Repression of the future-oriented disposition of Italians by a never-ending pandemic

Simone Di Zio, Luigi Fabbris

1. Introduction

This paper was aimed at highlighting how the coronavirus disease (COVID-19) pandemic influenced the future-oriented disposition of Italians. Having a future outlook is an attitude that motivational psychologists consider a mental trait that enables people to find motivations for their future plans and behaviours. Roseman (2013) defines this attitude an 'emotional syndrome' for coping with the future.

Having a future time perspective (FTP) and the instrumentality to operate for its realisation creates motivation, deep conceptual learning and intensive persistence. As suggested by Van Calster et al. (1987) and Simons et al. (2004), this perspective should consider the degree of specificity and the content of future goals and the context in which goals are designed. Thus, the clarity of the future background influences the possibility to design and achieve feasible goals and plans. Persons who are hopeful and have an optimistic opinion about their future tend to generate instrumentality and energy for better outcomes, whatever their goals are.

Our research question is not limited within the perimeter of health emergency but also involves social and economic aspects. Thus, we conducted a survey among a sample of Italians in the second half of the year 2021 using a web-administered electronic questionnaire (computer-assisted web-based interviewing [CAWI]). The survey was conducted when the COVID-19 pandemic was close to its end. The questions posed were oriented to understand the consequences of the health turmoil and the possibilities for a quick return to normality.

The fundamental idea of the survey was that the pandemic was a unique, dramatic experience for most Italians and that the health, economic and social relics of this 2-year experience could teach future behaviours, which could lead to a more sustainable future. Also, as Commodari and La Rosa (2020), among others, have proposed, the COVID-19 outbreak made the future fuzzier and darker than ever. This may reduce people's energy to operate for a strategic change. Accordingly, large groups of the population started experiencing malaise and psychological distress.

Our analysis was motivated by the following hypotheses:

- *H1: Did the COVID-19 infection influence the perception of Italians of their ability to master their futures?*
- H2: Which social obstacles and personal problems are at higher risk of (negatively) influencing the FTP of Italians?
- H3: Are there social, familial and personal resources that may protect against the difficulty to perceive one's own perspective after the pandemic?
- *H4: Which socio-demographic descriptors mediate the social and individual resources and obstacles in shaping a clear view of Italians about their own future?*

The rest of the paper is organised as follows: Section 2 describes the data at hand and introduces the relational model and basic methodological aspects for data analysis. Section 3 presents the main results of the statistical analysis. Finally, Section 4 provides the interpretations of the results with reference to the mainstream literature on FTP.

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FUP Best Practice in Scholarly Publishing (DOI 10.36253/fup best practice)

Simone Di Zio, Luigi Fabbris, Repression of the future-oriented disposition of Italians by a never-ending pandemic, © Author(s), CC BY 4.0, DOI 10.36253/979-12-215-0106-3.47, in Enrico di Bella, Luigi Fabbris, Corrado Lagazio (edited by), ASA 2022 Data-Driven Decision Making. Book of short papers, pp. 269-274, 2023, published by Firenze University Press and Genova University Press, ISBN 979-12-215-0106-3, DOI 10.36253/979-12-215-0106-3

2. Data and methods

2.1. The data

From June to November 2021, a sample of Italian adults was surveyed using a CAWI questionnaire, through mailing lists of (mostly) students, teachers and workers. At the end of the data collection, 817 respondents filled in the questionnaire, among which 52.4% aged between 18 and 34, 36.2% between 35 and 64, and 11.4% over 64 (other characteristics of the sample in Tab. 1). About the geographical distribution of the respondents, we have a tiny overestimation of the central-northern area of the country, being 73.6% of the sample against 63.5% of residents in this area.

The questionnaire survey was aimed at highlighting the frequency and the effects of the COVID-19 infection and how people faced the various moments of the pandemic, including isolation ('lockdown') and learning or working remotely. In this work, we focused on two descriptors of people's mentality and their possible predictors. The variables used in the relational model are described as follows:

Y: Having clear views about what to do after the pandemic as a measure of FTP. Even though psychometric tests were performed to evaluate FTP (among others: Zimbardo and Boyd, 1999), the question was posed dichotomously. FTP relates to the perception of time rather than to the actual physical time as it passes in the calendar (Husman and Shell, 2008). Simons et al. (2004) conjectured that the further into the future an individual's time perspective is extended, the greater the number of goals and plans to reach those goals the individual has.

X₀: Proactive attitude. The responses obtained were classified into three ordinal categories after performing a one-dimensional factor analysis of an 8-item set. The items were selected from the 20-item Beck Hopelessness Scale (Beck et al., 1974). The first category included the standardised factor scores till -0.25 ('passive'), the second category included scores from -0.26 to 0.39 ('reactive'), and the third category included scores from 0.40 and higher ('proactive').

 X_1 : Self-efficacy attitudes. This is a continuous variable obtained by factor analysing a set of 9 items related to self-effectiveness and resilience. The items were selected from a 25-item resilience scale (Connor and Davidson, 2003) and translated to Italian by the authors. Self-efficacy was defined as an individual's belief in their ability to achieve an outcome (Bandura, 1977); and resilience, as the ability to cope mentally or emotionally with a crisis or to return fast to pre-crisis status (de Terte and Stephens, 2014).

X₁₈: Full-blown depression. This is a dichotomous variable computed using the 9-item patient health questionnaire, as proposed by Spitzer et al. (1999) and translated to Italian by Mazzotti et al. (2003). A cumulative response score of ≥ 10 identifies a person with depression. The X_2/X_{17} and X_{19}/Z_3 variables are described in Table 1.

2.2 The model

The model for data analysis included the dichotomous variable, Y, as a criterion variable; the antecedent predictor, X_0 ; a selection of 26 predictors, X; and 3 control variables, Z. The relationship may be written as follows:

$$Y = f(X_0, X_1/X_{26}|Z),$$

where X_0 denotes a proactive personality, X_1/X_6 represents the personal resources available to one who went through the pandemic, X_7/X_{12} is the available social resources, X_{13}/X_{23} is the individual problems and X_{24}/X_{26} is the social obstacles that could limit without let or hinder one's future goals or plans. As a matter of fact, *resource* is a synonym of *protective factor*, and *obstacle* is a synonym of *risk factor*. For this analysis, the possible infection of the respondents and their parents, their contact with the healthcare system and the effects of the possible infection were assimilated to individual problems. Moreover, X_0 was transformed into three dichotomous variables.

The model assumes a hierarchy of causal relationships between the criterion variable Y, the

main predictor X_0 , the remaining X predictors and the Z control variables. Within this hierarchy, the relationships between Y and the correlates and between X_0 and the remaining X's identified the theoretical model à *la Ajzen* (Fishbein and Ajzen, 1975; Ajzen, 1991), in which blocks of positive and negative correlates altogether concur to the statistical fit of the disposition to actively participate in the post-pandemic society.

The logistic regression model can be written as follows:

logit
$$[p(Y=1)] = \beta_0 + \beta_1 X_1 + \beta_2 X_2 + \dots + \beta_k X_k + \beta_{k+1} Z_1 + \dots + \beta_{k+3} Z_3,$$

where logit[p] = ln(p/(1-p)) and β_i (i = 1, ..., k) measure the relationship between Y and X_i when all other variables in the model remained fixed.

Statistical analyses were performed in the SPSS environment. A logistic regression model to a dichotomous response variable was performed with the forward stepwise selection function. The control variables were forced into the model.

3. Results

Tables 1 and 2 summarise the survey results. Table 1 shows that 72.8% of the Italians had a clear view about what to do after the pandemic. By contrast, the remaining 27.2% were unable to imagine their future. Their difficulties may stem from their pandemic experience, health status and personality characteristics. The diffusion of mental health problems, as measured with a depression diagnosis, concerns 29.6% of the sample. Moreover, people who have claimed to have experienced psychological damages represent 32.4% of the participants. Of the respondents, 3.1% developed full-blown psychiatric diseases before the survey.

During the pandemic, approximately 21% used the social media as the main information source, and only 11.5% believed that TV programs informed correctly about the pandemic.

Variable	mean	Variable	Mean
Y: Clearness of future perspective	0.728	X ₁₄ : Infection: parents	0.201
X ₀ : Optimistic attitude: Passive	0.327	X ₁₅ : Suffered psychologic damages	0.324
" : Reactive	0.317	X ₁₆ : Suffered physical damages	0.122
" : Proactive	0.349	X ₁₇ : Had controls through swabs	0.696
Personal resources		X ₁₈ : Full-blown depression	0.296
X ₁ : Self-efficacy score	0.000	X ₁₉ : Had a psychic disease	0.031
X ₂ : Higher education degree	0.563	X ₂₀ : Fear for infection – personal	0.296
X ₃ : Single	0.286	X ₂₁ : Fear for infection – Italy	0.410
X ₄ : Children in family	0.405	X ₂₂ : Remote learning/working	0.490
X ₅ : Marital status: couple	0.548	X ₂₃ : Belonged to a broken family	0.017
X ₆ : Possessing own working tools	0.315	Social obstacles	
Social resources		X ₂₄ : Income reduced after pandemic	0.065
X ₇ : Vaccinated: Yes	0.745	X ₂₅ : Work time reduced	0.087
" : Not yet	0.176	X ₂₆ : Lost job during pandemic	0.001
" : Never	0.077	Control variables	
X ₈ : Scientists were crucial in pandemic	0.736	Z ₁ : Male (gender)	0.430
X ₉ : Family doctor available during pandemic	0.408	Z ₂ : Age: 18-34	0.524
X ₁₀ : Hospitals were a source of contagion	0.127	":35-64	0.362
X ₁₁ : Televisions informed correctly	0.115	" : 65 or more	0.114
X ₁₂ : Social media as main information source	0.206	Z ₃ : Employee	0.338
Individual problems			
X ₁₃ : Infection: personal	0.116		

Table 1. The mean values of the variables used in the statistical analysis

Table 2 shows the results of the multivariate regression analysis with the estimates of the regression betas, their significance, the estimates of the odds ratios $(exp(\hat{\beta}))$ and their 95% confidence intervals. The results highlight that the Italians in this study had a clear perception of their future when their self-efficacy and resilience scores were high and when working as an employee (as opposed to self-employed). Also, the coefficients relative to the variables of the optimistic attitude scale are highly significant to explain the FTP and, as expected, the strong positive relationship with proactive attitude and the strong negative correlation with passive attitude. Symmetrically, the vision of the future was blurred and made uncertain owing to psychologic damages, depression and other psychic disturbances caused or exacerbated by the pandemic.

Finally, the use of social media as a main information source entered the model with a negative coefficient. This may mean that during the pandemic, dazed people looked for health information from any source, even though they knew the risk of fake news. In addition, unreliable information about the viral threat and the long-term consequences of the infection might have led people to fear for their future. Definitely, approximate and distorted news from social media might have contributed to the imagining of dramatic future scenarios (Barua et al., 2020).

Finally, gender and age were not significant, which means that there were no gender-related differences or youth-specific difficulty as far as FTP was concerned. For the sake of precision, females and younger people showed, consistent with the literature, that the pandemic had a large negative impact (Carstensen et al., 2020; Eurofound, 2021). Notwithstanding, in the multivariate analysis, these differentials vanished because they were absorbed by significant psychological aspects. Instead, *ceteris paribus*, the self-employed have a vision of their futures that is significantly darker than those of employees.

Regressor	β	$se(\widehat{\beta})$	sig.	$exp(\widehat{\beta})$	95% CI $exp(\hat{\beta})$	
Intercept	1.476	0.275	***	4.376		
Z ₁ : Male (gender)	0.149	0.200	NS	1.161	0.785	1.718
Z ₂ : Age 18-34	0.007	0.237	NS	1.007	0.632	1.602
Z ₃ : Employee	0.761	0.260	**	2.140	1.286	3.561
X ₁₂ : Social media as main info. Source	-0.618	0.222	**	0.539	0.349	0.832
X ₁ : Self-efficacy score	0.323	0.110	**	1.382	1.114	1.714
X15: Suffered psychologic damages	-0.620	0.204	**	0.538	0.361	0.803
X ₁₈ : Full-blown depression	-0.824	0.213	***	0.439	0.289	0.667
X ₁₉ : Had a psychic disease	-1.074	0.509	*	0.341	0.126	0.927
X ₀ : Optimistic attitude: Passive	-0.732	0.210	***	0.481	0.319	0.725
" : Proactive	1.265	0.285	***	3.544	2.028	6.195

Table 2. Beta estimates of the regression model with clear vision of the future as criterion variable (forward stepwise selection of regressors, n = 817; Cox & Snell $\chi^2 = 25.6\%$; Omnibus tests of model coefficients: $\chi^2 = 237.628$, significance < 0.001)

*** $0 < \alpha^{oss} < 0.001$; ** $0.001 < \alpha^{oss} < 0.01$; * $0.01 < \alpha^{oss} < 0.05$; ° $0.05 < \alpha^{oss} < 0.1$; NS= Not significant

4. Discussion and conclusion

In this work, we analysed how Italians went through the pandemic and are perceiving their futures. A main outcome of this study was that the susceptibility to and the severity of a potential viral infection were not a significant threat for FTP. Instead, the frustration from such a powerful virus in comparison with humans' vulnerability, together with the procrastination of the national government to implement measures to contain the spread of the virus and the economic, financial and occupational turmoil, affected the people's perceptions of their futures (see also Rupprecht et al., 2022). This caused malaise and depression.

Indeed, the end of the COVID-19 pandemic may be considered a time when many people feel more doubtful than hopeful. Medical researchers have correlated mental disturbances to the delayed effects of COVID-19 infection (among the others: Mattioli et al., 2021). However, it may be argued that such a diffused psychological distress mainly has a social origin.

About one-third of the respondents perceived future opportunities as decreasing and their future lives as more fragile and constrained, which may hamper their activity plans and behaviours. Greater difficulties were highlighted among young people, females and broken or unstructured families. However, a resilient and proactive attitude proved effective against post-pandemic malaise. Thus, gender and age are no longer significant if psychological variables are considered.

The socio-emotional selectivity theory (Lang and Carstensen, 2002) assumes that perceiving one's future as limited and constrained forces a selection of emotionally meaningful goals, whereas an extended FTP allows the selection of instrumental and knowledge-related goals. Conversely, a distorted perception of the future may force some people into an irrational and emotional selection of their own goals.

Ling et al. (2022) argued that a proactive and future-oriented personality is an indicator of an adaptive capacity that can favour successful changes in people's lives. The improvement of FTPs makes individuals believe that their futures are widely open and that time to realise their plans is abundant; thus, they tend to expand their horizons and widen their social circles.

After such a dramatic social shock due to the COVID-19 pandemic, it is relevant to measure people's capacity to start new life strategies in an aware and purposeful manner. Precisely, to effectively imagine one's own future, one has to frame it as clearly as possible upon a social background. If people aspire to master their futures, first, they need to determine the social background of their plans and behaviours. Many people feel as if the pandemic has cast a long shadow against the future social life.

During one's lifetime, there is a mutual feed between resilient, proactive and future-oriented attitudes, so it is difficult to state which one follows the other in a causal chain. Ideally, it is a convolution of two positive attitudes, resilience and self-effectiveness, that may strengthen people's FTP. Both attitudes, particularly resilience, are ideally dynamic in the sense that they imply, on the one hand, a situation to improve and, on the other hand, the disposition to utilize psychological resources to fulfil that aim (O'Neill et al., 2022). Indeed, they strongly correlate with each other and with FTP.

The COVID-19 breakthrough was a social event that affected both individual and collective feelings. Hence, therapies to restore individuals' mental health and their capacity to figure out their own futures could be ineffective if they anticipate that the purpose of social and political interventions was to picture a medium-term social background and empower people's resilience and self-effectiveness capacity.

Finally, the COVID-19 pandemic has emphasised the dramatic role of misinformation through social media (Barua et al., 2020). As evidenced in other studies (Elbarazi et al., 2022; Xie and Liu, 2022), the haphazard use of social media is often associated with poor well-being, negative emotions and fear of infection. Our study highlights how this issue can affect people's ability to imagine and proactively build their own future. Safe public information is one that provides the foundation upon which a clear social background and, therefore, people's future are built.

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