

Choosing Who Lives our Life

Luca Stroppa

Stockholm University

Abstract

The relationship between Parfit's theory of Personal Identity and his research on Population Ethics is underexplored. In this paper I both examine this relationship and support the principle stating that it is moral to cause the greatest total wellbeing. Once introduced the basic concepts of Population Ethics and Parfit's theory of Personal Identity, I report Parfit's distinction between *Different Number Choices*, that affect both the number and the identity of future people, and *Same Number Choices*, that affect only future people's identity. Parfit underlines how, in *Different Number Choices*, it is doubtful whether someone ought to cause a higher average or a higher total of good. Assuming Parfit's theory of Personal Identity I argue that personal choices such as choosing between possible careers determine the chooser's future identity: such choices are thus *Same Number Choices*. Since personal choices can influence a life's length and enjoyed wellbeing, *Same Number Choices* share with *Different Number Choices* the dilemma of choosing between higher average and higher total of good. In the final part of the paper I support the principle of total good by suggesting that the crucial objection against it, called *Quality Condition*, seems to be valid only for populations too big to be correctly compared and violates a rule that seems obvious in small populations. The equivalent of the *Quality Condition* in *Same Number Choices* seems to be valid only for amounts of times too big to be correctly compared and violates an obvious prudential rule in short times.

Keywords: Population ethics, Personal identity, Total principle, Quality condition, Derek Parfit.

1. Introduction

Among the many themes explored in Derek Parfit's *Reasons and Persons* the two more discussed by the philosophical community probably concern Personal Identity and Population Ethics. Surprisingly, the debate concerning Parfit's conclusions on the permanence of Personal Identity in time is completely detached from any discussion concerning Population Ethics. By joining the two discussions, in this paper I will blur the distinction between what Parfit calls *Same Number Choices* and *Different Number Choices*, introduced in 2.2, since both kinds of choices share the dilemma between highest total welfare and higher average welfare.

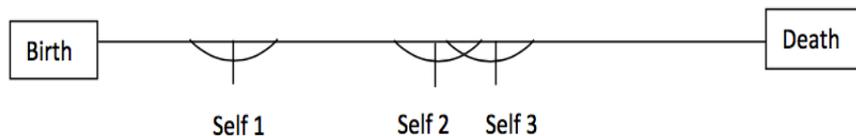
Since theorems demonstrate that this dilemma is unsolvable for *Different Number Choices* without violating some set of very appealing condition, it is reasonable to worry that there can be equivalent theorems for *Same Number Choices*. I will challenge the reliability of one of the allegedly appealing conditions, namely the one ruling out the principle of the highest total welfare. I will argue that this condition seems valid only when considering number of people or amounts of time we struggle to compare, but not when considering numbers we do not struggle to compare.

In order to understand why *Same* and *Different Number Choices* share the same theoretical problem the reader must first be introduced to, or reminded of, how Parfit defines Personal Identity through time, what are the different kinds of choices that influence the identity of future people and what are the moral principles that give guidance to an agent in each kind of choice identified by Parfit. That is the purpose of section 2. The goal of section 3 will be to show that *Same* and *Different Number Choices* are more similar than Parfit assumed. The goal of section 4 is to support the principle of higher total welfare. I conclude by summarizing the paper in section 5.

2. Personal Identity and Three Kinds of Choices in *Reasons and Persons*

2.1 Continuity and Connectedness

According to Parfit, the persistence of a person in time is psychological continuity and connectedness. A person X at time t1 is psychologically connected with a person Y at time t2 when X and Y share enough psychological traits, such as memories, desires, ideals, affections and so on. A person X at time t1 is psychologically continuous with a person Y at time t2 when there are overlapping chains of connectedness between X and Y (Parfit 1984: 206). In the diagram below is shown a representation of a normal person's life according to Parfit's theory.



The straight line that goes from Birth to Death represents Psychological Continuity. There are overlapping chains of connectedness linking most moments of an average person's life, thus a person at a certain time is usually psychologically connected with the previous moment of her existence; therefore a person is usually psychologically continuous within her lifetime. Since we have different psychological features in different moments of our lives, according to Parfit there is an alternation of successive selves within our life.

In line with this theory, moreover, normally we are *not* psychologically connected within our whole lifetime. The points of the line marked as Self 1, Self 2 and Self 3 are three moments during the life of a person. Self 1 has psychological features different from Self 2, whose psychological features are different from Self 3. The arches around the segments mark all the moments within which each Self is connected. For example, Self 2 is connected to some extent with Self 3, but is

not connected at all with Self 1. This means that Self 2 shares some psychological traits with Self 3, but none with Self 1. We can imagine Self 2 as the reader now, Self 3 as who the reader might be in a month and Self 1 as the reader at the age of two.

2.2 Three Kinds of Choices

In analyzing how choices can impact identity Parfit argued that, if the conception of someone had happened sooner or later than when she was in fact conceived, the cells involved in the birth would have been different, and therefore a different person would have been born.¹ It seems furthermore uncontroversial that a person would have never existed if she was not conceived by her parents (for example because they never met). Our choices can thus affect the identity of future people as well as the number of people that will exist: a couple that chooses to have a child, for example, adds thereby a further person to the total of existing people. We can thus affect both the identity and the number of future people. Parfit distinguishes three kinds of choices with respect to future people.

The first kind of choices are *Same People Choices*. Neither the number nor the identity of future people are affected by the consequences of such choices. According to Parfit most of our moral thinking is about these choices, but “such choices are not as numerous as most of us assume” (Parfit 1984: 356). In 3.1 I will extend Parfit’s arguments to argue that almost no morally relevant choice is a *Same People Choice*.

Choices whose consequences affect the identity of future people, but not their number, are called *Same Number, Different People Choices* (henceforth *Same Number Choices*). A couple that decides to postpone the conception of a child due to momentarily unstable economic conditions is an example of this kind of choice.

Finally, *Different Number, Different People Choices* (henceforth *Different Number Choices*) are choices whose consequences affect both identity and number of future people. This kind of choices is the main interest of Population Ethics.

Consequentialism prescribe that the morally right alternative in a choice is the one producing more good. What are the consequentialist principles helpful for each kind of choice?

2.3 Choices and Principles

Individuating a helpful principle for *Same People Choices* does not seem to present great theoretical difficulties. Parfit calls it

The Person-Affecting View, or *V*: It will be worse if people are affected for the worse (Parfit 1984: 370).

This principle is not applicable in the other two kinds of choices. In order to understand why, consider for example the following *Same Number Choice*:² a 14-year-old girl who wants to have a baby. Let us call this future baby John. The girl is very young, so it is very likely that John will have a bad start in life which will affect his adult life. However let us suppose that, despite the bad start in life, John’s life would be worth living. If the girl waits some years before conceiving,

¹ A defense of this claim can be found in Parfit 1984: 351-55.

² This example is taken from Parfit 1984: 358, with slight changes.

she would have a different child, called for example Jack, to whom she would presumably be able to give a better start in life.

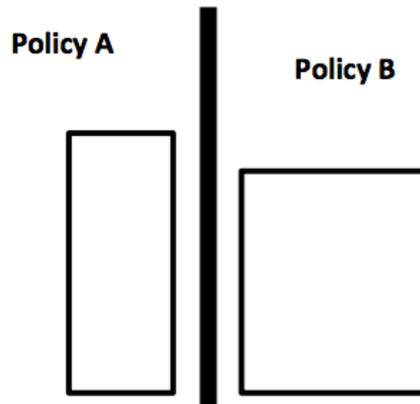
When considering what is best for the child we have no arguments for convincing this girl not to have John by appealing to V . If the girl has a baby now she will harm no child because John's life will predictably be worth living and, given that Jack would not exist, he cannot be harmed either.

In both scenarios a child would not exist and the life of the other would be worth living: neither choice affects any child for the worse. According to Parfit, in order to convince the girl to wait before conceiving a child, or in order to make any *Same Number Choice*, we must not rely on V , but rather on

The Same Number Quality Claim, or Q: If in either of two possible outcomes the same number of people would ever live, it would be worse if those who live are worse off, or have a lower quality of life, than these who would have lived (Parfit 1984: 360).³

Parfit claims that V is fit for *Same People Choices* but unfit for *Same Number Choices*. He claims that Q is fit both for *Same People* and for *Same Number Choices*,⁴ because in *Same People Choices* Q coincides in fact with V . Q is a general principle, of which V is a particular specification in a small number of occasions.

Parfit notices that Q cannot help in *Different Number Choices*. Suppose for example that a policymaker has to make a choice between two policies. The outcomes of the two policies are shown by the two rectangles below. Their width represents the number of lives generated by the policy. The height represents their welfare.



All lives generated by Policy A are better than lives generated by Policy B. Could this fact be morally outweighed by the fact that in Policy B there are significantly more people?

³ Someone might think that, instead of Q , we might appeal to some system of rights, or to some version of Contractualism. We cannot, since it is hard to believe that people that will never exist have rights, or might agree to a contract. For discussions on this matter see Parfit 1984: 364-66, 391-93, 490-93.

⁴ As I will make clear in 3.3, I think Q would be fit only in a minority of *Same Number Choices*.

Q does not help with this dilemma. *Q* does not state if the existence of more people makes a policy morally better than another. Since we cannot rely on *Q*, we need a principle more general than *Q*: a principle reliable in *Different Number Choices*, that presumably coincides with *Q* in *Same Number Choices* and with *V* in *Same People Choices*.

Finding a theory reliable in *Different Number Choices* is the aim of Population Ethics. More generally, Population Ethics has been defined as the field of philosophical moral reasoning that seeks “an adequate theory of population value where [a] the number of people, [b] their welfare, and [c] their identities may vary” (Arrhenius and Campbell 2017).⁵

In Population Ethics, by population it is meant any set of lives. A life’s welfare is how much one person’s life enjoys of what makes life worth living. It is assumed that lives’ welfares can be compared and can be positive, negative or neutral, thus the sentence “person A’s life is better off than person B’s” can be restated as “person A’s life has a higher welfare than person B’s life”.⁶ The assumptions concerning identities should be clear by now. I henceforth endorse all these assumptions.

2.4 Principles for *Different Number Choices*

The two most intuitive candidates for being the best principle of Population Ethics guiding in *Different Number Choices* are the *Average* and *Total Principles*. They have been defined as follows:

Impersonal Average Principle: If other things are equal, the best outcome is the one in which people’s lives go, on average, best (Parfit 1984: 386).

Impersonal Total Principle: If other things are equal, the best outcome is the one in which there would be the greatest quantity of good (Parfit 1984: 387).

It has been noticed that the *Impersonal Average Principle* has morally absurd implications. The most striking is the violation of the following, extremely plausible principle:⁷

The Non-Sadism Condition: an addition⁸ of any number of people with positive welfare is at least as good as an addition of any number of people with negative welfare, other things being equal (Arrhenius 2000: 64, 203).

The *Non-Sadism Condition* is part of a set of conditions that, according to Arrhenius, any satisfactory theory for Population Ethics should respect in order to be acceptable.⁹ To my knowledge, all thinkers of Population Ethics agree with Arrhenius on the truth of the *Non-Sadism Condition*.

⁵ The letters [a], [b] and [c] are my addition.

⁶ This is Arrhenius’ terminology. See Arrhenius 2000: 6-12 for further explanations on the choice of the term “welfare”.

⁷ It has been demonstrated that the *Average Principle* violates the *Non-Sadism Condition* in Arrhenius 2000: 63- 64.

⁸ The expression “adding people” means “causing to exist more future people”.

⁹ The complete list of conditions can be found in Arrhenius 2000: 202-204.

On the other hand, the *Impersonal Total Principle* implies

The Repugnant Conclusion: For any possible population of [...] ¹⁰ people, all with a very high quality of life, ¹¹ there must be some much larger imaginable population whose existence, if other things are equal, would be better, even though its members have lives that are barely worth living (Parfit 1984: 388).

Arrhenius identifies the intuition behind *the Repugnant Conclusion* with the following adequacy condition:

The Quality Condition: There is at least one population of people all having the same very high welfare which is at least as good as any population with very low positive welfare, other things being equal (Arrhenius 2000: 41). ¹²

Many thinkers of Population Ethics, and Parfit among them, tried to find a principle of Population Ethics better than the *Average* and the *Total Principles*. Some thinkers, such as Gustaf Arrhenius, suggested that a principle helpful in *Different Number Choices* cannot be found, due to theorems demonstrating that no theory for Population Ethics can respect some set of appealing adequacy conditions. Others, such as Torbjörn Tännsjö and Michael Huemer, accepted the *Repugnant Conclusion*. In the final part of the paper I will side with Huemer and others by challenging the plausibility of *the Quality Condition*.

All concepts necessary to understand the paper have now been introduced to the reader. Let us now focus on a set of *Same Number Choices* whose implications have been overlooked by the literature.

3. A Common Dilemma

3.1 Choosing Who Lives our Life

Let us consider

Alexander's choice. In high school Alexander was very good in chemistry while developing an interest in medicine to the point of considering the possibility of becoming a physician. The first day after finishing high school he receives an appealing job offer to work abroad on a platform extracting natural gas. He is free from any constraint in choosing between accepting the job offer or going to university and studying medicine.

Suppose now that twenty years have passed from the moment in which Alexander made his choice. He might have become a physician or a natural gas industry worker. In twenty years the people Alexander will spend time with, his bag of memories, knowledge, feelings and mental dispositions will be different.

Alexander the Physician is psychologically continuous with the Alexander of 20 years before, but he is not psychologically connected with him. The same is true of Alexander on the Platform. On the other hand, Alexander the Physician

¹⁰ In Parfit's original formulation: "any possible population of at least ten billion people".

¹¹ Parfit's expression "quality of life" is equivalent to what is here called "welfare".

¹² It has been demonstrated that *the Total Principle* implies *the Repugnant Conclusion* in Arrhenius 2000: 49-51, while the demonstration that *the Quality Condition* implies avoidance of *the Repugnant Conclusion* is in Arrhenius 2000: 205-206. I take both logical relations to be sufficiently intuitive to be omitted here.

is *not* psychologically continuous *nor* psychologically connected with Alexander on the Platform, and *vice versa*. They are not connected since they share few or no psychological features, and they are not continuous since overlapping chains of strong connectedness between them do not exist. They are mutually exclusive selves: only one can exist. This means that Alexander, when choosing his career, is making a *Same Number Choice* as much as the 14-years-old girl was doing in 2.3. Alexander chooses who exists and who does not, even without generating a child.¹³

Choices such as Alexander's are not uncommon. Everyone makes choices about their friendships, loves, hobbies, the places where they spend time and so on. All these choices, some of which are made daily, affect to some extent our future selves.

Any choice that affects the identity of future selves is a *Same Number Choice*. It is hard to think of a morally relevant choice that does not affect any future self except perhaps some cases concerning a person close to death, at least given a consequentialist perspective: all other cases of morally relevant choices I am able to conceive affect the future life of the agent or someone else's life.

Given that so many choices concerning the life of individuals are *Same Number Choices* and not *Same People Choices*, we must conclude that *Same People Choices* are very few, so few that it is not useful for the purpose of this paper to analyze them further.

It is only important to remember that, as shown in 2.3, *V* is unfit for all choices that are not *Same People Choices*. Since all choices that are not *Same People Choices* are the majority of relevant choices (at least for Consequentialism), *V* should be considered unfit for the majority of the morally relevant choices.

Let us now examine a more theoretically interesting case of *Same Number Choices* and the extent to which *Q* can help in it.

3.2 Q in Same Number Choices

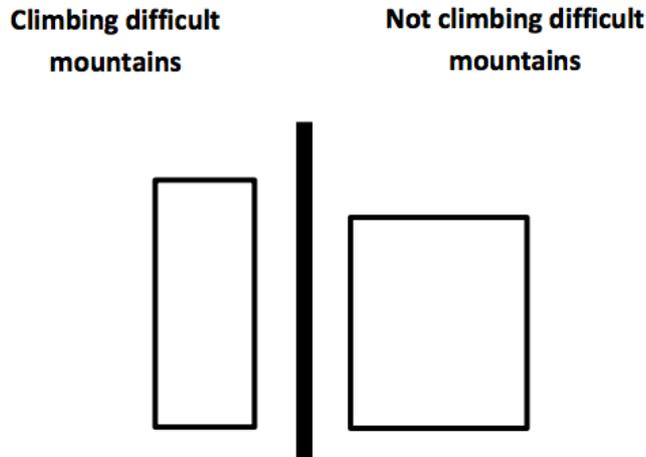
Imagine

The Climber's Choice. A person finds out that she loves climbing mountains.

This hobby becomes very important for her. The more the mountain is difficult, the more she enjoys climbing it. She is aware that, unfortunately, she has a higher chance to die climbing difficult mountains. She is wondering if she should avoid difficult mountains, in order to lower the death risk. This would make her hobby less enjoyable.

Should the Climber make this choice? The two blocks below represent the most likely outcomes of her choices. The width of the squares is the length of her life and the height of the squares represents her welfare. For simplicity, let us assume that, for the Climber, the only thing that makes a life worth living (that is to say, the only things that makes welfare positive, negative, high, low or zero) is climbing mountains. Again, for simplicity, let us assume that every moment of the Climber's lifetime will have the same welfare.

¹³ The 14-years old mother's choice presumably influences a future identity to a greater extent than Alexander's choice. However, since both choices influence a future identity they are both *Same Number Choices*.



All moments of the life generated by the choice of climbing difficult mountains are better than the moments of the life generated by the choice of not climbing difficult mountains. Could this fact be morally outweighed by the fact that, if the climber does not climb difficult mountains, she lives longer and still enjoys her life?

In 2.3, when evaluating the *Different Number Choice* between a Policy A and a Policy B, we raised a question with analogous features: “All people’s lives generated by Policy A are better than people’s lives generated by Policy B. Could this fact be morally outweighed by the fact that in Policy B there are significantly more people?” The analogy is due to the fact that, in order to answer both questions, we have to understand whether we should aim for the highest total welfare or highest average welfare. We might need to rely on a third principle, different from both the *Total Principle* and the *Average Principle*, but anyway such third principle cannot be *Q* for *Different Number Choices* nor for all *Same Number Choices* which resemble *the Climber’s Choice*.

This means that *Q* is less fit for solving *Same Number Choices* than is assumed in the literature, and leads to ask to what extent, if at all, is *Q* reliable for solving *Same Number Choices*.

3.3 Lack of Information: A Suspicious Friend of *Q*

Let us return to *Alexander’s Choice*. We have no way to know whether this choice raises the dilemma between total and average welfare, since it is difficult to state if becoming a physician will lead Alexander to live a longer or shorter life than working in the natural gas industry. Likewise, it is unclear whether becoming a physician will let Alexander enjoy a higher or lower level of welfare than working in the natural gas industry.

Nevertheless, it is very likely that (1) Alexander the Physician and Alexander on the Platform will enjoy different things in their lives (thus they will probably experience a different welfare), and it is unlikely that (2) they will have exactly the same lifespan. *Alexander’s Choice* might be a choice between a life with a higher total welfare and a life with a greater average welfare. It is possible that, had Alexander known how his lifespan would have been affected by his choice, *Q* might

have been unfit also for *Alexander's Choice*, and a theory for deciding between total and average welfare might have been required instead.

Since (1) is very likely and (2) is very unlikely it follows that a theory for deciding between total and average welfare is required in *Alexander's Choice* and all choices alike, if not in practice at least in theory. If we always knew the length of the possible lifespans, it would be immediately clear that *Q* is unfit in all *Same Number Choices* in which the lifespan is affected differently by the different alternatives - that is to say, in the greatest majority of the *Same Number Choices*.

Since we very often do not know how the alternatives affect the lifespans, or since sometimes, once we knew the difference in lifespans, this difference might be irrelevant, in our practical use of morality we may still heavily rely on *Q*. This does not make *Q* a completely reliable principle. A reliable principle should plausibly give more precise advice when more information is available. Instead, whoever uses *Q* happening to have more information about lifespans and welfare will find that *Q* gives no answer as to what ought to be done. We need therefore a theory for deciding between total and average welfare. Such a theory would help in *Same* and *Different Number Choices* and would coincide with *Q* in the *Same Number Choices* where *Q* is reliable.

Given my analysis, the line between *Same Number* and *Different Number Choices* gets to some extent blurrier. In fact, since in one alternative the Climber lives longer, there will come a time when her choice will have made a difference in the number of existing people: if she chooses to climb high mountains there will be one person less than if she chooses not to climb high mountains. Choices like *the Climber's Choice* can be considered somehow between *Same* and *Different Number Choices*. Since, if we knew all the facts, the greatest majority of *Same Number Choices* would be like *the Climber's Choice*, it might be stated that the greatest majority of *Same Number Choices* are actually *Different Number Choices*.

Still, I maintain Parfit's own distinction in this paper. Interpreting the greatest majority of *Same Number Choices* as akin to *Different Number Choices* seems to me perfectly equivalent to classifying them in a new group of choices with features similar to *Different Number Choices*. In order to decide whether or not to classify them directly in this latter group we would need to know to what extent the length of a life can be made akin to the number of existing people in the history of a population. I now conclude section 3 with an initial exploration about similarities and differences of our moral intuitions concerning individual lives and populations.

3.4 Similarities and Differences between People and Populations

A moral theory helpful in *Different Number Choices* should be able to compare the value of populations in which [a] the number of people, [b] their welfare, and [c] their identities may vary. Similarly, a moral theory helpful in *Same Number Choices* like *Alexander's Choice* or *the Climber's Choice* should be able to compare the value of individual choices where an individual's [a] amount of lifetime moments, [b] welfare and [c] identity may vary. Both choices share the dilemma of choosing between an *Average* and a *Total Principle*, or some compromise principle between the two. However, I do not want to suggest that there is necessarily a complete equivalence. There are differences in the common intuitions concerning the two kinds of choices. I point out two of them as an example.

A first difference is that, when considering lives' lengths, there are intuitions suggesting that a long life is better than a short one: a life's duration seems to have value *per se*. On the other hand, there are no intuitions suggesting that a population's dimension has value *per se*: a small population, intuitively, is not necessarily better or worse than a big population.

A second difference is that some would say that we value diversity in population, whereas we have no intuition concerning diversity in an individual's life. Some would find alienating a population in which a large number of people share the same behaviors, tastes and opinions: some want that each individual expresses herself or himself in a unique way and prefer diversity in a population. No similar intuition is found for what concerns the life of people: once the individual is an adult there seems to be no intuition on whether or not she should change her behavior or set of beliefs.

Of course, these intuitions might not be trustworthy. For example, a long life seems to be worse than a short life if each moment of both lives is at some level of negative wellbeing: if this is true, longevity *per se* has no value. Nevertheless, people do have intuitions suggesting that a long life is preferable, but not necessarily a large population, and a diversity is preferable in society, but an individual which is different at different times of his life is not necessarily preferable. This might mean that there are different intuitions concerning individual lives and populations. Such intuitions might make a difference when evaluating adequacy conditions in *Same Number* rather than *Different Number Choices*.

In this paper I do not examine whether these intuitions make a difference, are to be trusted or if there are other intuitions of this kind. A full examination of similarities and differences between the kinds of choices is important but would be too long to be included in this paper. The aim of part 3 was merely to underline some similarities between *Same* and *Different Number Choices*, without arguing that there is necessarily full similarity.

4. An Argument on Information Quantity

4.1 The Relevance of the Similarity and the Argument on Large Numbers

The main contribution of Arrhenius 2000 to Population Ethics are the six theorems demonstrating that it is impossible for a theory for *Different Number Choices* to fully respect some set of very appealing conditions. Due to the theorems, the similarity between *Same* and *Different Number Choices* raises some concerns for morality, because the adequacy conditions for a theory helpful in *Same Number Choices* might be perfectly analogue to the adequacy conditions for a theory of Population Ethics. This implies that there might be theorems similar to Arrhenius' that are valid for *Same Number Choices*. This is worrying, because it would mean that it might be impossible to have a consequentialist theory for the greatest majority of morally relevant choices that does not violate at least one very appealing adequacy condition. We have thus to hope that one of the adequacy conditions is more controversial than it seems.

To my knowledge, Arrhenius' *Non-Sadism Condition* has been accepted by all theorists, and thus no thinker supports the *Average Principle*. On the other hand, there are some thinkers supporting the *Total Principle* and thus rejecting the *Quality Condition*.

One of the arguments used by Michael Huemer and John Broome to support the acceptance of *the Repugnant Conclusion* can be summarized as follows:

- P1. People underestimate the value of enormous populations because, after a certain threshold, all numbers of people strike our imagination in the same way. For example, our concern about knowing that a million or a billion people are suffering is undistinguishable, but it should obviously be much greater in the latter case.
- P2. There are very many people in *the Repugnant Conclusion's* population with lower average welfare.
- C. People underestimate how good *the Repugnant Conclusion's* population with lower average welfare is.¹⁴

This argument is incomplete. Huemer's and Broome's version of the argument provides good reasons to believe that we should value the population with lower average welfare existing in *the Repugnant Conclusion* more than what our intuitions suggest, but it gives no reason to believe that the value of such population should be *higher* than the value of the population with higher average welfare. Sure, we fail to appreciate how good is a very large population with low positive welfare, but *why* do we have a reason to think that we would not find *the Repugnant Conclusion* repugnant if we could appreciate it?¹⁵

I will now give support to *the Total Principle* in *Same Number Choices* with an analogue version of Broome's and Huemer's argument. However, my argument deals with the limit just highlighted.

4.2. The Valuable Moments Condition

The majority of thinkers reject *the Total Principle* since it violates:

The Quality Condition: There is at least one perfectly equal population with very high welfare which is at least as good as any population with very low positive welfare, other things being equal. (Arrhenius 2000: 41).

I will attempt to deny the adequacy condition analogous to *The Quality Condition* in *Same Number Choices*. I call it

The Valuable Moments Condition. There is at least one set of lifetime moments with very high welfare in an individual's life which is at least as good as any set of lifetime moments with very low positive welfare in an individual's life, other things being equal.

I will not be able to demonstrate that the *Valuable Moments Condition* is obviously wrong, but I will show how there are good reasons for doubting its truth.

In order to understand if the *Valuable Moments Condition* is a good adequacy condition for a theory helpful in *Same Number Choices*, we need to find a set of lifetime moments with very high welfare which may be at least as good as any set of lifetime moments with very low positive welfare.

¹⁴ See Huemer 2008: 908-909 and Broome 2006: 58 and 212-13.

¹⁵ I have been informed that Andreas Mogesen wrote a currently unpublished paper where he provides a deeper analysis supporting the claim that the argument on large numbers, as stated by Huemer and Broome, is insufficient to support the Repugnant Conclusion.

The *Valuable Moments Condition* can be satisfied only when the amount of lifetime moments with very high welfare is large. In fact nobody would agree that, for example, a person should prefer a single minute of extremely good wellbeing to that of three years of lower wellbeing (but higher total wellbeing). If a person would be willing to do so, she would be labeled imprudent. This is valid also with lengths that are still relatively small but bigger than the minute: given that more total welfare is experienced in the first amount of time than in the second, no one would describe as prudent to sacrifice, for example, four years of low positive wellbeing for a day of extremely good wellbeing or forty years of low positive wellbeing for a year of extremely good wellbeing. Not sacrificing long periods of life worth living for short periods of life very worth living seems like an obvious axiom of prudence, at least if the total welfare is higher in the long periods of life.

If relatively small amounts of time at a very high welfare do not satisfy the *Valuable Moment Condition*, we obviously need some bigger amount of time at a very high welfare. This brings two problems.

The first problem is that, for the *Valuable Moment Condition's* plausibility, we need some explanations about why the condition does not work with amounts of times below a certain threshold and why it should work with amounts of time above it.

The second problem is that, as we have difficulties imagining enormous populations, we also have difficulty in grasping the value of great amounts of time. I shall now proceed to justify this claim.

People have no difficulties in evaluating short amounts of time, and thus decide that certain activities are worth some relatively short amount of time but not some other amount. For example, a person might be willing to build a chair for one day, but, if she finds out that building it requires two weeks, she would just buy it instead.

On the other hand, comparing alternatives concerning much longer amounts of time is way more difficult. A person that is willing to make sacrifices for a certain high number X of years for a certain aim would be willing to make the same sacrifices for indefinitely more time as well, given that she has the energy to do so. Let us say that X is for example 40 years: if a person would make sacrifices for 40 years in order to have a happy family or to complete an artwork, she would also be willing to make the same sacrifice for the same goal for 70 or 100 years. Since an effort endured for a hundred years must clearly have a different value than if it is endured for 40 years, but we cannot recognize that difference, we conclude that we struggle grasping the value of great amounts of time.

The reader might be skeptical about my example in which $X = 40$ years, and I cannot rule out that a counterexample consisting in an activity a person would do for 40 years but not for 100 years can be found. However the existence of a threshold X is difficult to deny: there is nothing we would do for 100 years but not 300,¹⁶ if we had the capability.

The *Valuable Moments Condition* claims that there is some set of lifetime moments at a very high level of welfare that is better than *any* set of lifetime moments

¹⁶ Considering numbers as big as 300 year or more is not inappropriate. Remember that for the *Valuable Moment Condition* there is at least one set of lifetime moments with very high welfare in an individual's life which is at least as good as *any* set of lifetime moments with very low positive welfare in an individual's life. The universal "any" clearly includes times much bigger than the usual duration of a life.

at a very low welfare. We established that the set of lifetime moments at very high welfare satisfying the condition is very great. Let us now enquire whether we should rely on this condition by examining how the uncertainty concerning the value of great amounts of times can arise. There are two possible ways in which our intuitions may get blurry when the lifetime moments increase.

In the first possibility, a specific amount X of lifetime moments that is the threshold above which all moments seem to have approximately the same value. If the amount of time that makes the *Valuable Moment Condition* plausible to our intuition is X years or more, we have reasons to distrust the *Valuable Moment Condition*. In fact, the condition does not appear valid when the amount of time at very high welfare is small enough for us to appreciate its value, whereas the condition appears valid when the amount of time is too big to appreciate its value.

The second possibility is that, for numbers lower than the threshold X , the uncertainty is proportional to the increase of lifetime moments: we have clear ideas with small amounts of time, but our intuition gets gradually more confused as the amount of time increases. If this is so there might be some set of lifetime moments Y ($Y < X$) that, according to people's intuition, would satisfy the *Valuable Moments Condition*, and the value of Y might be perceived to be different from the value of an amount of time X bigger than Y . For example, people may believe that 25 years at very high welfare are enough to satisfy the *Valuable Moment Condition*, and there is some kind of activity they would do for 25 but not 40 years. However, I find (very) implausible that these people know the value of Y as precisely as the value of smaller amounts of times, as a couple of weeks are. So, again, we should distrust the *Valuable Moment Condition*: the value of the amount of lifetime moments for which *the Valuable Moments Condition* seems plausible to our intuition is not as clear as the value of the amounts of lifetime moments for which *the Valuable Moments Condition* seems implausible.

In both cases we distrust the *Valuable Moments Condition*, since it gains appeal only with amounts of time whose values we struggle to grasp. We should suspect that the reason why this condition might be valid for big amounts of time but not with small amounts of time is that we cannot correctly appreciate the value of the former amounts. The *Valuable Moments Condition* seems unreliable: it must be demonstrated, and not posed as an uncontroversial adequacy condition.

4.3 Large Populations and Lack of Information

Remember that, according to Huemer and Broome, people should accept *the Repugnant Conclusion* (and thus reject *the Quality Condition*) because people underrate the value of very large populations. Their argument, summarized in 4.1, provides no reason to believe that the larger population in the Repugnant Conclusion is necessarily more valuable than the smaller but, in analogy with my argument in 4.2, the argument can be improved by recognizing two facts. The first fact is that, when considering the value of small populations, the application of *the Total Principle* seems unproblematic.

The second fact is that, while our intuitions get blurry when considering very large populations, they seem way clearer when considering small populations. Given that we should be skeptical of our intuitions concerning very large numbers and given that our more trustworthy intuitions support *the Total Principle*, we should distrust *the Quality Condition* since it might appear true only when considering large numbers.

In order to support my claim that, when considering the value of small populations, the application of *the Total Principle* seems unproblematic, consider the following. It is commonly admitted that, if the first set of people's lives has a higher total welfare but much lower average welfare than the second, we should prefer adding to an existing population¹⁷ two persons to a single person, or ten persons to three persons, or fifty persons to ten persons. This works with arguably any other sets of small populations.

Why should this not be admitted with populations that, being much bigger, are harder to conceive? A condition that violates rules valid for small numbers might work on very large numbers just due to our difficulty of comparing them. This makes *the Quality Condition* certainly controversial.

Given that *the Quality Condition* does not work for numbers that we can grasp, its appeal with numbers that we struggle to compare is very suspicious. The version of Huemer and Broome's argument proposed in this paper is therefore that a condition working exclusively with numbers we cannot grasp, but not working with numbers we can grasp, seems unreliable. Thus, we distrust the repugnance of *the Repugnant Conclusion*.

5. Conclusion

In this paper I showed how, if Parfit's theory of Personal Identity is true, the set of *Same Number Choices*, that are choices affecting the identity of future people but not their number, includes the choices that we perform when we decide how to live our lives (that is, when we decide the careers we pursue, the friendships we have, the places we attend and so on). This is because this kind of choices affects who will be our future self.

I furthermore showed that *Same Number Choices* share with *Different Number Choices*, which are choices affecting both identity and number of future people, the dilemma of choosing between an outcome with greater total good and one with greater average good. The distinction between the two kinds of choice is thus less definite than assumed in the current literature.

Arrhenius' theorems demonstrate that no theory can solve the dilemma between average and total good in *Different Number Choices* without violating some set of very appealing condition. The similarity between *Same* and *Different Number Choices* is thus worrying, because Arrhenius' theorems might have analogues in *Same Number Choices* as well.

I challenged a *Same Number Choices* version of *the Quality Condition*, one of Arrhenius' conditions. According to my version of the condition "there is at least one set of lifetime moments with very high welfare in an individual's life which is at least as good as any set of lifetime moments with very low positive welfare in an individual's life, other things being equal".

I objected this condition since it works only in sets of lifetime moments too big to be correctly compared in value, and it violates a rule that seems obvious in small sets of lifetime moments: such rule disapproves sacrificing long periods of life worth living for shorter periods of life very worth living, if the total of what

¹⁷ Not admitting it leads to implausible conclusions, such as Arrhenius' *Reversed Repugnant Conclusion* (Arrhenius 2000: 54) or the fact that it would be always wrong to cause a happy child to exist if the child's existence lowers the family's average welfare.

makes life worth living is bigger in the long period. I also challenged Arrhenius' *Quality Condition in Different Number Choices*, according to which "there is at least one perfectly equal population with very high welfare which is at least as good as any population with very low positive welfare, other things being equal", with an analogous argument.¹⁸

References

- Arrhenius, G. 2000, *Future Generations. A Challenge for Moral Theory*, Dissertation for the Degree of Doctor of Philosophy in Practical Philosophy presented at Uppsala University, Sweden.
- Arrhenius, G. and Campbell, T. 2017, "The Problem of Optimal Population Size", in Fleurbaey, M. (ed.), *International Panel on Social Progress 1st Annual Report*, <https://www.iffs.se/media/22124/the-problem-of-optimal-population-size-arrheniuscampbell.pdf>
- Broome, J. 2006, *Weighing Lives*, Oxford: Oxford University Press.
- Huemer, M. 2008, "In Defence of Repugnance", *Mind*, 117, 468, 899-933.
- Parfit, D. 1984, *Reasons and Persons*, Oxford: Oxford University Press.

¹⁸ I am very grateful to Gustav Alexandrie, Rikard Berg, Margarita Chudnovskaya, Ciro Luigi De Florio, Romy Eskens, Federico Faroldi, Jacopo Freri, Aldo Frigerio, Meradjudin Kahn Oidermaa, Giuliana Mancuso, James O'Brien, Guido Tonella and the two anonymous referees for their valuable comments, discussions and suggestions. This work is influenced by the teachings of Krister Bykvist and Renato Pettoello, and I owe them my thanks. Finally, I wish to thank my family and friends for their emotional support during the writing of this paper. This paper is dedicated to the memory of Maurizio Fiorani.