

The Behavioural Public Policy Cube

Abstract

Behavioural economics – the study of human decision making and how it sometimes deviates systematically from the assumptions of standard economic theory – has attracted a lot of attention in the health policy discourse over recent years. Many appear to believe that behavioural economic findings can be used only to help inform policies that manipulate the choices made by citizens; i.e. so-called nudge policy. However, these findings can be used to inform several different policy frameworks, from seemingly innocuous liberty-preserving changes to the contexts people operate in, to the outlawing of certain corporate behaviours. This article depicts diagrammatically, with the aid of a ‘behavioural policy cube’ and in relation to smoking cessation interventions, the conceptual parameters of several behavioural economic-informed policy frameworks, which could be easily extended to other areas of health, and indeed broader public, policy.

Introduction

Over recent years, partly due to the popularity and influence of Thaler and Sunstein's book, *Nudge*, behavioural economics has gained a prominent place in the health – and broader – policy discourse [1]. This should be no surprise, because behavioural economics is really nothing more than the enquiry into how people make decisions, which is presumably of interest to policy makers across the ideological spectrum. More specifically, behavioural economics can be thought of as the set of observations that demonstrate that human decision making often conflicts systematically with the assumptions of standard economic theory.

Behavioural economic findings that are perhaps among the most worthy of consideration among policy makers include present bias, loss aversion, probability weighting and reciprocity. Present bias is the observation that people place a heavy weight on the immediate moment, and quickly discount all future moments, which can make it difficult to predict what people will prefer in the future on the basis of their stated preferences now. For example, Read and van Leeuwen present evidence that people will often choose healthy over tastier unhealthy snacks if they are asked to pre-commit to their choices for consumption at some future date, but many will prefer to switch to the unhealthy snacks at the point of consumption [2]. Loss aversion is the finding that people often care about losing something far more than they do about gaining that same thing, and probability weighting is the tendency for people to overweight small probabilities and underweight large probabilities.

That human beings are at least sometimes motivated by reciprocity rather than entirely self-regarding utility maximisation has been repeatedly demonstrated in ultimatum games, in which 'donors' are given a money amount and are asked to allocate a share of the amount that they are given to an anonymous recipient. If the recipient accepts the share, then both donor and recipient go home with those respective allocations, but if the recipient declines then both parties go home with nothing. According to standard economic theory, the donor should offer a very small share because he ought to want to

retain as much of the money as possible and, for the recipient, anything ought to be better than nothing. It is not untypical for donor offers to exceed 40% (see, for example, [3]), partly because donors know that they will be punished by recipients if they make an offer that may be considered insulting, a finding that is linked to transaction utility – i.e. the joy that people feel when they receive a good deal and the pain that they experience when they are exploited [4].

Behavioural policy frameworks

The above are just some, albeit some of the most important, of the behavioural economic phenomena. As an input into policy deliberations they can be used in a variety of ways. To date, the most influential behavioural economic policy framework has been that advocated by Thaler and Sunstein, formally called libertarian paternalism and colloquially known as nudge policy [1]. Nudges require a redesign of people's environments according to the findings of behavioural economics such that their instantaneous choices are more likely to align with their deliberative preferences. Thus, the focus is on reducing negative externalities – the longer term harms that people impose on themselves through their own ill-considered automatic decisions, which may be driven by factors such as present bias (i.e. smokers may focus on the immediate pleasurable sensation offered by cigarettes, and overlook the long-term negative consequences). In a nudge, there should be no burden on those who choose their pre-existing behaviours rationally and thus wish to continue with those behaviours, and therefore the approach does not allow regulation or bans, and it also rules out using significant financial incentives and overt persuasion to change behaviour.

Three core features of libertarian paternalism are presented in Figure 1. Movement towards a on the ab axis indicates that a policy is increasingly liberty-preserving and antiregulatory, movement towards a on the ae axis indicates that a policy is increasingly informed by behavioural economics rather than standard economic theory, and movement towards a on the ad axis indicates that a policy is increasingly addressing externalities

rather than externalities (i.e. actions that cause harms imposed on others). Consequently, policies that lie on the adhe cube face are entirely liberty preserving, those on the abcd face are heavily informed by behavioural economics, and those on the baef face entirely address internalities. A classic nudge, satisfying all three requirements fully, must lie at the point at which the aforementioned axes intersect, at point a in Figure 1. A health-related example of such an intervention is the requirement that supermarkets hold their cigarettes behind the checkout counter rather than display them on aisle shelving; the customer remains free to buy cigarettes, but one could argue that their positioning behind the checkout makes them less likely to invade the customer’s immediate and automatic decision making mental apparatus (i.e. present bias), which may be good for many of those who might otherwise buy the cigarettes, as judged deliberatively by those persons themselves.

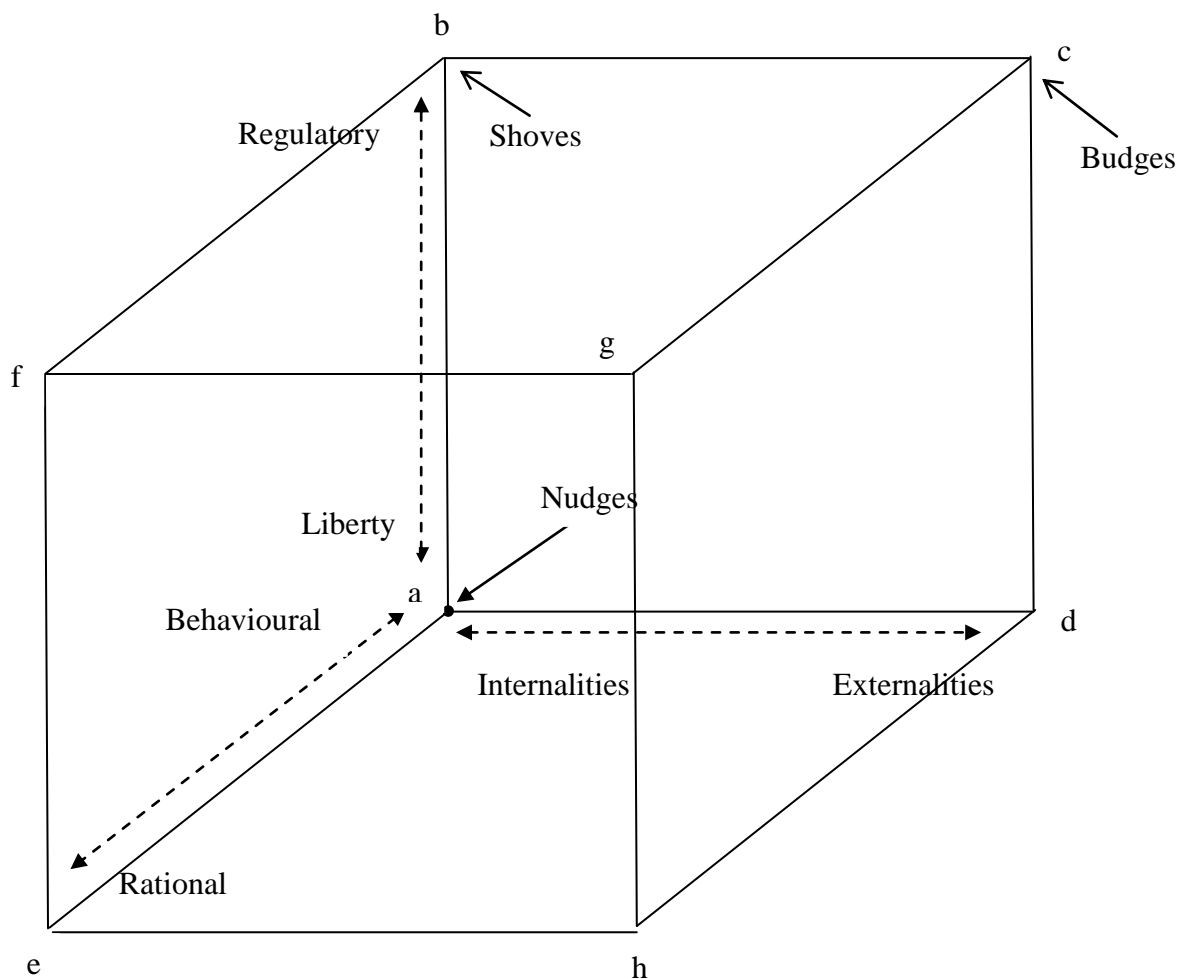


Figure 1: The Behavioural Public Policy Cube

Libertarian paternalism is known as a soft form of paternalism because it claims to respect autonomy. Conly outlines a harder form of paternalism that is also informed by the findings of behavioural economics in that she concurs that people engage in many self-harmful behaviours due to bounds on their rationality in their automatic choices, but by retaining autonomy she dismisses nudge policy for being insufficiently effective [5]. Conly calls for coercive paternalistic measures in the form of the explicit regulation of individual behaviours in cases where the broadly considered benefits of the regulation to the individuals themselves are perceived to outweigh the broadly perceived costs. Following this logic, she calls for a ban on smoking, because she contends that one of the fundamental goals for all human life is the maintenance of health. Coercive paternalistic measures are sometimes referred to as shoves.

The basic tenets of coercive paternalism can also be represented in Figure 1. As with nudges, shoves are informed by behavioural economics in that they aim to counter errors, caused by, for instance, present bias, in individual behaviours, and is also focused on addressing internalities: i.e. on protecting people from themselves. Unlike libertarian paternalism it calls for strong regulatory measures, and thus a classic shove, such as a ban on smoking in Conly's justification, would be placed at the intersection of the aforementioned axes at point b in Figure 1.

For many, shoves entail too much interference in personal lifestyle choices; yet nudges have been further criticised for being manipulative and for potentially crowding out more effective regulatory measures [6]. Rather than (or perhaps in addition to) turning to regulating the behaviours of citizens, however, one can use behavioural economics to help inform the appropriate regulation of private corporations. Behavioural economic-informed regulatory interventions of the supply side are known as budes [7].

Budge policy focusses on countering the profit maximising behavioural economic informed harmful manipulation of consumers by private organisations by openly

regulating against these activities. For example, it is likely that the type of packaging that cigarette manufacturers have traditionally used for their products was chosen so as to attract customers; implicitly, they have used one of the findings of behavioural economics – i.e. present bias – in order to capture the immediate attention of potential clientele. If policy makers and public opinion concurred that this practice is harmful in encouraging people to smoke who might otherwise have not done so, then mandatory plain packaging of cigarettes may rightly be classified as a budge. That is, it would be a regulation to counter implicit behavioural economic-informed measures used by private interests that impose externalities, otherwise known as harms, upon others.

The fundamental requirements of budge policy can also be depicted in Figure 1. As with nudges and shoves, budges are informed by the findings of behavioural economics. Budges use this knowledge to counter with regulation the inappropriate, if implicit, use of these findings by private interests as a means by which to maximise profits in harmful ways. Thus, budges would cluster around the intersection of the axes at point c in Figure 1. Also in common with nudges and shoves, budges will of course attract critics; in particular, business interests, often with powerful lobby arms, will be motivated to emphasise the possible negative economic growth and innovation implications of additional regulation, illustrated in the UK context by the tobacco companies, who had some success in stalling regulation for plain packaging on cigarette cartons.

Conclusion

Behavioural economics is the study of human behaviour, and its findings can be used to inform usefully many different policy frameworks, all of which will nonetheless attract critics. For instance, nudge policy can be accused of being covert, manipulative and insufficiently effective, shove policy of being overly intrusive in personal lifestyle choices, and budge policy of damaging legitimate business interests.

Pure types of each policy framework have been diagrammatically depicted in Figure 1. Most actual policies will not fall at a, b or c, but will rather be placed inside the cube. For example, even if we take only the internalities to externalities axis, the justification for behaviourally-informed smoking cessation policies is likely to be in part motivated by a concern for the smokers themselves, but also for others that may fall victim to second-hand smoking. Thus, with respect to smoking cessation, few policies are ever likely to be a pure nudge (or a pure shove), strictly defined, irrespective of what government rhetoric might suggest.

This is important, because nudge policy has formed the focus of attention in the behavioural economic-informed policy dialogue in several country contexts over recent years, to the extent that many, in academic and policy circles, now seem to equate erroneously behavioural economic policy with nudging. If scrutinised, it will be discovered that many policies that are being advocated as nudges, in smoking cessation policy, broader health policy, and even broader public policy, are actually nudges, and perhaps even shoves. Populating the behavioural policy cube with these policies will be informative, and will help to ascertain the extent to which government pronouncements and action in this increasingly important policy area are aligned.

Figure 1: The Behavioural Policy Cube

References

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