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Academic feedback and performance of students in institutions of higher education: Who is in control and how does our feedback impact students?

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Abstract

Attending higher education institutions and achieving academic success are associated with positive outcomes, valued at individual and societal levels, such as reducing unemployment and poverty and increasing civic participation. Thus, many studies have focused on enhancing learning by examining the factors that affect students' performance, including the teaching behaviour most strongly related to academic success. Within this research framework, in a population of social sciences students on different degree routes, the relationship between academic performance and different components of academic feedback is explored. The feedback students received in the dissertation module, which had two assessment points, was examined. The first assessment point feedback was statistically analysed to find changes in the grade point average of students between their first submission (T1) and the final dissertation (T2). Analysis to assess the impact of students' performance on the structure and content of feedback, as well as the extent to which the content of the feedback, can affect T2 grade increases.

Academic feedback and performance of students in an institution of higher education: How does our feedback impact our students?

Introduction

The aim of this paper is to present some preliminary findings of a mixed methods research project analysing feedback and the impact of this on attainment. This research was initially conducted across two departments in one Higher Education Institution in the UK. Both authors were working in their respective departments trying to seek ways of improving feedback for their students. One project was exploring whether Higher Education was training teachers to give praise and was based on qualitative focus groups with three cohorts; trainee teachers, Higher Education lecturers in teacher education and a random sample of Higher Education students at the institution. Two key findings from this project were that teachers stated that they were giving praise to students but the students received this as feedback and that the destructive influence of poorly constructed feedback far outweighed any developmental benefits (Darwent, 2016). The disjuncture between students' and teachers' understanding of what 'praise' is was quite startling. Dictionary definitions of praise (e.g. "*to express admiration or approval of the achievements or characteristics of a person or thing*" (Cambridge Dictionary, 2019)) bore no resemblance to what teachers were providing, and it was established that most educators and learners do not define praise as the dictionary does, nor as each other do. It was further established that many teachers believed that the purpose of praise (as they called it) was to encourage or stimulate learners to improve their work and thus achieve more highly: this later formed a crucial link with a second research project (see below). The researcher sought to develop a model for praising achievement whilst providing constructive feedback and feed-forward without the latter negating the former.

A separate project running in another department in the same institution was focussing on assessment guidance and feedback received. The first scoping exercise was conducted with second year undergraduate students and demonstrated that many of the practices were at modular level and there was very little programme approach (Jessop, *et al.*, 2014) taking place. Feedback was perceived as unhelpful as it was focussed on the task completed, rather than on wider learning objectives, and it was inconsistent across modules. Focus groups were then conducted with second year undergraduate students to explore some of the issues in greater detail and it was found that standardised assessment information would be helpful, level approaches to assessments were of benefit to students. Standardisation of feedback mechanisms were also something which the students welcomed.

Through the dissemination of this work within the institution the projects were brought together to analyse feedback in more detail and in doing so we evaluated historical student feedback on the dissertation module which had two assessment points. The intention here was to see if there were patterns in the feedback in the early assessment which could support an increase in attainment at the final submission point. As the first researcher's investigation into praise had revealed that

teachers believed this to be the purpose of praise, and were giving feedback whilst referring to it as praise, it was established that there was a strong connection between the two projects and it was decided to merge them into a single project. It should be noted that the researchers do not seek to define "good" feedback as that which results in measurable improvement in student work; rather we seek to devise and trial models of feedback which achieve the stated aim of the teachers in both initial investigations which was to facilitate improvement in students' attainment.

Research Context

This research paper will discuss the preliminary findings from a pilot study on attainment driven feedback. This research does not intend to debate the forms of feedback within higher education as there is significant evidence of this within the academic literature (Merry & Orsmond, 2008; Lunt & Curran, 2010; Ball, 2010; Hennessy & Forrester, 2014), however, what this paper will do is present the findings which demonstrate that there is a strong link between the content of feedback and the impact on attainment. This is seen as important as many of our students are driven by higher grades (Lund University, 2013) and the feedback we give can support this increase and add value to our students' learning (Carless & Boud, 2018; Hawk & Lyons, 2008; Kauffman, 2015).

In particular we discuss our findings that feedback is least effective when commoditised, which has been found to frequently be the case (Dunworth & Sanchez, 2016), and much more effective when the student is involved in the feedback process, such as by a meeting to discuss work. This should not be surprising as it has been found before (for example Bloxham & Campbell, 2010; Carless et al, 2011, McArthur & Huxham, 2013) that an active dialogic process is favoured by students and enables them to be more effective independent learners who can make accurate judgements of the quality of their own output (Nicol & Macfarlane-Dick, 2006; Sadler, 1985). Despite this well-established knowledge, we found that the majority of feedback is still commoditised and passed to the student as an entity.

The two small departmental projects which informed our investigations on feedback for this paper found that that at every level, from primary school to postdoctoral, combining praise and feed-forward (Jones, 2005) as typified in "praise burger" (Darwent *et al.*, 2018) style models is at best ineffective and more often destructive, demotivating and undermining. Outside of education this seems to be accepted readily, e.g. in the Harvard Business Review: "If you give a feedback sandwich, you risk alienating your direct reports. In addition, they are likely to discount your positive feedback, believing it is not genuine." (Shwartz, 2013). Learners, educators and dictionaries all mean different things when they use the term "praise". Bloxham *et al.*, suggests that there is an overreliance on the students or markers perceptions of feedback, rather than the interaction between them (Bloxham *et al.*, 2011). When individuals have a different understanding or interpretation of feedback it defeats the object and becomes ineffective in support the student's progression.

Furthermore, the two smaller departmental projects found that standardisation of assessment information was beneficial to students' understanding of what was required of them and they liked receiving information in a familiar way. This meant

that consistency across their modules was important to their understanding of the task(s) being set, as this had a direct impact on their understanding of the feedback they then got. Feedback needed to be personalised and specific to the student (Austen and Malone, 2018) but not critical, from their perspective, and not blandishments if the mark did not reflect a "good" mark from their perspective. The result of this being that students who have a negative perception of the feedback they receive are demotivated and lack determination (Hawk and Lyons, 2008; Kauffman, 2015) which impacted on their attainment in later assessments. However, positive feedback and feed-forward commentary on students' work yields an increase in attainment (Hawk and Lyons, 2008; Patchan *et al.*, 2016). Making clear links between assessment information and students understanding of feedback was a key finding from the departmental project and from within the literature (Bloxham *et al.*, 2011; Austen and Malone, 2018; Hawk and Lyons, 2008; Kauffman, 2015; Patchan *et al.*, 2016).

Anecdotally, many academics in Higher Education know that their students are disappointed and frustrated with the feedback they receive from their assessors, particularly when they do not receive the marks they had hoped for (Alfehaid *et al.*, 2018). Many institutions see this in national statistics, such as the National Student Survey (NSS England) and local feedback around assessment and feedback. Many assessors know that feedback is fundamental to a student's learning and overall performance and attainment and yet it is an aspect which is consistently highlighted as problematic. Indeed, detailed examination of NSS results consistently indicate that nationally the lowest levels of satisfaction are given for assessment and feedback (Williams, Kane, Sagu & Smith, 2008), for example in 2015 only 68% of respondents found faculty feedback to be helpful (Bell & Brooks, 2017). The following year HEFCE reported that satisfaction levels relating to assessment and feedback were again the lowest, with full time students reporting an average of 73% satisfaction (HEFCE, 2016). More recent NSS results show that the situation continues to be of concern.

At this point it is important to highlight the difference between attainment – commonly referred to as 'marks' or 'grades' such as in Alfehaid *et al.* (2018) and performance. Attainment generally, and especially in education, refers to the highest award that the student has successfully achieved to date. For example, Education Scotland (2022) describes attainment as "Attainment is the measurable progress which children and young people make as they advance through and beyond school … " Performance, however, is the measure of how nearly one's attainment matches an expectation, such as a target set by a teacher, a national average, personal aspiration or the pass criteria for an assessment. (Talib & Sansgiry 2012) define performance thus: "Academic performance is the extent to which a student, teacher, or institution has attained their short or long-term educational goals and is measured either by continuous assessment or cumulative grade point average." This difference is significant since our research started from the assumption that "*good feedback practice is broadly defined … as anything that might strengthen the students' capacity to self-regulate their own performance*" (Nicol & MacFarlane-Dick 2006: 205).

Our aim was to explore what types of feedback meet the students' desire for better attainment and support staff to best utilise their assessment time by providing students with useful, attainment driven feed-forward and feedback. This research explored feedback characteristics which supported student development and attainment, in turn, leading to greater opportunities for improvements in student attainment. Specifically, this means that if staff confront feedback by addressing the emotional and practical dimensions, student feedback literacy may be improved (Sutton, 2012) which, in turn, may improve attainment (Deenen & Brown, 2016).

Methodology
This project involved using historical feedback from 181 final year undergraduate dissertation projects. The dissertation involved two assessment points, and both sets of feedback were used in this analysis. Although the data was taken from one module, the students were on three different courses, two of which are jointly taught cross-departmentally within the institution. The first assessment point was six weeks after the start the module and consisted of a short piece, 1500 words, which summarised some the literature students have found so far, what their chosen methodology will be, proposed central research question and any ethical issues they see arising from their work. The purpose of this assessment was twofold; firstly, the students getting ethical approval for their research and, secondly, for the student to demonstrate they had started to consider the key areas which would support their final assessment point, the dissertation project. The second assessment point was the submission of the dissertation at the end of the semester two. The aim of this piece of work is for the student to demonstrate their capabilities with independent study, to select an appropriate approach for the question and consider their chosen topic from a critical standpoint. All the dissertation projects followed a similar pattern for the structure but there were some variations depending on the type of methodology used.

The feedback for the dissertation project was done by the supervisor of the students work. There were 25 assessors across two departments working on this project. Assessors were expected to return feedback on the assessment within 15 workings days of submission. Although there was some standardisation for the feedback given, namely, maximum number of words used, electronic qualitative feedback and a feedback matrix set against broad learning outcomes for the module, for example, on the whole assessors applied their own style at both assessment points.

Ethical approval for this project was granted by the host institution. All the feedback analysed was electronic feedback, either typed or spoken. The first assessment point was in semester 1 (T1) of the institutions' academic calendar around the six-week mark. The second assessment (T2) came at the end of the module in the institutions' end of year assessment period. The methodology used was a mixed methods approach in that we conducted a content analysis of T1 and T2 feedback data in order to uncover themes, categories and names for categories. The aim here was to explore the feedback across the dissertation project module to look for the presence of certain words, themes, or concepts within the qualitative data set. In order to protect the reliability and validity of the data a research assistant was hired to conduct the analysis of the T1 and T2 data. They were blind to the purpose and did not have any preconceived ideas about what they might find. They labelled the

feedback with no bias (Mackieson *et al.*, 2018 and Smith and Noble, 2014). The study started with no preconceived categories, but categories were developed and labelled as patterns emerged.

The feedback for the module contained two key elements, a tick box matrix which was built into the virtual learning environment and a space for qualitative comments. The qualitative comments had no content guidance attached other than a maximum word count, therefore, assessors were free to comment upon any aspect of the work based on what they had read. When the content analysis was conducted, we were, therefore, not bound by any specific guidance the assessors had been given. The categories which were developed in the T1 and T2 content analysis were found to broadly match the Stanford WISE (Yeager *et al.*, 2013) feedback categories of, firstly, feedback description - lecturer explicitly describes the nature of feedback being offered; secondly, high standards - lecturer emphasises and explains high standards used to evaluate the student work and generate the instructional feedback; and thirdly, assurance of student ability - lecturer states explicitly that the student has the skills necessary to successfully meet those standards (Yeager *et al.*, 2013). It should be noted here that the no individual assessor followed the Stanford WISE model in full, but when looking at the module feedback as a whole, it was evident that these characteristics exists.

The second element of analysis was quantitative in nature and involved looking at the relationship between the categorisation of feedback and attainment across T1 and T2 data. The aim was to assess if, or how much, value was added. To do this a focus was placed on factors which may have affected the grade point average (GPA) between T1 and T2. Conducting various statistical analysis also supported the identification of factors which may have influenced attainment between T1 and T2. This included specific feedback characteristics but also specific demographics; for example, gender, ethnicity and course studied, to identify whether there were any variations across these categories too. The demographics of the participants was typically female dominated (79% female) with ethnicity being identified as white [any] (95%).

The feedback matrix was not part of this data analysis due to its tick box approach and standard nature.

Findings
Feedback for both assessments on the dissertation project module consisted of written or oral feedback and a final year undergraduate standard (for the subject area) matrix. 99.5% (n = 180) of the feedback was given in electronic written form using the institution's web-interface and a completed matrix. 0.5% (n = 1) received only matrix feedback. Despite the optionality, no one received oral feedback. 25 assessors from across two departments at the institution were providing feedback on this module. Throughout the analysis of written feedback, it was clear to see that assessors had provided consistent feedback within their own marking but that this wildly differed between assessors and across departments. Written feedback varied between less than 100 words in some cases to over 400 words in others. However, what was apparent was that assessors gave well-meaning feedback which reflected on what they had read and gave praise to achievements that the individual work had demonstrated.

In analysing the data we discovered and labelled six characteristics of feedback from the 25 assessors. These were: structural feedback, follow-up meetings, unfocussed critiques, focussed critiques, unfocussed affirmation, focussed affirmation. Structural feedback was defined by some routine characteristics of academic work, for example, the way the assessor structures the work, a greeting, grade included. The follow up meeting was offered on very few occasions, but this was done by way of offering a face-to-face meeting. The unfocussed critiques were where assessors made broad statements about the inadequate features of the work without being specific, for example, *your work has been rushed*. Focussed critiques are where the lecturer highlights what the student did wrong and why; and how they can improve to get a better result, for example, "*as it stands this work doesn't meet the pass criteria because []... however if you do []... then it will meet the criteria*". Affirmation unfocussed is concerned with what the student has done well without identifying specific examples, for example, *this is great work*. Finally, focused affirmation states what the student has done well and explains why it is good. It might even suggest further refinement: for example, "*this is excellent work because you did []… and you could even improve it further by []…*"

Although the structured feedback varied hugely in style and content across the various assessors, but it was clear that they were following, either intentionally or unintentionally, a "praise burger" (Darwent *et al.*, 2018) model. The praise burger is structured by three key elements which are order specific, affirmation-criticism-affirmation. It is a very formulaic approach where assessors state something positive, then negative and then finishing on another positive. In this project, we found this structure was typically linked to unfocussed critiques as more general comments, for example, "*it is great that you have... [ ] however, I have notice that your... [ ] needs work, but I am pleased that... [ ]*". The affirmation element, which assessors wrote more words on, derived from the positive aspects of the work they had read but fell into two categories. Some cited areas which had been executed well, for example, "*the methodology is good*" (Hattie and Timperley, 2007); whilst others made more general comments about the work, for example, "*overall this is a good dissertation*" (Hesketh and Laidlaw, 2002). Feedback should be specific and directive, otherwise students are unlikely to engage with the feedback and unable to understand how to improve (Thompson, 1997).

When assessors are focusing on the middle of the "praise burger" the majority of the criticism detailed what had gone wrong without any direction on how they could have improved. This means that assessors either focussed on a very specific error or made unfocussed generalisations about the work. It can thus be seen that assessors – whether knowingly or otherwise – are closely following the "praise burger" (Darwent *et al, 2018*) principles of providing more positive affirmation (the two bread sections) and less critical or negative comment (the filling in the middle), but that their effort goes into managing this imbalance rather than ensuring that both elements are focussed and will facilitate students' development.

The Stanford WISE model (Yeager *et al.*, 2013) specifies three elements to feedback: noting why the strengths are strengths; noting where improvements can be made; and, noting why the assessor is confident that the learner is capable of

making the improvements suggested. Whilst uncovering characteristics, themes and labels from the data it transpired that 18.8% (n = 34) of the pieces of feedback included either one or two of the three characteristics of the Stanford WISE model of feedback. Assessors were using the strengths and improvement elements of Standford WISE but no one used the "capable of making these improvements" element. No assessors feedback had all three Stanford WISE characteristics; we therefore assume that the use of some Stanford WISE elements was unintentional. This left 81.2% (n = 147) of assessments receiving none of the Stanford WISE elements. Even if elements of Standford WISE were used unintentionally, this research found that when it was used it had a more positive effect on the students' attainment than when it was not used at all.

One of the key findings of this pilot study was that there was an increasing positive effect on grade improvement according to how many of the Stanford characteristics were present in the feedback between T1 (first assessment point) and T2 (second assessment point). Of the 18.8% (n = 34) who received one or more of the Stanford WISE feedback elements at T1, 50% (n = 17) moved into the next grade band at T2. Although this was not statistically significant, literature tells us that statistical significance should not be used as the sole test for real life significance. Henkel (1976) states that statistical significance is "...of little or no value in basic social science research, where basic research is identified as that which is directed toward the development and validation of theory" and McLean & Ernest (1998) note that statistical significance does not equate to practical significance. Any increase in grades apparently arising from unconscious use of a particular feedback model (in this case Standford WISE) is of practical significance and merits further research (Musgrove, *et al.*, in draft).

When Stanford WISE elements are used in the context of other findings from the data, this pilot study found key elements of feedback to be a potentially valuable to improving a student's attainment between the first and second assessment point. There were other positive aspects which aided an increase in grades, such as meetings being offered, structured feedback and focussed commentary. From the 18.8% (n=34), where two Stanford WISE characteristics of feedback were present, positive effect was greatest where additionally a tutorial, or discussion, had been offered and the feedback was focussed throughout. Whilst records were not kept of whether the tutorial offer was taken up or not, there was a clear amplification of increased performance with the inclusion of a tutorial/meeting offer. This finding links to earlier research supporting the idea of including a dialogue when providing feedback as it leads to better student attainment (Alfehaid, 2018; Beaumont, 2011; Blair, 2014; Boud and Molloy, 2013; Carless *et al.*, 2011; Nicol and Macfarlane-Dick, 2006). It is also connected to improving students' self-regulative skills, especially when in a dialogue with their peers (Alfehaid, 2018; Blair, 2014; Carless *et al.*, 2011), meaning students are more likely to achieve a higher grade in the future (Carless *et al.*, 2011).

By contrast, where the feedback was poorly structured and included unfocused comments, such as "Great work!", "well done" or "you can do better than this" there was either no, or even a negative, change in performance between T1 and T2. A study carried out at Liverpool John Moores University's architecture department asked students about the types of feedback which they found most helpful and

constructive (Smith, 2019). Smith's findings cite student comments such as "… *can be inconsistent … vague …*" and that [written] feedback would be more useful if it "*… clearly showed what went well … so then in future projects you know what to repeat.*" (Smith, 2019). In addition, Smith's study shows that individual tutorials were more than three times more helpful than their next nearest rival; students offered very clear statements such as "*you can ask questions, unlike written feedback*" and "*it facilitates more directed discussion and questioning…*" (Smith, 2019). Smith found that two of the most common barriers to understanding feedback were lack of opportunity for discussion and lack of direction on how to improve, both of which accord with our findings and the Stanford WISE model (Yeager *et al.*, 2013).

Conclusion

This was a pilot project looking at the types of feedback given on a final year dissertation project module which had two points of assessment. T1 was an early assessment whereby the student had to write a report on what they intended to study, early findings and where they were heading with their dissertation and T2 was the actual dissertation project of 10,000 words. As this was historical data the project analysed the data that was present having had no influence on it, although one author was also one of the 25 assessors.

Assessors spend a significant amount of time on reading students' work and providing feedback so that a student can see a critique or commentary on the work they have produced. However, there is a misalignment between this being provided and it being used as a tool for learning and improvement. There are large differences in how students and staff view feedback (Adams, 2020), therefore, tutors must make students aware of when feedback is being provided (Adams, 2020) and students should increase their understanding of how feedback works in order to improve their feedback literacy for future success (Carless and Boud, 2018). Feedback only becomes useful when students use it to make improvements to their work or their learning strategies (Carless and Boud, 2018). Boud and Molloy (2013) suggest "*that without understanding how feedback has been used, teachers are blind to the consequences of their actions and cannot act to improve learning*". If students are unable to understand their feedback, they are unable to engage, and if feedback is not reflected on, or read, staff should not waste their limited time with providing written comments that will remain unused or misused by students (Price *et al.*, 2011).

The model we propose consists of the positive aspects of feedback we identified and crucially the key addition of a face-to-face tutorial or meeting. Ajjawi and Boud's (2015) observation that there is an increasing need for feedback to be more of a social interaction between the tutor and the student, meaning that feedback becomes meaningful, understood and acted upon. Harvey (2019) discusses the benefits of tutorial discussions for feedback and benefits of marking and providing feedback face-to-face with students. Discussion between student and staff is essential as it allows for expectations to be regulated (Ajjawi and Boud, 2015; Orsmond and Merry, 2011), as a lack of dialogue leads to higher student dissatisfaction (Ali, 2018; Nicol, 2010) due to expectations not being met. Orsmond and Merry (2011) suggest a "*lack of feedback dialogue means that students never become fully aware of the potential contribution of feedback to their learning and*

tutors never fully appreciate how their feedback is being used" meaning that students are not fulfilling their learning capabilities and staff feedback is not being used to its fullest extent. For those reasons, it is essential that the model includes a dialogue.

Our pilot model consists of the three main elements of the Stanford WISE model (Yeager *et al.*, 2013), specifically: noting why the strengths are strengths, noting where improvements can be made, noting why the assessor is confident that the learner is capable of making the improvements. We then advocate the additional pro-active offer of a face to face meeting/discussion, for example a tutorial or similar, to discuss the feedback. Our model actively eliminates unstructured, unfocussed critiques as these are unhelpful at best and can often have negative impact on attainment (Hattie and Timperley, 2007).

The next phase in the development of these preliminary findings is to test our new hypothesis on current students. The hypothesis will focus on Stanford WISE characteristics plus a personalised offer of face to face contact at T1 and test to see whether this has a significant impact on T2 attainment. Mackay *et al.*, (2019) "*concluded that assessment can act as a barrier between staff and students, especially where students are not given effective feedback*" (2019: 315). We assert that, by identifying a way of improving attainment as a direct result of our feedback, assessors will be better equipped to discuss models of feedback and resulting potential. This discussion should sit within enhanced professional development and should also be shared with their students, in order to increase transparency and fairness of assessment.

References

Adams ,A) .2020) Student engagement with feedback and attainment :the role of academic self-efficacy .Assessment and Evaluation in Higher Education ,45(2 ,(317–329

Ajjawi, R. and Boud, D. (2015) 'Researching feedback dialogue: an interactional analysis approach', Assessment & Evaluation in Higher Education, 42(2), pp. 252–265. https://doi.org/10.1080/02602938.2015.1102863

Alfehaid, L., Qotineh, A., Alsuhebany, N., Alharbi, S. and Almodaimegh, H. (2018) 'The Perceptions and Attitudes of Undergraduate Healthcare Sciences Students of Feedback: A Qualitative Study', Health Professions Education, 4(3), pp. 186–197. https://doi.org/10.1016/j.hpe.2018.03.002

Ali, N. (2018) Identifying predictors of students' perception of and engagement with assessment feedback. Active Learning in Higher Education., 19(3), 239–251.

Austen, L. (2016) 'Balancing academic gatekeeping and interpersonal positioning: a qualitative analysis of written feedback to undergraduate students', Practitioner Research in Higher Education, 10(2), pp. 67-81.

Austen, L. and Malone, C. (2018) 'What students' want in written feedback: praise, clarity and precise individual commentary', Practitioner Research in Higher Education, 11(1), pp. 47-58.

Blair, A. (2014) Can dialogue help to improve feedback on examinations? Studies in Higher Education., 39(6), 1039–1054.

Bell, A.R. and Brooks, C. (2017) What makes students satisfied? A discussion and analysis of the UK's national student survey. Journal of Further and Higher Education, 1–25. 10.1080/0309877X.2017.1349886.

Ball, E. C. (2010) 'Annotation an effective device for student feedback: A critical review of the literature', Nurse Education in Practice, 10, pp. 138–143.

Bellon, J.J., Bellon, E.C. and Blank, M.A. (1991) 'Teaching from a Research Knowledge Base: a Development and Renewal Process'. Facsimile edition. Prentice Hall, New Jersey, USA.

Bloxham, S. and Boyd, P. (2007) 'Developing Effective Assessment in Higher Education: a practical guide', Open University Press, England.

Bloxham, S. and Campbell, L. (2010) Generating dialogue in assessment feedback: exploring the use of interactive cover sheets, Assessment & Evaluation in Higher Education, 35:3, 291-300, DOI: 10.1080/02602931003650045

Bloxham, S., Boyd, P. and Orr, S. (2011) 'Mark my words: the role of assessment criteria in UK higher education grading practices', Studies in Higher Education, 36 (6). pp. 655-670. http://insight.cumbria.ac.uk/1179

Boud, D. and Molloy, E. (eds.) (2013) 'Feedback in higher and professional education: Understanding it and doing it well', London: Routledge.

Beaumont, C., O'Doherty, E.M. and Shannon, L. (2011) Reconceptualising Assessment Feedback: A Key to Improving Student Learning? Studies in Higher Education. 36(6): 671-687

Brookhart, S.M. (2008) 'How to give Effective Feedback to you Students', Association of Supervision and Curriculum Development, Alexandria, VA, USA.

Cambridge Online Dictionary
https://dictionary.cambridge.org/dictionary/english/praise

Cambridge Dictionary (2019)
https://dictionary.cambridge.org/dictionary/english/praise [accessed Cambridge Dictionary (2019) https://dictionary.cambridge.org/dictionary/english/praise [accessed 08/02/2022]

Carless, D. and Boud, D. (2018). 'The development of student feedback literacy: enabling uptake of feedback', Assessment & Evaluation in Higher Education, 43(8), pp. 1315–1325. https://doi.org/10.1080/02602938.2018.1463354

Carless, D., Salter, D., Yang, M. and Lam. J. (2011). Developing sustainable feedback practices. Studies in Higher Education., 36(4), 395–407.

Darwent, D. (2016) 'To praise or not to praise, is that the question?',Sheffield Hallam University, England. (Accessed June 2019)

Darwent, D., Irons, C. and Taylor, L. (2018) 'The perilous praise burger.', Sheffield Hallam University, England. (Accessed June 2019)

Deneen, C.C. and Brown, T.L.G. (2016) 'The impact of conceptions of assessment on assessment literacy in a teacher education program', Cogent Education, 3:1, DOI: 10.1080/2331186X.2016.1225380

Dunworth, K. and Sanchez, H.S (2016) Perceptions of quality in staff-student written feedback in higher education: a case study. Teaching in Higher Education. Vol 21, 5.
https://doi.org/10.1080/13562517.2016.1160219

Education Scotland (2022) Scottish Attainment Challenge:
https://education.gov.scot/improvement/learning-resources/scottish-attainment-challenge/ [Accessed: 08/02/2022]

Harvey, T. (2019) 'What went wrong? Students' and lecturer reflection on why face-to-face feedback was ineffective', University of Cumbria, England.

Hattie, J.A.C. and Timperley, H (2007) 'The power of feedback', Review of Educational Research, 77(1), pp. 81-112

Hawk, T. and Lyons, P. (2008) 'Learner's perceptions of care and respect offered by instructors', Industrial and Commercial Training, 40(4), pp. 197–205 https://doi.org/10.1108/00197850810876244

Henkel, R.E. (1976) Tests of significance. Newbury Park, CA: Sage.

Hennessy, C. and Forrester, G. (2014) 'Developing a framework for effective audio feedback: a case study', Assessment & Evaluation in Higher Education, 39(7), pp. 777-789

Hesketh, E.A and Laidlaw, J. (2002) 'Developing the teaching instinct - 1: Feedback', Medical teacher, 24: pp. 245-8. 10.1080/014215902201409911.

Kauffman, H. (2015) A review of predictive factors of student success in and satisfaction with online learning. Research in Learning Technology, 23.

Jessop, T., El Hakim, Y. and Gibbs, G. (2014). 'The whole is greater than the sum of its parts: a largescale study of students' learning in response to different programme assessment patterns', Assessment and Evaluation in Higher Education, 39: pp. 73-88

Jones, C.A. (2005) 'Feedback for Learning', Assessment for Learning: Vocational Learning for 16-19s. Institution for Learning and Skills Development.

Lund University (2013) 'School system favors pupils driven by worry and conscientiousness, Swedish study shows', ScienceDaily, 24 January 2013. www.sciencedaily.com/releases/2013/01/130124091534.htm

Lunt, T. and Curran, J. (2010) '"Are you listening please?" The advantages of electronic audio feedback compared to written feedback', Assessment & Evaluation in Higher Education, 35(7), pp.759-769.

McArthur, J. and Huxham, M. (2013) Feedback unbound: From master to usher in Reconceptualising Feedback in Higher Education (eds) Merry, S., Price, M., Carless, D. and Taras M (2013) London. Routledge.

MacKay, J.R.D., Hughes, K., Marzetti, H. Lent, N. and Rhind, S.M. (2019) Using National Student Survey (NSS) qualitative data and social identity theory to explore students' experiences of assessment and feedback. Higher Education Pedagogies. VOL. 4, NO. 1, 315–330 https://doi.org/10.1080/23752696.2019.1601500

McLean, J.E. and Ernest, J.M. (1998), The Role of Statistical Significance Testing in Educational Research, Research in the Schools, vol. 5, no.2, pp. 15-22

Mackieson, P., Shlonsky, A. and Connolly, M. (2018) 'Increasing rigor and reducing bias in qualitative research: A document analysis of parliamentary debates using applied thematic analysis', Qualitative Social Work, https://doi.org/10.1177/1473325018786996

Merry, S. and Orsmond, P. (2008) 'Students' attitudes to and usage of academic feedback provided via audio files', Bioscience Education, 11(1), pp.1-11.

Musgrove, A., Darwent, D. and Baker-Green, K. (*in draft*) How can our feedback support improvement in students' grade: A case study.

Nicol, D. and Macfarlane-Dick, D. (2006) 'Formative assessment and self-regulated learning: a model and seven principles of good feedback practice', Studies in Higher Education, 31(2), pp. 199–218
https://doi.org/10.1080/03075070600572090

Nicol, D. (2010). From monologue to dialogue: improving written feedback processes in mass higher education. *A*ssessment and Evaluation in Higher Education, 35(5), 501–517.

Orsmond, P. and Merry, S. (2011) Feedback alignment: effective and ineffective links between tutors' and students' understanding of coursework feedback. Assessment & Evaluation in Higher Education, 36:2, 125-136

Patchan, M., Schunn, C. and Correnti, R. (2016) 'The Nature of Feedback: How Peer Feedback Features Affect Students' Implementation Rate and Quality of Revisions', Journal of Educational Psychology, 108(8), pp. 1098–1120
https://doi.org/10.1037/edu0000103

Price, M., Handley, K. and Millar, J. (2011) Feedback: focusing attention on engagement, *Studies in Higher Education*, 36:8, 879-896

Sadler, R. D. (1985) The origins and functions of evaluative criteria. Educational Theory,
35 (3), 285-297

Schwartz, R. (2013) The "Sandwich Approach" Undermines Your Feedback,
https://hbr.org/2013/04/the-sandwich-approach-undermin

Smith J. and Noble H. (2014) 'Bias in research', Evidence-Based Nursing 2014, 17, pp. 100-101 http://dx.doi.org/10.1136/eb-2014-101946

Smith, C. (2019) 'What do they do with my feedback?' Liverpool John Moores University, England

Sutton, P. (2012) 'Conceptualizing Feedback Literacy: Knowing, Being, and Acting', Innovations in Education and Teaching International, 49 (1), pp. 31–40. DOI 10.1080/14703297.2012.647781

Talib N. and Sansgiry S.S. (2012) Determinants of academic performance of University students. Pakistan. J Psychol Res. 27(2): 265–78.

Yeager, D. S., Purdie-Vaughns, V., Garcia, J., Apfel, N., Brzustoski, P., Master, A., Hessert, W. T., Williams, M. E. and Cohen, G. L. (2013). 'Breaking the Cycle of

Mistrust: Wise Interventions to Provide Critical Feedback Across the Racial Divide', Journal of Experimental Psychology, Advance online publication, doi: 10.1037/a0033906

Williams, J., Kane, D., Sagu, S. and Smith, E. (2008). Exploring the National Student Survey Assessment and feedback issues. Higher Education Academy. http://www.heacademy.ac.uk/assets/York/documents/ourwork/research/NSS_Assessment_and_Feedback_ExecSummary_31.04.08.pdf

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This work has been given institutional ethical approval.