

## GENERATION STUDIES

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### Is the “Third Generation” of the Polish Transformation More Economically Liberal? Inter-Cohort Differences in Job Entrance and Egalitarian Attitudes

*Abstract:* This article looks at changes in early career, self-evaluation of economic standing, and egalitarian attitudes in three Polish birth cohorts. The first cohort is sometimes labeled the “crisis generation” (those born in 1957–59), the second is called the “transition generation” (1970–71), while the third is named the “open-borders generation” (1988–89). As the members of these generations were socialized in substantially different economic, social, and institutional contexts it is hypothesized that they will have distinct views on the economic order. To verify the hypothesis it was necessary to dissect age, period, and cohort effects. We did so using data from “The Three Generations of the Polish Transformation” project in conjunction with two older datasets. This allowed us to harmonize data (replicated questions, post-stratification) and synchronize data (the same biographical point) for the purpose of a suitable parametrization of statistical models. The results show that substantially different job experience has generated a significant cohort effect in the youngest of the three cohorts studied.

*Keywords:* cohort effect, generation, egalitarian attitudes, liberal views, transformation, young adults

#### Introduction

Social change is mediated by and inscribed in the relay of generations. This is a widely accepted yet not that widely studied phenomenon. Actually, at least part of the evolution of social trends observed over the last decades happened on account of replacements in the ranks of society rather than of personal developments over the life span of individual members. A notable example was provided last year by *The Economist*, which published an analysis of long-term opinion change in the US and concluded that “[s]ocieties change their minds faster than people do” (2019: 85). Different attitudes to various social issues appeared to be due mainly to changing demography and not merely to changing views. While millennials were coming of age, baby boomers were going into retirement. In the case of Poland, the generational change of the last three decades has been accompanied first by deep systemic change and then by the continued reform of the economy, the state, and its institutions. In fact, the Polish transformation itself can be looked upon as a saga of certain generations.

In this article we look analytically at selected aspects differentiating the “third generation” of the transformation that began in Poland in the late 1980s, namely, the conditions

under which the generation's members first entered the job market and their attitudes concerning distributive justice. The analysis compares three birth cohorts of Poles, which can tentatively be labeled the "crisis generation" (those born in the late 1950s), the "transition generation" (those born in the early 1970s), and the "open-borders generation" (those born in 1988–89). Members of the first entered adulthood during the late period of Gierek's rule and for them the experience of stark economic crisis, the birth of the Solidarity movement, and martial law in 1981–1983 was, in a sense, formative. Members of the second entered adult life together with the political breakthrough of 1989, with the hopes and risks inscribed in the systemic change itself. The beginning of adulthood of the third birth cohort followed Poland's accession to the European Union and entrance to the Schengen Area. Members of this generation could call themselves Europeans from the beginning of their adult life.

These birth cohorts can be defined and labeled variously (similar labels were used by Zielińska & Szaban 2011), but the different historical backgrounds in which they grew up and entered adulthood makes it plausible that each of them is marked by a distinctive "participation in the common destiny" (Mannheim [1927] 1952). This is, broadly speaking, one of the main hypotheses behind the study presented in this paper. In particular, we aim to verify whether inter-cohort differences in early career trajectories influenced how people evaluate their own material situation and existing social inequalities. The data and analysis are part of the "Three Generations of the Polish Transformation" project (3GEN—funded by the National Science Centre, Poland, 2017/26/D/HS6/00994) and are complemented by previous Polish cohort and panel studies. The data made it possible to establish a comparative framework for analyzing the life trajectories, orientations, and attitudes of birth cohorts entering adulthood in socially and politically distinct periods. One point of methodological importance is that the data is biographically synchronized: all the cohorts were studied at the moment they turned 30. The contribution of the current study consists in a tailored research design in which three well-defined cohorts are systematically compared using a complex mix of new and existing data.

## Theoretical Background

There are many commonly used generational labels in the public discourse, such as the "generation of 84," "generation Z," and the "JP2 generation." In most cases, the labels imply a kind of distinctiveness of certain cohorts and are often provided as ready explanations for social changes. However, in the classical sociological sense, the notion of a "generation" functions rather as a hypothesis. In the Mannheimian sense ([1927] 1952), generations are birth cohorts formed specifically by the changing historical context and can further be divided into "generation units." In fact, the relationship between the cultural and institutional contexts on the one hand, and socio-occupational trajectories and attitudes on the other, poses an empirical question. In the narrow sense, cohorts can be deemed generations if they are clearly distinguished by specific life trajectories and sociopolitical traits. Despite the ambiguity of the term, "generations" are usually treated as mediators of transformation processes: "cultural change does have origins in the never ending drama of the succession of generations" (Bengtson, Furlong, Laufer [1974] 1983: 67), while the variability and diver-

sity of this succession can be contrasted with the stability provided by reproduction within the family and class (see Eisenstadt [1956] 2009).

A striking part of the modern sociological account of temporal changes in intra-person and inter-person developments and variations has come from discussions of the succession of generations. The classical works by Mannheim ([1927] 1952) and Schelsky (1957) and sophisticated, up-to-date, empirical analyses within the GLHS and SOEP projects are rich sources of data on how successive (differently framed and labeled) generations and cohorts of Germans have diverged in terms of their socio-economic achievements and attitudes.<sup>1</sup> While many aspects of the war generation and post-1989 transformation generation have been analyzed in Germany, over the last decades baby boomers and many subsequent, variously defined cohorts have been the subject of research initiatives and of media “generation hype” all over the world.

The relationship between the succession of cohorts and the changing historical context has been analyzed primarily in connection with the biographies of the post-war generations—the war survivors and then the baby boomers, and then with respect to the experience of the generation of ’68 (see Davis 2002). Later, other generations were defined (generation X, millennials). However, subsequent changes were not so dramatic that it could be claimed there were deep, structurally conditioned generation gaps (there is speculation about such a possibility in regard to the changes that occurred after September 11, 2001 (see Cavalli 2004; Edmunds, Turner 2005). At the same time, it is widely accepted that such a change has taken place in the countries of Central and Eastern Europe. German sociology responded by analyzing the biographies of cohorts affected by the unification of the Federal Republic of Germany and the German Democratic Republic (see Huinink, Mayer 1995; Hillmert, Mayer 2004; Diewald, Goedicke, Mayer 2006; Mach, Matthes 2005; Mayer, Schultze 2009). The transformation of Polish society is no less interesting in this respect, as there was no ready blueprint for the transition from communism. As Alessandro Cavalli states, “Obviously, the new generation growing up after 1989 will differ considerably from young men and women who lived their formative years during the communist regime in Eastern European countries and the former Soviet Union” (2004: 163). In public discourse the “third generation” (those born in 1988/89) is already being defined as distinct (see Sawulski 2019). This assumption might seem relatively safe, but the changes after 1989 in Poland—more than those in the former East Germany—should perhaps be seen in a sequence of several generations. The transition in 1989 in Poland was more gradual: it was not the radical, “single point” elimination of a state as in the case of East Germany during unification.

Some scholars speculated that economic attitudes in Polish society would converge with those of Western societies “from above, not below” (Kelley, Zagórski 2004: 352), that is, from even more liberal positions. The assumption was that high inequalities reflected the wide opportunities accompanying economic transition. This, however, proved rather unsubstantiated in the long term (see Sadowski 2006; Grosfeld, Senik 2010). Since Poland

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<sup>1</sup> GLHS stands for the German Life History Study, a monumental work in which several German cohorts were comprehensively studied over decades (from the 1970s) at the Max-Planck-Institute for Human Development in Berlin under the supervision of Karl Ulrich Mayer (Huinink, Mayer 1995). SOEP stands for the German Socio-Economic Panel, a longitudinal survey of households started in 1984 and run by the Deutsches Institut fuer Wirtschaftsforschung (DIW) in Berlin (Alesina and Fuchs-Schuendeln 2007).

joined the EU, its society seems to be slowly converging “from below.” There is a question, however, of what is really behind this change. Is it the direct impact of the developing economy—that is, citizens thinking more favorably about the economic order because their situation is improving—or is it additionally influenced by generational replacement, with the more lasting impact of different socialization? Or perhaps to the contrary, do higher risks encourage the youngest generations to challenge the existing distributional justice more than other generations have done in the past 30 years?

In many ways, the structure of opportunity changed favorably for the younger cohorts. Higher education became much more accessible. Educated people are better equipped to face modernization challenges and thus they often gain in processes of social and economic change (Becker, Blossfeld 2017). On the other hand, there is a widespread sense of insecurity and instability among the younger cohorts, especially when they are compared with previous generations (Sawulski 2019). Younger cohorts in Europe are considered to be facing a relatively less stable work situation than their predecessors and are sometimes called the “precarious generation” or the “jilted generation” (Green 2017; Kretsos 2010). Globally, new generations are also increasingly vulnerable in their transition to employment (Blossfeld, Mills 2010). They are said to bear most of the costs of the shift to the “gig economy” (Furlong et al. 2017). At the same time, many social inequalities are effectively transferred across generations, including in the form of direct inter-generational support within families (Hillmert 2010; Rowlingson, Joseph, Overton 2017). In spite of the above-mentioned literature, the younger generations’ stance on the economic order—and especially on social inequalities—is largely unknown.

Economic liberalism is addressed in our study in a limited sense: we are only looking at how prone different birth cohorts of Poles are to accept the income inequalities that have arisen since the fall of communism. We operationalize the economic attitudes as liberal (accepting the existing inequalities) versus egalitarian (rejecting them). This seemingly crude approach is partly implied by “path dependency”: we use questions that have been included in Polish surveys since the late 1980s. A focus on the issue of distributive justice is, however, well established in the literature. Contemporary generational differences and potential conflicts are often considered to be specifically economic in nature. “Unlike in the 1960s, the challenge does not lie in the political and cultural spheres but in the economic sphere” (Attias-Donfut, Arber 2000: 1). A notable global example in this respect was the Occupy movement, which was considered to be a generational phenomenon (Milkman 2017).

### Three Generations of Poland’s Transformation

While William Strauss’ and Neil Howe’s *Generations* (1991) has mostly been deemed to be pseudo-sociology, it effectively inspired popular discourse. It is already a well-institutionalized practice both in the social sciences and elsewhere to refer to the baby-boom generation, generation X, or the millennial generation. Without dwelling on the idea of “turnings,” such terms began to serve as a classification of cohorts. “Boomers” are those who were born after the Second World War; therefore, it was rather the Vietnam War and the events of 1968 that became formative for this cohort. “Gen Xers” (or the “13<sup>th</sup> genera-

tion”), in turn, do not remember the Vietnam War and the 1960s, as they were approaching adulthood around the end of the Cold War. Finally, “millennials” do not remember the Cold War but came of age in the Internet era, mostly in the twenty-first century. The historical context for each country is specific; therefore, these labels can be applied to Polish society only very loosely.

It is futile to try to indicate the exact time interval for the emergence of a generation in socio-cultural terms. The literature suggests a minimum of a decade and a maximum of 30 years (see Mannheim [1927] 1952; Ossowska 1963; Mach 2003; Biggs 2007). In practice, the process of generational change observed from a sociological perspective makes the temporal boundaries relative to the rate of technological, cultural, and political changes occurring in a given period. Therefore, given the rate of significant institutional and social changes in Poland during the transition (but also taking into account the parallel global changes, including those in communication technologies), a period of about a decade and a half seems sufficient. At the same time, this interval marks a clear movement in the sequence of “generational roles”—when one cohort is entering adulthood, the other is already in the period of stabilization.

In our study we refer to three narrowly defined birth cohorts. The first concerns people born in 1957–1959, who reached the age of 18 in the mid-1970s and thus witnessed, and often actively participated in, the economic and political crisis and the beginning of the erosion of the communist system in Poland. Their entry into adulthood was marked by the events of Gierek’s “interrupted decade,” such as those related to the birth of the democratic opposition (the “Letter of 59,” the workers’ protests in Radom, Ursus, and elsewhere, the “Letter of 14,” the creation of the Workers’ Defense Committee and later the Solidarity movement), and the crisis (rising prices, the introduction of rationing). The fact that this was the first generation not socialized under Stalinism possibly made it more inclined to oppose the regime openly. The phenomenon was sometimes called “a revolution of rising expectations” (see Adamski 1982; Bialecki, Sikorska 1982). While young Poles had been hopeful at the beginning of the 1970s, by the end of the decade they were starting to treat the state as alien and hostile (Osęka 2013). These Poles can figuratively be described as the “crisis generation” (after Zielińska & Szaban 2010), while chronologically they correspond with the “baby boomers.” Zagórski (2014) calls them the “generation of the little stabilization and protest.”

Poles born in 1970–1971, who reached the age of 18 in 1989 and were the youngest adults to witness the institutional transition from socialism to democracy and the market economy, are the second cohort of interest. Here, we label them the “transition generation.” What distinguishes its members is that they entered adulthood in conditions of radical social change. This change—the transition (which may and, as some argue, should be distinguished from a more gradual process of transformation, see Rychard 1993; Pawlak 2013)—had a strong and very often adverse impact on their life chances, despite having wider access to higher education than in previous cohorts and the advantage that youth usually provides in regard to adaptation (Mach 2003). This was the first Polish post-war cohort that exercised political freedoms, but also the first to deal with issues such as unemployment. They could not readily influence the direction the transition was going, yet they were immediately subjected to its outcomes.

These two cohorts serve as a unique reference point for the key cohort in the study—people born in 1988–89. They, like the cohorts before them, also matured at a momentous time for Poland. In fact, this cohort is distinguished by two historical contexts: their entire (or nearly entire) life has been lived in a democracy and a market economy (they have no memory of communist times), and they have made practically all their adult decisions as citizens of the European Union. Their outlook has been largely shaped in the twenty-first century, as they dealt with all the opportunities and challenges provided by the changing situation of the Polish state and society. Poland acceded to the European Union in 2004 and this generation sees Western Europe as an important reference point. It could be labeled the “open-borders generation.”

All this could result in significantly different attitudes toward the changing social, economic, and political order in comparison to older cohorts. On the one hand, those born in 1988–1989 may be expected to be the first fully to embrace the reality of a competitive economy; on the other hand, there are reasons to presume that they might be the first to challenge it actively (see [Szafraniec et al. 2017](#); [Sawulski 2019](#)). In contrast to the cohort of 1970–1971 this cohort also stands out in terms of sheer numbers, as part of the 1980s baby boom in Poland (which may also have consequences in terms of “vacancy chains,” see [Chase 1991](#)). These cohorts were surveyed in 2019–2020.

When we put the three cohorts against the backdrop of the institutional transition from communism with its central planning to democracy and the market economy, we see that the first of the three was able to participate in this crucial political and economic shift, the second bore the immediate results of this shift, while the third—whose members started adult life in an already well-established institutional reality—experienced the long-term consequences of the transition. The 3GEN data allows us to check to what degree differences between these birth cohorts can be linked to certain life-course events and features (career advances, experiences in the labor market, living standards) and to what degree they are generational effects (socialization, institutional change). Studies suggest that there can be significant inter-cohort change in attitudes linked to institutional processes ([Down, Wilson 2013](#)).

### Design of the Study and Survey Data

Methodologically, the crucial issue in studying generations is the proper attribution of social changes to generational phenomenon. There are three basic “social clocks” binding time and social change. They are associated with (a) a life cycle, that is, the passage of an individual’s time from birth to death, (b) a historical timeline, that is, a continuous stream of events, and finally, (c) an inter-generational relay. The latter in fact links the former two, as it provides the “medium” for structural, institutional, and mental changes, that is, new birth cohorts. The three “social clocks” correspond to the three effects that are distinguished in sociological analysis, namely, the “age effect,” “period effect,” and “cohort effect.” As they are interconnected, they are often addressed jointly as APC. They describe changes associated with, respectively, aging, the impact of a current context, and socialization ([Riley 1973](#); [Rodgers 1982](#)). Obviously, not every difference observed between age groups can be attributed to the cohort effect. This in fact poses a serious methodological problem that is often called “the APC conundrum” ([Glenn \[1977\] 2005](#)). There are several developments in

the analysis of the APC specification that can be utilized to address the issue: from nonlinear transformations to mixed-effects models (Miyazaki, Raudenbush 2000; Yang, Schulhofer-Wohl, Fu, Land 2008; Yang, Land 2013; Dinas, Stoker 2014; O'Brien 2016). However, without data collected in a suitable design such attempts remain in most cases a “futile quest” (Glenn [1977] 2005). The availability of suitable data is therefore crucial in this respect, as cross-sectional and small cohort subsamples still prevail in sociological research.

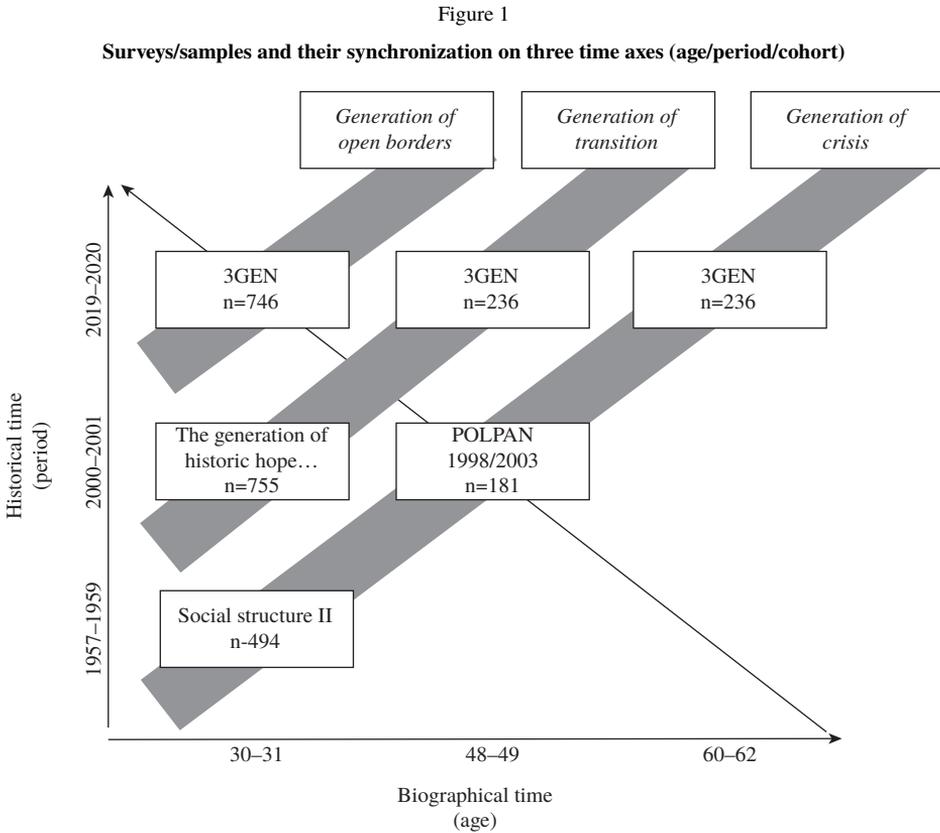
The 3GEN study was designed to analyze the life trajectories and attitudes unique to cohorts socialized in changing socio-economic and political orders. As the interviews with the members of three cohorts were conducted at the same biographical moment, they record the collective experience and attitudes *in vivo* (and not purely retrospectively). The data from the 2019–2020 survey is used in the analysis jointly with data from the 2000–2001 study “Generation of Historic Hope and Everyday Uncertainty” (Mach 2003) and from the 1987–1988 study “The Social Structure and Mobility II” (Słomczyński et al. 1989), as well as the latter’s subsequent POLPAN panel waves (Słomczyński 1998, 2008). These studies combined allow selected variables to be compared (as questions were replicated) on three cohorts, both at the age of 30 (surveyed separately) and during 2019–2020 (surveyed jointly). The complete design of the study is presented in Figure 1. The biographical synchronization on the turning point between the third and fourth decade of life is supported by conclusions from both generational studies and a psychodynamic approach to aging.<sup>2</sup>

Depending on which samples and subsamples are combined in a particular analysis, this design allows for the partial (or even full) control of age, period, and cohort effects. The 3GEN survey is the keystone of the design. It was conducted by the ARC Rynek i Opinia polling agency in late 2019 and early 2020, and involved three subsamples, one for each cohort studied. In total, individual interviews were conducted with 1261 respondents—746 born in 1988–89, 236 born in 1970–71, and 279 born in 1957–59. Face-to-face interviews (CAPI) were conducted with 1163 respondents, while the rest (98) constituted a supplementary CAWI subsample. The post-stratification weights used in the analyses were estimated separately for each cohort. More detailed information on the sampling, representativeness, and weighting is given in Appendix A.

The data on the 1970–1971 cohort was collected in 2000–2001 in the project “Generation of Historic Hope and Everyday Uncertainty: The Socio-Economic Trajectories and Political Biographies of the 18-Year-Olds of 1989” (Mach 2003). The general population for the project was defined as people born in 1971 who were legally of age at the time of Poland’s historic parliamentary elections in June 1989 and could then vote. 755 interviews were conducted, the majority in November 2000. In the analysis, this data is also post-stratified, as distributions of demographic characteristics displayed some self-selection patterns.

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<sup>2</sup> The transition to adulthood is usually considered to happen before 30, along with entrance to the labor market and establishment of a family (Heinz 2009). There is no doubt that the first years of an occupational career are generally crucial in defining a person’s entire professional trajectory. The correlation between the characteristics of the first job and the features of later jobs is generally relatively strong. For example, in the panel study of the 1971 cohort a correlation between the prestige of the first job and the job at 30 was 0.64, and between the latter and the prestige of the job at 38 was 0.61. Maria Ossowska ([1944] 1983) also argued that a “closure” in psychological development occurs not later than in the second half of the third decade of life, while the research of the psychodynamic school in generational studies indicate that generational identity is shaped before turning 30 (Biggs 2007).



The data on the 1957–1959 cohort was extracted from the “The Social Structure and Mobility II” dataset and subsequent POLPAN waves (see [Słomczyński et al. 1989](#); [Słomczyński et al. 2011](#)). The 1987–1988 survey was conducted on a very large sample—nearly 6,000 respondents—which allowed subsets of the dataset to be treated as subsamples of specific age categories. The fieldwork took place when members of the 1957–1959 cohort had reached 30. Sampling proceeded in two stages. However, no data allowing this fact to be accounted for was available for the analysis (the sample was treated as a simple random sample in the analysis).

### Analysis and Results

Our analysis has three main themes. First, we compare the biographical experiences of the three cohorts on their entry to the labor market. Second, we dissect their self-evaluated material situation, as it is an important “bridge” linking indicators of occupational situation with potential views on the economic order. Third, we look at attitudes toward existing inequalities, which we interpret, *pars pro toto*, in terms of orientations concerning the distributive justice of an economic system. Those three aspects taken together should shed light on potential generational changes.

An important issue in this analysis is the harmonization of data from different surveys. Some of the analyses treat data on specific cohorts jointly, which allows for additional checks on the validity of results. In particular, this opportunity is provided by information concerning the respondent's first job. We should expect that different samples of the same birth cohort, though surveyed at different times, should on average match in the reported timing of such an event. This is a basic biographical fact and no matter whether people are interviewed at 30 or at 60 it is expected to be consistent.

### *Differences in early careers*

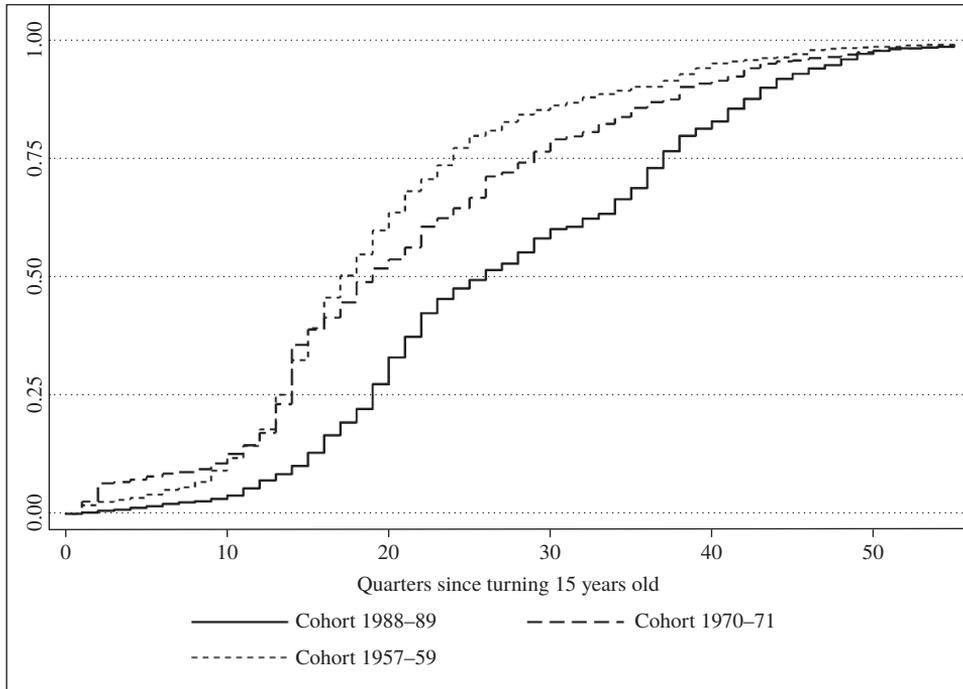
Such a validity check shows that there are no statistically significant differences between the reported timing of first job entry (expressed in quarters). In the case of the 1970–1971 cohort, the difference between the 2000–2001 study (726 respondents who started their first job before turning 30) and the 2019–2020 study (215 cases) remains insignificant regardless of whether weighting and/or post-stratification is applied. Even the conservative Kolmogorov-Smirnov test for equality of distributions shows a combined difference of 0.074 ( $p = 0.18$ ) despite the fact that time is expressed in a “finer grid” than years. In the case of the 1957–1959 cohort comparability is slightly limited because in the 1987–1988 survey the question concerned solely the year of starting one's first job. This poses only a minor problem, however, and distributions from both surveys match each other as well ( $n = 455$  for the 1987–1988 survey and  $n = 251$  for the 2019–2020 survey). The K-S test gives a result of 0.102 ( $p = 0.07$ ) which also suggests that cohort subsamples from different studies were drawn from the same populations and can be treated jointly.

Figure 2 shows differences in the time of entering the labor force, which sociologically signifies the end of adolescence (the time is expressed in quarter years after turning 15—the legal age for having a job). The cohorts born in the late 1950s and early 1970s differ slightly, while adolescence is significantly prolonged for the youngest of the three cohorts. This is in large degree an outcome of longer periods of education (see Szafraniec et al. 2017). The average time it took for members of the 1957–1959 cohort to start a job after reaching 15 years of age was 19.8 quarters (or less than 5 years). For the 1970–1971 cohort it was more than two quarters later (a statistically significant difference,  $t = 3.2$ ). For the 1988–1989 cohort it was more than 8 quarters later ( $t = 11.6$ ). This is just the first strong indication of differences in life trajectories.

Another important feature is the kind of job contract these cohorts first acquired. At each of the three historical periods the Polish labor market was marked by very different economic and institutional conditions. Most members of the earlier (i.e., older) cohorts started their first job at about 20; in both cases, employment occurred under low to non-existent (at least officially) unemployment (it was still just 6.5% in 1990). However, after 1990 and the “shock reform” of the Polish economy unemployment soared (as appears in the subsequent divergence of lines in Figure 1). The youngest cohort entered the labor force when the market economy was already well established. This, paradoxically, led to a peculiar difference in job security.

When we look at the rates at which the respondents obtained a permanent employment contract for their first job there is a huge difference between the cohorts (Table 1). This

Figure 2  
Kaplan-Meier estimates of a first job entrance (in quarters)



time, only the 2000–2001 and the 2019–2020 surveys were taken into account. The oldest (earliest) cohort entered the labor force under socialism and comparison of work contracts has obvious limitations. In [Table 1](#), aside from the cohort effect, a period effect is added to check whether differences can be attributed to the surveys themselves. In fact, this is another validity check and the same kind will be also applied to the results in [Figures 3–4](#). If the period effect were to be significant, discrepancies between the two studies would appear in the indicators for the 1970–1971 cohort. As the results show, there is only an insignificant difference. All the variance can hence be attributed to cohort effects (as age is fully synchronized). The marginal effects show that about 45% of the 1970–1971 cohort declared that their first contract was a permanent one, compared with just 18% of the 1988–89 cohort. Job stability at the beginning of a career was thus dramatically different. This should not be automatically interpreted as an unambiguously “worse situation” for the younger cohort, as it is important to take into account how hard or easy it was at different moments to find alternatives, i.e., change jobs. However, there is no doubt that institutional guarantees of long-term employment at the same workplace were definitely lower for Polish millennials.

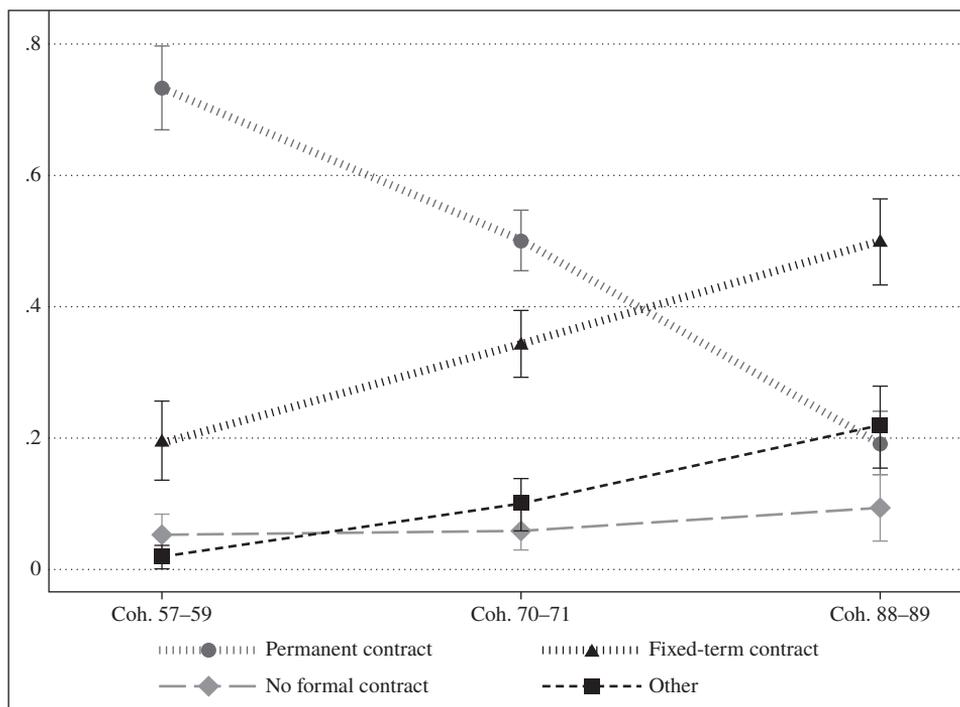
Further inter-cohort differences in regard to a first job contract are shown in [Figure 3](#) (log odds coefficients are available in [appendix B](#)). As can be seen, members of the 1988–1989 cohort more often experienced not only fixed-term employment but also had other kinds of work agreements (such as internships or contracts of mandate) or no formal contract at all. Combined, such agreements amount to almost a third of the first contracts of

Table 1  
**Prevalence of permanent employment contract in a first job (logit model)**

	Coefficient (SE)	t	Sig.
Constant	-0.23 (0.10)	-2.38	0.02
Cohort 1988–89	-1.35 (0.19)	-7.13	0.00
Period effect	0.07 (0.16)	0.44	0.66

Polish millennials, compared with just one sixth of the Polish generation Xers. Given that the 1988–1989 cohort began their careers later in life, it shows that they had much less security at the start of their careers. The prevalence of temporary employment in Poland is also higher than the EU average for 15–39 year olds (Kretsos 2010).

Figure 3  
**Types of contracts in first employment by cohort (marginal effects)**



The crisis generation's entry to an occupational career was characterized by certainty of employment, but work did not guarantee the satisfaction of many of their needs and expectations. The transition generation started work when employment conditions had gone from stable to very uncertain. While there were new possibilities on the job market, this

generation often had to cope with unemployment and job searches were not always easy in the early 1990s. The open-borders generation, conversely, experienced the least guarantee of staying in an early job but at the same time they were not threatened by as high a rate of unemployment. Work was more available and, thus, the choices as well. These prominently included the option of working abroad. In this respect a lot has changed in 30 years. While only 22% of Polish “boomers” declared at age 30 (in 1987–1988) that they had been abroad in the preceding 5 years, 55% of Polish millennials made such a declaration in 2019–2020. For 20% of the latter, the stay spanned more than three months. It has to be remembered that we only took into account Poland’s resident population, while in the 2013–2016 period alone more than 44,000 Poles born in 1988–1989 had emigrated to other countries.<sup>3</sup>

Pronounced differences in the type of first work contract went along with the expansion of the market economy in Poland. The reported sectors of the economy in which first jobs were found indicates that there is also a stark inter-cohort contrast. As [Figure 4](#) shows and as was definitely not the case for earlier cohorts (fractions based on model B2 in the appendix, the period effect was insignificant) the majority of Poles born in 1988–1989 acquired their first job and most subsequent work experiences in private companies. This fact might be quite relevant, as occupational career is an important element in adult socialization. Views on the economy in general, and the public sector in particular, could have shifted in parallel with work experience. Power and property relations—which usually coincide in firms—might be especially important in defining norms and expectations about the social order. What was deemed “normal” by one birth cohort definitely need not be treated as normal by another.

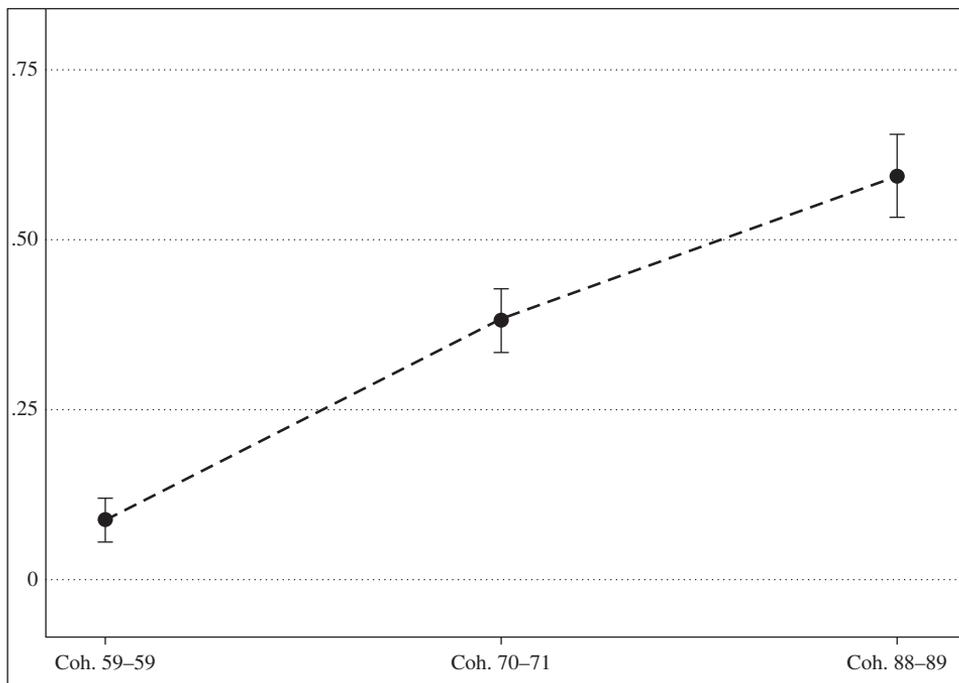
We assume that people’s experience of job entry and early work is important because it is in many ways formative. It is also important to note that employment is marked by a certain degree of inertia. Differences in employment structure, though slightly converged, have been to a degree retained: as of 2020, 57% of the 1988–1989 cohort works in private companies, while 45% of the 1970–1971 cohort and 42% of the 1957–59 cohort do. Early jobs not only leave a mark on people’s general orientation concerning professional activity, they also—statistically speaking—set the paths for all subsequent careers.

#### *Evaluation of one’s own material situation*

An important factor in the relation between economic order and the individual is the latter’s expectations. We now turn to the question of whether there are differences in how happy people were with their own material situation at different times and ages, and in different birth cohorts. It is worth noting that the three cohorts had very different social standing when surveyed in 2019–2020 as they were respectively at early, high, and late career stages. Consequently, the cohort of 1988–1989 had objectively lower (on average) income. Nevertheless, only 3.7% of them judged their material situation to be bad—considerably less than in other cohorts. To enhance the scope of this comparison, in [Table 2](#) we added the data on

<sup>3</sup> This estimate is based on Eurostat data (see <https://ec.europa.eu/eurostat/>, accessed on September 14, 2020). It can also be estimated that in 2017 more than 120,000 Poles of the 1988–1989 cohort had lived outside of Poland for at least a quarter year (see <https://stat.gov.pl/obszary-tematyczne/ludnosc/migracje-zagraniczne-ludnosc/informacja-o-rozmiarach-i-kierunkach-czasowej-emigracji-z-polski-w-latach-2004-2018,2,12.html>, accessed on September 14, 2020). This was considerably more than for the other two cohorts studied.

Figure 4

**Fraction of first employment in private sector by cohort (marginal effects)**

another two cohorts—those born in 1925–1927 (who entered adulthood in 1943–1945) and those born just after the war (in 1946–1948). It becomes clear that (a) evaluation depends mostly on period, and (b) age seems to play a role in this respect, as younger people are generally less prone to see their standing negatively. As was said above, it is rather a matter of lower expectations than of actual wealth and income. The period effects are hardly surprising, given that since about 2000–2001 people’s positive evaluation of their household material situation has been on the rise (CBOS 2018). It might be noted that the prevalence of people’s negative views of their own situation in the 2000–2001 survey preceded the 2001 parliamentary elections, which resulted in a sharp change in the political balance in Poland (a right-wing government was replaced by a left-wing government). Generally positive (or neutral) views in 2019–2020, coincided in turn with elections that renewed the mandate of the ruling coalition.

Table 2

**Negative evaluation of respondent household’s material situation (in %)**

Period	Birth cohort				
	1925–27	1946–48	1957–59	1970–71	1988–89
1987/88	27.9	17.2	13.9		
2000/01		51.6	64.7	23.9	
2019/20			7.6	6.8	3.7

Importantly, cohort effects seemed to play little or no role in the valuations. For example, the “crisis generation” was least dissatisfied in 1988 (presumably due to its young age), however, its members became the most dissatisfied of the three studied in 2000–2001 and 2019–2020. Further inspection of the APC effects in logistic models confirms the observation (see [Table B3](#) in the appendix<sup>4</sup>). With cohort and period controlled, the optimism of young adults seems to be confirmed.

### *Acceptance of existing inequalities*

The main question we pose is whether generations of Poles differ in their propensity to accept existing economic inequalities. We assume the answer would allow us to infer, *pars pro toto*, the level of legitimization of the economic order. The above-described characteristics of early careers and evaluations of personal economic standing are important factors that will be considered predictors. The subsequent analysis should be treated as the equivalent of a one-sided test. We have to take into account that in the 1988–2019 period income differences were either steady or on the rise in Poland (see [Bukowski & Novokmet 2017](#); [Brzeziński, Najsztub, Myck 2019](#)). Other kinds of inequalities proved to be relatively high as well ([Sadowski 2012](#)). Therefore, if we are to record decreasing acceptance for inequalities, the interpretation might be more problematic, as it might be caused by sheer change in the income distribution. However, if acceptance was increasing despite the said objective trend, that would be a clear indicator of a change in economic views. In short, if existing income differences are accepted, especially when the latter are rising, then the fact is indicative of a stronger embrace of the liberal economic order.

[Table 3](#) gives the gross levels of rejection of inequalities at different times in several cohorts. Opposition to inequalities has always been a dominant feature of post-war Polish society, at least when it comes to evidence from existing survey data. During communist times, it was part of the official state ideology. What we see on the “eve” of the introduction of a market economy (1987–1988) can actually be attributed to a moderate decrease in egalitarian sentiments, which should be linked with the “honeymoon” period of the transition, when individuals’ hopes for the improvement of their personal material situation became more widespread ([Ziółkowski 1994](#)). It is well established that in later years egalitarian attitudes in Poland were in general on the rise ([Sadowski 2006](#)). In recent years inequalities have again found a bit more acceptance and this pattern is visibly correlated with the previous one: in times perceived as being “tougher,” people oppose inequalities more strongly. The differences are not that stark, however, and it is not clear if the age effect trumps the cohort effects. It seems that in general more young people tend to take liberal stances, but with time they cease to value opportunity over social security. This, as we may speculate, comes with establishing a family, gaining experience in occupational life, and possibly—simply aging. Perhaps, even, socialization to more dynamic and competitive job conditions worked both ways: some were convinced, while others started to long for a more secure situation. These

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<sup>4</sup> Small subsamples of 1957–1959 and 1970–1971 cohorts from the POLPAN waves surveyed in 1998 and 2003 ( $n = 181$ ) were combined and treated as an additional interpolation of the 2000 survey. The interpolation might seem risky, though the data is mostly coherent (e.g., of those negatively evaluating their situation in 1998 only 4% evaluated it positively in 2003).

Table 3

## Percent agreeing with the statement “Inequalities in Poland are too high”

Period	Birth cohort				
	1925–27	1946–48	1957–59	1970–71	1988–89
1987/88	80.4	82.7	82.5		
2000/01		91.0	95.5	89.4	
2019/20			78.1	72.9	69.7

assumptions, however, are made without controlling the respondent’s self-assessed material situation or job characteristics. It is important to take these and other correlates into account.

The statement on whether the inequalities are too high in all three surveys was used with a standard 5-point Likert scale. As this is *par excellence* an ordinal variable we turned to ordered logistic models (Table 4). This time the coefficients express ratios of odds of belonging to a certain category to the odds of belonging to a lower one. If a certain independent variable makes it more likely that the response will be higher, then the odds ratio is greater than 1. If the variable made the respondents agree less with the statement, the odds ratio was lower than 1. The higher the ratios, the more egalitarian—on average—the attitude. There is no single intercept term in an ordered logistic model and the four thresholds have been omitted in the table, as they only give information about the distribution of answers (which is much skewed toward rejection of existing inequalities). Geographical diversity in the answers (which is obviously significant) has been taken into account in the form of a random effect (not reported in the main table).

The first of the three models establishes only age, period, and cohort effects. It confirms the high rejection of inequalities at the turn of the millennium. Age does not significantly differentiate Poles in this respect, while the cohorts form a sequence with those more recently born being less egalitarian. However, in those “gross” effects, only the 1957–1959 cohort stands out significantly. The differences are further explored in Model 2, where a set of key predictors has been added. These include gender, urban-rural divide, education levels, self-evaluated material situation, and job in a private company. Women, people living in rural areas, those who are less educated, and those who view their own material standing negatively, were significantly more prone to reject inequalities. Not surprisingly, it is disadvantage that prompts egalitarian views. Working in a private company, in turn, seemingly encouraged a stance more accepting of inequalities, but the effect was not significant (curiously, there was virtually no difference between other working respondents and those who did not work). In the final model, we add the interaction between cohorts and the private sector job to uncover a significant, strong effect. We need to keep in mind that at the same time there is a large contrast between birth cohorts in regard to the share who work in private companies. It would seem that the gross estimates, which mixed different work situations, in fact concealed an important underlying inter-cohort difference. No such significant interaction was observed in the case of age.

The cohort effects, in the form of predicted fractions—computed as marginal effects—are presented in Figure 5. For easier interpretation, only answers signifying rejection of inequalities have been plotted. The black dots correspond to the answers of those work-

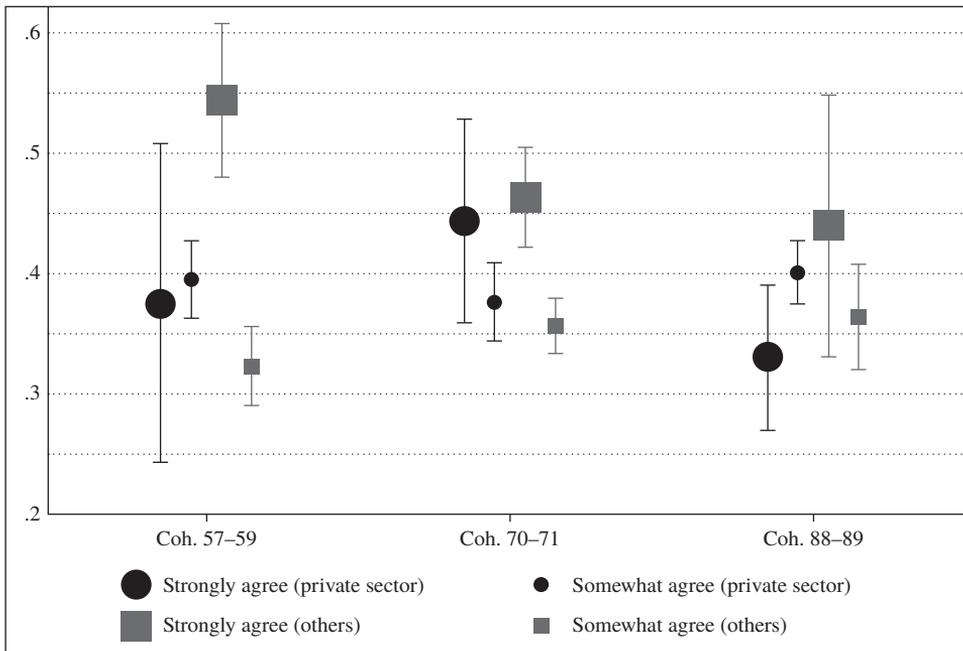
Table 4  
**Degree of accepting the statement: "Inequalities in Poland are too high" in mixed ordinal logistic models (5 categories, n = 2298)<sup>a</sup>**

	(1)			(2)			(3)		
	Odds ratio (SE)	Z	Sig.	Odds ratio (SE)	Z	Sig.	Odds ratio (SE)	Z	Sig.
Cohort 1988-89	0.76 (0.22)	-0.96	0.34	0.80 (0.23)	-0.78	0.44	0.89 (0.28)	-0.38	0.70
Cohort 1957-59	1.40 (0.24)	1.96	0.05	1.26 (0.22)	1.35	0.18	1.51 (0.29)	2.18	0.03
Period 2000/01	4.78 (1.30)	5.74	0.00	3.84 (1.06)	4.86	0.00	3.46 (0.98)	4.39	0.00
Period 1987/88	0.99 (0.41)	-0.02	0.98	0.87 (0.37)	-0.33	0.74	0.72 (0.31)	-0.75	0.46
Age 30-31	1.13 (0.34)	0.40	0.69	1.29 (0.39)	0.84	0.40	1.46 (0.46)	1.20	0.23
Women				1.41 (0.12)	3.95	0.00	1.34 (0.12)	3.29	0.00
Resident of rural area				1.33 (0.15)	2.48	0.01	1.37 (0.16)	2.70	0.01
Completed education: primary				0.95 (0.15)	-0.34	0.73	0.97 (0.17)	-0.19	0.85
Completed education: basic vocational				1.23 (0.14)	1.87	0.06	1.23 (0.14)	1.84	0.07
Completed education: secondary				(ref.)	(ref.)	(ref.)	(ref.)	(ref.)	(ref.)
Completed education: tertiary				0.57 (0.07)	-4.73	0.00	0.60 (0.07)	-4.32	0.00
Negative evaluation of material situation				1.77 (0.27)	3.72	0.00	1.96 (0.32)	4.14	0.00
Works in a private company				0.86 (0.08)	-1.55	0.12	1.08 (0.17)	0.51	0.61
Works in a private company * Cohort 1988-89									
Works in a private company * Cohort 1957-59									

<sup>a</sup> Random effects for municipalities and in case of data from the "Social structure II" and the POLPAN surveys for individual variance has been included. Those components of variance as well as the intercepts (four cut points) are not reported in the table.

ing in private companies while the gray squares represent the rest. In the case of the latter there seems to be a clear, almost linear pattern: in more recent cohorts people tend to reject inequalities less firmly (fewer people agree strongly with the statement and more agree somewhat). This trend of slightly higher tolerance of income disparities, though noticeable, does not prove a generational change, as it is not statistically significant. The second category plotted—those working in the private sector—shows a more substantial shift in attitudes. In the case of the 1957–1959 cohort the confidence interval is relatively wide and is partly due to the fact that relatively few people were working in the private sector in the 1980s. There is no doubt, however, that there was a significant drop in egalitarian attitudes between the 1970–1971 and 1988–89 cohorts. In the former there were significantly more people who strongly agreed with the statement on inequalities than those who somewhat agreed. In the latter cohort it was other way around. This illustrates the overall significant difference in the ordinal coefficients in Model 3 of [Table 4](#).

Figure 5  
Marginal effects (expected fractions) for agreeing with the statement:  
“Inequalities in Poland are too high”<sup>a</sup>



<sup>a</sup> Based on combined cohort effects from Model 3 in [Table 4](#).

These results suggest that substantially different job experience socialized the younger generation of Poles to display more tolerance toward the distributive outcomes of the capitalist system than was observed in their predecessors. The contrast is much less evident (and not significant) in the case of people functioning outside this sector of the economy.

All in all, we see that inter-cohort differences can mostly be explained by the changing nature of work and the labor market.

### Conclusions

When asked whether income inequalities in Poland are too high, 78.1% of those born in the late 1950s agreed, while 69.7% for those born in 1988 and 1989 agreed. In the international context, the difference can be compared with the difference between Polish society and the more economically liberal British society (see [ISSP Research Group 2017](#)). Significantly, after separating the cohort effect from the age and period effects, we have shown that the difference can not simply be attributed to age or *genius saeculi*. It seems that younger generations of Poles are indeed becoming less egalitarian as they make their living in the context of a well-established market economy. These results are to a degree consistent with what was found by Gonthier (2017) for 27 countries with ISSP data: younger generations are more economically liberal. However, while that study found mainly baby boomers to be distinctive in the international context, our study limits the significant contrast to millennials, and in particular those who work in private companies (the majority of them).

This result might be interpreted in terms of socialization effects. In particular, the reality of functioning within a private company, with a clearly established, uneven distribution of profit between the entitled owners and the employees, makes young Poles prone to accepting larger income discrepancies in the whole of society. It is possible that for people entering adulthood under socialism or on the eve of democracy, high inequalities were harder to accept simply because this was a new phenomenon—one suddenly arising before their eyes. The 1988–1989 cohort, in turn, entered social reality when the economic order was already well institutionalized and things that were not necessarily obvious to their parents had become more of a norm for them. Thus, at least for now, the 1989 generation does not seem inclined to rebel against the existing economic order (see [Sawulski 2019](#)). This seems to be in stark contrast with, for example, the US millennials who constituted the core of the Occupy Wall Street movement. Perhaps the Polish open-borders generation has a quite different reference point, as they compare with their parents much more favorably than is the case of their US counterparts.

We can point to some general implications of the observed patterns. Presumably, the patterns may be a sign that the Polish electorate will in fact become slightly less prone to support egalitarian policies in the future—given, of course, a good overall economic situation. We can see traces of such a change in detailed exit poll results; young Poles voted differently from older voters, and probably at least part of the phenomenon can be attributed to a cohort effect and not solely an age effect. Such a trend, however, will certainly not be abrupt because the wider acculturation to the “ways of capitalism” is partly countered by an inter-generational transmission of values. It is also important to bear in mind that the strongest effect of the three we measured was the period effect. All three generations are largely “flexible” in their thinking about the economic order. If we take, for example, the 1957–1959 cohort, its members were strongly egalitarian in 1987–1988 and had become even more egalitarian by 2000–2001. It could be said that the change was accompanied

by an actual rise in inequalities. However, in the 2019–2020 survey this cohort’s opposition to inequalities somewhat decreased, while there was no visible drop in inequalities (if anything, the contrary has been the case, see Brzeziński, Najsztub, Myck 2019). It was rather individuals’ positive perception of their material situation that played a key role in the shifts, not actual inequalities *per se*. This perception affected all three cohorts similarly; there were no significant interactions in this regard. Therefore, a note of caution is advised: the intergenerational differences should not be overstated. In a time of crisis all the generations might jointly re-evaluate their views, sometimes with lasting effect.

Additional research is undoubtedly needed to further verify a durable generational shift in economic orientations. In particular, another wave of inter-cohort survey that would allow further harmonization of the existing data could help to further explore the observed tendencies (more data points and observations are needed for more definitive results). Perhaps a survey in 15 years, when Poles born as EU citizens will be turning 30, would serve as yet another window of opportunity for conducting a harmonizable cohort study. Additional analyses of the existing data on Polish birth cohorts are needed as well, especially analyses taking into account a broader set of factors, including life-course changes with respect to family formation and different life orientations. If there were significant inter-cohort differences in other attitudes as well, it would provide even stronger support for the thesis concerning the distinctiveness of the “third generation” of the Polish transformation.

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### References

- Adamski, W.W. 1982. Structural and Generational Aspects of a Social Conflict, *Sisyphus. Social Studies. Volume III. Crises and Conflict. The case of Poland 1980–81*. Warszawa: PWN.
- Alesina, A., Fuchs-Schündeln, N. 2007. Good-bye Lenin (or not?): the effect of Communism on people’s preferences, *American Economic Review* 97(4): 1507–1528.
- Attias-Donfut, C., Arber, S. 2000. Equity and solidarity across the generations, in: C. Attias-Donfut, S. Arber (eds.), *The Myth of Generational Conflict. The Family and State in Ageing Societies*. London: Routledge, pp. 1–21.
- Becker, R., Blossfeld, H-P. 2017. Entry of men into the labour market in West Germany and their career mobility (1945–2008): A Long-term longitudinal analysis identifying cohort, period, and life-course effects, *Journal for Labour Market Research* 50: 113–130.
- Bengtson, V.L., Furlong, M.J., Laufer, R.S. [1974] 1983. Time, Aging, and the Continuity of Social Structure: Themes and Issues in Generational Analysis, *Journal of Social Issues* 39(4): 45–71.
- Białeck, I., Sikorska, J. 1982. In the Sphere of Human Needs and Aspirations, *Sisyphus. Social Studies. Volume III. Crises and Conflict. The case of Poland 1980–81*. Warszawa: PWN.
- Biggs, S. 2007. Thinking about Generations: Conceptual Positions and Policy Implications, *Journal of Social Issues* 63(4): 695–711.
- Blossfeld, H-P., Mills, M. 2010. How does globalization affect the life courses of young men and women in modern societies?, in: J.C. Tremmel (ed.), *A Young Generation Under Pressure? The Financial Situation and the “Rush Hour” of the Cohorts 1970 1985 in a Generational Comparison*. Heidelberg: Springer, pp. 37–55.
- Brzeziński, M., Myck, M., Najsztub, M. 2019. Reevaluating distributional consequences of the transition to market economy in Poland: new results from combined household survey and tax return data. *IZA*

- Institute of Labor Economics DP No. 12734. Available at: <http://ftp.iza.org/dp12734.pdf> (accessed on 15.09.2020).*
- Bukowski, P., Novokmet, F. 2017. Inequality in Poland: Estimating the whole distribution by g-percentile, 1983–2015. *WID.world Working Paper Series No. 2017/21*. Available at: <https://wid.world/document/bukowski-novokmet-poland-1983-2015-wid-world-working-paper-2017-21/> (accessed on 15.09.2020).
- Cavalli, A. 2004. Generations and value orientations, *Social Compass* 51(2): 155–168.
- CBOŚ. 2018. Materialne warunki życia. *Komunikat CBOŚ Nr 47/2018* (oprac. Małgorzata Omyła-Rudzka).
- Chase, I.D. 1991. Vacancy chains, *Annual Review of Sociology* 17: 133–154.
- Davis, J.A. 2002. Did Growing Up In The 1960's leave a permanent mark on attitudes and values? Evidence from the GSS, *GSS Social Change Report No. 48*, NORC, University of Chicago, September 2002.
- Diewald, M., Goedicke, A., Mayer, K.U. 2006. *After Fall of the Wall. Life Courses in the Transformation of East Germany*. Stanford: Stanford University Press.
- Dinas, E., Stoker, L. 2014. Age-Period-Cohort analysis: a design-based approach, *Electoral Studies* 33: 28–40.
- Down, I., Wilson, C.J. 2013. A rising generation of Europeans? Life-cycle and cohort effects on support for Europe, *European Journal of Political Research* 52: 431–456.
- Edmunds, J., Turner, B.S. 2005. Global generations: social change in the twentieth century, *The British Journal of Sociology* 56(4): 559–577.
- Eisenstadt, Sh. [1956] 2009. *From Generation to Generation: Age Groups and Social Structure*. New Brunswick: Transaction Publishers.
- Furlong, A., Goodwin, J., O'Connor, H., Hadfield, S., Hall, S., Lowden, K., Plugor, R. 2017. *Young People in the Labour Market. Past, Present, Future*. London: Routledge.
- Glenn, N.D. [1977] 2005. *Cohort Analysis*. Thousand Oaks: Sage.
- Gonthier, F. 2017. Baby boomers still in the driver's seat? How generational renewal shapes the dynamics of tolerance for income inequality, *International Journal of Sociology* 47(1): 26–42.
- Gough, H.G., Heilbrun, A.B. 1983. *The Adjective Check List Manual*. Palo Alto, CA: Consulting Psychologists Press.
- Green, A. 2017. *The Crisis for Young People Generational Inequalities in Education, Work, Housing and Welfare*. London: Palgrave.
- Grosfeld, I., Senik, C. 2010. The emerging aversion to inequality, *Economics of Transition* 18(1): 1–26.
- Heinz, W.R., Huinink, J., Weymann, A. (eds.). 2009. *The Life Course Reader: Individuals and Societies Across Time*. Frankfurt & New York: Campus.
- Heinz, Walter R. 2009. Youth transitions in an age of uncertainty, in: A. Furlong (ed.), *Handbook of Youth and Young Adulthood. New perspectives and agendas*. London: Routledge, pp. 3–13.
- Hillmert, S. 2010. Traditional inequalities and new insecurities: Long-term trends in the transition to the labor market in Germany, in: J. C. Tremmel (ed.), *A Young Generation Under Pressure? The Financial Situation and the "Rush Hour" of the Cohorts 1970 1985 in a Generational Comparison*. Heidelberg: Springer, pp. 57–76.
- Hillmert, S., Mayer, K.U. (eds.). 2004. *Geboren 1964 und 1971. Neuere Untersuchungen zu Ausbildungs- und berufschancen in Westdeutschland*. Wiesbaden, VS Verlag fuer Sozialwissenschaften.
- Huinink, J., Mayer, K.U. (eds.). 1995. *Kollektiv und Eigensinn. Lebensverlaufe in der DDR und danach*. Berlin: Akademie Verlag.
- ISSP Research Group. 2017. *International Social Survey Programme: Social Inequality IV—ISSP 2009*. GESIS Datenarchiv, Köln. ZA5400 Datenfile Version 4.0.0, <https://doi.org/10.4232/1.12777>.
- Kelley, J., Zagórski, K. 2004. Economic change and the legitimization of inequality: The transition from socialism to the free market in Central-East Europe, *Research in Social Stratification and Mobility* 22: 319–364.
- Kretsos, L. 2010. The persistent pandemic of precariousness: young people at work, in: J.C. Tremmel (ed.), *A Young Generation Under Pressure? The Financial Situation and the "Rush Hour" of the Cohorts 1970 1985 in a Generational Comparison*. Heidelberg: Springer, pp. 3–22.
- Luiten, A., Hox, J., de Leeuw, E. 2020. Survey nonresponse trends and fieldwork effort in the 21<sup>st</sup> Century: Results of an international study across countries and surveys, *Journal of Official Statistics* 36(3): 469–487.
- Mach, B.W. 2003. *Pokolenie historycznej nadziei i codziennego ryzyka. Społeczne losy osiemnastolatków z 1989 roku*. Warszawa: ISP PAN.
- Mach, B.W. and Matthews, B. 2005. Transformation Processes in Poland and East Germany, in: *Research Report 2003–2004*. Berlin: Max Planck Institute for Human Development, pp. 258–265.
- Mannheim, K. [1927] 1952. The Problem of Generations, in: P. Kecskemeti, (ed.), *Essays on the Sociology of Knowledge*. London: Routledge, pp. 276–322.

- Mayer, K.U. and Schultze, E. 2009. *Die Wendegeneration. Lebensverlaufe des Jahrgangs 1971*. Frankfurt: Campus Verlag.
- Milkman, R. 2017. A new political generation: Millennials and the post-2008 wave of protest, *American Sociological Review* 82(1): 1–31.
- Miyazaki, Y. and Raubenbush, S.W. 2000. Tests for linkage of multiple cohorts in an accelerated longitudinal design, *Psychological Methods* 5: 44–63.
- O'Brien, R. 2016. Model misspecification when eliminating a factor in age-period-cohort multiple classification models, *Sociological Methodology* 46: 358–372.
- Oseka, P. 2013. Elita „Solidarności”. Propozycja Komisji Krajowej, in: A. Friszke, K. Persak, P. Sowiński (eds.) „Solidarność” od wewnątrz. 1980–1981. Warszawa: IPN, ISP PAN, pp. 186–201.
- Ossowska, M. 1963. Koncepcja pokolenia, *Studia Socjologiczne* 2: 47–51.
- Ossowska, M. [1944] 1983. *O człowieku, moralności i nauce*. Warszawa: PWN.
- Pawlak, M. 2013. *Organizacyjna reakcja na nowe zjawisko*. Warszawa: University of Warsaw.
- Riley, M.W. 1973. Aging and cohort succession: interpretations and misinterpretations, *The Public Opinion Quarterly* 37(1): 35–49.
- Rodgers, W.L. 1982. Estimable functions of age, period, and cohort effects, *American Sociological Review* 47: 774–787.
- Rowlingson, K., Joseph, R., Overton, L. 2017. *Inter-generational Financial Giving and Inequality Give and Take in 21<sup>st</sup> Century Families*. London: Palgrave.
- Rychard, A. 1993. *Reforms, Adaptation and Breakthrough. The Sources and Limits to Institutional Change in Poland*. Warszawa: IFiS Publishers.
- Ryder, N.B. 1965. The cohort as a concept in the study of social change, *American Sociological Review* 30: 843–861.
- Sadowski, I. 2006. Egalitarne nostalgii: czy stosunek do nierówności dzieli Polaków?, *Studia Socjologiczne* 181(2): 23–52.
- Sadowski, I. 2012. Poza wiedzą i majątkiem. nierówności w kapitale społecznym w okresie transformacji systemowej, *Studia Socjologiczne* 205(2): 101–127.
- Sawulski, J. 2019. *Pokolenie '89. Młodzi o polskiej transformacji*. Warszawa: Wydawnictwo Krytyki Politycznej.
- Schelesky, H. 1957. *Die Skeptische Generation. Eine Soziologie der deutschen Jugend*. Düsseldorf/Köln: Eugen Diederichs Verlag.
- Słomczyński, K.M. 1998, 2008. *Struktura społeczna w Polsce. POLPAN 1998: komputerowy zbiór danych*. Zespół Porównawczych Analiz Nierówności Społecznych, IFiS PAN.
- Słomczyński, K. M., Białecki, I., Domański, H., Janicka, K., Mach, B., Sawiński, Z., Sikorska, J., and Zaborowski, W. 1989. *Struktura społeczna: schemat teoretyczny i warsztat badawczy*. Warszawa: Wydawnictwo IFiS PAN.
- Słomczyński, K.M., Domański, H., Sawiński, Z., Janicka, K., Tomesu-Dubrow, I. 2011. *Polski survey panelowy : POLPAN 1988–2008. Problemy teoretyczne i metodologiczne*. Warszawa: Wydawnictwo IFiS PAN.
- Szafranec, Krystyna, Domalewski, Jarosław, Wasilewski, Krzysztof, Szymborowski, Paweł, Wernerowicz, Marcin. 2017. *Zmiana warty. Młode pokolenie a transformacje we wschodniej Europie i Azji*. Warszawa: Scholar.
- The Economist*. 2019. Talkin' 'bout my generation. November 2<sup>nd</sup> 2019.
- Yang, Yang, Schulhofer-Wohl, Sam, Fu, Wenjiang J., Land, Kenneth C. 2008. The Intrinsic Estimator for Age-Period-Cohort Analysis, *American Journal of Sociology* 113: 1697–1736.
- Yang, Yang, Land, Kenneth C. 2013. *Age-Period-Cohort Analysis. New Models, Methods and Empirical Applications*. Boca Raton: CRC Press.
- Zagórski, Krzysztof. 2014. Warunki życia, postrzeganie konfliktów oraz postawy wobec demokracji i rynku, in: W. Adamski (ed.), *Fenomen „Solidarności” i zmiana ustroju : Polacy 1980–2011*. Warszawa: IFiS PAN, pp. 393–448.
- Zielińska, Maria, Szaban, Dorota. 2011. Metodologiczne problemy w badaniach pokoleń. Wybrane Zagadnienia, *Rocznik Lubuski* 37(2): 33–47.
- Ziółkowski, Marek. 1994. Pragmatyzacja świadomości społeczeństwa polskiego, *Kultura i Społeczeństwo* 4: 11–28.

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## Appendix A.

### Description of the sample and weighting in the 3GEN survey

The sample selection proceeded in two stages. At the first stage the procedure followed the design used in the 2000/01 study (see below), which means that the list of territorial units randomly selected in previous survey was also a starting point in 2019 (there was no major change of administrative division of Poland between the studies). In each of those units there have been individual people sampled randomly from the national PESEL registry. The CAWI subsample covered respondents belonging to harder to reach categories, i.e. young people from biggest Polish cities (which are intensive internet users, which created an effect of synergy). It was randomly taken from the large internet panel administered by “ARC Rynek i Opinia” (70 thousand users). Majority of interviews was conducted in November-January.

Fieldwork proved prolonged, especially as it was conducted during the elections and holiday seasons in Poland. There is a growing number of obstacles in conducting survey studies in recent years (see Luiten, Hox, deLeeuw 2020), while the sample was composed mainly of young, mobile people, which is one of the reasons response rate ended relatively low. What is also important, there were clear self-selection effects in non-respondents which were likely to cause bias in results. Individuals in the original sample can be categorized as: (a) unreachable, (b) unreachd, (c) refusals, and (d) successful interviews. The patterns involving those 4 outcomes of the fieldwork characterize some important tendencies in survey data collection. One of the issues in doing survey research in Poland is validity of official residence registry. While mandatory registration was to be abolished in 2016, it legally remained in force, while at the same time becoming increasingly ignored. A growing discrepancy between the official registry and actual places of residence seemingly impacts the outcomes of survey fieldwork. For example, we might expect that younger people, those more mobile and often living in rented places might be harder to reach. Indeed, 30% of the youngest cohort sample could be characterized as unreachable, compared with 22% of those in the oldest cohort. Those people were in most cases permanently absent at the addresses listed in PESEL. In effect, large portion of the sample has been forfeited without contacting designated respondents. Refusal rate was relatively high as well, and there were large differences in rates between cohorts and places of residence—it was about 50% in case of the oldest cohort living in the country, and almost 80% for the youngest and living

in large cities. The overall response rate ended up at 25%—this is partly due to the fact that reserve samples have been fully employed during the fieldwork to meet the deadlines, thus, inflating denominator. This puts the overall fieldwork efficiency much below the one in most elaborated scientific surveys (above 60% response rate in Polish edition of European Social Survey), yet close to many other surveys (like cyclic omnibus studies by CBOS, which at the time of the study shared a portion of pollster network with other agencies, including ARC).

Given the facts described above, some compensatory measures, like poststratification, seemed not merely an option, but rather a necessity. The weights have been estimated separately for each cohort and raking included 4 marginal distributions. One distribution involved level of completed education (primary, vocational, secondary, tertiary) while three other were joint distributions of having a job and gender, having a job and living in the town/city, and finally—gender and living in the town/city. All four characteristics have been related to particular group’s availability for survey interview. The resulting weights have been validated based on a conveniently available criterion—the declaration of voting. In late 2019 there had been parliamentary elections in Poland and during the survey respondents were asked to report on their vote. This provided an opportunity to compare survey distribution with age-specific vote distribution estimated using an exit poll results. In the largest subsample (1988/89 cohort) the raw estimated difference in five leading political parties was 5 percentage points on average (with two leading parties being overestimated—along with turnout—suggesting some degree of social desirability effect). However, when both the CAWI supplement and poststratification weights have been applied, the average discrepancy decreased to 2.9 percentage points. To put it differently—7.2% of declared voters would have had to be reallocated to other parties to get the distribution in line with the exit poll results. In the two smaller subsamples such measures did not yield the offsetting effect.

## Appendix B. Supplementary results

Table B1

**Prevalence of different kinds of contracts in a first job as compared with permanent contract in multinomial logit model**

	Fixed-term contract			No formal contract			Other		
	Coef. (SE)	t	Sig.	Coef. (SE)	t	Sig.	Coef. (SE)	t	Sig.
Constant (cohort 1970–71)	-0.315 (0.155)	-2.04	0.043	-2.120 (0.374)	-5.67	0.000	-1.569 (0.326)	-4.81	0.000
Cohort 1988–89	1.325 (0.208)	6.36	0.000	1.444 (0.472)	3.06	0.002	1.735 (0.350)	4.96	0.000
Cohort 1957–59	-0.942 (0.236)	-4.00	0.000	-0.450 (0.461)	-0.97	0.331	-1.979 (0.530)	-3.74	0.000
Period effect	-0.161 (0.198)	-0.81	0.418	-0.122 (0.461)	-0.26	0.792	-0.118 (0.382)	-0.31	0.757

Table B2

**Private sector job as first employment in binary logit model**

	Coef. (SE)	t	Sig.
Intercept (cohort 1970–71)	-0.378 (0.146)	-2.59	0.010
Cohort 1988–89	0.870 (0.177)	4.91	0.000
Cohort 1957–59	-1.864 (0.243)	-7.67	0.000
Period effect	-0.275 (0.183)	-1.50	0.135

Table B3

**Subjective evaluation of respondent household's material situation in binary logistic models**

	Bad (vs good & neither good nor bad)			Bad & neither good nor bad (vs good)		
	Odds ratio (SE)	Z	Sig.	Odds ratio (SE)	Z	Sig.
Intercept (ref.)	0.68 (0.30)	-0.87	0.39	14.14 (4.47)	8.37	0.00
Cohort 1988–89	1.67 (1.02)	0.84	0.40	1.32 (0.47)	0.78	0.44
Cohort 1970–71	0.74 (0.28)	-0.79	0.43	1.09 (0.20)	0.47	0.64
Period 2019/20	0.12 (0.07)	-3.55	0.00	0.05 (0.02)	-7.87	0.00
Period 2000/01	2.55 (1.08)	2.22	0.03	0.32 (0.08)	-4.60	0.00
Age 30–31	0.24 (0.10)	-3.43	0.00	0.38 (0.11)	-3.49	0.00