Letters to the Editor


J Antimicrob Chemother 2012
doi:10.1093/jac/dks025
Advance Access publication 8 February 2012

Comment on: Ethical dilemmas in antibiotic treatment

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Keywords: medical ethics, principlism, utilitarianism

Sir,

Leibovici et al.1 are addressing very important issues regarding the ethical dilemma in antimicrobial stewardship, such as the central question: whether we could and should value benefits in the distant future for an identified patient. However, some aspects in the argumentation by Leibovici et al.1 are problematic: (i) overlapping use of two ethical frameworks, i.e. utilitarianism and principlism; (ii) justifying the use of cost-effectiveness studies by only one ethical framework; and (iii) other ethical solutions to deal with this dilemma exist.

(i) Generally, the use of different theoretical frameworks in approaching an ethical dilemma is to be encouraged because different frameworks may result in different solutions. But, importantly, one has to resolve inconsistencies that arise from using different frameworks. The two ethical approaches used by Leibovici et al.1 are principlism and utilitarianism. Principlism is based on the four moral principles of autonomy, beneficence, non-maleficence and justice. In contrast, the single goal of utilitarianism is to maximize ‘total utility’. The weakness in this article lies in emphasizing cost-effectiveness studies as a tool justified solely by utilitarianism while simultaneously relying on a principlistic framework. However, these two frameworks are mutually exclusive, because utilitarianism only allows one moral principle: maximizing total utility. On the other hand, principlism does not allow one of its four principles to become absolute. Thus, if cost-effectiveness studies are used as a normative instrument justified by utilitarianism, this conflicts with this tenet of principlism.

When using cost-effectiveness as an operationalization of utilitarianism, respect for patient autonomy and justice is no longer a concern, as long as violations of patient autonomy and justice do not lead to a heavy loss of overall utility. The reason for this is that, in contrast to principlism, respect for autonomy and justice have no intrinsic value in utilitarianism.

There are multiple theories of utilitarianism, however, and some modern versions of preference utilitarianism, e.g. the theory of Gesang,3 take secondary preferences, such as moral preferences, into account. If, for example, many persons wish to live in a healthcare system that always respects patient autonomy and demands informed consent, the current practice of antimicrobial stewardship would lead to a severe loss of utility, rendering the practice immoral from a utilitarian point of view. Thus, the concept of utility in utilitarianism is broader than just medical benefit.

(ii) Leibovici et al.1 note that ‘The inclusion of cost-effectiveness together with the most quoted principles of bioethics looks strange.’ While it is easier to argue for cost-effectiveness within a utilitarian framework, cost-effectiveness as a means to solve an ethical dilemma can be supported by principlism as well. In fact, Beauchamp and Childress5 discuss cost-effectiveness as part of the principle of beneficence. What they point out, though, is that such quantitative methods may only function as auxiliary means in ethical decision-making and must not become a surrogate for decision-making. The important difference is that all four principles have to be specified and balanced. Moreover, if using principlism, the exception to the rule that Leibovici et al.3 introduced in the case of life-threatening scenarios would not have to be an exception. It would be just a specification of the principle of non-maleficence, which very likely would have gained enough weight in principlistic balancing to be morally preferred to all other courses of action. So, the same result might have been possible in the argumentation without mixing conflicting ethical approaches.

(iii) One could further ask if there is no possibility of reconciling the duties of non-maleficence or beneficence for unidentified patients with the duty of respect for autonomy for the actual patient. We suggest three considerations. First, analogously to tacit consent when being treated in a teaching hospital (possibly by junior doctors and residents) someone treated with antibiotics tacitly consents to non-maximum empirical treatment, as long as there is no life-threatening situation. Secondly, informed patients might accept non-maximal empirical coverage because of ethical reasoning. Thirdly, one could consider that nowadays, respect for patient autonomy already does not include the duty to do everything that a patient wishes. Specific broad-spectrum antibiotics might, as Leibovici et al.1 suggest, be regarded as a ‘scarce’ resource when being used for empirical treatment, and thus, these antibiotics would represent a treatment restricted to those needing it most, e.g. in transplantation.

In summary, restricting universal coverage in empirical treatment can be justified within various ethical frameworks. Cost-effectiveness analysis as a measure to solve the ethical dilemma can be used in a utilitarianistic or principlistic ethical framework. In order to assess the dilemma in the patient–doctor relationship, empirical studies should be conducted addressing what patients would accept in terms of non-maximal
empirical antibiotic coverage in the context of potentially saving the lives of future, non-identified patients.

**Transparency declarations**

None to declare.

**References**