Revisiting promotion in Hull: a new model

Introduction

With a view to aligning all performance-related policies to the Academic Career Framework, HR is looking to revise the academic promotions procedure and has made some provisional amendments to be agreed by the three campus trade unions. By the time the processes of consultation and negotiation are concluded, the environment in which these policies and procedures will be applied will be radically different to the environment in which they were conceived. Assuming that the university's 'Transformation' project goes to plan, the staff base will have been cut by up to a quarter by July 2021. Although the university will certainly be smaller after that date, it is not a corollary that higher-quality provision will follow by default. For that to occur, the remaining staff must benefit from careful workload management and a fair and transparent promotion system that incentivises and rewards activities critical to the university's success. Without significant buy-in from the staff, the university will not be well-placed to capitalise on the projected upturn in student numbers for 2021-22.

Obtaining staff buy-in will present a serious challenge. The two most recent staff surveys have revealed consistently poor levels of morale and low confidence in the university's management. Sitting chronologically between them, UCU's stress survey of 2016/7 indicated that approximately 50% of all staff (academics, professional services and technical) were experiencing moderate to severe levels of anxiety and depression; levels which, in diagnostic terms, are clinically significant. The most recent independent measure was taken between September and November 2018. The *National Academic Survey* (NAS) is the academics' version of NSS, providing a means to measure and express levels of satisfaction in their institutions. In terms of overall satisfaction, Hull was ranked 28th out of the 28 institutions taking part in the 2018 survey. On the item relating to the present proposal (item 18: 'The promotions process is fair at my institution'), Hull is again ranked 28th out of 28. In aggregate, then, the evidence shows that staff satisfaction and wellbeing have been consistently poor at this university for at least five years. As all these measures pre-date the commencement of the Transformation project in July 2019, one can only (but reasonably) speculate how £25 million in cuts will impact on staff satisfaction over the coming months and years. That is the context in which we are operating, and we should not be blind to it when making policy for the future. Periods of crisis are also periods of opportunity, and the Transformation project does at least allow a chance to reflect on whether the old ideologies, assumptions and practices around performance will be effective in a post-cuts environment.

UCU therefore welcomes the decision to revisit the procedure for academic promotions, however we also call for a complete rethink in how *all* policies relating to academic performance will operate following an unprecedented loss of staff and cuts to investment and expenditure. This will allow us here, at the University of Hull, the opportunity to reflect on what activities are truly of value to the university's core business, and to build a system that supports and rewards staff in delivering them. We begin with the procedure for academic promotions, first by highlighting the flaws inherent in the existing scheme (including proposed amendments). We then advance a new procedure that addresses all the substantive shortcomings of the existing process, and which will restore confidence in the academic promotions system in Hull.

Critique of the current system

1. **It is inherently passive, (2.) bureaucratic, and (3.) retrospective**

Presently, decisions on promotion are made following two panel meetings in which a candidate's application is assessed on merit, supplemented by remarks from their immediate line manager. It is therefore a passive system. An employer could choose to invest in its people by actively seeking out and promoting valued individuals at any point in the annual cycle, whereas the university invites applications once-annually and assesses the quality of only those which are made. The quality of an application is singularly determined by the candidate's ability to persuade others of their accomplishments, and they are encouraged to do so in up to 16 pages of text. Thus, the promotion scheme is also highly bureaucratic and resource intensive. These are two variables which have been empirically shown to impede good decision making, first by asking panellists to make consistently accurate decisions in the face of too much information (known as *information overload*[1]); second, by asking them to extract the substance of an application while ignoring its style. This latter requirement reflects a particularly strange feature of the existing promotion scheme. Rather than simply listing their achievements, applicants are explicitly instructed to *panygyrise* them in a way that must be convincing to two (largely different) sets of panellists. Putting aside the curious precept of instructing applicants to do something that panellists must ignore, it has long been known that people are influenced by style over substance when assessing the veracity of information[2], and that it is difficult to avoid. Hence, a scheme that is vulnerable to these extraneous variables does not favour accomplishments per se; it favours applicants who can better articulate those accomplishments. In contrast, a well-designed promotion scheme does not require the inclusion of a persuasive narrative to assist panellists. Quite simply, achievements ought to speak for themselves.

Furthermore, the scheme is highly retrospective and never prospective. In order to be promoted, academics are explicitly required to demonstrate that their performance has already reached a higher pay band. Put another way, applicants are expected to undertake work for an unspecified period of time and without commensurate remuneration, and only then *might* pay be brought in line with their performance. Why should this assumption – that pay follows performance – be any more valid than the one where performance follows pay? Consider the context: the higher education sector is already facing a crisis of overwork[3], so any promotion system that relies on unpaid work might be considered tone deaf at best, and perverse at worst. In a period of severe financial restraint it also disincentivises universities from promoting academics who are already performing higher-band activities 'for free'.

[1] Schroder, H., M.J. Driver, and S. Streufert. 1967. *Human information processing*. New York: Holt, Rinehart and Winston.

[2] Petty, R. E, & Cacioppo, J.T. (1986). Communication and persuasion: central and peripheral routes to attitude change. Berlin, Germany: Springer-Verlag, *ISBN* 978-0387963440.

[3] www.timeshighereducation.com/blog/we-must-confront-culture-overwork-tackle-academias-mental-health-crisis

4. The idea that promotions are free of budgetary considerations is not convincing (but nor is it necessary)

The following information is from the *Transformation eBulletin* circulated to staff on August 6th, 2019 (with emphases appearing in the original text):

*The figures make the situation very clear: In 2016/17 we had **10,720** full-time undergraduate students. By 2020/21, without significant successful interventions, this will fall to **7,557**, a reduction of circa 3,200 students and a consequential **reduction in income of £30m.***

*On the other side of this, in 2019/20 our staffing costs are just over £115m per year. Due to pay awards, increments, increases in pension costs etc. this will increase to £138m by 2023/24. An **increase of £23m** at our current staffing levels.*

In this context, it is fanciful to believe that the number and/or type of promotions awarded are (or even should be) independent of budgetary constraints. In all likelihood, no one believes it to be true, nor is there a definitive way of proving it to be true. Advancing what appears to be a quixotic ideal can only ever be harmful in the longer term, particularly in a financial environment in which more academics are promotable than realistically can be promoted. This assertion is singularly the most damaging aspect of the current promotion scheme, as it means panels are pressured to find non-financial reasons to reject applications. This in turn creates a need for obfuscation – the 'wiggle room' around quality, merit and experience – which will be addressed in points 5-7 below. The net result can only ever be disaffection, resentment and distrust in the system. A more constructive approach would be to openly acknowledge the financial context in which promotions can be made, and take a multilateral approach to incentivising and rewarding good performance.

5. The five categories are poorly defined, cumbersome, and without explicit inter- and intra-categorical weighting

The five categories for promotion are:

- Qualifications/Professional Membership
- Teaching
- Research
- Leadership and Management
- University Citizenship

Of these, only Qualifications/Professional Membership have core requirements that are clearly defined and thus clearly demonstrable. The rest – the core requirements in the remaining four categories – are far more ambiguous, perhaps necessarily so that the assertion of budgetary independence can be maintained. Consider the following example from the Teaching category. Those applying for senior lecturer are expected to show how they:

Design, develop and deliver teaching material across a range of modules and programmes within a subject area using appropriate teaching, learning support and assessment methods

As per the requirement to panegyrise this ability, an applicant might expend several hundred words outlining what in fact are rudimentary requirements of university teaching. In fact, this criterion is one that would be justifiably expected from Band 7 lecturers, let alone senior lecturers on Band 9. As a separate point, it is not clear how this expectation can accrue across Bands 7-9 given that the volume of teaching is normally incommensurate with academic seniority. Nevertheless, putting that aside for now, the question is why applicants even need to spell out how they meet this criterion. First, it is binary – one either does it or one does not. Second, *how well* it is done can be demonstrated through a functioning peer review system or by simple corroboration from a Head of Department or Programme Director. Engagement with a fundamental requisite of higher education teaching does not need a few hundred words of persuasive argumentation. Its inclusion as a criterion therefore appears to serve little purpose beyond creating wiggle room in which applications can be rejected.

In addition to ill-defined criteria, the relative weighting between the five categories is not reported, nor is the relative weighting of within-category requirements. As an example of the former, *Citizenship* is undoubtedly important, but it cannot be as important as *Teaching*, which is the university's main source of income. As an example of the latter, consider two criteria listed under *Research*. Anyone applying for senior lecturer should be:

acting as a referee and contributing to peer assessment,

but they should also be

attracting external funding to support research activity.

These two criteria cannot be of equal value to the university, and the cynical amongst us might argue that, in reality, grant income is worth more than the sum total of all other criteria in all other sections. In the experience of a small, cross-disciplinary focus group, drawn together to discuss the pros and cons of the current system, disproportionate weighting is applied to management roles (e.g., School Academic Manager, Director of Teaching, Head of School/Head of Department), such that colleagues with otherwise unremarkable CVs are promoted above those with achievements in the other categories. There may indeed be greater weighting attached to management roles. By and large, these are roles which research-focused academics tend to avoid so there may be a need to incentivise them. However, if such roles are indeed short-cuts to promotion in Hull, they ought to be advertised as such so that academics can be fully informed when those positions are advertised. One must also consider the ramifications of attaching disproportionate value to roles which are, by definition, few in number and closed off to others during a period of incumbency.

6. It is punitive in nature

Following on from above, the need to engineer non-financial reasons for rejecting applications changes the nature of the scheme from one that is supportive to one that is punitive. Now panels need to find reasons – even bad reasons – to reject applications. One such example is the requirement for senior lecturers to hold, as a minimum, Fellowship of the Higher Education Academy (FHEA), and to obtain Senior Fellowship within two years of promotion. For all academics teaching in higher education, obtaining Fellowship status is merely a formality. It is not a test in which an uncertain outcome depends on ability, judgement or skill, nor is it a measure of teaching quality. It is a measure of teaching experience that most academics at this university already possess. Therefore, the outcome is guaranteed if academics can set aside a few weeks to compile the requisite portfolio of evidence. As a promotion criterion, then, it has little discernible value as almost every academic currently employed at the university is merely weeks away from securing at least FHEA status[4].

With that in mind, it seems harsh for a promotion application to be rejected because it "does not satisfy the core requirement… to have FHEA". As promotion (to SL) is already conditional on senior fellowship being obtained within two years, there is no reason why the fellowship requirement cannot also be conditional in the same way (e.g., within one year). Further evidence of a punitive scheme can be found in the university panel feedback, which highlights the areas in which applications fall short of the requirements but stops short of guaranteeing promotion if those deficiencies are remedied. Both faculty and university panels focus on the gaps in one's CV, without promising anything should those gaps be filled. And without that assurance, a different set of gaps can always be found in the next application round. In that regard, Hull's promotion system is a Foucaultian cycle in which the test is permanent and the pass mark is never known.

[4] Given that, one might ask why all academics don't already have some level of HEA status. The answer is likely to relate to workload and time, and what activities academics consider to be an effective use of their time. While increasing the number of academics with HEA status may be strategically important for the university (e.g., in its contribution to TEF), there are more effective ways to increase the number of fellows than to use it as a promotion criterion. Factoring it into the Workload Planner, for example, will see many more academics engage with the award than there are at present.

7. It lacks transparency

The decision from the faculty panel is fed back via the Dean, who verbally explains the panel's reasoning, presumably referring to information recorded on the completed AP2. For reasons that are unknown, neither the AP2 nor the AP3 is ever given to the applicant, nor are the minutes of the panel discussions provided. (In fact, candidates wanting to see these forms have to make an FOI request; see **#16**, below.) Having these forms available to candidates is not to suggest that Deans are anything less than impeccable in their feedback. It is that verbal feedback increases the likelihood of misunderstandings, especially during what can be highly emotive conversations, and any misunderstandings can have implications for appeals. In more general terms, a lack of transparency decreases accountability and increases deniability. Hence, to improve transparency, there is no reason why the AP2 and AP3 forms cannot be shared with applicants as a default.

The system also lacks transparency in that applicants only ever have access to their own AP1 and portfolio forms. Staff promotions ought to be something to celebrate – the sharing of good practice should serve to motivate and inspire others, and provide some tangibility on where 'the bar' is set. However, neither successful nor unsuccessful AP1 forms are made available to other applicants, meaning that the reasons why some colleagues have been promoted and others have not can seem mysterious. A fully transparent system would involve making all documentation available to all applicants within a promotion round. It should also enable any individual to cross-reference any two applications and understand the reasons behind the decisions As CVs are public documents, and AP1 and portfolio forms do not contain confidential or even sensitive information, there is no good reason why these cannot be made available upon request.

8. **It decontextualises performance and assumes all other variables are equal (when clearly they are not)**

One of the benefits of being part of an organisation is that it can be (and ought to be) sensitive to internal circumstances that can affect individual performance. A few examples at our university might include: historically poor or no measurement of academic workload (and only a 50% uptake of the university workload model predicted for 19/20); blurred workload divisions between T&R and T&S staff; poor local management; major initiatives and restructures introduced at critical points in the academic cycle (S&S and subsequent restructures, IT updates, Curriculum 2016(-19), 'Transformation' 2019-21); centralisation, competitisation, and reduction of internal research funds, withdrawal of bespoke technical support, and a largely unsupported sabbatical scheme.

At Hull, however, the entire suite of policies relating to performance is blind to factors such as those outlined above. In practice, all are applied as if the performance of individuals is independent of university infrastructure. In the context of promotion, internal candidates are effectively treated as if they are external candidates for higher-band jobs, and held to the same standards. While that should not be contentious in itself, providing all else is equal, all else is *not* equal. We recruit from institutions that are organised differently to our own, and in doing so we are exploiting the infrastructural support those academics receive in building CVs that we find attractive. As such, the bar cannot be set by the standards offered by external appointments, because they have benefitted from levels of support that are much different to our own. And if that might seem like an assertion, it does at least offer an empirical test: That is, how many of our staff have improved, maintained or lost the momentum they had built before their arrival? This seems an eminently sensible question to ask beyond its specific relevance to promotion, given its impact on research income, REF and TEF.

9. Faculties act to filter than to advocate

In theory, the faculty panel could be a useful tool in refining an application before it goes forward to the university panel. Any ambiguities, misgivings or misunderstandings could be resolved at this stage, ensuring that a stronger, fully-supported application goes forward. In practice, the faculty's assessment (and Dean's feedback) usually marks the end of the conversation rather than the beginning. Instead of there being an opportunity to clarify and refine, the options are either to withdraw the application or continue without faculty support.

10. The composition of the faculty panel is based on role rather than experience and expertise

To serve as an example, the 2019 FHS panel was populated *in its entirety* by individuals from practitioner-based disciplines, such as midwifery, nursing and general medicine[5]. In the current procedure, no measures exist to ensure that the panel can competently assess the research profiles of, say, experimental psychologists, biomedical scientists or sports scientists, many of whom conduct theoretical (i.e., non-applied) research. If the roles were reversed, one imagines it would be immensely difficult for theoretical scientists to adequately assess the CVs of practitioner-based colleagues. When faced with that prospect, one might expect panels to enlist the help of colleagues with expertise in the conventions of the discipline, yet currently there is no obligation for them to do so.

[5] [redacted]

11. The composition of the *university* panel is based on role rather than experience and expertise

The 2020 university panel will include the Director of HR and Organisational Development (or a nominated representative), and a(nother) representative from HR who will act as an advisor to the panel. As the procedure is supposed to…

- Recognise excellence in academic performance
- Recognise and reward on the basis of agreed standards
- Recognise the various ways in which academic staff contribute to the university's mission and development

… what experience and expertise do these non-academic colleagues have to help them recognise and judge academic merit?

12. The potential for bias (conscious and unconscious) is not sufficiently controlled

In the 2019 round, one Dean, when explaining why a candidate's application was not being supported by the faculty, asserted that "only published papers count". This was because the applicant had listed papers on their AP1 form which were at that point in various stages of peer-review. The university panel, feeding back after the application was rejected, also made reference to the papers that were still "awaiting publication". This assumption, that unpublished papers do not count, represents a "dark criterion" that does not appear in any published documentation on promotion, and reflects an inherent distrust in the judgement, experience and expertise of academic staff who include them in their applications as an indicator of momentum. Lest there be any doubt, the likelihood that research outputs will be published is *not* subject to random forces. If work is currently under review, it means that an academic has judged the research worthy of several months' investment of their time, and a further several weeks preparing the resulting manuscript for publication. There is no academic currently employed at this university or any other whose judgement is that far off-kilter.

The example above could be used to illustrate some of the other criticisms outlined here, as it is symptomatic of a system that is inherently punitive (#**6**), passive (#**1**), and retrospective (#**3**), and lacking sufficient knowledge of cross-disciplinary conventions (**#10, 11**). All of these amount to bias, whether conscious or unconscious in nature, and this is not adequately controlled in either the existing procedure, or in the proposed amendment in which departmental heads and Deans are merely required to "refresh their awareness of unconscious bias" (p3). A serious and effective approach to eliminating bias would be to establish controls at every level of decision making. These might include independent observers at the faculty and university panels, such as a trade union representative or external academics with discipline-relevant experience, or moving to a purely metrics-based system in which subjective decisions are replaced by objective standards for promotion.

13. It incentivises and rewards only the ends and never the means

An ends-over-means approach is perhaps justifiable whenever outcomes are certain, but can be utterly perverse when outcomes are not. There seems a general misunderstanding of the micro- and macro-level factors that contribute to successful performance. For example, publication outputs are treated as random when they are not (**see #12**). Successful grant capture, or lack of, is treated as if it is singularly down to the individual academic's ability, when in fact most of the variables determining success actually lie beyond the individual academic's control. (These include the perceived reputation of the host institution, the number and quality of other proposals in the same funding round, the Matthew effect[6] and, of course, plain luck.) Assuming the research proposal is of sufficient quality to secure funding, the probability of success is still only between 10-20%, depending on the funding body, and these data are readily accessible from many funding organisation's own websites. RCUK funding is a finite resource, which has been decreasing since 2013[7], and the number of potentially fundable projects far exceeds the budget available to fund them. Realistically, then, all academics can do for the institution is to ensure they are regularly submitting high-quality proposals, defined as such by the institution's internal review procedure. Incentivising and rewarding *that* behaviour is fairer and likely to pay off in a number of other ways (e.g., improving staff morale and motivation). In contrast, incentivising any outcome in which luck plays a significant role is perverse and self-defeating.

[6] Matthew effect: an economic principle reflected in the adage that "the rich get richer, the poor get poorer". It has been shown that research funding follows the same pattern (Bol et al., 2018. The Matthew effect in science funding. Proceedings of National Academy of Sciences, 115, 4887-4890, doi.org/10.1073/pnas.1719557115)

[7] Office for National Statistics (www.ons.gov.uk/economy/governmentpublicsectorandtaxes/researchanddevelopmentexpenditure/bulletins/ukgovernmentexpenditureonscienceengineeringandtechnology/2015)

14. Its baseline measure is inadequate (and unnecessary)

In meeting promotion criteria, only the last five years matter. In the existing scheme, the total accumulative output of a career thus far is much less important than is the ability to demonstrate 'growth' within the last five years; and, if relevant, since one's last promotion application. It is, of course, in the interests of any organisation to promote staff who are on an upward trajectory (however that may be defined) but our institution's application of a five-year rule gives rise to several peculiarities:

- Academic A has a strong start to their career in Hull, publishing several papers and securing an early-career grant. Being early career, they are unaware these achievements are grounds for promotion and apply after these achievements have 'expired'. Their application is rejected.

- Academic B arrives from another university with a 4* research department, but maintains strong collaborative links with the old institution. 4* papers are published, grant income flows, but none of the work has been carried out in Hull. As soon as they are eligible to apply for promotion, they do so and are successful.

- Academics C and D both have identical AP1s when they apply for promotion for the second time. However, since their last application, C has maintained a strong and steady output, whereas D has doubled their outputs. C cannot demonstrate 'sufficient growth', D can. Presumably, C is rejected while D is promoted.

Hence, while it might be reasonable to include 'direction of travel' or 'growth' as a factor in determining promotion, these concepts – along with a clearly defined baseline – need to be operationalised for them to be meaningful. Total career performance must also be considered.

15. Promotion is treated as a gamble rather than a determinable outcome

Academics are not risk-averse. It is not uncommon for them to commit several weeks of intense work to a task that has a deferred pay-off, or does not pay off at all. This might be a grant application that is rejected from a string of funding organisations, or a paper that is worth submitting to a '4*' journal, but which in reality is better suited to one more specialised. Just because these gambles are part and parcel of academic life in the UK, it does not mean that the University of Hull should apply that model to its promotion scheme. Imagine a different workplace in which a staff member's application for promotion has just been rejected. Instead of being told that they haven't demonstrated "sufficient growth", the applicant is given specific reasons why they were unsuccessful and – critically – is assured that if they do those things, they *will* be promoted within a specific timeframe. Furthermore, they are given the resources they need to do those things. That is the workplace everyone wants, but not the workplace we have.

16. Appeals are invariably uninformed

In both the current and revised procedure, appeals are allowable on three bases: an error of fact, of procedure, or of (legally-defined) discrimination. In the 2019 promotion round, the outcome letter was dated May 20th, yet was only disseminated to applicants with the Deans' verbal feedback on May 31st, 11 days later. This allowed applicants just two weeks in which to lodge their appeal before the given deadline.

In the absence of information such as promotion statistics, broken down by department, faculty, sex, age, and role, as well as the inability to compare one's own AP1 forms and portfolios with those of successful applicants, it is almost impossible to determine whether any type of discrimination has taken place. One appellant was informed that they must make an FOI request to obtain the basic data that would allow them to assess whether they had been discriminated against. Another staff member, who had concerns that their trade union activity had counted against them had no means to compare their applications with similar but successful cases. This lack of transparency is not only pernicious in itself, it may have implications around compliancy with the Equality Act 2010 and the Employment Rights Act 1996.

<u>Summary</u>

The criticisms above highlight some of the assumptions, implicit and explicit, that underlie the current scheme and show how they are counter-productive in achieving the presumed goals: to reward and incentivise good performance. Here we propose an alternative model that will achieve those aims, by: (i) providing a more equitable and objective system than we have at present; and (ii) helping to identify, incentivise, reward and retain good performers in an increasingly challenging working environment.

There are two caveats. First, the proposed model is explained from the perspective of an experimental psychologist, so all the reference points are grounded within the conventions of the main author's own discipline. Some of these conventions are shared by most if not all other disciplines within the university (e.g., the way external research funding is obtained), whereas others might be different. In the author's field, for example, individual research papers are the basic units of output, whereas in other disciplines it might be book chapters or musical compositions. For ease of reading, then, any reference to publications or outputs can be understood as *whichever type of output is returnable in the Research Excellence Framework*.

Second, this is also written from the perspective of an academic contracted to undertake teaching and research, and it may be fair to say there are more objectively measurable outputs in research than in teaching. While the general principles proposed here will apply to Teaching and Scholarship pathways, work will be needed to ensure that activities performed in the context of T&S are measurable and have parity with T&R[8]. Hence this proposal is intended to start a conversation about implementing a promotion scheme that is more progressive than the one we have, and to do so by embedding a few core principles. It is not intended to provide all the answers to all possible questions at this stage.

[8] In the context of promotions, these <u>should not</u> include departmental-level NSS results or module-level MEQs, as these are poor proxies for measuring individual performance.

<u>An alternative model</u>

Step 1 - *acknowledge the financial context in which promotions are held*

There are budgetary constraints on the number of promotions that can be awarded and everyone knows it, so this should be acknowledged from the outset. The university could even report the actual budget for promotions that year, in both raw terms (monetary amount) and as a guide in real terms (number of promotions by type). Everyone also knows that L-to-SL incurs the largest increase in salary cost, while SL-to-Reader is cost-neutral, and SL/Reader-to-Chair incurs a fixed cost without automatic increments. Hence it is possible to say that the promotion budget equates to *x* L-to-SLs, *y* SL/Reader-to-Chairs, and *z* Professorial increments. Once promotions have been awarded, the number and type can be published in the same broken-down form.

Step 2 – *Agree* simple *and* objective *criteria for each level of seniority and job family*

These criteria should not require the applicant to make a persuasive case for how they meet them. For most academic activities, the core requirements are already evidenced by production of the output itself. The following criteria, for example, found under *Research* in the current procedure, are all demonstrated by senior authorship on several 3-4* research papers (my comment in italics):

- Contribute to the development of research strategies *(depending on how this is interpreted)*

- Maintain a regular output of high quality research which is published in peer reviewed journals
- Engage in scholarly activity (including awareness of relevant pedagogic research and practitioner research) to underpin teaching, research and enterprise activity

Hence, instead of having applicants explain how they meet each criterion, we just need to decide **how many research publications** (Npub) would be expected for promotion to the next pay band. In disciplines such as my own, the expectation would be Npub in peer-reviewed journals of 3-4* quality, but that expectation is likely to be discipline-specific. Once Npub can be established, one might suggest the following as a guide for each level of seniority:

5 = Lecturer (B)

15 = Senior Lecturer

30 = Reader

50 = Chair

Contained within those four threshold-markers is a wealth of ancillary information that requires no additional explanation. The very act of meeting those numbers over a sustained period of time is *in itself* a demonstration of all the abilities outlined in those three criteria.

The **h-index**[9] also offers a useful (if imperfect) measure of academic impact, combining counts of productivity (number of research papers produced) and impact (number of citations). There are data available to show what *h* is considered appropriate for each level of seniority (although this varies considerably according to discipline). Again, *as a guideline*, one might expect h-indices of:

3-5 = Lecturer B

8-12 = Senior Lecturer

12-15 = Reader

15-20 = Chair

In addition to publishing regularly (*Npub*) and showing impact (*h*), we want our (primarily T&R) academics to attract external research funding. However, as outlined above, *securing* research income is subject to a number of extrinsic variables, and the success rate of even high-quality applications is between 10-20%. All one can reasonably ask from academics is that they *submit* high-quality grant applications on a regular basis, and expect that on average, one in five or six will be successful. In keeping with the principle outlined above, we can suggest **numbers of grant proposals submitted** (*Nsub*) to count towards promotion. These numbers might vary according to the amount of money requested, whether or not they have FEC attached, and whether the individual is a principal applicant or co-applicant. Nevertheless, all will be assumed to be of sufficient quality to attract funding because they will have passed the university's internal quality control checks. Hence, *as a guide*, we might say:

1 submission = Lecturer B

6 = Senior Lecturer

12 = Reader

18+ = Chair

[9] Hirsch, J. E. (2005). An index to quantify an individual's scientific research output. Proceedings of National Academy of Sciences, 102, 16569-16572, doi.org/10.1073/pnas.0507655102

Step 3 – *Assign computational weightings to these and other academic activities which reflect their actual value to the university's core business*

As a way of describing colleagues who have a significant responsibility for research, the three numbers outlined above – *Npub, h, Nsub* – contain as much information as can be written persuasively by applicants (and read diligently by faculty and university panellists). The same principle of metrication can be applied to other categories, to Teaching, Leadership and Management, Citizenship, and Enterprise, where individual activities can be assigned computational values that reflect their actual value to core university business. Under Teaching, this might cover everything from ASTs to introducing new programmes; under Citizenship, everything from contributing to open days to promoting the university internationally. In order to do this transparently and with maximum discipline-level fidelity, working groups can be convened in each faculty to itemise activities within each domain, setting appropriate guideline numbers for each level of seniority.

Once input values have been ascribed to activities within each category, we will have a sense of what each activity is 'worth' to the university. This is not to say that some activities are worth nothing or can be abandoned, although it is possible this process will reveal some that are inefficient. For the purposes of describing the principle, all will have positive value but to varying degrees. We can also weight the relative value of the categories themselves: university citizenship is important, but not as important as teaching. By publishing these values and weightings, academics can see exactly where they might fall short of promotion, and exactly what they need to do to rectify it.

Step 4 – *Adjust the output thresholds according to the promotion budget*

The model will work using an algorithm that takes into account the values of within-categorical activities as well as their between-category weightings. This could output a single number that is compared against a pre-defined promotion 'threshold' at each level of seniority. Those thresholds need not be immutable, or even known in advance. They can be adjusted at each time of asking according to the budget available, and how many applicants meet the thresholds at each level. For instance, if only one applicant meets the threshold for

Chair, this frees up some of the budget to promote lower down. Thus, the Band 8 threshold might be lowered to allow more Band 7s to be promoted.

Anyone missing out due to budget-imposed adjustments can be compensated in other ways. After all, promotion is not the be-all or end-all, and evidence shows that academics are motivated by intrinsic rewards[10]. Depending on what is practicable, they might be given assurances that they will be promoted in the next round or within a certain timeframe. They might be asked to undertake specific activities that will likely tip them over threshold next time; or there might be other ways in which rejection can be mitigated (a sabbatical or a university-funded conference trip, for example).

[10] Jindal-Snape, D., & Snape, J. B. (2006). Motivation of scientists in a government research institute. Management Decision, 44, 1325-1343, DOI 10.1108/00251740610715678

Step 5 – *Change the role of Faculty/University panels*

An algorithmic approach to promotion removes much of the subjectivity from decisions made by Faculty and University panels. In the proposed system, only a single panel is required to adjust thresholds according to the available budget and the number and distribution of applicants across pay bands. To increase transparency, representatives from the three campus trade unions should be enlisted as independent observers.

Step 6 - *Full disclosure*

The proposed system is built on a foundation of transparency – of budget, formula and outcome. This is vital to the restoration of trust between academics and senior university management, ensuring equity between colleagues, and in renewing confidence in a promotion scheme that is perceived as among the worst in the UK[11]. Against a backdrop of unparalleled cuts, it will be central to the university's ability to incentivise and reward good performance, as well as attracting and retaining talent.

[11] www.theacademicsurvey.co.uk/?do=results&g=rankings&h=1&i=questions&j=1&k=1&l=1

Benefits of the proposed system

- It can operate within the existing promotion budget, meaning its implementation can be cost neutral. There could be some increase in costs if academics missing out due to adjusted thresholds are given alternative incentives, although they too provide benefits to the university as they are reinvested back into the core business.

- The current promotion scheme is highly bureaucratic, time-consuming and resource intensive. The time - and salaries – committed to the process, in applying, evaluating, feeding back and considering appeals, can be reduced by automating much of the process. The human resource cost would be limited to basic information gathering, error checking and threshold adjustment, and publishing information.

- As well as reducing bureaucracy, it addresses almost every other shortcoming of the current system. It removes subjectivity and all its inimical corollaries from decisions (inconsistency and bias), recognises and rewards achievements outside the ability to 'spin' them, takes into account the means as well as the ends, and removes the sense that promotion is a lottery. In short, it is inherently fairer and more transparent than the current system.

- It allows the university and its academic staff an opportunity to reflect on the value of the activities in which we currently engage, and to establish whether those activities will be the same in a smaller, higher-quality university. By itemising these activities as a function of their value, academics can mix-and-match them according to their own strengths while working towards promotion. It will be enabling and empowering because it does not force all academics along precisely the same path.

- It contributes to a joined-up suite of policies relating to performance. By following the same basic logic as the Workload Planner (by assigning activities units of 'value' than units of time), both frameworks can be used to inform one another, leading to more coherent workload planning and appraisal.

- It is possible that threshold adjustments that follow a limited promotion budget generate a promotion 'backlog', where more academics are known to be promotable than can actually be promoted. However, that is very likely to be the case already, the difference is that it is not publically acknowledged to be the case. On balance, the increased transparency around promotions, and the inclusion of alternative incentives may well offset any dissatisfaction arising from academics missing out.