brief demographic information.

159

160 In total, 44 individuals noted an interest in the study of whom 15 consented to take
161 part, met the eligibility criteria and provided a valid email address to be contacted.

162 Of these, two opted out of the study and three did not respond to email
163 communication. Therefore, in-depth interviews were conducted with ten adults,
164 which was the minimum sample size striven for to enable data saturation.
165 Interviewers had no prior relationship to interviewees, except for one participant
166 who knew the interviewers from a previous eating disorder awareness event. Nine
167 participants identified as female; one identified as non-binary. The mean age of
168 participants was 29.6 years, ranging from 24 to 38 years, and all participants
169 identified as White. Five participants lived in England, five in Scotland. Five
170 participants lived alone at the time of the interview, two participants lived with
171 family, one with a roommate, one with a partner, and one with a partner and family.
172 All participants identified with disordered eating behaviours for more than two
173 years. Six participants mainly identified with Anorexia Nervosa, two with Eating
174 Disorders Not Otherwise Specified and one with Bulimia Nervosa.

175

176 2.2 Data Collection

177 Participants were contacted via email to arrange a one-on-one Skype interview with
178 one of two female interviewers (SMB (MSc) and MCO (MSc), both PhD students in
179 the field of eating disorders at the time of the interviews). Skype interviews were
180 audio-recorded and transcribed verbatim by three researchers (SMB, MCO and IP).
181 No field notes were taken during the interviews. The purpose of the study was fully
182 disclosed to all participants prior to the study and interviewees had the opportunity
183 to enquire about the researchers' motivations and interests in this research topic
184 subsequent to the interview. A semi-structured interview schedule was used, which
185 was provided to participants beforehand if they requested it to reduce the likelihood
186 of being triggered by any of the questions. The schedule was pilot tested by each
187 interviewer and focused on the general impact of COVID-19 and resulting lockdown
188 measures, the specific impact on eating behaviours, food purchasing and exercise
189 behaviours. In addition, participants were asked about how the media had impacted
190 their mental well-being during lockdown and how their support systems were
191 impacted by the restrictions. In the UK, "lockdown" was enforced on March 26th,
192 2020 where all UK residents were asked to stay at home unless purchasing basic
193 necessities, for medical need, essential key worker travel to work or one form of

194 exercise a day. Restrictions on outdoor activities (e.g., exercise) started to ease in
195 mid-May 2020, and non-essential businesses remained closed until mid-end June
196 (specific dates vary across the UK). Interviews were conducted from 14th May to 4th
197 June 2020 and lasted between 45 and 120 minutes. All participants were debriefed
198 after completion of the interview and provided with external support resources.
199 Transcripts were not returned to participants for comments or corrections.

200

201 2.3 Theoretical Position and Analysis

202 This study was informed by Houston's (2001) illustration of critical realism, which
203 recognises human subjectivity, while acknowledging that personal meaning is
204 shaped by social structures. In the present context, the COVID-19 pandemic and
205 resulting lockdown measures can be seen as structures and powers that actuate
206 specific psychological mechanisms. These mechanisms in turn cause so-called
207 tendencies (e.g. behaviours, thoughts, feelings). Our main analytical goal was to
208 understand and explain these tendencies, considering underlying psychological
209 mechanisms and structures (Houston, 2001).

210

211 Positioning us as researchers within the framework of critical realism involves
212 questioning our own assumptions, to better understand how those participating in
213 our study interpret their own actions, thoughts and feelings (e.g. Manicas, 2009).
214 Firstly, all researchers involved in this project experienced the lockdown measures in
215 the UK first-hand which may have had an influence on how we expected participants
216 to feel during this time. All authors are mental health researchers in the field of
217 eating disorders, which constitutes an 'insider conflict' (Aguinis & Henle, 2002;
218 Holian & Coghlan, 2013). One of the authors has lived experience with disordered
219 eating behaviours. Therefore, we must acknowledge the impact of assumed
220 knowledge, use of vernacular and assumed shared beliefs on our research.

221

222 All transcripts were coded line-by-line using NVivo (QSR International, Melbourne,
223 Australia) and a thematic analysis was conducted in accordance with the steps
224 outlined by Braun and Clarke (2006), using an inductive approach. Three researchers
225 (SMB, MCO, IP) coded four transcripts each to identify preliminary themes, while

226 allowing for partial cross-validation between coders. During two meetings, the
227 researchers discussed identified themes in the context of critical realism.
228 Subsequently, preliminary themes were grouped and, if necessary, adapted. This
229 process was followed by a second coding phase, which focused on the identification
230 of common underlying structures, psychological mechanisms and resulting
231 tendencies. Prevalent “patterned responses” (Braun & Clarke, 2006, p. 10) were
232 identified to investigate meaningful structures across all data sets. Initial codes
233 were reviewed among the coders and three overarching themes were determined as
234 coherently representing the complexity of the data. Eventually, all coders were
235 familiar with all transcripts and two further meetings were used to finalise the
236 thematic analysis by clearly defining all themes and subthemes. Participants did not
237 provide feedback on the findings.

238

239 3. Results

240 Across all interviews, the impact of the lockdown could be described as a catalyst for
241 either disordered eating behaviours or the effort to recover. Participants who were
242 managing better during lockdown attributed their coping skills to comparatively
243 better personal circumstances at the onset of lockdown and expressed concern
244 about the possibility of being in lockdown during a severe phase of disordered
245 eating.

246

247 Our study identified three main themes of underlying lockdown structures: social
248 restrictions (changes in how people were socialising), functional restrictions
249 (changes in daily routines around work, shopping etc.) and restrictions in access to
250 professional support.

251

252 3.1 Social Restrictions

253 Social distancing measures were introduced during lockdown to contain the spread
254 of the virus. Restrictions in social interactions were therefore the most decisive
255 overarching structure influencing participants’ mental well-being. Under this theme
256 we identified tendencies related to participants experiencing social isolation,
257 changes in accountability to others meaning increases or decreases in disordered

258 eating behaviours, and participants needing to take on more responsibility for
259 themselves and others.

260

261 3.1.1 Social Isolation

262 The COVID-19 public health restrictions had a significant impact on most
263 participants' social interactions, especially for those living alone. Loneliness was a
264 prevalent theme in all interviews as illustrated by participant 2696:

265 "Times when I would normally kind of be doing something potentially social or
266 something like that over the weekend...Obviously with more free time, I might
267 have gone back to see my parents--that [...] feeling, of like, existential loneliness
268 felt incredibly desperate and really quite painful. But it was...It came in bursts to
269 begin with, and I think as lockdown has gone on, it's that feeling of real painful
270 loneliness." (R2696)

271

272 Being socially isolated while struggling with an eating disorder was linked with the
273 tendency to become even more focused on food and disordered eating behaviours:

274 "Whereas, since lockdown, because I live alone...I'm on my own in the house
275 because there's nobody else around and I've got my house full of food, I have
276 more and more preoccupied thoughts about food." (R4880)

277

278 One participant compared the first weeks of confinement during lockdown with
279 being back in hospital, while two other participants described their realisation that
280 the lockdown only emphasised how socially isolated they had been before.

281 Becoming aware of this loneliness was seen as painful, but experiencing this social
282 isolation due to external circumstances made it more apparent that enhanced social
283 support would be helpful:

284 "Sometimes I think I found I couldn't manage the intensity of what I was going
285 through [with the eating disorder]...I've lost relationships because of it. Now I
286 feel like I've got a [...] a very small [support system] compared to how I feel like I
287 would need. But I feel like I could do with a lot more." (R7375)

288

289 3.1.2 Changes in Accountability

290 Depending on their living situation, participants in this study either experienced an
291 increase in or decreased accountability to others for their behaviours during
292 lockdown. Even though feelings towards accountability were ambivalent,
293 participants had the tendency to associate an increase in accountability with
294 improved eating pathology. Working from home without face-to-face social contacts
295 led one of the participants to actively engage in her eating disorder:

296 “And there were more days of not eating the week before lockdown. I of course
297 wasn't allowed in work and it was before they'd realise that, "Oh! You can do
298 your job from home!" And...I just...I didn't eat for that entire week because it
299 was like, ‘Hey! I'm not accountable! No one else is here! This is the
300 dream!’...Which is very dysfunctional! But it was absolutely...’This is all I've ever
301 wanted!’ with my 'eating disorder brain'. [...]” (R5082)

302

303 Another participant felt more accountable at home, where she lives with her
304 partner:

305 “I'm very busy at work. And no one pays any attention to what I am eating, in
306 my job. Whereas when I am at home with my partner, erm... and we eat
307 together, it's much more difficult for me to *not* eat. Because he will ask me to
308 eat a meal with him, or a snack with him [...]. I don't think that he's – he's
309 perhaps as aware of that happening as I am. So, he just wants to eat lunch
310 together.” (R1443)

311

312 All participants showed a high level of self-awareness for their disordered eating
313 behaviours and how they previously or currently engage in them. An ambivalence
314 towards accountability was experienced by most participants, which reflected a
315 tension between both distress and relief associated with disordered eating
316 behaviours. Even though accountability was seen as helpful, not being accountable
317 (due to being alone) was also associated with feelings of safety by one of the
318 participants:

319 “Like – if I was going to my work every day, I wouldn't be able to like exercise
320 this much in the morning or I could, but I would have to get up super early. And
321 I'll be out of the house longer and people will expect me to eat lunch and they'll

322 expect me to not just eat salads and my mum will expect me to go out with her
323 more [...] like there's lots of more expectations of...I suppose less opportunity to
324 hide and be quite like safe and withdrawn." (R7260)

325

326 The social restrictions of the lockdown are therefore an opportunity to evade
327 expectations for recovery. This, however, was associated with anxiety regarding a
328 future post-lockdown, when it wouldn't be possible to actively engage in certain
329 behaviours anymore.

330 "[...] I used to slightly be anxious about coronavirus, but now I'm just anxious
331 about where it's going to go from here. I've kind of gotten used to those
332 thoughts. Now, I've got future worries about how I'm gonna go back out into the
333 world" (R9143)

334

335 3.1.3 Increased Responsibility

336 Due to the social distancing measures, participants had less or modified professional
337 support and communicated with their friends and family primarily via phone and
338 online. Having had experiences of continued recovery was therefore an opportunity
339 to claim responsibility for certain accomplishments.

340 "I *hope* that I won't slip back into that habit [not eating lunch], because I think
341 actually, I'm doing quite well now. [...] and it will be nice if I could take
342 responsibility for that myself as well, really." (R1443)

343

344 Again, the conditions appeared to influence how participants coped with the
345 increased responsibility for themselves and others. Participant 1443 was working
346 towards recovery before the lockdown was introduced and received additional
347 support from her partner. Other participants were living on their own or had to take
348 on additional responsibilities due to the pandemic. Participant 4110, who was taking
349 care of her two younger brothers due to her mother being part of the high-risk
350 population, described how buying foods for others increased her preoccupation with
351 food and compensated for not eating the food herself:

352 "[...] I am buying a lot of food just like for my brothers, because I am doing all
353 the shopping because my mum is not here. I am buying so much food. [...] – and

354 a lot of it I am doing because I know that I can't eat it. Like I am – I just buy
355 everything, [...] it's not even pleasure, I just don't know, I am obsessed with it.
356 Like I hate food shopping I absolutely hate it. But I spend - I have never spent so
357 much money on food shopping in my life." (R4110)

358

359 Heightened responsibility was experienced by most participants, but resulting
360 behaviours and cognitions differed depending on their living situation, eating
361 disorder progression and how readily accessible additional support was during the
362 first weeks of lockdown.

363

364 3.2 Functional Restrictions

365 The lockdown not only limited people's social interactions, but also the way they
366 could organise their daily life. Many activities such as the commute to and from
367 work, meal time routines and food shopping had to be altered, meaning participants
368 had to build up new routines. Related to these functional restrictions, we identified
369 tendencies associated with this lack of structure, becoming increasingly 'intentional'
370 in planning social activities and exercise, and managing a desire for
371 anonymity/secretcy in the context of food purchasing.

372

373 3.2.1 Lack of Routine and Structure

374 All participants referred to rigid behaviour when describing their disordered eating
375 behaviour. Routine and structure were not only seen as important, but also essential
376 to being able to cope with dysfunctional thoughts and behaviours. The lockdown
377 disrupted established routines and heightened participants' need for introducing
378 new structures and routines into their lives:

379 "So...So, my eating routines have changed probably for the better. Because I'm
380 with my partner more. Erm...Yeah. I think...[pause] Erm... [pause] I-I think I have
381 struggled a lot with...Worry about not getting food that I feel comfortable
382 eating." (R1443)

383

384 Maintaining both daily routine and structure functions to both perpetuate and
385 mitigate disordered eating psychopathologies. Most respondents referred to these

386 behaviours, especially in relation to times and environments associated with eating.
387 Participant 7260 referred to this in terms of social cues and expectations from
388 colleagues:

389 "Yeah because I see what was keeping me in my routine was having people
390 around me, so like some people at my work knew so they'd be like 'It's lunch
391 time!' and like we would all be all over so we might not eat together but like
392 because -and we would eat at our desks and stuff as we were working, but
393 because people said like it's lunchtime like it was easier to do things in a routine
394 when you've got more of a routine. Whereas like, the whole day just seems the
395 same even if you're working, even if you've got meetings or whatever, it's not,
396 the day is split so like yeah." (R7260)

397

398 Similarly, participants referred to a lack of routines making disordered eating habits
399 less severe. Without pre-lockdown routines and structures, Participant 4110 did not
400 feel compelled to mitigate maladaptive eating behaviours:

401 "I don't know, like I think – there's just always like just that thing that like I go to
402 in my life that as soon as things like kind of change and go a bit crazy like it's my
403 kind of go to and the – and my brain is automatically like, 'Ok, well, like, let's just
404 stop it then forever, d'you know- let's just cut down, or let's do this or...' There
405 was definitely change or it was quite slow at first it wasn't like let's stop eating
406 altogether it was just like let's cut back a bit and see how that works." (R4110)

407

408 As established routines and structures were inevitably impacted due to the
409 lockdown, participants reported being disconcerted by having to deconstruct rigid
410 regimens to adjust to the current situation. For Participant 2696, the lack of physical
411 boundaries distinguishing work and leisure has been unpleasant:

412 "But, it has been kind of strange, and I personally have actually hated working
413 from my flat. I really, really like to implement those physical boundaries around
414 saying, "Okay, I'm going to work now"--treating study like work, going to the
415 library, getting to my lectures and then I come back to the flat. "Fine. This is
416 where you don't work. This is where I chill out. I rest." So, that's been very
417 difficult." (R2696)

418 3.2.2 A Need for Intentionality

419 Prior to the lockdown, participants' daily routines were to some extent externally
420 regulated and offered diverse opportunities to socialize, without actively choosing to
421 do so. Having to compensate for this new type of confinement and a more sedentary
422 lifestyle led participants to introduce more intentional, consciously-planned activities
423 or to intensify their exercise routines, which were in some instances perceived as
424 compulsive.

425 "Yeah, because now it is like exercise for exercise sake, whereas like before it
426 was like a social thing. I was doing that with people, and I was going to the gym
427 to see people and then I was going running with people and now it's just like I
428 need to exercise because I am in the house sitting still being lazy all
429 day." (R7260)

430

431 Having to *schedule* all social interactions further meant that participants had to
432 actively reach out for support if needed. Participant 9143 described how her
433 problems with communication are part of her eating disorder and part of why she
434 misses the casualness of social interactions before lockdown:

435 "[...] It's harder to bring things up if today I'm struggling...Before, it was a lot
436 easier in-person to pass it by in conversation rather than make such a big deal
437 out of it. That's what I feel like it is now—just a lot of emphasis rather than just
438 notice I'm not very well. [...] But, when I'm with some people I know, I find it
439 hard to open up, and they usually can tell a lot by my body language and
440 behaviours. That's probably a big reason why I have an eating disorder and still
441 do...It's a way of communicating, isn't it? If I'm not okay and people can't see
442 that, I find it hard then to communicate how I am, or if I need help or something
443 without being in person." (R9143)

444

445 The intention to socialise across distinct environments within participants' daily
446 routines became increasingly apparent once interaction frequencies changed and
447 environments became more static. For participant 4880, unintentional social
448 interactions grew more apparent after their day-to-day schedules were disrupted:

449 "I don't really have a 'social life' so to speak, before lockdown anyway. But the
450 thing that has changed is I'm not having the little interactions I would have been
451 having before with other people at the swimming pool or with my yoga teacher,
452 or with colleagues in the office at work. So, I'm not having any of these
453 interactions." (R4880)

454

455 Overcompensating for both a lack in activity and a perceived inability to purposefully
456 ask for support are the result of fewer opportunities to engage in daily rituals.

457 Participants discussed replacing typical daily lower intensity exercise with more
458 moderate and vigorous exercise once lockdown restrictions were implemented:

459 "Erm...Yeah, I think I – I think I started running properly, erm... at the beginning
460 of lockdown. Because I think, for me, I couldn't...Not being able to go out for
461 long walks in [the national park] or wherever was really difficult. So, I think I just
462 felt like I needed something to replace that—to try and keep myself...
463 stable." (R1443)

464

465 Participant 5082 reported utilizing the 'one form of exercise per day' mandate by
466 attempting to exercise as much as possible in the allotted opportunity for physical
467 activity:

468 "[...] I can only get out once a day. I'll have to make the most of it. I'll have to
469 run. There can't be any, 'Fuck it. I'm not doing it. I feel like shit.' You have to get
470 out. You have to do it. And then...Thinking of days when I felt I really had to
471 compensate. It would be walking a long way to the shops. And then...Yeah. It
472 was a bit of a grey area, in terms of, "Should I really be out for three, four hours
473 running on the fell? Erm...Probably not." (R5082)

474

475 For most participants, interrupted routines and structures impacted rigid behaviours
476 that served various functions regarding eating pathology. Intentionality across social
477 interactions and exercise regimes became increasingly evident as the lockdown
478 prevented access to work environments, altered social interactions, and increased
479 perceived sedentary behaviours. However, situations differed based on individual

480 motivations behind established routines, which either mitigated or exacerbated
481 disordered eating behaviours, perception of sociality, and exercise habits.

482

483 3.2.3. Secrecy

484 Concern around being recognised in shops and whether or not disordered eating
485 behaviours were noticeable was raised by some participants. Anxiety surrounding
486 others' assumed options on deemed 'non-essential' food purchases, frequency going
487 to supermarkets, and detectability of disordered eating symptoms contributed to a
488 want to maintain secrecy.

489

490 For two respondents who identified with binge-eating disorder and OSFED
491 respectively, heightened awareness of food purchasing behaviours impacted food
492 purchasing behaviours. Participant 2445 referred to frequenting different shops to
493 possibly prevent shop staff from noting perceived inappropriate purchases during
494 lockdown:

495 "The fear of being recognised is what has made me feel very anxious about
496 going to the shops, so I tend to switch stores every two or three days just to
497 make sure that people don't recognise me and they don't know who I am and I
498 can be free to purchase whatever I want to purchase! It's a bit of an awkward
499 concept." (R2445)

500

501 Shame was also evident in discussions around food purchasing and possible staff
502 recognition. With limits on store occupancy and designated for essential workers,
503 shopping behaviours that perhaps once seemed more nondescript now seemed
504 more conspicuous:

505 "That guilt going to the shops. The 'beige food trolley', which...And it's even
506 better because at eight o'clock, it's yellow sticker shopping. And NHS key
507 workers get straight in. So, you get a full range of the entire binge foods that you
508 could want! Or, what I would use. And then, because of where I live...Well, it's a
509 tourist town. And the shop is normally really, really busy. Loads of tourists
510 struggle to even buy milk. Now, eight o'clock I can go and be the only person in.
511 And if I'm on full-blown 'binge mode', 'This is what is happening!'...The shop

512 assistants know me. And, if I bump into people and they recognise me, and then
513 it's this whole thing, 'Oh...I was in here two days ago doing this...' So, that's been
514 hard..." (R5082)

515

516 Depending on participants' living situation, hiding certain behaviours became a way
517 to avoid friends' and relatives' concerns or help:

518 "I don't [talk about my eating disorder now], because I don't want, I don't want
519 anyone to stop me either, like I kind of do – but I also don't." (R7260)

520

521 While for those sharing the household with a partner, not being able to keep certain
522 behaviours hidden was a cause of anxiety, because they were forced to accept how
523 disordered their behaviours had been.

524 "I used to do nearly all of our food shopping. And... my partner would just let me
525 get on with it, because I did the food shopping. Erm... whereas – because he's
526 wanted to make sure we've had enough of things, and he knows that I'm not
527 likely to judge that very well, erm... he's started doing the online shopping, or
528 checking it before... before we place the order and adding loads of things...
529 which makes me really anxious. Because [...] I just - I hate it. [...] but also, it kind
530 of is making me realize how... perhaps... disordered some of my habits were. [...] a
531 lot of the... stuff around food during lockdown has made me really anxious.
532 Erm... but I also do think it's-it's teaching me... erm... where I'm still really
533 maintaining quite rigid control. Erm... perhaps without realising it." (R1443)

534

535 3.3 Restrictions in Accessing Professional Support

536 As support services had to adapt in relation to health and safety concerns, some
537 participants highlighted new and continued barriers to support, while one
538 participant viewed increased online communication as beneficial.

539

540 3.3.1. Accessibility of support

541 All participants mentioned comparisons between personal health concerns and
542 overall health concerns surrounding the COVID-19 pandemic when discussing their
543 thoughts on available supportive resources. For Participant 2445, receiving medical

544 assistance during lockdown was a mixed experience. Compared to others who
545 needed medical attention and resources during this time, they believed their
546 situation was not as critical, but nevertheless required more attention than was
547 offered:

548 “A couple of days ago, I was in hospital and they offered me psychiatric help,
549 and they told me that I was technically allowed to receive it, but I wasn't 'bad
550 enough' to be in the psychiatric ward or be followed-up by a psychiatrist or a
551 psychologist. I do understand that there are much bigger problems going on, but
552 I felt like I wasn't 'sick enough'...Nobody should feel like they're not 'sick enough'
553 to be taken care of. I feel like I've kind of been let down by the whole system at
554 this point, and I haven't been able to talk to a therapist. I wasn't able to start a
555 new round of therapy because, at this point, I finished my journey with the
556 whole clinic...[...] And it's not very clear how I should approach my GP or how I
557 should try to find a new counsellor.” (R2445)

558

559 Many participants mentioned not necessarily wanting more help, as they believed
560 others were in greater need for support at the moment, due to COVID-19. Most
561 mentioned their belief that receiving more support may take away health providers
562 from perceived more important cases:

563 “To be honest, I feel lucky to have the support that I do, and, like you said, I am
564 also really, really aware that there are people all over the country who are
565 struggling with lockdown who don't have any support whatsoever. I think my
566 main feeling around it is, to be honest, I feel undeserving of weekly hour
567 long mental health support when everybody's struggling with their mental
568 health at the moment...I certainly don't think that I would want more.” (R4880)

569

570 Similarly, Participant 1096 referred to the resources and support others affected by
571 COVID-19 required, and stated that anxiety and age restrictions prevented them
572 from seeking additional support:

573 “So, yeah, it's like the only support that I get, because of COVID-19 I daren't ask
574 my GP for more support...GP, the access is there but it is much, much, much
575 more difficult because it has to be telephone call, there's no text-based service. I

576 can't text, I can't email, I can't book appointments online...It makes it much
577 more inaccessible for me. So it exists, but it is not one I can use. I also do the fun
578 thing of being ever so slightly too old for some of the support offered by BEAT
579 because a lot of that is 18-25 and I am 26..." (R1096)

580

581 Conversely, some participants had different experiences regarding streamlined
582 medical care and support services, and online options during lockdown. Compared
583 to previous practical contact with service providers, Participant 7260 expressed
584 preference for adapted and restructured eating disorder support services:

585 "I think it has been really good that support services have had to adapt to using
586 digital technology. Before, everyone had been really quite resistant to like online
587 communication I think, like how long has it taken for any medical records to
588 even be digital...I think that actually there's a few benefits in it, like no one
589 would choose for this to happen but at the same time I hope that things don't
590 go back to the way they were, where everyone had to physically turn up to
591 buildings to access a service." (R7260)

592

593 4. Discussion

594 This study is the first using an in-depth interview approach with adults with mixed
595 eating disorder presentations in the UK. Our results suggest the impact of COVID-19
596 lockdown in the UK can be described as a catalyst for either the exacerbation of
597 disordered eating behaviours, or for eating disorder recovery. The findings
598 highlighted the structures of social and functional restrictions, as well as restrictions
599 in accessibility to professional support, to be crucial determinants of mental well-
600 being in this group. Personal experiences of disordered eating during lockdown were
601 seen as either facilitated or limited by these restrictions, depending on participants'
602 living and work situation, as well as their eating disorder progression. Predominant
603 feelings of ambivalence towards lockdown measures were in line with participants'
604 feelings towards recovery. Ambivalence in eating disorder recovery has previously
605 been described as "a state of dynamic stability" (Bell, 2013) due to conflicting
606 motivations in long-term eating disorder pathology. Participants in this study
607 described feeling safe or proactive while engaging in disordered eating or excessive

608 exercise, even if they were working towards recovery and recognised that their
609 mental health was affected by their behaviours. Being externally restricted through
610 the lockdown measures might have reinforced the ambivalent perception of agency
611 in the context of disordered eating behaviours (Shohet, 2007).

612

613 Our findings partially aligned with the pathways proposed by Rodgers et al. (2020).
614 The disruption to usual life and the resulting influence on meal patterns, routines,
615 and physical activities had a considerable impact on the lives and eating disorder
616 symptoms of participants. Social isolation and removal of social support led to an
617 increased sense of loneliness and resulted in impact on accountability (Akey &
618 Rintamaki, 2014), their routines and sense of responsibility. Participants reported
619 having to redesign and restructure the usual aspects of their lives which heightened
620 participants' awareness of their behavioural intentions, seeking to reintroduce the
621 incidental aspects of day to day life into the new mode of living during the COVID-19
622 pandemic. Participants' responsibility for themselves and intentionality in planning
623 their own actions were highlighted as being key mechanisms influencing their eating
624 disorder behaviours.

625

626 In contrast, Rodgers et al.'s (2020) second and third pathways – concerning
627 increasing in detrimental media exposure and health concerns were less apparent in
628 our findings. Regarding health anxiety, participants voiced concern primarily
629 regarding the threat of the virus for others such as the elderly or vulnerable loved
630 ones rather than towards themselves, often feeling undeserving of professional
631 support as others were viewed as needing it more in the pandemic context.

632

633 One key, and novel, finding of this study was the lockdown associated with COVID-19
634 being experienced as a catalyst for *recovery* from disordered eating behaviours for
635 some, whilst be related to increased difficulties for others. Previous authors have
636 highlighted that COVID-19 may precipitate or exacerbate disordered eating
637 behaviours (e.g. Weissman et al., 2020). However, reported experiences in our study
638 reveal the potential of the pandemic to improve eating disorder symptomatology
639 through its focus on self-efficacy and risk management. Motivations for continuous

640 recovery were risk avoidance in the context of COVID-19, and a sense of
641 achievement of managing without professional support. That said, not all
642 participants were in a position to experience this; severe eating disorder pathology
643 before and during lockdown was not associated with reported improvements in
644 eating disorder management. Individual perceptions of negative impact were highly
645 dependent on how participants conceptualised current eating disorder symptoms,
646 which was generally ambivalent and differed between expected short-term and
647 long-term impact.

648

649 A further important finding of the present study was participants' concept of the
650 perceived future post-lockdown. The introduction of the lockdown was followed by
651 multiple amendments which will eventually allow UK residents to return to their
652 workplaces. The easing of restrictions is thereby associated with as much, if not
653 more, uncertainty as the introduction of the social distancing measures. Established
654 lockdown routines continuously need to be adapted, which was highly anxiety
655 inducing for most participants in our study. Future studies will have to assess the
656 long-term impact of this uncertainty on eating behaviours and exercise routines.

657

658 4.1. Strengths and Limitations

659 Throughout the pandemic, recommendations and guidance rapidly changed; thus,
660 capturing the experience of a particular period during the pandemic was challenging.
661 The interviews were performed from 14th May until 4th June, with four interviews
662 being conducted after the first amendment to lockdown restrictions was
663 implemented in Scotland and England. However, lockdown restrictions were still
664 seen as significantly impacting participants' lives and capturing this change might
665 have enabled us to identify additional feelings of uncertainty due to changing
666 circumstances.

667

668 In addition, only White, predominantly female participants volunteered to take part
669 in this study, limiting the generalizability of our research findings. Regarding
670 pathology, we were able to interview participants with a wide range of eating

671 disorder behaviours. Even though most participants identified with Anorexia
672 Nervosa, our findings are based on various clinical pictures, which enriched our
673 analysis.

674

675 Finally, all interviews were guided by a semi-structured interview schedule to ensure
676 consistency among interviewers and interviews, while allowing for flexibility in the
677 data collection, depending on participants' experiences. This, however, meant that
678 interviews varied in length and focused on slightly different topics, if participants
679 chose to elaborate on certain experiences more than on others.

680

681 5. Conclusion

682 Social, functional, and professional support-related restrictions were three main
683 themes of underlying lockdown structures inductively identified from 10 interviews
684 with individuals with an eating disorder. The tendencies identified related to social
685 isolation, accountability, increased responsibility, lack of routine and structure,
686 intentionality, and secrecy all reflect Rodgers et al.'s (2020) first pathway of the
687 COVID-19 pandemic's impact of disruption and restrictions to established daily
688 routines and interactions. Exploring how existing professional support services can
689 best adapt to help those with eating disorders manage these difficulties would be
690 valuable going forward.

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693

694 Author Contributions

695 S.B. and M.O. conducted the interviews. S.B., M.O., and I.P. transcribed the
696 interviews and analysed the results. All authors contributed to the overall design of
697 the study and writing the manuscript. All authors have approved the final article.

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702

703

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