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Firma (Signature)

Francesco Picarella

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Introduction

Throughout the last decade, the European Union has had to face several crises such as the Great Recession, the Eurozone crisis, the migration crisis, and Brexit. These crises with their different focal points forced EU institutions to adapt and overcome them. Overall, the EU has persevered in the face of these crises, but several studies have also claimed that this came with a significant decline in public support for the European Union and a consequent increase in public opposition towards European integration, which is the so-called Euroscepticism. This issue is particularly relevant nowadays as public support has never been so important for EU legitimacy. With a proliferation of referendums on EU matters, the politicization of EU issues in national and European elections, and the rise of Euroscepticism parties in the aftermath of the financial crisis, there has been a move away from the "permissive consensus" of the first years of European integration toward a "constraining dissensus" (Hobolt et al., 2016a). Not surprisingly, public attitudes towards the European Union are at the heart of political, and academic debates regarding the present state and future of European Union.

Most recently, the European Union had to face the economic consequences of the Covid-19 pandemic. Even though political institutions can benefit from a rally around the flag effect in times of crisis, these periods are pivotal in generating trust in political institutions and increasing public support, which is particularly relevant for a supranational institution such as the European Union that has been perceived as having a democratic deficit (Mitchell, 2014). This can be achieved by implementing policy instruments that seem disrupting and adequate to the crisis as it was Next Generation EU. For the first time in history, the European Union decided to borrow significant resources from the capital markets and use them to support national economies hardly hit by the coronavirus pandemic. Next Generation EU is a clear signal of fiscal solidarity among Member States. Furthermore, this EU initiative might represent a strategic step within the process of European integration, moving towards a European federation with its own budget and redistribution policies which provide insurance against asymmetric shocks that differently affect its Member States.

In this work, we consider Next Generation EU as the most significant and innovative measure adopted by the European Union in the wake of Covid-19 emergency in order to test the hypothesis that adequate crises' responses might create an opportunity for reinforcing public support for the European Union. As suggested by Jean Monnet, one of the EU founding fathers, "Europe will be forged in crises and will be the sum of the solutions adopted for those crises". Building on the largely acknowledged fact that public attitudes towards the European Union are multidimensional, we will study the short-run impact of the approval of Next Generation EU on three significant dimensions of public opinion: trust towards the European Union, EU identity, and appetite for further integration in the EU.

The work is structured as follows. Chapter 1 briefly illustrates the overall EU response against the Covid-19 pandemic and describes some important aspects of Next Generation EU such as the composition of the fund and the relevance of the instrument in the process of European integration. Chapter 2 reviews previous literature on public attitudes, focusing on those studies which investigated how public opinion towards the EU has been impacted in the context of a crisis or further integration. Chapter 3 discusses the data and the empirical strategy adopted to measure the short-run impact of Next Generation EU on public attitudes towards the European Union. Chapter 4 describes and interprets the main results and the additional findings related to the heterogeneous impact of NGEU among individuals that have a different level of education, age, and nationality. Eventually, the main conclusions of this work are provided.

Chapter 1

Background Setting

1.1 EU response to the Covid-19 pandemic

In March 2020, the European Union was struck by the first wave of the COVID-19 pandemic. The first large European pandemic occurred in the north of Italy in February, and by March all countries in the EU reported cases (Plümper and Neumayer, 2020). As a consequence, around mid-March, several countries introduced a wide range of public health measures including physical distancing, and, in many cases, the closure of business activities and schools, and lockdowns limiting the movement of citizens. Moreover, some countries also decided to close their borders (ECDC, 2020). The restrictions imposed to contain the spread of the virus plunged the EU into a deep economic crisis. Production lines and supply chains have been disrupted and the trade in goods and services has been interrupted. At the same time, private investment and household spending collapsed to historic lows. European Union's economy and most of its industrial ecosystems have been working at a fraction of their capacity. All combined, these factors were expected to lead to a sharp contraction of the EU economy.

Given the exceptional nature of the economic situation, most EU Member States had to adopt temporary increases of public deficit goals to provide substantial aid packages to businesses and enterprises (Echebarria Fernández, 2021). Even EU institutions started to gradually intervene adopting emergency measures to preserve the health of the citizens and prevent a collapse of the economy. On 18 March 2020, the President of the European Central Bank (ECB), Christin Lagarde, launched the Pandemic Emergency Purchase Program (PEPP), a temporary asset purchase program of €750 billion to support the economy through this shock. The ECB's Governing Council established that the asset purchases were allowed to the extent they were necessary and proportionate within the objectives of the ECB mandate. In June 2020, the ECB decided to increase the volume of the PEPP program from the initial € 750

billion up to a total of €1,350 billion. On 20 March 2020, Ministers of Finance of the EU Member States agreed upon the use of the general escape clause of the Stability and Growth Pact (SGP) as a result of the severe economic downturn in the euro area or the Union as a whole (Council of the EU, 2020a). The use of the clause allowed EU Member States flexibility to support their national economies with their state recovery packages. On 9 April 2020, the Eurogroup decided on a comprehensive economic policy response to the COVID-19 crisis, with a package worth €540 billion (Council of the EU, 2020b). The deal allowed any eurozone country to access a credit line, up to 2 percent of its economic output, from the European Stability Mechanism (ESM), to cover emergency health costs — with no macroeconomic conditions attached. Although some countries found ESM politically unacceptable as it was considered an institution responsible for enforcing fiscal austerity, the ESM loans would indeed provide countries with financial support at more favourable financing conditions. The package worth €540 billion also endorsed the so-called Temporary Support to Mitigate Unemployment Risks in an Emergency (SURE), a temporary €100 billion jobless reinsurance plan proposed by the European Commission. The funds raised were to be paid as back-to-back loans to EU Member States and used to finance short-term employment schemes across the EU. Finally, the European Investment Bank (EIB) Group scaled up its support for mostly small and medium-sized European companies, providing up to €200 billion of additional financing.

All these mechanisms have been eventually complemented by the EU budget deal reached by the European Council on 21 July 2020, which also includes a one-time €750 billion recovery fund named "Next Generation EU" (NGEU). When taken together with the €540 billion package of measures agreed on by the European Council on 23 April 2020, the new proposal of NGEU along with the EU budget brings the total economic response of the European institutions to €1.29 trillion (without taking into account the ECB interventions).

1.1.2 Next Generation EU

The most innovative part of the EU response to the coronavirus pandemic relates to the introduction of Next Generation EU. On 21 July 2020, the Commission was empowered by the European Council to borrow funds in the capital markets on behalf of the Union up to the amount of €750 billion (in 2018 prices) to support the recovery and resilience of the economies of the EU Member States. The funds will be available to the EU Member States in

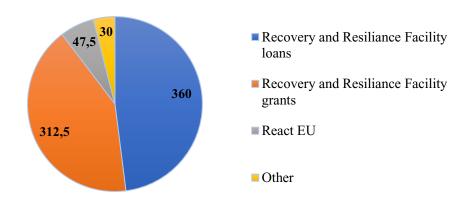
the form of loans in an amount of €360 billion (in 2018 prices) and in the form of grants in an amount of €390 billion (in 2018 prices). Relying on its high credit rating, the European Union raised funds in the capital markets under more favourable market conditions than many individual Member States could have done. Various forms of debt financing were used in the past to fund European projects, but the magnitude of debt incurred to finance Next Generation EU is new for the European Union. The amount borrowed in the capital markets under the proposal of the European Commission is approximately ten times larger than in the period 2010-2019 (Osservatorio Conti Pubblici Italiani, 2020). For the first time in the European integration process, the European Union will be allowed to borrow a significant amount of resources from the financial markets to finance expenditures throughout the Union.

Next Generation EU was approved after long and tough negotiations among EU leaders. The idea of a joint issuance of common debt had been advanced by southern members of the eurozone, in particular by Italy, Spain and France, in order to ensure a fiscal response commensurate with the magnitude of the crisis (Miro et al., 2021). The political pressure exerted by these countries would probably have remained without effect, if on 18 May 2020 Germany had not eventually decided to support the initiative in a joint Franco-German proposal of €500 billion in grants to be distributed among EU Member States affected by the crisis (Fuest, 2021). Following this agreement, on 27 May 2020, the European Commission proposed the so-called "Next Generation EU" plan, an aid package worth €750 billion, including both grants and loans, to be integrated into the EU budget for a total of €1.85 trillion. As a result, strong political divisions emerged among EU Member States' leaders, in particular between the so-called "frugal four" countries (Austria, Denmark, the Netherlands and Sweden) and those hit hardest by the crisis (Italy, France and Spain) (Alcidi et al., 2020). One of the major sources of discord regarded the size and the composition of the mechanism. While the Commission had first proposed €500 billion in grants and only €250 billion in loans, the European Council, under the pressure of the Frugal Fours, reduced the grant portion to 390 billion and raised to 360 billion the funding that the EU Member States will have to repay (Lionello, 2020). Under this and some other conditions (e.g. Rule-of-law conditionality, Allocation Key amendment...), EU leaders found an agreement during a Special meeting of the European Council that occurred between 17-21 July 2021, and the joint Next Generation EU fund was finally approved on 21 July 2020.

During the Special Summit of the European Council, EU leaders also defined the different spending programs that constitute NGEU. The Recovery and Resilience Facility (RRF) is the core of NGEU, accounting for €672.5 billion of the total €750 billion. The RRF will be

disbursed as grants (€312.5 billion) and loans (€360 billion) among the Member States according to an established cross-country allocation method. According to the agreement, 70% of the grants will be allocated based on the Member State's population, the inverse of its GDP per capita, and its average unemployment rate over the past 5 years (2015-2019), always compared to the EU average (European Council, 2020). In this sense, RFF could be seen as a redistribution instrument from high income countries to less affluent countries (Fuest, 2021). For the allocation of the remaining 30%, committed in 2023, the Conclusions of the European Council (2020) indicate that "the 2015-2019 unemployment criterion is replaced, in equal proportion, by the loss in real GDP observed over 2020 and by the cumulative loss in real GDP observed over the period 2020-2021". Thus, the RRF instrument becomes more of an insurance system which definitely stands for a signal of solidarity among EU Member States. One of the reasons why distributing NGEU funds does not place much weight on the insurance principle is to avoid a situation where Member States with lower per capita income might have to make payments to richer countries if their GDP loss due to the Covid-19 crisis is larger, which would lead in turn to problematic redistributive effects (Fuest, 2021). The Recovery and Resilience Facility offers financial support to the Member States for investments and reforms in relation to the green and digital transitions and to augment the resilience of national economies. This means that the use of the funds is only partially related to the impact of the crisis. Rather, it seems to be more attached to the achievement of wider objectives (Alcidi, 2020). To receive the funds, the Member States were asked to prepare and submit national plans describing how they intend to support their respective economic recoveries and how the investments will make them more resilient (European Council, 2020). Other €47.5 billion will be allocated under the fund REACT-EU that stands for Recovery Assistance for Cohesion and the Territories of Europe. These resources are expected to be distributed according to GDP losses as well as the level of youth unemployment and the relative prosperity. Thus, REACT-EU, although limited in size, is a true fiscal measure to mitigate the impact of the COVID-19 shock (Alcidi, 2020). The remaining €47.5 billion of the plan will be committed to other flexible cohesion policy grants to both respond to the coronavirus crisis and support the green transition to a climate-neutral economy (€5 billion in Horizon Europe, €5.6 billion in InvestEU, €7.5 billion in Rural Development, €10 billion in Just Transition Fund, and €1.9 billion in RescEU) (European Council, 2020).

Figure 1. Composition of spending in NGEU Funds



Source: Author's elaboration based on EUCO data (2020)

For a long time, a recurring criticism of the eurozone has been the lack of a common central budget like that of mature federations. In this context, Next Generation EU may signal a new important acceleration in the process of fiscal integration in the European Union. This EU initiative led to the creation of the first genuine stock of European debt in history, which will be repaid through the collection of new revenues such as the reimbursement of loans from the beneficiary Member States, higher contribution from national budgets (GNI-based resources), and new genuine own resources. Regarding the latter source of revenues, the European Commission has expressly suggested the establishment of new own resources based on the taxation of non-recycled plastic waste, a carbon border adjustment mechanism, a common digital levy, a genuine Financial Transaction Tax or an extension of the EU emissions trading system (ETS) scheme to aviation and maritime (Lionello, 2020). Thus, even if the EU budget remains dependent on national contributions, Next Generation EU stressed the need to provide the EU budget with EU's own resources.

Following the creation of the first genuine stock of European debt, another important innovation of NGEU is the establishment of a temporary transfer mechanism between the EU Member States, depending on their needs, which typically occurs within a mature federal structure (Osservatorio Conti Pubblici Italiani, 2020). The financing of Next Generation EU will indeed require heterogeneous fiscal efforts, as there will be no correspondence between

the final beneficiaries and the final contributors of the mechanism. This implies that a significant transfer of resources will take place in the coming years between either the Member States or groups of individuals within the Union (Lionello, 2020). In this way, through NGEU, the European Union overcomes the idea that the EU budget should not give rise to a "transfer Union".

At the moment, it is not possible to conclude that NGEU will lead to a fiscal union as the initiative is considered temporary, and it is motivated by exceptional circumstances. However, exercising some form of fiscal power, the EU made a significant step forward in the process of the European integration, thus building the basis to possibly overcome in the future its fundamental shortcoming which is the absence of a common central budget.

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Chapter 2

Literature Review

The process of European Integration has been largely influenced by the functionalist theory, which was first advanced by Jean Monnet, one of the EU founding fathers. As Spolaore (2013) suggested, functionalists predict that moving some policy functions to supranational institutions creates pressure for further integration in other areas in a sort of chain reaction towards an "ever-closer union." This idea is implicitly embodied in the Schuman Declaration, which states "Europe will not be made all at once, or according to a single plan. It will be built through concrete achievements." The integration 'chain reaction' predicted by the functionalist view may take place in two different ways. On one hand, integration in some areas may push further integration through a positive mechanism as voters observe the benefits from integrating some functions and consequently ask for more integration. In this scenario, crises can be seen as a catalyst which transform political consensus into action. Alternatively, a darker mechanism through which the chain reaction can occur is simply by "burning bridges behind". In other words, partial integration might be able to force more integration just because there are no alternatives or because the alternatives are too costly. In this negative loop, further integration does not generate political consensus. Rather, it arises in spite of growing public discontent. Even under these circumstances, crises can be seen as a catalyst, but only to force unpopular choices against voters' will. If integration occurs through the first mechanism, the chain reaction will lead to an "ever-closer union". In contrast, if integration forces further integration against voters' will, then the integration process is more at risk because, as in all chain reactions, also in Monnet's conjecture it is likely that a meltdown may eventually occur. These mechanisms are key to understand the sustainability of the European Union integration process. As many considered Next Generation EU as a leap in European integration, it is crucial to understand whether the approval of the EU initiative took place with the support of EU citizens or, rather, against their favour.

Understanding the mechanisms through which the Monnet's chain reaction works, is even more relevant nowadays as it has become clear that public opinion is crucial for the legitimacy of the European Union and its further integration. In the early period of the European Union, public opinion was viewed as largely irrelevant to the process of integration, and EU institutions were allowed to pursue further integration without having citizens' consensus. Literature on European integration refer to those years as the so-called "permissive era" (Lindberg and Scheingold, 1970). Moreover, the initial steps of integration in the EU were often done in narrow and technical areas, such as coal and steel in the 1950s, so it was difficult for voters to understand many aspects of European integration and the implications for their countries (Spolaore, 2013). The rejection of the Maastricht Treaty in 1992 in a referendum in Denmark marked a turning point in the study of European integration. Since then, it has been acknowledged that public support for European integration could no longer be taken for granted and that public attitudes toward the EU were crucial for the European Union's future (Hobolt et al., 2016a). After the referendum in Denmark, other similar episodes seemed to suggest that public opinion had a clear influence on the direction of European integration. Among them, there are the failure of the Constitution for Europe, the rejection of the single European currency in Sweden and, most notably, the United Kingdom's decision to leave the EU. In other words, there has been a move away from the "permissive consensus" of the first years of European integration towards a "constraining dissensus" (Hooghe and Marks, 2009). Not surprisingly, public attitudes towards the European Union are at the heart of political, popular and academic debates regarding the present state and future of European integration.

Early studies of public opinion about European integration typically referred to the concept of EU support, while the focus in the last decade has shifted to the concept of Euroscepticism, narrowly defined as opposition towards the European integration process (Boomgaarden et al., 2011). In their quest to understand citizens' attitudes toward the EU, these studies required conceptual clarification regarding the dependent variable. Given the complex nature of the European integration project, other studies have challenged this one-dimensional approach and have systematically engaged in this discussion by disentangling the underlying dimensions of public attitudes towards the EU. Easton (1975) pioneered the study of public support for systems of government and distinguished between specific and diffuse support. The former relates to concrete policy outcomes or the performance of a polity, while the latter refers to a general evaluation of "what the object is or represents, not what it does". Other authors differentiated between policy and regime, rather than specific and diffuse support

(Hobolt et al., 2016a). The first refers to support for the content of collective decisions and actions taken by EU institutions. On the other hand, regime support indicates the support for constitutional settlement of the European Union as laid down in the treaties, including support for membership of the Union. Nonetheless, in practice, it is quite difficult to clearly separate the concepts of regime and policy support, since EU policies often regards transfers of sovereignty from the national to the European level. In the discussion regarding the support for the EU, Lindberg and Scheingold (1970) introduced the distinction between the utilitarian and affective dimensions, including the role of emotions. The former refers to the support which is based on an evaluation of the costs and benefits of being member of the EU, while the latter refers to a diffuse and perhaps emotional response to some vague ideals embodied in the notion of European unity. To address an evident overlap between these theoretical classifications, Boomgaarden et al. (2011) identify five dimensions, which are all different components of the overall notion of public attitudes towards the EU. The comprehensive work of these authors first includes the emotional dimension of EU attitudes, referring to the feeling of fear of and threat by the EU. The second dimension refers to a sense of European identity, meaning a feeling of identification with the European Union and as Europeans. The third dimension refers to the performance and the financial and democratic functioning of the EU and its institutions. The fourth dimension is related to utilitarian attitudes such as general support and benefit evaluations with respect to the EU. The last dimension refers to a future strengthening of the EU and reflects support for extended decision-making competencies, policy transfer as well as further integration. This multidimensional scheme was similarly replicated and widely adopted by following studies such as Hobolt et al. (2016a). Moreover, Lubbers and Scheepers (2010) pointed out that a multidimensional understanding of public attitudes towards the EU is fundamental to understand variation in the degree of support and changes in future levels of support. Indeed, some dimensions, such as identity, were found to be more stable over time than others and less subject to new developments within the integration project and supranational discussions. On the contrary, other dimensions such as EU strengthening and performance, may be influences to short-term changes.

The objective of our work is to investigate the impact of Next Generation EU on public support for the EU. In this respect, there is a burgeoning literature that studied how public attitudes toward European Union has changed in response to episodes of further integration – often occurred during a crisis. All these studies indirectly contributed to test whether the integration chain reaction advanced by Jean Monnet has taken place through positive or negative mechanisms throughout the process of European integration. As the literature on the

topic is extremely large, it is not possible to cover all the studies. Among them, we will review those which show some similarities with the output variables of our work, specifically trust towards EU institutions, European identity, and citizens' appetite for further integration. Negri et al. (2021) investigated the relationship between the introduction of the Euro and European identity. They found that the introduction of the Euro has had a negative and statistically significant short-run impact on the share of respondents who identify only with their nation in the countries that adopted it (about -3%). Thus, they demonstrated that the single currency, being an observable link between Brussels and the daily lives of the citizens', became a symbol affecting Europeans' feelings of belonging to the European Union. To interpret this result through the lenses of Monnet, we may say that in this case further integration occurred along with a favourable response from EU citizens. On the contrary, Zingales et al. (2016) found that the positive feedback loop of the integration chain reaction broke down in 1992 with the Maastricht treaty and the crisis of the European Monetary System. At these two critical junctures of the European project, support for EU membership significantly decreased among EU citizens. Furthermore, the authors found that the euro-crisis eroded citizens' trust towards EU institutions, albeit the drop appears more related to the dramatic economic conditions. According to their analysis, the 1992 Maastricht treaty and the crisis of the European Monetary System contributed to an overall Europeans' disenchantment with the European project, in opposition to Monnet's predictions. Yet, Polyakova et al. (2016) found that further economic integration in the context of the 2007–9 financial crisis caused a decline in Europeans' sense of belonging to the EU project. In particular, the authors showed that the sense of feeling European in those who have some European identity have declined substantially in countries that were those hit hardest by the crisis. This can be directly traced to the failure of EU institutions to find supranational solutions which could have created a sense of shared fate for the EU citizens negatively affected by the economic consequences of the crisis. In the light of these results, the authors concluded that during the financial crisis, EU institutions failed to reach one of the ultimate goals of the EU envisioned by its founders such as Monnet, i.e. to create a cultural community of Europeans united by a shared sense of belonging.

Next Generation EU was approved as an exceptional measure to support EU Member States in the context of the Covid-19 crisis. As argued by Lefkofridi and Schmitter (2015), crises test the relevance and legitimacy of institutions, and are crucial in shaping public support. Looking back to the last decade, the financial crisis and the consequent eurozone recession tested the EU institutions' capability to respond to systemic economic shocks, thus

challenging the overall development of the EU economic and political project. Several studies have clearly illustrated that the recent sovereign debt crisis in the Eurozone resulted in a decline in trust in both national and EU institutions and in an unprecedented surge in support for Eurosceptic parties. In this regard, Serricchio et al. (2013) investigated the link between Euroscepticism and the Global Financial Crisis finding that political institutions played a key role in explaining the increase in Euroscepticism. The authors argued that in the second stage of the crisis, the sovereign debt crisis, EU institutions became more involved in dealing with the crisis and new institutions were created for that purpose, namely the European Stabilization Fund in 2010 and the European Stability Mechanism in 2011. At this stage, the EU institutions' handling with the crisis played a key role in explaining the increase in Euroscepticism. Hobolt et al. (2016b) also investigated whether the crisis, and the ensuing EU's response to it, could explain the rise of Eurosceptic parties. The authors found that those adversely affected by the crisis and dissatisfied with the EU's performance during the crisis were more likely to vote for Eurosceptic parties, both on the left and on the right. Other studies have showed that widespread malcontent during the crisis is mostly driven by the worsening of economic conditions. For instance, Braun et al. (2014) investigated the impact of the global and the Euro crisis on citizens' attitudes towards the European Union, finding that during the crisis, economic factors played a major role in explaining the drop in support for the EU. Similarly, Zingales et al (2016) found that the Eurozone crisis has contributed to further erode this support, although the drop appeared more related to the terrible economic conditions and, thus, expected to be potentially reversible.

Further, the negative impact on public opinion towards the EU during the financial crisis can be directly traced to episodes of fiscal consolidation in several Euro area Member States. In this regard, the supranational institutions in the EU and the European Central Bank have forced EU Member States to implement policies of austerity and away from social protection. There is large evidence that episodes of fiscal consolidation had a detrimental effect on trust in institutions, both national and supranational, through the European Union in the period of the Great Recession. For instance, Drakos et al. (2019) showed that the levels of trust enjoyed by European institutions was substantially eroded in countries that experienced downgrade episodes and participated in fiscal adjustment programmes during the Great Recession. Yet, Fetzer et al. (2019) provided evidence that austerity policies in UK from late 2010 contributed to the development of broader anti-establishment preferences, and are strongly associated with the growing support for the populist UK Independence Party (UKIP) in the wake of the EU referendum. Unlike what happened during the Great Recession, this time EU institutions

responded to the Covid-19 pandemic crisis with a financial fiscal stimulus which is represented by all the measures described in the previous chapter (SURE programme, ESM loans, EIB support, Next Generation EU plan,...). In this respect, several studies have shown that public preferences favour increased public spending rather than fiscal consolidation, especially in the health and education sectors, which were greatly impacted by austerity measures in the recent past (Ferragina et al, 2021). As Next Generation EU can be considered as a form of expansionary fiscal policy meant to stabilize the economy in the face of the shock caused by the coronavirus crisis, we may expect to observe a positive change in public attitudes towards the EU after the approval of the policy instrument.

Chapter 3

Empirical Strategy

3.1 Data

To conduct our analysis, we used data from the Standard Eurobarometer 93 survey which was conducted between 9 July 2020 and 26 August 2020 in the 27 EU Member States, the UK, the five candidates for the EU membership (North Macedonia, Turkey, Montenegro, Serbia and Albania) and in the Turkish Cypriot Community in the part of the country that is not controlled by the government of the Republic of Cyprus¹. In total, the survey includes answers from 33059 respondents. For the sake of consistency, we excluded from our analysis individuals from countries that are not members states of the European Union.

The Standard Eurobarometer is the flagship public opinion survey conducted on behalf of the EU institutions since 1974 and designed to provide regular monitoring of attitudes related to European affairs. It analyses how Europeans perceive the European political and economic situation as well as their national governments, the EU and its institutions. It also examines people's attitudes on European citizenship and on issues linked to the priorities of the European Commission. The questions are then complemented by measurements for general socio-political orientations as well as respondent and household demographics. Respondents of Eurobarometer surveys are selected randomly and the total sample is weighted to ensure demographic and geographical representativeness. Interviews are conducted face-to-face, twice per year (each spring and each autumn), and are at all times based on new samples (cross-sectional survey).

Exceptionally, the Standard Eurobarometer survey 93 was conducted during summer (July-August 2020) instead of spring because of the difficulties with face-to-face interviewing linked to the coronavirus pandemic. Moreover, alternative interview modes were put in place in Luxembourg, Finland, Ireland and Estonia because it was not possible to conduct face-to-

¹ The data set was downloaded from the GESIS data archive—<u>https://www.gesis.org/eurobarometer-data-service/survey-series/standard-special-eb/study-overview/</u>

face interviews as a result of the particular circumstances. In these countries, the respondents were interviewed online, mostly after being recruited in a probabilistic random way by telephone, thus ensuring that all individuals in these countries have an equal chance to be interviewed.

3.1.1 Output variables

Several empirical studies of public support for the European Union rely on Eurobarometer data as the survey includes a wide variety of questions related to public attitudes towards the European project and its institutions. Building on the largely acknowledged fact that attitudes towards the European Union are multidimensional (De Vreese et al., 2019), we use Standard Eurobarometer data to study the impact of the approval of Next Generation EU on three main dimensions of public attitudes towards the EU.

The Standard Eurobarometer 93 includes in total 539 variables. Among them, we selected three questions that could capture the multifaceted nature of public opinion towards the European integration discussed in Chapter 2. Unfortunately, the two standard questions measuring general membership support² and perceived benefits of a country's EU membership³ are missing in the summer 2020 edition of the Standard Eurobarometer. These EU items were widely used in the previous literature as a standard measure of regime support towards the European Union according to a utilitarian approach which is based on an individual cost-benefit analysis (Hobolt et al., 2016a). We then focused on those questions that ask respondents about their trust towards the EU institutions, their European identity, and the decision-making power of the European Union. For each of these EU attitudes measures, we specify below the exact question and the possible answers. Relying on the existing literature on EU attitudes, we also explain how these questions reflect the multidimensional nature of public opinion towards the European Union.

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² This item asks respondents if their country's membership in the European Union is a "good thing," a "bad thing," or "neither good nor bad".

³ This item asks respondents if their country has on balance benefited or not from being a member of the European Union.

Trust towards the European Union

The question asked was as follows: "I would like to ask you a question about how much trust you have in the European Union". The possible answers were: (1) Tend to trust; (2) Tend not to trust.

The question about citizens' trust towards the European Union serves as a measure of the current performance of the EU institutions. Similarly, Zingales et al. (2016) interpreted this Eurobarometer's EU item as an assessment of how the European project is managed by its institutions in a study aimed at monitoring the evolution of public support towards the European Union. The existing literature on EU attitudes suggests that evaluations of the functioning of the regime and its democratic nature refer to the dimension of regime support, specifically relating to the institutional aspect of regime support (Lubbers, 2008). It has also been stressed that increasing citizens' trust is a relevant issue for the European Union as scholars have constantly showed that positive evaluations of the EU institutions strongly contribute to explaining satisfaction with the EU.

European identity

The statement regarding the European identity was as follows: "You feel you are a citizen of the EU". The possible answers were: (1) Yes, definitely; (2) Yes, to some extent; (3) No, not really; (4) No, definitely not.

This Eurobarometer item has become the standard measure of European identity in several empirical studies (see for example Coupe et al., 2020). This variable captures the affective dimension of EU attitudes which refers to the sense of emotional connection with the idea of the European Union and with the broader community of 'Europeans' who compose the group (Mitchell, 2014). A sense of European identity is a topic that has been widely addressed in the previous literature and is also gaining prominence in the discussion about the legitimacy of the EU (Boomgaarden et al., 2011). For the European Union, it is important that Europeans have a European identity as research has shown that both the overall support for the European Union as well as the support for some of the key policies of the European Union are bigger among people who have a European identity, instead of or in addition to their national identity.

Decision-making power of the European Union

The question asked was as follows: "Please tell me to what extent you agree or disagree with the following statement: more decisions should be taken at EU level". The possible answers were: (1) Totally agree; (2) Tend to agree; (3) Tend to disagree; (4) Totally disagree.

This Eurobarometer item measures public opinion regarding the desirability of a further integration in the European Union through extended decision-making competencies. Thus, the question reflects the strengthening aspect of EU attitudes which relates overall to the future of European integration and to a process of further deepening and widening of the EU. This dimension of EU attitudes broadly includes items that tap support for policy transfer and extended decision-making competencies, the integration of more member states and integration into one country (Boomgaarden et al., 2011).

These EU items will be introduced in our econometric analysis as output variables. Following the same order, these variables are called "EU trust", "EU identity", and "EU integration". To facilitate the interpretation of the results, we collapsed the answers to these questions to obtain three dummy variables, one for each of the EU attitudes measures mentioned above. As a result, we created dummy variables which take value 1 if the respondent shows a favourable attitude towards the European Union and 0 otherwise. Table 1 summarizes the main descriptive statistics of the output variables.

Table 1. Sample statistics, output variables

Variable	Label	Mean	Std. Dev.	Min	Max
EUtrust	EU trust	.5140167	.4998139	0	1
EUidentity	EU identity	.7346884	.4415075	0	1
EUintegration	EU integration	.5819689	.4932454	0	1

3.1.2 Control variables

As already briefly mentioned, the Eurobarometer surveys also contain data on the demographic characteristics of the respondents. Among them, we used the information on the age, level of education, gender, occupation, self-perceived social status and nationality in order to control for individual demographic characteristics in our analysis.

To measure the respondents' age, we used the continuous variable *age* available in the Eurobarometer dataset. For the sake of consistency, we excluded individuals that are below the age of 18. Thus, the variable ranges from a minimum value of 18 to a maximum of 99. The average age in our sample is 52 years.

To control for gender in our analysis, we used the dummy variable *woman* which takes value 1 if the individual is female, and 0 otherwise. In our sample, women account for almost 55% of the total respondents.

Eurobarometer does not provide a variable precisely measuring the years of education. Nonetheless, it asks respondents what their age was when they stopped full-time education. According to their answers, individuals are then grouped into several categories which indicate different levels of education. We reclassified this variable to obtain a categorical variable, *educ*, with three different levels of education (low, medium, high). The majority of the sample has a medium level of education (61%), while individuals with a high level and a low level of education represent respectively 31% and 8% of the sample.

In the Eurobarometer dataset, occupation is classified in 20 categories⁴. From this variable, we created the dummy variable *employment* which takes value 1 if the individual is employed in one of those occupations and 0 otherwise, to control for the employment status of the respondent in our model. Almost 60% of the respondents are currently employed in our sample.

The Eurobarometer survey also asks respondents about their self-perceived socio-economic status among the following categories: "the working class", "the lower middle class", "the middle class", "the upper middle class", "the higher class". We recoded this variable into a categorical variable called *socialstatus*, which classifies the socio-economic status of respondents into low, middle and high. In our sample, almost 40% of the respondents

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⁴ Responsible for ordinary shopping, etc.; Student; Unemployed, temporarily not working; Retired, unable to work; Farmer; Fisherman; Professional (lawyer, etc.); Owner of a shop, craftsmen, etc.; Business proprietors, etc.; Employed professional (employed doctor, etc.); General management, etc.; Middle management, etc; Employed position, at desk; Employed position, travelling; Employed position, service job; Supervisor; Skilled manual worker; Unskilled manual worker, etc.

perceive themselves as belonging to a low socio-economic class, 50% to the middle class, and only 10% to the upper or higher class.

Finally, we also used information on the individuals' nationality in the Eurobarometer to create country dummies that take value 1 if the respondents are citizens of that country, and 0 otherwise. Non-EU Member States were removed from the sample, so we obtained 27 country dummies.

Table 2 summarizes the main descriptive statistics of all the control variables included in our regressions model.

Table 2. Sample statistics, control variables

Variable	Label	Mean	Std. Dev.	Min	Max
age	Age	52.02068	17.25665	18	99
woman	Gender	.5454163	.4979426	0	1
educ	(Low education)	.0796984	.2708313	0	1
2	Medium education	.6132567	.4870142	0	1
3	Higher education	.307045	.4612778	0	1
employment	Employment status	.5932793	.4912313	0	1
socialstatus	(Low social status)	.4043967	.4907844	0	1
2	Middle social status	.4998648	.5000096	0	1
3	High social status	.0957385	.294238	0	1
country	(Croatia)	.0387644	.1930367	0	1
2	France	.0374646	.1899011	0	1
3	Belgium	.0374646	.1899011	0	1
4	Netherlands	. 037694	.1904588	0	1
5	Germany	.0568851	.2316273	0	1
6	Italy	.0381528	.1915686	0	1
7	Luxembourg	.0210261	.1434739	0	1
8	Denmark	.0372735	.1894348	0	1
9 22	Ireland	.0379998	.1911995	0	1

10	Greece	.0381528	.1915686	0	1
11	Spain	.0373117	.1895282	0	1
12	Portugal	.039529	.1948536	0	1
13	Finland	.0389556	.1934928	0	1
14	Sweden	.0401789	.1963824	0	1
15	Austria	.0380763	.1913842	0	1
16	Cyprus	.0186559	.135309	0	1
17	Czechia	.0378469	.1908296	0	1
18	Estonia	.0378852	.1909222	0	1
19	Hungary	.0400642	.1961136	0	1
20	Latvia	.0370823	.1889672	0	1
21	Lithuania	.0373117	.1895282	0	1
22	Malta	.0189617	.1363923	0	1
23	Poland	.0388409	.1932193	0	1
24	Slovakia	.0404083	.1969186	0	1
25	Slovenia	.0374646	.1899011	0	1
26	Bulgaria	.0391467	.1939477	0	1
27	Romania	.0414022	.1992225	0	1

3.2 Identification strategy

In this section, we introduce the identification strategy that we use to study the short-run impact of Next Generation EU on public attitudes towards the European Union. We then describe the main baseline specification of our model and discuss how strong our identification strategy is.

3.2.1. A quasi-experimental approach

As already stated at the beginning of this chapter, the Standard Eurobarometer 93 survey was conducted between 9 July 2020 and 26 August 2020. A crucial aspect in our identification strategy is that the Special Council summit - during which NGEU was approved - took place precisely during the fieldwork period. We exploit this fortuitous timing to approximate a real experiment which would allow us to identify the short-run causal effect of Next Generation EU on citizens' attitudes towards the European Union. Indeed, in our framework the approval of Next Generation EU can be seen as an experimental treatment in which the respondents who were interviewed before 21 July 2020 can be considered a control group as they were not exposed to the treatment, while the respondents who were interviewed after that date can be seen as those receiving the treatment. Assuming that the date of the interview was assigned randomly⁵, the change in EU attitudes between the control and the treatment group will reflect the causal effect of the approval of the NGEU instrument.

Eurobarometer provides information on the precise date of interview, so we created a dummy variable that divides respondents into treatment and control groups according to whether they were interviewed after or before the approval date of Next Generation EU, i.e. 21 July 2020. As the announcement was made in the very early morning by European leaders, the dummy variable takes value 1 for all the respondents who were interviewed on 21 July or after that date.

For each EU attitudes measure that we described in the previous section, we estimate the following linear probability model (LPM).

$$Y_i = \beta_0 + \beta_1$$
 after $i + \beta_2 X_i + \epsilon_i$

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⁵ This assumption is explained in more detail in paragraph 3.2.2

Let *i* be the individual interviewed. The dependent variables *Y* are the dummy variables for the measures of the respondents' attitudes towards the European Union, which are *EUtrust*, *EUidentity*, *EUintegration*. The coefficient of interest in the baseline equation is the marginal impact of the *after* variable. This is a dummy variable which takes value 1 if the respondent was interviewed after (or on) 21 July 2020, and 0 otherwise. The vector *X* includes some individual demographic characteristics that might influence the respondents' attitudes towards the European Union as well as the timing of the interview. In particular, we included variables for the age, gender, level of education, socio-economic status and employment status. We also controlled for country dummies to take into account country specific characteristics.

From the initial dataset of the Eurobarometer 93 survey including 33059 respondents, non-EU citizens were removed from the sample and further individuals were dropped if they were below 18 years. As a result, our baseline estimates used information from 26158 respondents: 49.54% of them were interviewed before the approval of Next Generation EU, while the remaining 50.46% were interviewed after the approval.

3.2.2 How strong is the identification strategy?

This identification strategy has been widely used in the previous literature to identify causal impacts. Coupe et al. (2020) adopted a quasi-experimental approach to investigate the short-run effect of the Eurovision Song Contest on the European identity. Metcalfe et al. (2011) used the same strategy to assess the impact of terrorism on happiness, finding a significant negative effect of the September 11 attacks on happiness in the UK. Yet, Bassi and Rasul (2016) evaluated the impact of a papal speech on fertility-related beliefs and behaviour, comparing a survey's answers of individuals interviewed before and after the papal visit. Using a similar approach, Jakiela and Ozier (2019) found that post-election violence increased the risk averseness of Kenyans, while Goebel et al. (2015) showed that the Fukushima disaster increased environmental concerns among Germans.

While our identification strategy finds moderate success in other research works, we need to make two main assumptions to estimate the impact of the approval of Next Generation EU on EU attitudes.

The primary econometric concern is that the effect of Next Generation EU could blend into the effect of other shocks or events that occurred at EU level as well as in EU Member States during the time the fieldwork was done, i.e. from July to August 2020. Ideally, one would

need to observe individuals interviewed immediately before and after the day of the Next Generation EU approval. As this could not be the case, we need to assume that no other events that could also have influenced the support to the European Union occurred during the window in which the summer Standard Eurobarometer survey was carried out. First, no other measures against coronavirus or any other relevant decisions were made by EU institutions in those days. In that period, the European Commission only concluded exploratory talks with Astrazeneca⁶. However, this could have hardly had a significant impact on EU sentiment. Secondly, many of the most stringent public health measures were gradually phased out across the EU between April and June, and new measures had to be taken in several countries (Germany, France, Greece, Spain, Belgium) in August due to a resurgence of virus numbers, mainly concerning travelling. Nonetheless, more stringent measures that were likely to influence also public opinion towards the EU were introduced only in Autumn 2020⁷, so well after the Eurobarometer 93 survey was conducted. Finally, a potential confounding factor for Poland could have been the national presidential elections, originally scheduled for May 2020, but postponed due to the coronavirus pandemic. The second round between the candidates with the highest number of votes took place on 12 July when the conservative incumbent president Andrzej Duda from the Law and Justice Party (PiS) defeated the Civic Platform candidate Rafał Trzaskowski (51.03% to 48.97%). However, even these events were likely to influence only a small portion of the sample. Therefore, we conclude that fairly little happened during summer 2020 and we may exclude the possibility that the impact on public attitudes on 21 July was due to other events.

More importantly, we need to assume that the respondents' dates of interviews were set randomly. In our framework, this is a necessary condition to have a random assignment to the control and treatment groups. It is likely that the respondents did not choose their date of the interview as a function of their opinion towards the EU. Thus, it is rather safe to assume that self-selection based on attitudes towards the European Union was hardly an issue here. However, it is possible that the respondents did choose their date of the interview as a result of their individual characteristics. The issue here is that these individual characteristics may have affected both the date of the interview and the output variables. This could be a relevant issue considering that several studies have consistently shown that socioeconomic factors influence public support towards the EU. For instance, Stoeckel (2011) found that in countries where media salience of the EU is high, individuals from higher social classes are more likely

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⁶ https://ec.europa.eu/info/live-work-travel-eu/coronavirus-response/timeline-eu-action en

⁷ Covid-19 government response stringency index

to identify with the EU. Yet, Hakhverdian et al. (2013) have suggested that education has become a more important determinant of EU support over time, as the less educated are becoming less supportive of the integration project. Similarly, many researchers have showed that identification as European and EU support are more common among the young and highly educated. Considering our framework, it is plausible to think that employed people could be more likely to postpone their interview than unemployed people. At the same time, employment status could be positively correlated with favourable sentiment towards the EU. This may compromise the exogeneity of the treatment effect.

A random assignment to the control or treatment group would imply that there are no significant differences in terms of observable characteristics of the respondents such as the age, gender, employment status, socio-economic status and level of education between those interviewed before and after the approval of Next Generation EU. We therefore checked whether there are significant differences in these characteristics between the control and the treatment group by regressing each demographic characteristic on the after variable (always controlling for country dummies). The estimated coefficients in Table 3 indicate that there are some significant differences between the respondents interviewed pre- and post- NGEU approval, suggesting that the time of the interview may not have been assigned to the respondents in a casual manner. For example, there are significant differences in terms of the age and employment status, although the absolute magnitude of the unbalancing is fairly small. The positive coefficient associated to after in regression (3) indicates that employed people were more likely to be interviewed after 21 July. This result may confirm the hypothesis that employed individuals could be more likely to delay the date of the interview due to their busy schedules. In regression (1), after has a significant and negative coefficient, suggesting that young people were more likely to be interviewed after 21 July. Assuming that young people are more likely to work than old people, the negative sign seems to be coherent with the argument behind the positive coefficient of after in the regression of the employment status. To address the unbalancing issue, we included all these variables as controls in our baseline equation. In other words, we controlled for unbalanced individuals' characteristics to achieve random assignment to the control and the treatment group. We conclude that our analysis relies on the assumption that the date of the interview is set randomly within groups of individuals with the same characteristics, that is, in other words, the so-called independence conditional assumption (Angrist, 2008).

Table 3. Balancing check

VARIABLES	(1) age	(2) woman	(3) employment	
	<u> </u>		1 7	
after	-0.535**	-0.00279	0.0203***	
	(0.236)	(0.00695)	(0.00681)	
Country dummies	YES	YES	YES	
Constant	52.53***	0.537***	0.510***	
	(0.546)	(0.0161)	(0.0157)	
Observations	26,158	26,158	26,158	
R-squared	0.048	0.010	0.023	
	Standard errors			
:	*** p<0.01, ** p	o<0.05, * p<0.1		
	(4)	(5)	(6)	
VARIABLES	low educ	medium educ	high educ	
C	0.0117***	0.00005	0.00275	
after	0.0117***	-0.00895	-0.00275	
	(0.00369)	(0.00667)	(0.00622)	
Country dummies	YES	YES	YES	
Constant	0.102***	0.644***	0.253***	
	(0.00845)	(0.0153)	(0.0142)	
Observations	24,003	24,003	24,003	
R-squared	0.124	0.113	0.141	
	Standard errors *** p<0.01, ** p			
	(7)	(8)	(9)	
VARIABLES	low class	middle class	high class	
after	0.0106	-0.0102	-0.000369	
	(0.00668)	(0.00695)	(0.00402)	
Country dummies	YES	YES	YES	
Constant	0.457***	0.454***	0.0885***	
	(0.0154)	(0.0160)	(0.00926)	
Observations	25,883	25,883	25,883	
R-squared	0.070	0.031	0.064	

Standard errors in parentheses
*** p<0.01, ** p<0.05, * p<0.1

When running a hypothesis test, there is a small chance to get a bogus significant result. That is, in fact, the definition of the significance level: it is the probability that the test statistic will exceed the critical value when the null hypothesis is true (typically the conventional level is set up at 5%). It should be taken into account that when running thousands of tests, the number of false alarms increases dramatically, which is the so-called multiple testing problem (Bender and Lange, 2001). The idea is that one could generate significant results just by doing more and more tests until something turns up. In our framework, this would lead us to obtain significant estimates of the variable after in the above regressions even if there is no unbalancing across the treatment and control groups.

Therefore, when running multiple tests, the p-values need to be adjusted for the number of hypothesis tests that one is currently running. Traditional solutions involve correcting each test using adjustments such as a Bonferroni correction. This method works well in settings involving a few tests (e.g., 10-20) and even when the number of tests is somewhat larger (e.g., a few hundred) (Rice et al., 2008). Bonferroni correction can be easily done on Stata which directly provides the adjusted p-values. Alternatively, it is possible to compute adjusted p-values manually, dividing the conventional 0.05 level by the number of the tests done. These two methods are equally trustworthy.

Thus, we carried out Bonferroni adjustments for each of the nine regressions whose purpose was the balancing check. We found that in the *employment* regression (3), the variable *after* (the one we are interested in) is significant only at the 10% level using Bonferroni-adjusted p-values. Therefore, the employment is still an unbalanced variable which needs to be included as control in our specification model. On the other hand, we found that the Bonferroni-adjusted p-value of *after* in the regression of *age* is equal to 0.6350. This result may suggest that there is no issue of unbalancing concerning the individuals' age in our sample.

Chapter 4

Results

4.1 Main results

By running our baseline regression, we estimated the average impact of Next Generation EU approval on EU citizens' public attitudes towards the EU, after controlling for individual characteristics. Table 4 shows the results of our primary analysis.

According to Risse (2010), identity change can be gradual and incremental or rapid and radical. While the former usually comes through socialization or persuasion, the latter typically requires "critical junctures", such as a war or a historical moment. As many considered the approval of Next Generation EU as a critical moment in the 70 years of the European integration, we expected to observe an immediate impact on the European identity and indeed we found a significant effect of the main variable of interest *after* in regression (2). Surprisingly, our results suggest that fiscal solidarity between the EU Member States did not shape a stronger European identity. Rather, it seems that overall EU citizens feel slightly less European after that Next Generation EU was approved by the European Council on 21 July 2020. According to these primary results, we may conclude that the introduction of the instrument reduced pro-European feelings by almost 2% among EU citizens, at least in the short run.

Even though we obtained a significant estimate for the coefficient associated with the main variable of interest *after* in regression (2), our results show that the NGEU approval did not have any impact on the other two dimensions of public attitudes towards the European Union. One may argue that the lack of influence may be due to the absence of public awareness regarding the approval of Next Generation EU or of the policy instrument itself. It is true that our results reflect only the impact of the "intention" to treat and not the treatment itself. While the approval of Next Generation EU, in theory, could reach all the respondents interviewed after 21 July, it is very likely that not all European Union citizens were informed about it.

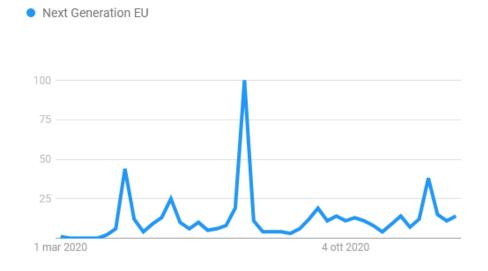
Table 4. Baseline regressions

	(1)	(2)	(3)
VARIABLES	EU trust	EU identity	EU integration
after	-0.00583	-0.0198***	-0.00722
	(0.00741)	(0.00621)	(0.00711)
200	-0.000614**	-0.00133***	-0.00150***
age	(0.000246)	(0.000207)	(0.000236)
	(0.000240)	(0.000207)	(0.000230)
woman	0.0268***	0.00118	-0.00307
	(0.00658)	(0.00556)	(0.00633)
educ			
mediumeduc	-0.0161	0.0822***	-0.0205
	(0.0139)	(0.0115)	(0.0135)
higheduc	0.0586***	0.127***	-0.0107
-	(0.0153)	(0.0128)	(0.0148)
employment	-0.00572	0.0185***	-0.0123
1 7	(0.00807)	(0.00681)	(0.00777)
socialstatus			
middleclass	0.0770***	0.110***	0.0614***
imadicciass	(0.00738)	(0.00620)	(0.00707)
highclass	0.137***	0.159***	0.113***
8	(0.0127)	(0.0109)	(0.0122)
Country dumania	VEC	VEC	VEC
Country dummies	YES	YES	YES
Constant	0.283***	0.504***	0.696***
	(0.0279)	(0.0233)	(0.0269)
Observations	21,868	23,556	22,339
R-squared	0.071	0.090	0.098
10 Squared	Standard errors in n		0.070

Standard errors in parentheses
*** p<0.01, ** p<0.05, * p<0.1

To better define the magnitude of this issue, we collected information that could give us some indication regarding the degree of public awareness of the event. For instance, Google Trends provided some evidence about the public interest in what happened at the EU level on 21 July 2020. Figure 2 shows the search intensity for the topic⁸ "Next Generation EU" worldwide between March 2020 and December 2020. A value of 100 on the y-axis indicates the highest frequency of searches for the topic, while a value of 50 indicates as half as many searches. A score of 0, on the other hand, indicates that not enough data were found for the topic. The figure suggests that the highest peak was recorded in the week of 19-25 July, which includes the date in which the instrument was approved by the European Council (21 July). On the other hand, the weeks that precede and follow have quite low intensity. Other peaks are registered in the week of 19-25 April 2020 and 24-30 May 2020, respectively, when the initial idea of "Eurobonds" was proposed by the Italian Prime Minister Giuseppe Conte and the plan of Next Generation EU was announced by the European Commission. Afterwards, the highest number of searches in Google News for the topic "Next Generation EU" was recorded exactly in the week when NGEU was approved. Therefore, there is some evidence that there was indeed a certain public interest and awareness of the instrument approval.

Figure 2. Google Search intensity for "Next Generation EU" from 1 March 2020 until 31 December 2020



Source: Google Trend⁹

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⁸ We specifically selected the option "topic", rather than "term". Topics are language agnostic and account for spelling variations and mistakes as well as multiple names for the same thing.

⁹ https://trends.google.com/trends/explore?date=2020-03-01%202020-12-31&q=%2Fg%2F11hfxw18n1

Further, we tried to understand how many EU citizens in our dataset may have been reached by the spread of the news regarding the instrument approval. For that purpose, we considered the Eurobarometer survey question: "In general, how satisfied are you with the measures taken to fight the Coronavirus outbreak by the European Union institutions?". The possible answers were: "Very satisfied"; "Fairly satisfied"; "Rather not satisfied"; "Not at all satisfied"; "Don't know".

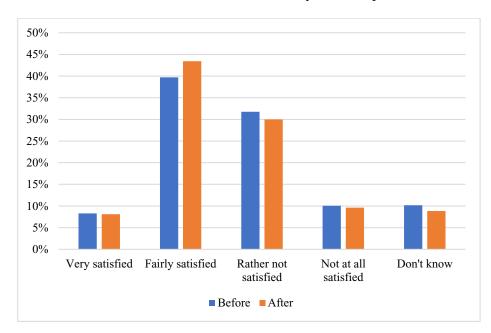


Figure 3. Satisfaction towards the measures taken by the European Union institutions

Source: Standard Eurobarometer 93 data (2020)

We observe some variations in citizens' satisfaction between the two periods, before and after 21 July 2020. In particular, the percentage of those fairly satisfied with the EU measures increased by almost 4 percentage points while the percentage of those rather not satisfied decreased by about 3 percentage points. Interestingly, the reduction in the percentage of "Don't know" answers seems to indicate that the respondents interviewed after 21 July were more aware of their attitudes. As in the period we are considering (July and August 2020) there were no other measures taken by the EU institutions, it is likely that these variations reflect the public satisfaction towards the Next Generation EU plan. Thus, these variations, even though little, may suggest that in our sample there was indeed a certain awareness of the

Next Generation EU approval which, in turn, was able to influence the public satisfaction towards the EU measures at that time.

As a result of this piece of evidence, we may partly assume that the public awareness was not an issue here and that the lack of impact could be explained by other factors. For instance, one may argue that the change in the EU attitudes could be observed more in the medium-long term, rather than there being an immediate impact of the event. In our setting, this could be particularly true, considering that Recovery and Resilience plans were prepared between September 2020 and April 2021, and that the funds were transferred to the EU Member States only starting from summer 2021. Therefore, it is reasonable to think that one would need more time before being able to observe a change in attitudes towards the European Union. If that is the case, a medium-long term analysis would be more helpful.

It is also important to take into account the sample size of the respondents that we analysed in our work. As previously mentioned, our analysis relies on 26158 observations. It is likely that our sample is not big enough to capture an effect. If we also consider that the impact is likely to be small in the short run because of the reasons that we have just explained, it is even harder to find significant estimates.

4.2 Heterogeneous effect

By running our baseline regression, we estimated the average impact among all the individuals. However, the impact may vary according to some individual characteristics. In this section, we analyse and discuss the heterogenous effect of the approval of Next Generation EU among respondents with different level of education, age, and nationality.

4.2.1 Education and knowledge of the EU

For the European Union, restoring trust, building consensus and creating a sense of belonging is hard in an era where there has never been so plentiful and accessible information, which is also so difficult to grasp. Because of the quick nature of the news cycle, EU citizens find difficult to keep up with the information on the EU matters and, thus, to respond to it. In line with this concern expressed by the European Commission (2017), it is likely that not all EU citizens were well informed about NGEU and its economic implications, as also suggested in the previous paragraph.

In this context, education is a demographic variable which may be informative about the degree of information and awareness of the respondents. In this respect, empirical and political behaviour research has consistently observed a robust and positive relationship between education and political engagement (Bömmel et al., 2020). Based on this literature, we made the assumption that highly educated people in our sample are more likely to be aware of the EU political affairs. Thus, we explored the heterogeneous effect of NGEU among individuals with different levels of education to understand whether those who are assumed to be more politically informed showed a more favourable attitude towards the EU after 21 July 2020. Table 2 in the previous chapter includes main descriptive statistics for the variable *educ*, which measure the level of education of respondents in our sample (low, medium, high). Table 5 shows the results from the three baseline regressions after introducing the interaction variable between higher education and the main variable of interest *after*.

First of all, we found a positive and significant estimate for the coefficient associated with the variable *educ* in regression (1) and (2). Our results suggest that highly educated people are more likely to trust the EU and to identify with the EU by respectively 4.1% and 11.1%. These findings are in line with previous literature. Educational attainment has indeed been advocated in several studies as a powerful predictor of EU support. Accordingly, educated

people are expected to show a favourable attitude towards the EU with respect to less educated people (Kuhn and Stoeckel, 2014).

Interestingly, the impact of the NGEU approval on the EU identity becomes slightly positive among higher educated individuals (+0.4%). Therefore, the negative estimate reported in the baseline equation (2) in Table 4 refers to less educated individuals rather than those who have an advanced education. The interaction variable between *after* and the measure of educational attainment also has a significantly positive effect on trust towards the European Union as shown in regression (1). According to this result, trust towards the EU has increased by 2% among highly educated respondents after 21 July 2020. On the contrary, we observed that the approval of Next Generation EU had a negative impact on the less educated individuals, increasing their distrust feelings towards the EU institutions by 1.6%. Assuming the positive relationship between education and political interest, these results are in line with the proposition that less politically informed individuals tend to subscribe to Euroscepticism more strongly (Lubbers, 2008). Finally, we did not find any significant estimate in regression (3) regarding the strengthening of the EU decision-making powers.

Table 5. Heterogeneity across level of education

	(1)	(2)	(3)
VARIABLES	EU trust	EU identity	EU integration
after	-0.0163*	-0.0291***	-0.00673
urter	(0.00849)	(0.00710)	(0.00816)
	,	,	,
higheduc	0.0409**	0.111***	-0.00984
	(0.0168)	(0.0141)	(0.0163)
after*higheduc	0.0363**	0.0332***	-0.00168
unter inglieude	(0.0144)	(0.0122)	(0.0138)
age	-0.000614**	-0.00133***	-0.00150***
	(0.000246)	(0.000207)	(0.000236)
woman	0.0268***	0.00112	-0.00306
	(0.00658)	(0.00556)	(0.00633)
educ			
mediumeduc	-0.0152	0.0829***	-0.0206
	(0.0139)	(0.0115)	(0.0135)
higheduc	-	-	-
employment	-0.00582	0.0184***	-0.0123
1 2	(0.00807)	(0.00681)	(0.00777)
socialstatus			
middleclass	0.0772***	0.110***	0.0614***
	(0.00738)	(0.00620)	(0.00707)
highclass	0.137***	0.159***	0.113***
	(0.0127)	(0.0109)	(0.0122)
Country dummies	YES	YES	YES
Constant	0.288***	0.508***	0.696***
	(0.0279)	(0.0234)	(0.0269)
Observations	21,868	22 556	22 220
R-squared	0.071	23,556 0.090	22,339 0.098
1. oquutou	Standard errors in		0.070

Standard errors in parentheses *** p<0.01, ** p<0.05, * p<0.1

In order to capture the level of awareness regarding the approval of Next Generation EU, measuring the degree of overall knowledge on the European Union could be another helpful tool. In this regard, Hobolt et al. (2016a) suggested that the European integration is too complex and remote from the daily lives of most citizens for them to have sufficient interest or awareness to base their attitudes on an evaluation of the implications of the European integration process. Similarly, Brosius et al. (2019) suggested that due to a lack of actual knowledge about the European Union, citizens have fewer opportunities to form a judgement on the EU matters. Accordingly, it could be reasonable to expect different effects of the approval of Next Generation EU on individuals that have an advanced knowledge of the European Union, if those are assumed to be more aware of the policy instrument.

In addition to questions about the subjective impression of understanding how the EU works, the Standard Eurobarometer survey quantified the objective level of knowledge of the European Union, using a "true/false" quiz consisting of three statements ("the euro area currently consists of 19 Member States"; "the Members of the European Parliament are directly elected by the citizens of each Member State"; "Switzerland is a Member State of the EU"). We combined the answers to these three questions to construct an index variable called "EU knowledge" that measures the knowledge that the respondents have about the European Union. In a very simple way, we assigned a score of zero to those who did not answer correctly any questions, 1 to those who had one correct answer out of three, 2 to those who had two correct questions out of three, and 3 to those who answered all the questions correctly.

Table 6. Main descriptive statistics, the respondents' knowledge of the European Union

VARIABLE	N	Mean	Std. Dev.	min	max
EUknowledge	26158	1.908709	.8938371	0	3

We expect that those who learnt about the EU and how it functions would respond differently to the approval of NGEU with respect to those who do not have any knowledge of the European Union. Thus, we regressed each EU attitudes measure on the interaction between the variable of interest *after* and *EUknowledge*.

Table 7. Heterogeneity across level of EU knowledge

	(1)	(2)	(3)
VARIABLES	EU trust	EU identity	EU integration
after	-0.0127	-0.0255*	-0.0248
	(0.0163)	(0.0133)	(0.0158)
EUknowledge	0.0411***	0.0637***	0.0133**
Lomo wieage	(0.00544)	(0.00448)	(0.00523)
after*EUknowledge	0.00401	0.00371	0.00927
and Lokhowledge	(0.00761)	(0.00626)	(0.00737)
age	-0.000753***	-0.00153***	-0.00156***
age	(0.000733	(0.000206)	(0.000237)
woman	0.0332***	0.0119**	-0.000402
woman	(0.00659)	(0.00554)	(0.00635)
educ	(0.00037)	(0.00334)	(0.00033)
mediumeduc	-0.0305**	0.0575***	-0.0260*
	(0.0139)	(0.0115)	(0.0136)
higheduc	0.0376**	0.0918***	-0.0189
8	(0.0154)	(0.0128)	(0.0149)
employment	-0.0104	0.0111*	-0.0142*
1 7	(0.00806)	(0.00676)	(0.00777)
socialstatus			
middleclass	0.0703***	0.0995***	0.0586***
	(0.00738)	(0.00617)	(0.00709)
highclass	0.129***	0.145***	0.109***
-	(0.0127)	(0.0108)	(0.0123)
Country dummies	YES	YES	YES
Constant	0.241***	0.442***	0.685***
	(0.0289)	(0.0240)	(0.0279)
Observations	21,868	23,556	22,339
R-squared	0.076	0.105	0.099
	Standard errors in		

Standard errors in parentheses
*** p<0.01, ** p<0.05, * p<0.1

In line with a well-established literature, we found that the knowledge of the EU is positively correlated with favourable attitudes towards the EU. All the estimates of the coefficient associated with the variable *EUknowledge* are indeed significantly positive. On the other hand, none of the estimates related to the interaction variable between *after* and *EUknowledge* are significantly different from zero. Thus, it is not possible to infer any significant conclusion regarding the heterogenous impact of Next Generation EU among individuals that have a different background in terms of EU knowledge. Nonetheless, the sign of the coefficient is positive in all the three regressions, thus suggesting that those with an advanced knowledge of the EU would be potentially more likely to show positive attitudes towards the European Union after Next Generation EU was approved.

4.2.3 Next Generation

As suggested by the name of the instrument, the so-called Next Generation will be the main beneficiary of the funds. On 27 May 2020, the European Commission deliberated that the primary objective of Next Generation EU is to repair the short-term damage from the crisis in a way that also invests in our long-term future. To achieve this, both Next Generation EU and Multiannual Financial Framework (MFF) will contribute to address the fundamental generational challenges. Particular emphasis will be given to the objectives of the Green New Deal, in particular the climate change, and to the digitization of the economy (European Commission, 2020).

For that reason, we may expect that the approval of NGEU had a greater impact on the younger generation with respect to the older one. To test this hypothesis, we targeted the Millennial generation (those born between 1983 and 1994) and Generation Z (those born between 1995 and 2003) as representatives of the young population in our sample and created a dummy variable called *young* that takes value 1 if the individual is born after 1983, thus belonging to the Millennial Generation or Generation Z, 0 otherwise. Table 8 shows the main descriptive statistics of the dummy variable *young*.

Table 8. Main descriptive statistics, the *young* variable

VARIABLE	N	Mean	Std. Dev.	min	max
young	26158	.2979203	.457353	0	1

We, therefore, include in our regressions model the interaction variable between the main variable of interest *after* and the new dummy variable *young* to explore the heterogenous impact of Next Generation EU among different generations. The results are shown in Table 9.

According to the results in Table 9, we did not find any significant estimates for the coefficient related to the interaction variable *after*young*, neither in regression (1) nor in regression (2). On the other hand, our results show that the approval of next Generation EU has indeed had a heterogeneous impact across generations when considering the strengthening dimension of the EU public attitudes in regression (3). The support for the EU extended decision-making competencies has increased by slightly more than 1% among young people after 21 July 2020. In line with our expectations, it seems that the future generation, which is in theory the main beneficiary of the resources invested under the NGEU plan, reacted with a favourable attitude towards the decision-making powers of the EU. On the contrary, the approval of Next Generation EU had a negative impact, although fairly small, on older generations with respect to the same strengthening dimension of the EU public attitudes. According to previous empirical studies, our results show once again that young age goes hand in hand with primarily positive messages about European integration.

Table 9. Heterogeneity across generations

	(1)	(2)	(3)
VARIABLES	EU trust	EU identity	EU integration
2	0.000.00	0.0400.00	0.04.404
after	-0.00869	-0.0193***	-0.0142*
	(0.00847)	(0.00709)	(0.00812)
young	0.0716***	-0.00135	0.0339**
, ,	(0.0145)	(0.0123)	(0.0140)
ofter*voung	0.0106	-0.00201	0.0255*
after*young	(0.0146)	(0.0124)	(0.0141)
	(0.0140)	(0.0124)	(0.0141)
age	0.00129***	-0.00139***	-0.000337
	(0.000392)	(0.000329)	(0.000378)
woman	0.0264***	0.00120	-0.00340
	(0.00658)	(0.00556)	(0.00633)
educ			
mediumeduc	-0.00762	0.0818***	-0.0148
	(0.0139)	(0.0116)	(0.0136)
higheduc	0.0644***	0.127***	-0.00659
8	(0.0153)	(0.0128)	(0.0149)
employment	0.00765	0.0181**	-0.00399
employment	(0.00835)	(0.00704)	(0.00804)
a a sialatatua			
socialstatus middleclass	0.07(1***	0.110***	0.0600***
middleciass	0.0761***		0.0609***
1 1 1 1	(0.00737)	(0.00620)	(0.00706)
highclass	0.135***	0.159***	0.112***
	(0.0127)	(0.0109)	(0.0122)
Country dummies	YES	YES	YES
Constant	0.147***	0.508***	0.615***
	(0.0355)	(0.0298)	(0.0343)
Observations	21,868	23,556	22,339
R-squared	0.073	0.090	0.099
IX-Squareu	Standard arrars in no		0.027

Standard errors in parentheses *** p<0.01, ** p<0.05, * p<0.1

4.2.4 Net beneficiaries of NGEU

In absolute terms, Italy and Spain are the countries that were allocated with the highest amount of grants under the NGEU proposal, respectively €68,88 (along with 122,6 billion in loans) and €69,51 billion¹⁰. However, these figures may be misleading when interested in knowing which countries net benefit from the allocation of resources as all Member States will also need to contribute to servicing the debt through the EU budget. The EU intends to create new own resources to service the NGEU debt, but they are considered only as a marginal source of financing, while the burden of financing will be mainly distributed among the EU Member States (Fuest, 2021). Thus, the redistributive effects are best measured by the net balances of each country with respect to the grant component of the fund. Assuming that servicing the debt will be proportional to GNI, the net balances would be as illustrated in Figure 4. A similar analysis provided by the Osservatorio Conti Pubblici Italiani (2020) confirms these estimates. The largest net contributors in terms of GDP are Austria, the Netherlands, Denmark, Sweden, Finland, Germany, Ireland and Belgium. On the contrary, the Frugal Fours are net creditors for about 2% of their pre-pandemic GDP. It is, therefore, not surprising that these countries insisted on reducing the amount of grants under the NGEU initiative. On the other hand, the major net beneficiaries are Croatia, Bulgaria and Greece. Italy and Spain also receive transfers (net of their contribution), although as a smaller portion of their GDP.

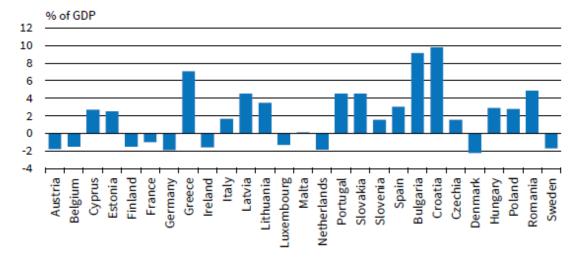


Figure 4. NGEU Net Balances

Source: Fuest (2021) based on the European Commission's data

¹⁰ http://documenti.camera.it/leg18/dossier/pdf/AT052.pdf? 1629216367631

Nonetheless, this analysis only partly captures the overall benefits of NGEU for some countries. First, it should be considered that the European Union borrows on capital markets at interest rates that are much lower than those at which countries such as Italy would usually borrow. Secondly, the resources will flow in over the next few years, while most of the payments would be due much later in time. Currently, the plan is to start paying down the NGEU debt in 2028 and to complete the repayment no later than in 2058 (Fuest, 2020). More importantly, the ownership of the debt will then be of the Union only. Obviously, the EU Member States need to contribute individually to the EU budget for financing the plan, but the burden of the debt is on the shoulders of the European Union as a whole and this does not worsen the financial conditions of the high debt countries. The EU-financed expenditure, which does not increase national public debt, also affects consumers' behaviour. In fact, it is possible that in the EU Member States, where public debt is already at high levels, the expectation that deficits will lead to even higher debt levels, and thus increase taxes, will make consumers more prudent, leading them to save a large part of the income they are receiving now. This effect, the so-called Ricardian equivalence, should be less relevant for the EU-financed expenditure, which does not lead to an outright increase in the national public debt (Alcidi, 2020).

At an individual level, research has shown that citizens that believe they will personally benefit from the European integration or that believe that their country is benefitting from the EU membership will also be more supportive (Arnold et al., 2012). As some countries benefit more than others from the issuance of the EU common debt under the NGEU plan, it is reasonable to think that the impact of NGEU on public attitudes towards the European Union will be different across countries. To investigate such heterogeneity across countries, we used the above-mentioned figures to create a dummy variable which split our sample into two groups of countries, the net beneficiaries and the net contributors of the NGEU financing. Thus, the dummy variable, named *beneficiaries*, takes value 1 whether the country is a net beneficiary, 0 otherwise. We then regressed each output variable on the interaction between *after* and *beneficiaries*. Table 10 shows the corresponding results.

Our results from Table 10 indicate that there is no significant heterogeneous impact of NGEU across countries on the EU trust and EU identity. However, we find that the coefficient related to the interaction variable is significant and positive in the regression of the EU integration, meaning that there are indeed some heterogeneous impacts of the NGEU approval across different EU Member States. The magnitude of the estimates is relatively small, but the sign is in line with our expectations. Overall, *EUintegration* increased by 0.6% among net

beneficiaries countries, while decreased by 2.5% among net contributors. Thus, we conclude that, after 21 July 2020, those countries which directly profit from net fiscal transfers from the European Union are slightly more likely to support the idea that more decisions should be taken at the EU level. On the contrary, net contributors show less appetite to delegate more power to the EU. These results are probably motivated by the above-mentioned utilitarian explanations which emphasize the importance of cost-benefit concerns for public support.

Table 10. Heterogeneity across countries

	(1)	(2)	(3)
VARIABLES	EU trust	EU identity	EU integration
after	0.00832	-0.0132	-0.0251**
	(0.0114)	(0.00969)	(0.0110)
beneficiaries	0.201***	0.0955***	0.0560**
	(0.0245)	(0.0206)	(0.0235)
after*beneficiaries	-0.0245	-0.0111	0.0308**
arter beneficiaries	(0.0150)	(0.0126)	(0.0144)
	(111 11)	(3.23)	(***)
age	-0.000607**	-0.00133***	-0.00150***
	(0.000246)	(0.000207)	(0.000236)
woman	0.0268***	0.00118	-0.00307
,, o	(0.00658)	(0.00556)	(0.00633)
educ	0.0165	0.000004444	0.0000
mediumeduc	-0.0165	0.0820***	-0.0200
	(0.0139)	(0.0115)	(0.0135)
higheduc	0.0581***	0.127***	-0.0100
	(0.0153)	(0.0128)	(0.0148)
employment	-0.00573	0.0185***	-0.0123
1 7	(0.00807)	(0.00681)	(0.00777)
socialstatus			
middleclass	0.0772***	0.110***	0.0611***
	(0.00738)	(0.00620)	(0.00707)
highclass	0.137***	0.159***	0.112***
C	(0.0127)	(0.0109)	(0.0122)
Country dummies	YES	YES	YES
Constant	0.278***	0.502***	0.702***
Constant	(0.0281)	(0.0235)	(0.0271)
	,	,	,
Observations	21,868	23,556	22,339
R-squared	0.071 Standard errors in	0.090	0.099

Standard errors in parentheses
*** p<0.01, ** p<0.05, * p<0.1

4.3 Robustness check

The balancing exercise we made in Chapter 3 revealed differences between the control and treated populations which may compromise the exogeneity of the treatment effect. We addressed the issue of selection on observables by adding the unbalanced individual characteristics as controls to our equation. Nevertheless, one may be concerned that *unobservable* variables have an influence on both the output variables and the variable of interest. In that case, the treatment effect in our regressions would suffer from endogeneity due to unobservable omitted variables.

In our framework, there may have been some unobservable variables. For example, some individuals may not enjoy interactions with other people – especially during the Covid-19 pandemic emergency – and, therefore, be more likely to delay their interview. At the same time, a low level of sociability may be correlated with a low support towards the European Union. In this regard, a very recent study by Aichholzer et al. (2021) found that extroversion played no role in predicting attitudes towards the EU, thus denying the presence of this issue here. However, other unobservable variables that we had ignored could create endogeneity in our model.

To address this concern, we applied a robustness test proposed by Oster (2019). Oster (2019) suggested that we can learn something about the effect of unobservables on the coefficients of interest when looking at the inclusion of additional observables combined with the movement of the R squared. The intuition is that, as controls are added, the magnitude of the change in the R squared is informative for the level of the observable selection in the sample, and by assumption, for the level of the unobserved selection potentially operating as well.

Here we focus on the calculation of δ , which is the ratio of the impact of unobservables to the impact of observable controls that would drive the coefficient on the treatment variable to zero. As a point of reference, Oster (2019) suggests that effects for which $\delta > 1$ can be considered heuristically robust, i.e. when selection on unobservables is at least as important as selection on observables to zero-out the treatment effect. Obviously, this exercise makes sense only when we obtain a significant estimate in the baseline regression. We, therefore, conducted the Oster test over the baseline regression of *EU identity* on *after*, from which we obtained a significant coefficient for our main variable of interest. The parameter δ can be computed using the Stata module "psacalc" provided by Oster (2019). We obtained that δ is equal to 6.10461. The interpretation behind this coefficient is that the selection on unobservables would have to be on average 6.1 times as powerful as the selection on

observables in order to zero-out the estimated treatment effect. This result is particularly encouraging, as we consider the observed controls as important determinants of both the EU identity and the time of the interview, so it is unlikely that so many other variables that have a similar influence on these two variables may exist.

The "psalcal" command on Stata also provided us with an estimate of the treatment effect that we would obtain once considered the presence of all possible control variables. On the bottom of Table 11, we report the bias-adjusted estimates β . We found that this type of unobserved selection would not change the sign of the estimated effect on *EUidentity*. Even the magnitude would be almost unchanged.

On the other hand, we cannot test the treatment effect in the regressions where the variable of interest *after* is interacted with other variables to investigate heterogenous effect of Next Generation EU. Nonetheless, the discussed above results of the Oster test give us some indications regarding the incidence of the issue of unobservable omitted variables in our specification setting. Obviously, it is impossible to rule out the possibility that the results of our analysis were affected by the presence of unobserved selection, but the Oster test added more credibility to our findings.

Table 11. Oster's test (2019)

	(1)	(2)	(3)
VARIABLES	EU trust	EU identity	EU integration
after	-0.00583	-0.0198***	-0.00722
	(0.00741)	(0.00621)	(0.00711)
age	-0.000614**	-0.00133***	-0.00150***
C	(0.000246)	(0.000207)	(0.000236)
woman	0.0268***	0.00118	-0.00307
Woman	(0.00658)	(0.00556)	(0.00633)
	(0.00038)	(0.00330)	(0.00033)
educ			
mediumeduc	-0.0161	0.0822***	-0.0205
	(0.0139)	(0.0115)	(0.0135)
higheduc	0.0586***	0.127***	-0.0107
	(0.0153)	(0.0128)	(0.0148)
employment	-0.00572	0.0185***	-0.0123
1 2	(0.00807)	(0.00681)	(0.00777)
socialstatus			
middleclass	0.0770***	0.110***	0.0614***
iniduleciass	(0.00738)	(0.00620)	(0.00707)
highclass	0.137***	0.159***	0.113***
ingiiciass	(0.0127)	(0.0109)	(0.0122)
Country dummies	YES	YES	YES
Constant	0.283***	0.504***	0.696***
Constant	(0.0279)	(0.0233)	(0.0269)
	,	, ,	` '
β	0.00471	-0.01785	-0.01139
Observations	21,868	23,556	22,339
R-squared	0.071	0.090	0.098
	Standard errors in pa		

Standard errors in parentheses
*** p<0.01, ** p<0.05, * p<0.1

Conclusions

In our work, we study the impact of Next Generation EU on three dimensions of public attitudes towards the European Union: trust in the EU, European Union identity, and strengthening of the EU decision-making powers. The interest in this topic springs from the view that despite of evident detrimental effects, this crisis can also be perceived as an opportunity for supranational institutions to increase public support towards the European Union. This is particularly relevant for the European Union which has always suffered from a so-called "demographic deficit".

To measure the short-run causal impact of Next Generation EU, we used data from the Standard Eurobarometer that was fielded during summer 2020, precisely when Next Generation EU was approved by European Council. We use this fortuitous timing to approximate a real experiment in which those interviewed before 21 July 2020 can be seen as control group, while those interviewed after serve as treatment group. Thus, the main variable of interest in our regression model is a dummy variable that takes value one if the individual is interviewed after the 21 July.

Our primary results show that, on average, the approval of Next Generation EU caused a small drop in the feeling of belonging to the European Union. This is not an encouraging result for the European Union as research has shown that both the overall support as well as support for some of the key policies of the European Union are bigger among people who have a European identity. However, further analyses suggest that the impact on EU identity was rather heterogenous among individuals with different level of education. Indeed, it seems that that highly educated respondents were slightly more likely to feel European after 21 July 2020. Exploring the heterogenous effects of Next Generation EU among different level of education, we also found that those with an advanced education also tend to have more confidence in the European Union. On the contrary, low educated individuals expressed some feelings of dissatisfaction towards EU institutions' performance during the crisis. Overall, our results suggest that education played a key role in explaining the change in attitudes towards the EU after the approval of NGEU was approved. We interpret these results as the evidence

that educated people are probably better informed about current EU matters and, therefore, able to base their attitudes on a positive evaluation of the implications of Next Generation EU.

Another interesting finding of our work concerns the impact of NGEU on next generation, which is expected to be the main beneficiary of the EU funds, as the name of the instrument also suggests. We found that young individuals are indeed positively responsive to the approval of the EU policy initiative, showing more appetite for some extension of EU decision-making powers after 21 July 2020. The last heterogeneity we explore in our work regards the respondents' nationality. In line with our expectations, we found that in those countries which net benefit from EU funds (e.g. Italy, Spain, Croatia,...), the percentage of respondents who answered that more decisions should be taken at EU level has increased. On the contrary, net contributors (e.g. the so-called frugal fours countries) show less appetite to delegate more power to the EU after the approval of NGEU. Overall, the results from these two heterogeneity analyses seem to indicate that individuals tend to base their evaluations of Next Generation EU according to a cost-benefit analysis, which would be perfectly in line with the utilitarian approach of EU attitudes.

For many, EU institutions took advantage of the exceptional circumstances of the Covid-19 crisis to make a leap in the integration process of the European Union, which national governments and voters would have not favoured otherwise. As predicted by Jean Monnet, one of the EU founding fathers, partial integration may inspire political support for further integration in a sort of chain reaction, or, rather, it could arise in spite of growing political dissensus. Interpreting our result through the lenses of Monnet, we may conclude that public reaction to the NGEU approval was not homogeneous among all individuals. Rather, the mechanisms through which the integration chain reaction advanced by Monnet takes place are likely to depend on individual characteristics. In our framework, respondents' education, age and nationality played a key role in explaining the heterogeneity of the impact. Thus, taking into account these variables is crucial to understand whether there is a risk of meltdown in the Monnet's conjecture.

We based our analysis on two important assumptions. First, we assume that no other possible confounding events took place during summer 2020. Secondly, we assume that the treatment, i.e. the date of interview in our framework, was assigned randomly to the respondents interviewed in our sample. Therefore, we included in our specification model all the observable individual characteristic that were likely to have an influence on both the dependent variables and the date of interview. To add more credibility to our findings, we also

conducted the robustness check proposed by Oster (2019) to control for the importance of omitted variable in our specification model. The results from the Oster test seem to suggest that selection on unobservables is not likely to be an issue here.

It should be underlined that our analysis is limited to impact of NGEU in the short-term horizon. However, it is reasonable to think that the impact of Next Generation EU is rather a question of time and that the effects will be rather observable in the medium-long term. Next waves of the Standard Eurobarometer show some interesting data in this respect. According to the EU survey conducted in February-March 2021, the trust in the EU have increased by six percentage points since summer 2020 and reached their highest levels in more than a decade. Similarly, the feeling of attachment to the European Union has increased significantly by five percentage points, while the level of this feeling remains stable for both the community and the country. It is also interesting to note that, since summer 2020, the share of respondents who would like to see more decisions taken at the European Union level has increased from 56% to 63%. Of course, these positive trends could be explained by other factors such as the beneficial effects of the vaccination campaign which started at the end of December in EU Member States. Although it is not possible infer any causal relation from these descriptive statistics, it is plausible to think that the approval of Next Generation EU could have played a role in explaining the change in public perspective between the two surveys. This evidence highlights the need for further analysis on the topic.

References

Aichholzer, J., & Rammstedt, B. (2021). Can specific personality traits better explain EU attitudes?. *Acta Politica*, 56(3), 530-547.

Alcidi, C., & Gros, D. (2020). Next Generation EU: A Large Common Response to the COVID-19 Crisis. *Intereconomics*, 55(4), 202-203.

Angrist, J. D., & Pischke, J. S. (2008). *Mostly harmless econometrics*. Princeton university press.

Arnold, C., Sapir, E., & Zapryanova, G. (2012). Trust in the institutions of the European Union: A cross-country examination. *Beyond Euro-Skepticism: Understanding Attitudes Towards the EU'*, *European Integration Online Papers, Special Mini*, (2).

Bassi, V., & Rasul, I. (2017). Persuasion: A case study of papal influences on fertility-related beliefs and behavior. *American Economic Journal: Applied Economics*, 9(4), 250-302.

Bender, R., & Lange, S. (2001). Adjusting for multiple testing—when and how?. *Journal of clinical epidemiology*, *54*(4), 343-349.

Bömmel, N., & Heineck, G. (2020). Revisiting the causal effect of education on political participation and interest.

Boomgaarden, H. G., Schuck, A. R., Elenbaas, M., & De Vreese, C. H. (2011 O 2015?). Mapping EU attitudes: Conceptual and empirical dimensions of Euroscepticism and EU support. *European Union Politics*, *12*(2), 241-266.

Braun, D., & Tausendpfund, M. (2014). The impact of the Euro crisis on citizens' support for the European Union. *Journal of European Integration*, 36(3), 231-245.

Brosius, A., van Elsas, E. J., & de Vreese, C. H. (2019). Trust in the European Union: Effects of the information environment. European Journal of Communication, 34(1), 57-73.

Council of the EU. (2020a). *Statement of EU ministers of finance on the Stability and Growth Pact in light of the COVID-19 crisis* [Press Release]. Available at: https://www.consilium.europa.eu/en/press/press-releases/2020/03/23/statement-of-eu-ministers-of-finance-on-the-stability-and-growth-pact-in-light-of-the-covid-19-crisis/.

Council of the EU. (2020b). Report on the comprehensive economic policy response to the COVID-19 pandemic [Press Release]. Available at: https://www.consilium.europa.eu/en/press/press-releases/2020/04/09/report-on-the-comprehensive-economic-policy-response-to-the-covid-19-pandemic/.

Coupe, T., & Chaban, N. (2020). Creating Europe through culture? The impact of the European Song Contest on European identity. *Empirica*, 47(4), 885-908.

De Vreese, C. H., Azrout, R., & Boomgaarden, H. G. (2019). One size fits all? Testing the dimensional structure of EU attitudes in 21 countries. *International Journal of Public Opinion Research*, 31(2), 195-219.

Drakos, K., Kallandranis, C., & Karidis, S. (2019). determinants of trust in institutions in times of crisis: survey-based evidence from the European Union. *JCMS: Journal of common market studies*, 57(6), 1228-1246.

Easton, D. (1975). A re-assessment of the concept of political support. *British journal of political science*, 5(4), 435-457.

Echebarria Fernández, J. (2021). A Critical Analysis on the European Union's Measures to Overcome the Economic Impact of the COVID-19 Pandemic. *European Papers-A Journal on Law and Integration*, 5(3), 1399-1423.

European Central Bank. (2020, March 18). *ECB announces €750 billion Pandemic Emergency Purchase Programme* [Press Release]. Available at: https://www.ecb.europa.eu/press/pr/date/2020/html/ecb.pr200318_1~3949d6f266.en.html.

European Centre for Disease Prevention and Control (ECDC). (2020). *Timeline of ECDC's response to COVID-19*. Available at: https://www.ecdc.europa.eu/en/covid-19/timeline-ecdc-response.

European Commission. (2017). White paper on the future of Europe and the way forward.

Available at: https://ec.europa.eu/commission/sites/beta-political/files/white_paper_on_the_future_of_europe_en.pdf.

European Commission. (2020). *Communication from the Commission, Europe's Moment: repair and prepare for the Next Generation, COM (2020) 456 final.* Available at: https://eurlex.europa.eu/legal-content/EN/TXT/PDF/?uri=CELEX:52020DC0456&from=EN.

European Commission. (2021). Eurobarometer 93.1 (2020). GESIS Data Archive, Cologne. ZA7649 Data file Version 1.2.0, https://doi.org/10.4232/1.13746.

European Council, (2020). *European Council Conclusions of 17-21 July 2020, EUCO 12/20*. Available at: https://www.consilium.europa.eu/media/45109/210720-euco-final-conclusions-en.pdf.

Ferragina, E., & Zola, A. (2021). The End of Austerity as Common Sense?: An Experimental Analysis of Public Opinion Shifts and Class Dynamics During the Covid-19 Crisis. *New Political Economy*, 1-18.

Fetzer, T. (2019). Did austerity cause Brexit?. American Economic Review, 109(11), 3849-86.

Fuest, C. (2021). The NGEU Economic Recovery Fund. In *CESifo Forum* (Vol. 22, No. 01, pp. 03-08). München: ifo Institut-Leibniz-Institut für Wirtschaftsforschung an der Universität München.

Goebel, J., Krekel, C., Tiefenbach, T., & Ziebarth, N. R. (2015). How natural disasters can affect environmental concerns, risk aversion, and even politics: evidence from Fukushima and three European countries. *Journal of Population Economics*, 28(4), 1137-1180.

Guiso, L., Sapienza, P., & Zingales, L. (2016). Monnet's error?. *Economic Policy*, 31(86), 247-297.

Hakhverdian, A., Van Elsas, E., Van der Brug, W., & Kuhn, T. (2013). Euroscepticism and education: A longitudinal study of 12 EU member states, 1973–2010. *European Union Politics*, *14*(4), 522-541.

Hobolt, S. B., & De Vries, C. E. (2016a). Public support for European integration. Annual Review of Political Science, 19, 413-432.

Hobolt, S. B., & De Vries, C. (2016b). Turning against the Union? The impact of the crisis on the Eurosceptic vote in the 2014 European Parliament elections. *Electoral studies*, *44*, 504-514.

Hooghe, L., & Marks, G. (2009). A postfunctionalist theory of European integration: From permissive consensus to constraining dissensus. *British journal of political science*, *39*(1), 1-23.

Jakiela, P., & Ozier, O. (2019). The impact of violence on individual risk preferences: evidence from a natural experiment. *Review of Economics and Statistics*, 101(3), 547-559.

Kuhn, T., & Stoeckel, F. (2014). When European integration becomes costly: the euro crisis and public support for European economic governance. *Journal of European Public Policy*, *21(4)*, 624-641.

Lefkofridi, Z., & Schmitter, P. C. (2015). Transcending or descending? European integration in times of crisis. *European Political Science Review*, 7(1), 3-22.

Lindberg, L. N., & Would-Be, S. S. E. S. (1970). Polity: Patterns of Change in the European Community.

Lionello, L. (2020). Next Generation EU: has the Hamiltonian moment come for Europe?.

Lubbers, M. (2008). Regarding the DutchNee'to the European Constitution: A Test of the Identity, Utilitarian and Political Approaches to VotingNo'. *European Union Politics*, 9(1), 59-86.

Lubbers, M., & Scheepers, P. (2010). Divergent trends of euroscepticism in countries and regions of the European Union. *European Journal of Political Research*, 49(6), 787-817.

Metcalfe, R., Powdthavee, N., & Dolan, P. (2011). Destruction and distress: using a quasi-experiment to show the effects of the September 11 attacks on mental well-being in the United Kingdom. *The Economic Journal*, 121(550), F81-F103.

Mitchell, K. (2012). Student mobility and European Identity: Erasmus Study as a civic experience?. *Journal of Contemporary European Research*, 8(4).

Miró, J. (2021). Debating fiscal solidarity in the EU: interests, values and identities in the legitimation of the Next Generation EU plan. *Journal of European Integration*, 1-19.

Negri, F., Nicoli, F., & Kuhn, T. (2021). Common currency, common identity? The impact of the Euro introduction on European identity. *European Union Politics*, 22(1), 114-132.

Osservatorio Conti Pubblici Italiani. (2020). *Recovery Fund: chiarimenti su finalità e cifre*. Available at: https://osservatoriocpi.unicatt.it/cpi-archivio-studi-e-analisi-recovery-fund-chiarimenti-su-finalita-e-cifre.

Oster, E. (2019). Unobservable selection and coefficient stability: Theory and evidence. *Journal of Business & Economic Statistics*, 37(2), 187-204.

Plümper, T., & Neumayer, E. (2020). Lockdown policies and the dynamics of the first wave of the Sars-CoV-2 pandemic in Europe. *Journal of European Public Policy*, 1-21.

Polyakova, A., & Fligstein, N. (2016). Is European integration causing Europe to become more nationalist? Evidence from the 2007–9 financial crisis. *Journal of European Public Policy*, 23(1), 60-83.

Risse, T. A Community of Europeans?: Transnational Identities and Public Spheres.

Serricchio, F., Tsakatika, M., & Quaglia, L. (2013). Euroscepticism and the global financial crisis. *JCMS: Journal of Common Market Studies*, *51*(1), 51-64.

Spolaore, E. (2013). What is European integration really about? A political guide for economists. *Journal of Economic Perspectives*, 27(3), 125-44.

Stoeckel, F. (2011). EU media salience, instrumental thinking and identification with the EU. In *Issue salience in international politics* (pp. 159-177). Routledge.