What kind of Welfare State do you prefer? An experiment on framing the social insurance scheme¹

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EXTENDED ABSTRACT NOT TO BE QUOTED

Abstract. To understand the coherence with citizens' social preferences of the design of reforms presently implemented by governments, we perform a between-subjects experiment in which we elicit preferences for different types of Welfare State. By focusing attention on alternative models of tax-and-transfer system financing the Welfare State, we test people's preferences for merit versus equality, in a scenario where low-skilled workers are penalized twice. In fact, we observe – especially in Italy – that they earn a low wage and have a high risk of loosing their jobs (i. e.: temporary workers). In order to collect this information, we design an experiment in which we present three different types of Welfare State. In each state, people pay taxes to finance two functions: insurance and redistribution. The taxation schemes vary among the three types. In the first type, we present a proportional system, in the second one an actuarially-fair system and in the third one a progressive system. At a first sight, what it turns out from our experiment is that people choose a specific state according to their expected performance. This could imply that preference either for merit or for equality is not due to ethical principles, but to expectations on one's own position in the society.

Key words: Welfare State, equality, insurance, redistribution, proportional system, actuarially-fair system, progressive system JEL CLASSIFICATION: C9, D31, D, 63, H26

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1. AIM OF THE PAPER

In the era of globalized markets, the idea of Welfare institutions providing income and in-kind support to "disadvantaged" individuals, is under scrutiny in recent years, both in economic literature and in the democratic deliberation by majority voting of advanced countries. Many papers have proposed models in which Welfare benefits present the unwelcome consequence of moral hazard behaviour, which jeopardizes market incentives to work and invest. Many governments are pursuing Welfare reforms, the objective of which is twofold. First, to retreat from universal coverage, by switching to "means-test" social protection. Second, to complement public institutions of mutual risk sharing with private provision of Welfare (e.g., private pensions, quasi-market health care, "welfare accounts", etc.) aimed at strengthening personal responsibility in coping with the microeconomic risks (e.g., the probability of long term unemployment, poverty) through private insurance contracts.

To more deeply understand the coherence with citizens' social preferences of the design of reforms presently implemented by governments, we perform a between-subjects experiment in which we elicit preferences for different types of Welfare State. By focusing attention on alternative models of tax-and-transfer system financing the Welfare State, we test people's preferences for merit versus equality, in a scenario where low-skilled workers are penalized twice. In fact, we observe – especially in Italy – that they earn a low wage and have a high risk of loosing their jobs (i. e.: temporary workers). In order to collect this information, we design an experiment in which we present three different types of Welfare State. In each state, people pay taxes to finance two functions: insurance and redistribution. The taxation schemes vary among the three types. In the first type, we present a proportional system, in the second one an actuarially-fair system and in the third one a progressive system.

2. THE EXPERIMENT

In each session of our experiment we inform the *n* participants that: (i) they have to perform an ability task (Raven's Progressive Matrices); (ii) the risk exposure of each participant is linked to the ability exhibited in the performance; (iii) they will be grouped in three categories on the basis of their relative scores; (iv) depending on the category in which each participant was included as an effect of his performance, they are exposed to a "low", "medium", or "high" risk to incur in a "bad event". The scheme works as follows. The best n/3 subjects will belong to the first category – the

rich². They will be endowed with a gross income of 300 tokens and they have a probability equal to 40% to loose 80 tokens. The second n/3 subjects will belong to the second category – the middleclass. They will be endowed with a gross income of 200 tokens and they have a probability equal to 50% to loose 80 tokens. The worst n/3 subjects will belong to the third category – the poor. They will be endowed with a gross income of 100 tokens and they have a probability equal to 60% to loose 80 tokens. Then, we present the three kinds of Welfare State³ and we ask subjects to rank them according to their preferences.

While the participants' earnings and risk exposure are linked to ability, each of the tax-and-transfer systems we propose in order to elicit their preferences corresponds to a "social contract" implementing one of three different models of Welfare State. We define each model of Welfare State according to the "principle of justice" to which it could broadly be traced back:

1) "*Pooling*" *Welfare State*. This contract reflects the "paternalistic State" willing to provide social insurance by levying proportional taxes and protecting citizens on an equal basis from the probability to be hit by negative events. Therefore, the State abides by "equal treatment", as heterogeneity across citizens in terms of their different probability of "disadvantaged" conditions, stemming from their different exposure to negative events, is not take into consideration;

2) Individualistic Welfare State. This contract aims at the implementation of the system of mutual risk insurance which is the most efficient from the viewpoint of the direct proportionality of taxation stand endured by each individual to his own degree of risk of incurring in negative events. The tax-and-transfer system is then oriented to an "actuarially-fair" Welfare State, so to avoid that the high-risk individuals' greater use of the Welfare institutions be paid by the low-risk individuals. In this "individualistic" vision of the Welfare State, those who are more likely to benefit from the Welfare institutions must bear their cost to a larger extent; 3) *Prioritarian Welfare State*. This contract aims at fostering "social cohesion" among citizens, by devising the tax-and-transfer system capable to carry out the Principle of Justice which gives "priority" to the worst-off individuals. Hence, the individuals who are most exposed to the risk of a negative event stand a lower burden of the Welfare State (in terms of the difference between taxes paid ex ante and expected benefits to be obtained ex post). This contract reflects the real world in that a low ability exhibited by a subject is likely to determine both a low income *and* a high risk exposure to negative events. Hence, the rationale of this type of Welfare State is to prevent that the complementarity across dimensions of life could further worsen the well-being of a "disadvantaged" individual.

The three taxation schemes perform as follows. In the first one we have a proportional taxation. We impose a 30% tax rate for each subject. Then, subjects that belong to the first (second, third)

² Obviously, we do not use terms like "rich", "poor" or "Welfare State" in the instructions. We use neutral terms

³ In the next sub-section we present in detail these three schemes.

category pay 90 (60, 30) tokens. The second system is the "actuarially-fair" one. Taxation is based on the risk subjects' face to loose the 80 tokens. Then, the rich pay 32 tokens (0.4*80), the middleclass people pays 40 (0.5*80) tokens and the poor pay 48 (0.6*80) tokens. Moreover, in order to reinforce the sustainability of the state, each subject is taxed by a 10% tax rate. Then, subjects that belongs to the first (second, third) category pay 30 (20, 10) tokens. The total amount paid by subjects that belong to the first category (second, third) is 62 (60, 58) tokens. In the third system we have a progressive taxation. The rich are taxed by a 35% tax rate and pay 105 tokens. The middleclass people are taxed by a 30% tax rate and pay 60 tokens. The poor are taxed by a 15% tax rate and pay 15 tokens.

In each Welfare State the tax revenue is used to implement two functions. The first one is to fully refund people that loose a part of their income. ⁴ Secondly, the remaining part of the tax revenue is equally redistributed among all participants.

Before performing the task, we ask players to predict the category they will belong to – we pay them if the prediction is correct. At this point, participants start to perform the task. At the end of that they are informed about the category they belong to. Then, we ask them to re-rank the three kinds of Welfare.

At the end, they cast a ten-face dice. If the number is lower then five (six, seven) for subjects that belong to the first (second, third) category 80 tokens are lost. On the basis of a Borda-count electoral system, we select the preferred Welfare State in each session and we pay subjects. Finally, they fill-in a socio-demographic questionnaire.

The experiment has been programmed by Marie Edith Bissey and has been performed in the laboratory at the University of Turin. We ran three sessions with 63 participants (21 per session). The value of each token was 0.08 euro. The correct prediction for the category has been paid 1 euro and the questionnaire 3 euro. The average gain was 15 euro.

3. EXPECTED RESULTS

We perform two within-subjects treatments, as in our experiment people state two times the rank for Welfare State schemes. The first one under the veil of ignorance – they don't know their relative score, they simply declare their expectation about that – and the second one after that they know their rank.

⁴ Please notice that, since a function of the Welfare State is full insurance, the individual effect of losing 80 tokens is exclusively indirect: a reduction of the pot for redistribution.

Starting from a simply economic consideration, we expect that subjects choose the taxation scheme that maximizes their expected income – in the first choice stage – and their real income – in the second one. This means that the rich will choose the actuarially fair system. In fact they have a net income of 238 tokens (plus the expected level of redistribution⁵) under this scheme, while under proportional (progressive) taxation the net income is 210 (195) tokens. At the same time, the expected choice is symmetrical for the poor. In fact, they earn 85 (70, 42) tokens under the progressive (proportional, actuarially fair) system.

The net income for people that belong to the middle class is always equal to 140. Then, there is no economic reason to choose the preferred scheme. In this case we will be able to test the preferences for merit versus equality.

Obviously, we expect that they people change their choice if the prediction is in contrast with the real result.

4. PRELIMINARY RESULTS

Result 1. The preferred Welfare State under the veil of ignorance is the actuarially fair state, while, as soon as participants know their rank, the progressive system is slightly preferred.

Result 2. People's preference for a particular state may be explained by their expected/real performance. In fact, under the veil of ignorance, the actuarially fair state is mostly chosen by participants who think that they will end in the first category – the rich. By contrast, the progressive system is chosen by people who think that their performance will be the poorest one. Without the veil of ignorance, this tendency holds. Most of the rich choose the actuarially fair system, while the progressive one is chosen by the poor. Most of people who switch to a different contract when the veil of ignorance drops, actually chose the system that guarantees the highest earning.

Result 3. People who forecast under the veil of ignorance that they will end in the middle-class group, slightly prefer the actuarially fair state.

5. PRELIMINARY COMMENTS

At a first sight, what it turns out from our experiment is that people choose a specific state according to their expected performance. This could imply that preference either for merit or for equality is not due to ethical principles, but to expectations on one's own position in the society.

⁵ The expected level of redistribution is the same under the three systems