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OCCASIONAL
P A P E R

A Prize Worth Paying?

Non-standard ways to
support and reward excellence
in health research and
development in the UK NHS

Tom Ling

2008

Prepared for the Department of Health funded Centre
for Policy Research in Science and Medicine (PRISM)

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Preface

This is a short paper scoping the issues involved in considering the merits of using prizes to support the objectives of the Department of Health Research and Development Directorate (DH R&D).

This document has been produced by RAND Europe's Department of Health research unit: PRISM (Policy Research in Science and Medicine), which works on the science of science. PRISM aims to provide research, analysis and advice to support the effective implementation of the Department of Health's research strategy, and to improve research to support decision making more widely in the health research sector.

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Summary

This is a short paper scoping the issues involved in considering the merits of using prizes to support the objectives of the Department of Health Research and Development Directorate (DH R&D). The paper concludes that there is indeed merit in developing incentives to support excellence in health research in addition to ‘standard’ performance management and routine inspection. These could act either to reinforce the signals created by standard metrics (for example, awards recognising the best performers as measured by standard metrics) or they could ‘fill the gaps’ to encourage behaviour not influenced by conventional incentives. This would create an ecosystem to more effectively link reward with motivation, which could deliver benefits for patients and the health care system more widely. Prizes, it is argued, should play a more significant role in the UK health R&D system than in the past but it is not suggested that they replace existing systems to support high-quality research and development.

This is a short paper looking at the issues involved in considering the merits of using prizes to support the objectives of the Department of Health Research and Development Directorate (DH R&D). Reviewing the use of performance measures and incentives, it concludes that there is merit in developing non-standard incentives to support excellence in health research in addition to ‘standard’ performance management and routine inspection. These could act either to reinforce the signals created by standard metrics (for example awards recognising the best performers as measured by standard metrics) or they could ‘fill the gaps’ to encourage behaviour not influenced by conventional incentives. This would more directly link reward with motivation, and could deliver benefits for patients and the health care system more widely. Prizes, it is suggested, should play a more significant role in the UK health R&D system than they have to date but it is not suggested that they should replace existing systems to support high-quality research and development.

The paper is divided into three parts. In Chapter 2 we consider the use of performance measures and incentives more generally and note that, although helpful in many respects, they are incomplete. In Chapter 3 we look at non-standard incentives and in Chapter 4 we consider how these could apply to the case of health research and development, concluding that ‘the prize is right’. This is a scoping paper identifying potential benefits but is not a detailed policy appraisal and the arguments here should be seen as a stimulus for debate rather than a developed position.

CHAPTER 2 **The use of metrics and incentives in standard performance management**

To understand why prizes might play a more important role in the health and healthcare R&D ecosystem, it is first necessary to consider the limitations of more standard instruments of performance management. ‘Standard instruments’ are the metrics (typically following the ‘balanced scorecard approach’ developed by Kaplan and Norton) that identify important measurable targets, measure performance and use appraisal and incentives to steer behaviour towards these. In our view, these are fundamental to the efficient running of accountable and improving public services. However, they also have limits relating to the potential gap between aggregated metrics and context-rich culturally shaped motivations. These limitations leave a space for non-standard mechanisms to flourish.

Standard instruments in health R&D reflect wider trends in results-based management. Results-based management has become a prominent feature in the public and not-for-profit sectors in the UK. Across government in particular, departments, non-departmental public bodies and arm’s-length bodies increasingly need to demonstrate that they understand what their organisations are doing and what they have achieved. Furthermore, it is argued, by creating incentives that reward the pursuit of measurable desired outcomes, performance management can align the activities in an organisation to its strategic goals. The theory of change implicit in this is that if goals are quantified and the contribution to these goals measured and rewarded, then activities will be aligned.

Inevitably, results-based management has given rise to a need for more performance data. Varying systems and approaches have developed to marshal the massive amounts of internal performance data being generated by organisations. One of the most high-profile of these in the UK was the report *Choosing the Right FABRIC*, published jointly by the Treasury, Cabinet Office, National Audit Office, Audit Commission and Office for National Statistics in 2001.¹ The main goal of such approaches is to fashion a meaningful performance management system out of organisations’ vast array of available and potential data. This performance management system, it is hoped, will then render organisations more tractable, more accountable and more able to learn.

¹ HM Treasury, Cabinet Office, National Audit Office, Audit Commission and Office for National Statistics, *Choosing the Right FABRIC: A Framework for Performance Information*, London: TSO, 2001.

In developing its own approach to performance data, in 2004 the Department of Health produced ‘Standards for Better Health’, which became part of the performance assessment by the Healthcare Commission. The Healthcare Commission consulted with UKCRC (the UK Clinical Research Collaboration) and others involved in NHS research and, following iterations, ‘The Better Metrics Project, Version 8’ was published by the Healthcare Commission in November 2007.² The current metrics cover three main areas:

- **Core standards assessment** – where metrics relevant to core standards are available from national data sources, they are included in the core standard screening dataset for the annual health check.
- **Improvement reviews** – any improvement reviews covering metrics topics have included currently available metrics in their assessment tools (for example mental health, heart failure and diabetes).
- **Developmental standards assessment** – the Healthcare Commission extended the annual health check to include a pilot assessment of trusts’ progress against developmental standards in 2006/2007.

Nevertheless, the years since the publication of *FABRIC* in 2001 have seen growing recognition of the possible perverse consequences of performance information (and indeed these possible consequences are flagged up in the report).³ The Public Administration’s Select Committee 2003 Report *On Target? Government by Measurement*,⁴ the Royal Statistical Society⁵ and others have highlighted both the managerial and technical limitations and the challenges of performance data. These anxieties reiterate concerns expressed since the 1950s (if not earlier) and identified again in the discussion by Smith⁶ of the potential dysfunctional effects of the publication of performance data.⁷ It also encouraged a view that micro-managing through performance indicators would, in many contexts, encourage such perverse outcomes. Even amongst supporters of metrics, this has strengthened a view that, for Key Performance Indicators (KPIs), more is not always better and that, like the organisations they quantify, KPIs should be lean.⁸

² P. Whitty, *The Better Metrics Project, Version 8*, London: NHS and the Healthcare Commission, 2007, p.8.

³ HM Treasury, Cabinet Office, National Audit Office, Audit Commission and Office for National Statistics, 2001, p.18.

⁴ House of Commons Public Administration Select Committee, ‘On Target? Government by Measurement’, *Fifth Report of Session 2002–03*, Vol. 1, HC 62-I, London: TSO, 2003.

⁵ S. M. Bird, D. Cox, V. T Farwell, H. Goldstein, T. Holt and P. Smith, *RSS Working Party on Performance Monitoring in the Public Services*, London: Royal Statistical Society, 2003.

⁶ P. Smith, ‘On the Unintended Consequences of Publishing Performance Data in the Public Sector’, *International Journal of Public Administration*, Vol. 18, Nos. 2&3, 1995, pp.277–310.

⁷ These might be summarised as: tunnel vision; suboptimisation for the whole system; myopia; measure fixation; misrepresentation; misinterpretation; gaming; ossification.

⁸ Or, as Lenin once wrote in his appropriately named ‘Better Fewer, But Better’: ‘In the matter of improving our state apparatus, the Workers’ and Peasants’ Inspection should not, in my opinion, either strive after quantity or hurry’; V. I. Lenin, *Collected Works*, 2nd English ed., Vol. 33, Moscow: Progress Publishers, 1965, pp. 487–502.

There are, of course, limitations to this approach. The ‘information architecture’ based on KPIs will almost inevitably miss things that matter to researchers, managers and deliverers of DH R&D. It is particularly vulnerable to the ‘fallacy of aggregated representation’, in which not only do aggregations obscure variety but also quantitative representations are confused with real experiences. The Nobel Prize-winning George Stigler argued that when incentive systems become de-aligned with the goals of an organisation, suboptimal, or even perverse, consequences will most likely follow. Similarly, health research and development comprises a community of practitioners in health research and development and their organisations, characterised by many and varied measures of success, interpretations of quality and methods of inquiry. Under such circumstances, it is almost inevitable that aggregated measures or performance will not feel closely aligned to the things that incentivise high-quality research and a passion to translate findings into real improvements for patients. This is not an argument against KPIs – which are an important part of the DH R&D approach to performance – but it recognises that they leave gaps in the warp and weft of motivation and reward that binds the activities of a community to its goals and aspirations. The response of academic researchers to Research Assessment Exercise-style measures of their performance may be partly due to the desire of any profession to avoid external accountability, but it may also be due to a more legitimate sense of grievance with a set of measures that do not adequately capture what they consider to be important.

There is therefore a clear possibility that performance indicators may not offer as complete traction as has been hoped. Even worse, as Goodhart’s Law famously states: ‘any observed statistical regularity will tend to collapse once pressure is placed upon it for control purposes’.⁹ Thus, once bibliometrics become not only a means for monitoring research activity but also a mechanism for directing funds, they may develop into the object of both gaming and perverse behaviour. Furthermore, there is anecdotal evidence that the peer review of publications encourages conservatism in research ambition and favours track record over youthful enthusiasm. If this were true, the problems of perverse behaviour and gaming might be increased.

As this brief discussion has shown, metrics might usefully support the effective steering of R&D but for the fact that they provide an incomplete basis for a system of rewards and incentives in a complex and varied system. The following chapter goes on to consider other instruments that might be available.

⁹ C. A. E. Goodhart, ‘Monetary Relationships: A View from Threadneedle Street’, *Papers on Monetary Economics*, Vol. 1, Sydney: Reserve Bank of Australia, 1975.

CHAPTER 3 **Beyond metrics and indicators: incentivising further improvements in performance**

In the preceding section we outlined some important strengths and weaknesses of a metrics-based approach to the question of performance management for health research. We saw that metrics provide us with measurements of outputs and outcomes against which to measure performance. However, we also noted possible limitations to this.

In this chapter, we discuss ways in which it might be possible to move beyond metrics as the only basis of performance management, towards policy instruments encouraging not merely improved, but potentially outstanding, practice. We have identified three major ‘non-standard’ (in the sense that they are outside the practice of traditional performance management) forms of policy instrument, each of which provides subtly differing incentives for NHS Trusts, researchers and research-support workers to improve performance: awards, beacon status and prizes. For clarity, we have separated these three approaches but we recognise that in practice they could be combined.

A number of important considerations underlie the discussion of policy instruments that follows. As with all improvement strategies, context is very important. First, we must recognise that the time at which a non-standard instrument is deployed has implications for its incentive effect (should a prize, for example, reward past outstanding practice or create a goal to be pursued?). Second, we need to consider granularity – particularly for awards and prizes, which may have quite variable incentive effects depending on their size, cash value, duration and so forth. Third, prizes and awards, almost by definition, create winners as well as losers and this has implications for the motivations of both (especially, possibly, those who believe that they will always be losers). Finally – and perhaps most importantly, given the complexity of healthcare organisations – we should acknowledge that instruments may have variable incentive effects depending on the *level* at which the rewards are focused: do we seek to reward individuals, groups or whole institutions? Context may matter in other, subtle ways. For example, prizes are a way of confirming the respect of a community and that presupposes that this respect is desirable and sought after. Some cutting-edge researchers, for example, may not hold this respect from peers in such high regard. Others might even regard such prizes with disdain. For them it may be that the intrinsic rewards of research are sufficient and they would be immune to the lure of recognition. In what follows, it should also be kept in mind that the systematic evidence

available around the effectiveness of these instruments unfortunately remains rather patchy.

3.1 **Recognising organisational performance: organisation awards**

Organisation awards represent a natural extension of performance management based on metrics. They amplify the influence of these existing metrics. Typically, they seek to identify and celebrate excellent performance, defined as performance levels above a certain threshold, and therefore they are targeted at high-flying institutions. A number of important examples exist in the health sector in the UK, although at present these are not tied to R&D. The healthcare intelligence provider CHKS Top Hospital Awards provides perhaps the best example¹⁰. Here, an award is made annually to the most improved NHS trust, and a list of the 40 best-performing trusts – of all kinds – nationwide is generated according to a series of predefined metrics, most of which are forms of performance measurement against which trusts are already reviewed by the Healthcare Commission. These metrics include:

- risk-adjusted mortality
- emergency readmissions within 28 days
- day case rate (trolley procedures)
- diagnostics 13+ weeks' wait
- a staff survey
- overall data quality.¹¹

The annual Health Service Journal (HSJ) Awards recognise outstanding performance at trust level in the NHS across a range of categories, ranging from the most outstanding acute service trust and primary care trust, to those with the most effective chronic disease management schemes, and IT systems. HSJ Awards are made on the basis of review of trust performance by panels of expert judges for each of the categories¹².

In both instances, the aim is to reward outstanding practice, *over and above* core standards. However, in the absence of any formal evidence on the matter, it is difficult to say whether these kinds of awards – in and of themselves – would act as effective incentives for improved research performance. It is more likely that they would incentivise drives for improved performance only among top-tier research institutions with a realistic chance of winning the awards, or those near the bottom with the potential for substantial short-term improvement. Trusts with a competent, but not outstanding, research record would be unlikely to be strongly incentivised to improve performance by the distant prospect of system-level recognition. They are therefore most appropriately used to encourage high-performing trusts to perform even better.

¹⁰ CHKS, homepage.

¹¹ CHKS, Top Hospitals web page, 2007.

¹² HSJ Awards web page.

An important advantage of an awards system over other forms of incentives for improved performance is its proximity to transparent metrics-based criteria (but this, for the reasons listed above, could also be seen as its limitation). For the CHKS scheme in particular, the decision to award seems to be based heavily on objective criteria – rather than the subjective opinions of an ‘expert panel’. These data are relatively inexpensive to collect and should be non-controversial. For the potential winners, the process requires little additional effort (beyond attendance at the customary awards dinner or similar). An alternative would be to try to gain some added value by using the awards participation process itself to encourage further reflection and development by requiring them to produce a reflective account of some sort to demonstrate why they were worthy of winning the prize.

3.2 **Recognising organisational performance: ‘beacon’ status for research trusts?**

Although in this sense the practice of awarding ‘beacon’ status to organisations has not been systematically extended to the health sector in the UK, it is gaining increasing currency in other areas, most notably in local government and criminal justice.¹³ For those judging the award of beacon status, satisfying broad metrics requirements is the bare minimum. The beacon approach aims to identify organisations performing outstandingly and, in particular, *innovatively*, across the board, and which might provide models for similar organisations elsewhere. Under the model practised by the Beacon Councils Scheme, it does so in rounds, each one tied to a set of themes covering everything from welfare provision to programmes to combat antisocial behaviour, and performance is evaluated by specially convened expert panels. The culmination of the review is the award of beacon status to a council for a particular programme it administers.

In fact, the award of beacon status is merely the first stage in a lengthy process of exchange intended to raise the standards of beacons and non-beacons alike. The newly identified Beacon Council becomes a focal point for workshops, consultations and informal meetings with similarly focused bodies elsewhere, at which ideas are exchanged and elements of best practice noted. The principle of beacon schemes is to recognise the complexity of the systems in which they operate and particularly the specificity of the contexts in which interventions occur. In the context of health research, beacon schemes could provide some important advantages, notably:

- The potential to recognise outstanding performance and innovative practice in terms of research organisation – highlighting institutions that have proved particularly successful at providing a positive environment for health research.
- Formalising networks of exchange between institutions so that successful management principles can be disseminated.

¹³ See <http://www.localinnovation.idea.gov.uk/idk/core/page.do?pageId=17522455>

3.3 Moving beyond metrics: prizes for innovative research and development

Thus far, we have focused on instruments that reward strong performance at organisational level – they could conceivably be targeted at high-flying research units. Typically, they are awarded for achieving previously identified high standards of performance. Prizes, on the other hand, could be awarded to teams, organisations or to individuals. Like beacon schemes, they also tend to foster *innovation* by individual researchers or research groups. However, they usually involve a sense of competition. Typically prizes are for being perceived as the best at something or for being the first to achieve some prespecified target.

The degree of incentivisation depends critically on whether prizes are awarded *ex ante* or *ex post*. Perhaps the best-known international prizes – chiefly the Nobel Prizes – are made *ex post*, usually for contributions to a particular research field over the course of an entire career. In this sense, they contribute little to incentivising innovative research in the short-term. However, by raising awareness about an achievement they can draw attention to a body of work, or a certain accomplishment, which is instructive. In this way, information, rather than incentive, may be the key to further behaviour change. For example, by providing a prize for the best example of researchers involving patients, this may highlight to others the potential benefits of patient engagement as well as illustrating how it might be done. *Ex ante* prizes are thought to offer more incentives to innovate. Best known is the ‘grand prize’, and this is currently receiving renewed attention as a means to stimulate research and development¹⁴ (see below). Relatively little work has been conducted to examine their longer-term impact however. Grand prizes offer arguably the greatest potential as mechanisms for incentivising increased innovation in research at systemic level. Historically quite common, they have fallen from favour over much of the past 20 to 30 years, but more recently there has been a growing interest in reviving them in certain sections of the research policy community.

There is evidence to suggest that even small-scale prizes may provide significant incentives to produce innovative research if they are targeted appropriately; Erren¹⁵ identifies two prizes of \$1,000 offered by the Nobel Laureate physicist Richard P. Feynmann in 1959 for highly specific and original pieces of research – both of which were subsequently completed by research students. However, large-scale prizes present additional problems. Erren suggests that while big cash prizes have long been used in fields such as aeronautical research to generate rapid and radical advances, it is important to guard against confounding effects arising from awards made only for the ‘complete solution’. Since big cash prizes encourage greater secrecy between individuals or research groups that are effectively in competition, it may be preferable to break up large-scale awards, or at least recognise research that makes significant contributions to solving the recognised problem for which the grand prize was established.

Ultimately, the real value of prizes – as with the other policy instruments we have discussed here – probably depends on finding a correct balance between incentives of various kinds.

¹⁴ L. N. Davis, ‘Should We Consider Alternative Incentives for Basic Research? Patents vs Prizes’, paper presented at the DRUID Summer Conference, Copenhagen, 2002.

¹⁵ T. C. Erren, ‘Prizes to Solve Problems in and Beyond Medicine, Big and Small: It Can Work’, *Medical Hypotheses*, Vol. 68, 2007, pp.732–4.

The real costs include not only the actual cash awarded but the opportunity costs, as researchers stop pursuing some avenues of research in pursuit of prizes. We have seen that metrics provide useful, but limited, indicators of individual and organisational performance. In much the same way, we should be mindful of the quite different incentives for changed performance that various supplementary policy instruments offer: some may do little more than reward particularly strong performance against agreed metrics; others may offer real incentives for genuinely innovative, cutting-edge research.

CHAPTER 4 **Non-standard incentives in research and development in the NHS**

In Chapter 3 we discussed three ‘non-conventional’ approaches that could be added to the mix of rewards designed to align the research and development system with public and patient benefits. In this chapter we look more specifically at the role of prizes.

Recently, much of the debate around offering prizes in medical research has focused on the alleged inadequacies of the patent system. The argument can be simply put. The patent system delivers public benefit by promoting innovation in medical devices, treatments and drugs and it is accepted that these innovations should be rewarded. The mechanism of offering a monopoly for a period of years to the inventor is seen to provide such an incentive. However, once a patent has been granted, a price can be charged above what would be the case in a competitive market. Even though other producers can enter the market when the patent expires, the disadvantage is that purchasers pay additional money until the patent runs out. The problem, it is said, lies not with the granting of a patent but with the monopoly that goes with it.

An alternative approach is to award inventors a cash prize that would incentivise the innovation but would mean that the knowledge created should be publicly available to any potential producers. This approach separates the reward for inventing useful products from the product’s price. Once freed to set competitive prices, it is claimed, the resulting competition among producers would generate public savings greater than the cost of the prize. (However, in practice the difficulties in estimating the appropriate value for the prize might be considerable.) This illustrates how incentives might be aligned in creative ways with wider benefits.

The DH R&D shares in the aim of rewarding the pursuit of knowledge which, once achieved, could be used time and again with continuous public benefit and no additional cost (so-called non-rival consumption). The incentive structures shaping the production of knowledge in DH R&D are, however, very different. Researchers intrinsically value their research as an end in itself and extrinsically value their careers, status, the sense of doing good, and income. As argued above, metrics-based reward structures are unlikely to be sufficient to steer all these motivations. Prizes, equally, are unlikely to be sufficient but they can play an important role in the ecosystem of rewards and, if successful, monetary benefits would far outstrip the cost of the prizes.

NHS trusts engage with Research and Development in at least three different ways,¹⁶ and prizes could relate to each or all of these. First, trusts may be users of research evidence; second, they may collaborate in research led by others; and third, they may be a research centre giving expert support to lead investigators and their collaborators. So prizes could be won for using research, collaborating in its production or leading it. Within each of these three areas there is considerable diversity among and within trusts (which might lead research in one clinical area but not others). This diversity probably argues against having an award or beacon status for a whole trust (although presumably success in one area would reflect well on the whole trust).

The particular aspects that might be relevant are also varied. They might include:

- being a high-quality collaborator in clinical trials
- sponsoring underserved themes in research
- engaging patients or public in research
- supporting nurse-led research
- communicating research findings to practitioners and policymakers
- using the research of others effectively either in research or in healthcare (the ‘steal with pride prize’, perhaps).

Prizes could be combined with elements of awards or beacon status. For example, the prize for nurse-led research could include, ‘beacon-style’, resources to run seminars, contribute conference papers and so forth on nurse-led research. Indeed, the cash value of the prize would be unlikely to change the incentive structure significantly unless it was of an order that brought it onto the radar of the chief executive (because of the low probability of winning). However, relatively small sums could be used within the trust to support further improvement and to build on excellence.

Non-standard incentives in healthcare perhaps face an additional advantage. Prizes confer status and raise profile. They gain attention from peers and allow winners to feel good about themselves and to tell friends and family of their accomplishments. Status and collegiality are entrenched in the UK healthcare system. The engagement of professional bodies and Royal Colleges, trusted journals and leading professionals all may enhance the impact (although the selection of these would require care).

Given the recognised limitations of standard performance measurement and management, there is at least a good case to be made for considering non-standard approaches. These would, obviously, sit alongside more standard approaches but could reinforce them and support important activities that might be lost in the aggregating processes of performance measurement. They could also be used to balance the apparent conservatism of peer review and to raise the profile of health R&D within trusts and in the wider policy community. However, they would need to be carefully managed to avoid perverse incentives, uncovenanted benefits and undesirable opportunity costs.

¹⁶ See P. Whitty, 2007, p.152.

In designing a prize system, it is necessary to consider the amount of the prize, constraints that might be put on the use of prize money and who should pay. It is unlikely that DH R&D would award prizes to individuals to use as they wish. More probably, prizes would be given to research teams who have a number of shared interests such as attending conferences, engaging additional support, visiting other research centres and so forth. These interests are not necessarily expensive and relatively small sums could have a disproportionate influence on group behaviour; this is because small marginal sums could be used to fund high-interest activities that could not be paid for out of core funding. By constraining the use of prize money to these interests, the amount of the prize could be minimised.

Award systems could be more or less radical. One more radical model would be to have a fixed budget for innovation prizes, in which innovators applied for funding on the basis of the amount of public money their innovation could be calculated to save in one year. These claims would be verified and funding allocated to all applicants in proportion to the sums of public money potentially saved. This approach is a variant of the US Medical Innovation Prize Fund as proposed (but not agreed) in a 2005 legislative proposal to Congress.

'Grand prizes' have historically been used for high-profile, scientifically or technologically significant discoveries and at first sight they may be less relevant for DH R&D. However, there are apparently intractable problems that might emerge as candidates; for example, the successful application of the best research evidence to successfully eradicate *C. difficile* (after taking into account apparently random fluctuations) or the development of new procedures or techniques. The feature of 'grand prizes' is that they must be of sufficient value (monetary or otherwise) to change behaviour. However, if they do not change behaviour then they would be an uncovenanted benefit (a reward for doing what would have been done without the prize), but if they do change behaviour then the problems of perverse incentives and opportunity cost may appear. A further weakness is the technical difficulty in identifying the threshold at which point the discovery is thought to be complete. Another risk is that it might discourage collaboration as researchers conceal emerging findings from rivals.

A more likely model could focus on the needs of high-priority groups and award prizes based on the number of quality-adjusted life years (QALYs) (or equivalent) claimable by the invention. This could either be awarded to one winner or shared, as in the above example. It might include, for example, a focus on unfashionable groups that are currently underserved by the R&D system, or on groups that are most costly to treat currently.

A variant might be similar but focused on one high-priority aspect of the patient pathway in the treatment of a particular disease. For example, it could be decided that low-cost, accurate diagnostics in sexually transmitted diseases was particularly important. Once again, this could be used to attract research towards areas currently underserved. Where this could, for example, exploit existing treatments and devices more effectively by removing a significant bottleneck, the benefits could be considerable.

A final model would be a more conventional approach, with a panel receiving bids from applicants focused on issues that matter, such as high-impact collaborations with demonstrable benefits for patients, patient-led research, etc. More conservative in design,

this could nevertheless provide an opportunity to identify and spread good and promising practice.

Each of these models also presupposes that some prestige is attached to winning. By linking the prize to the prestige of sponsors, this can not only provide a source for financial support but, more importantly, for intangible incentives. Clearly, selecting such sponsors would be important. The allure of the prize can be added to with high-profile speakers and events at the prizegiving ceremony.

In conclusion, therefore, there is at least a case for considering a more extensive use of prizes in the ecosystem of rewards and supports that aligns the DH R&D system to better health outcomes and an improved healthcare system. These should be used either where there is a perceived need to amplify existing (weak) standard incentives or to ‘fill the gaps’ by appealing to researchers and researchers’ managers in ways that performance metrics don’t touch. Designing the prize system requires considerable care if it is to incentivise the desired behaviour and not disincentivise non-winners. Attention should also be paid as to whether it is individuals, teams or organisations that are being incentivised. The granularity of timing and prize size also matter, as does the relationship between prizes and prestige, and professional pride. Consequently, if it were to be a sustainable and long-term contribution to the eco-system of health research and development, it should be introduced with care, following consultation and further analysis.

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