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RAPID ETHICS REVIEW

A LEVELS 2021: UNDERSTANDING GRADE INFLATION, INEQUALITIES AND DATA FLOWS DURING COVID-19 ASSESSMENTS

Ruchi Sharma, Dr Cian O'Donovan, Dr Melanie Smallman, Prof. James Wilson
University College London

A level exams in England have been cancelled for the second year running. Disruption to teaching and the risks of covid-19 transmission in packed exam halls have meant significant changes to how A levels are assessed and graded. Controversy over data modelling and adjustments last year has led to greater focus on this year's proposals. Experts have warned that the government's teacher assessment plan for 2021 risks "extremely high grade inflation" (Britten, 2021).

In this review we assess why grade inflation is a risk, and to whom. But our review also finds that other serious issues are also at stake for students. Ethical issues concern fairness to individuals and groups, and the production, distribution and worsening of inequalities.

The aim of this rapid ethics review is to:

1. Highlight state-of-the-art evidence on the **ethical implications** of these changes in 2021 and for future years.

2. Show how thinking about **exam results as data** helps evaluate what's at stake for students and the **organisational implications** across the broader education system.

3. Show how ethical arguments are critical in helping decision-makers understand the values and issues at play in understanding data use, data flows and data comparisons in the exam system.

We find that the current debate brings to light important concerns that will be the focus of education debates over coming years.

First, and most immediately, issues of grade inflation have made headlines again in 2021 because of the uneven distribution of higher grades between schools and because of the difficulties it has caused for university admissions. This year's standardising model fails to appropriately and fairly *signal and sort* students ahead of university admission or entering the job market.

Second, the focus on grade inflation neglects serious issues caused by the pandemic itself such as the loss in learning suffered most by England's poorest students. It seems that in an effort to avoid repeating the 2020 algorithm controversy (Timmins, 2021) the government in 2021 have implemented a grading system that does not sufficiently inform policy makers about learning loss or inequalities created within and between exam centres. And because poorer students missed out on more learning than richer students during school closures, they have more to lose from mitigation policies that do not adequately identify schools and students most in need of help.

Third, this draws our attention to issues with how transparent the exam grading process is and how data use is enabling unfair practices in exam grading. Increased data use in the fu-ture risks exacerbating this situation if it ignores existing inequalities. Both perceived and actual unfairness in examination and grading frameworks represents a serious threat for the trustworthiness of the exam system.

The impact of covid-19 on students is likely to be felt for years. Discussion about credible policies to these issues must continue after long after results day.

OVERVIEW

The situation in 2021

- New ways of grading A levels during the pandemic raise **concerns about fairness** to students.
- In this review we look at issues of fairness in terms of **grade standardisation and grade inflation, grade commensurability** and **university admissions.**
- Despite changes to grading for 2021, standardisation at the level of local exam centres increases the risk of grade inflation and undermines confidence in grades.
- The focus on grade inflation neglects issues caused by the pandemic itself such as the **loss in learning which is most pronounced amongst England's poorest students**
- These issues put Ofqual's principles of fairness at risk.

Long-term concerns with the data ethics of exams

- This review shows that standardisation and grade inflation are representative of deeper systemic concerns with data.
- In any given year, the adjustment of grades in line with standardising models will lead to significant disadvantages for individuals who outperform their school or cohort average.
- **Modelling means that some students get higher grades than they deserve.** This is unfair, especially if students are in schools already more advantaged. There are also likely to be longer-term consequences when less competent students get inflated grades
- These issues raise further concerns about deep-seated fairness in the exam system

1. WHAT IS THE PLAN FOR GRADING A LEVELS IN 2021 AND WHAT ARE THE ETHICAL CONCERNS?

Summary points:

- In 2021 teacher assessed grades will again replace A level exams.

- Assessment will be based on evidence of students' demonstrated performance.

- Because the focus on standardisation efforts by exam centres in 2021 is on internal consistency (for each exam centre Ofqual emphasises comparisons between this year's cohort and cohort data from previous years), there may be issues with external consistency, for instance unfair variation in assessment and inequalities in outcomes *between centres.*

- This is likely to influence national grade averages through grade inflation as well as an increase in the number of students appealing their grades because of a lack of trust in the results due to either perceived or real inconsistencies or lack of fairness.

- Learning lost by this year's students because of disruption is not likely to be captured in A level results data. This will impact poorer students to a greater extent as research shows that their learning has been disproportionately curtailed.

- Students already disadvantaged are at greater risk losing a place at university.

The plan for grading A levels in 2021: Teacher Assessed Grades

In 2021 teachers are grading students' work based on the content actually taught during the disrupted academic year rather than the full curriculum for each subject (JCQ, 2021). Under the guidance of exam boards (the awarding bodies), each exam centre (usually the individual schools, colleges and academies where students are taught) will submit its policy on determining teacher assessed grades in a consistent and fair way. Exam boards will review each centre's policy.

There is no set requirement of how much content the teachers should have taught. For each A level, teachers are to grade students based on an overall assessment of course work, class or homework, NEAs, internal tests, and mock exams. The evidence teachers consider for grading will be consistent for the cohort, but with flexibility given the disrupted learning.

Exam boards have provided each exam centre with common grade descriptors which teachers must use to make grade judgments. Next, the centres must compare and standardise the grade judgments of 2021 cohort with the centre's grade distribution data in 2017-19 for each grade in each subject and for the centre as whole. The centres must consider limitations of such comparison. Where there is '*significant divergence*' from centre level profiles of previous years, then Heads of Centres need to address the disparity. However, the evidence of student's work should be the basis of student's grade.

The guidance elaborates on how schools should allow flexibility in considering the evidence for grading; **maintain fairness, reliability,** and **validity in grading; conduct internal and external quality assurance checks**, and the process for appeals.

This places considerable responsibilities on teachers. With every exam centre having its own policy, teachers must adapt to new grade descriptors in a short time span. The grading process means teachers must be fair while knowing the resources and grading across schools have not been consistent. Teachers need to be unbiased; be able to assess students' performance rather than potential; be flexible in considering a range of evidence due to the pandemic; and avoid grade inflation despite little clarity on what constitutes *significant divergence* from historical grades – the criteria which would trigger exam board quality checks at their school (Lough, 2021).

What this means for students in 2021

The Education Policy Institute (2020) has warned of several issues that stem from this system of teacher assessed grades. Schools have ended up teaching different parts of subject curricula. Because of this, grades of students from different schools will reflect different parts of the syllabus and a variety of assessments. Consequently, the learning achievements of students awarded similar grades in different schools will not necessarily be commensurate. Neither will grades awarded in 2021 necessarily be commensurate with those of students attaining similar grades in 2017-19.

Approaches to grading will also likely differ across exam centres. According to Natalie Perera, chief executive of the Education Policy Institute "this could result in large numbers of pupils appealing their grades this year or extremely high grade inflation, which could be of little value to colleges, universities, employers and young people themselves" (Britten, 2021).

These issues are likely to impact students in several ways. The first is in assessing exactly how students have lost out on learning and which students have been most affected. Covid-19 has scarred the education of students. Disruption to schooling between March 2020 and April 2021 was unprecedented in its scale, with most pupils missing over half of their expected days in the classroom, with a common feature of disadvantaged pupils suffering particularly large losses during two periods of school closures (Elliot Major et al., 2021).

Because there is no common assessment taken under standard conditions, it is impossible to produce national measures of lost learning for this year's A level cohort. Moreover, as we shall discuss in Section 3, standardising exams at the exam centre level means that data on schools in poorer areas is not comparable with data from wealthier areas. The danger here is that lost learning is invisible in national data, meaning that policies to mitigate these harms cannot be targeted at those who need them most.

Also, as potential losses in learning will not necessarily be visible in student grades this year, many students may be underprepared for their career destinations (EPI, 2021). The pandemic has reduced internship and job opportunities and increased the attractiveness of higher education, encouraging more students to apply for undergraduate courses (Fuller, 2021). However, it is not clear how teacher assessed grades will shape higher education admissions. Students with incommensurate grades will compete for university place on inconsistent grounds. Also, less advantaged

students are at a greater risk of not securing a university place because of issues of how fairness is maintained in grading frameworks and because of concerns with systemic data use (see sections 3 and 4).

Despite an increase in university applications, university admissions departments are cutting offers (Hall & Adams, 2021), in some cases because of over-recruitment in 2020 (Britton and Waltmann, 2020). If the kind of grade inflation occurs in August that is expected, students with very good grades,

but who don't meet their university offer may not be able to find a place. While demand exceeds supply at many preferred destinations, at issues here is (i) the distribution of those who miss out; and (ii) the means available to some who are in danger of missing out to capitalise on already structured advantage. For instance, the *Sunday Times* reports on lobbying of universities admissions tutors by private schools (Griffiths, 2021) in advance of the release of results, but made possible because schools and teachers have foresight of student grades this year.

2. HOW DID WE GET HERE AND WHAT CAN WE LEARN FROM 2020 ALGORITHM CONTROVERSY?

Summary points:

- Exams were scrapped early in the covid-19 crisis.

- In 2020 A levels were awarded by teachers via centre assessed grades but standardised using an algorithm.

- Standardisation impacted students individually but critically this impact was not evenly distributed.

- Collective action in 2020 forced the Department for Education to reverse algorithmically standardised grade adjustments.

- Ofqual's process of grade standardisation is meant to achieve fairness, but itself raises concerns about to whom it is intended to be fair.

What happened in 2020

In March 2020, the DfE cancelled upcoming exams and set up an alternative grading arrangement. A levels were awarded via Centre Assessment Grades (CAGs). For each student, teachers submitted grades and rank order within each grade for each subject to the exam centres based on their judgment of what students would have achieved had there been exams.

As results had to be declared in August there was a time constraint in rolling out a standardised approach for different schools to arrive at students' estimated

grades and rank order (Ofqual, 2020a). In an effort to be fair and consistent across schools the grades were

standardised at the exam board level (Ofqual, 2020b). This was done using an algorithm to standardise grades based on historic A level data from schools between 2017-19, see Box 1 for details.

However, when the results were released there was significant controversy. The centre assessed grading process resulted in widespread grade inflation. Prior to release, grades had been downgraded via algorithmic standardisation. The 'goal' of the algorithm was to avoid grade inflation by delivering the 'right' school level performance (Ada Lovelace Institute, 2020), in other words, in line with historic norms.

Standardisation impacted students individually but critically this impact was not evenly distributed. For instance, grades of students from state schools were 20% more likely to be downgraded than those from private schools (Hyland Deeson, 2020). Subsequently the standardised results were dropped and student grades awarded as per Centre Assessed Grades.

Even despite the reversal, some pupils received a larger boost from the move to teacher predicted CAGs, and hence to their future education and employment prospects – particularly pupils with graduate parents (Anders et al. 2021). This is important because a variant of this system is being used again in 2021.

Box 1. A level grading in 2020 – the A level algorithm controversy and a change of plan

- Centre assessed grading led to 38% of entries being awarded A/A* grades before standardising, a significant increase on previous year(s).

- Standardising was seen as an important process by Ofqual and the DfE because without it, the likely inflationary effect would undermine the confidence in grades awarded, in the regulator and in the government department.

- The exam boards adopted a statistical model – an algorithm – proposed and developed by Ofqual to standardise grades across centres in each subject. The model combined a range of evidence such as expected grade distribution at national level based on previous years' results, results for each centre and prior attainment (GCSE results) of current and previous cohort at centre level.

- The standardisation process considered previous data from 2017-19. Exam boards made adjustments by grading students up or down to maintain parity with these parameters while retaining student's rank-order (Ofqual, 2020c; 2020d)

- When the results were released to students in August 2020, the overall proportion of A/A* grades looked to be in line with previous years: 27.6% in 2020 against 25.2% in 2019 (Ofqual, 2020e).

- But almost 40% (280,000) of entries had been downgraded during standardisation. It was the record high number of A/A* grades combined with the initial desire to keep a norm-referenced type approach that led to the requirement for algorithmic downgrading of 40% of results.

- Students, parents, and politicians from all major parties expressed dismay. With the risk of missing out on university places, downgraded students threatened to join a legal action against DfE and Ofqual. (Hill & Davies, 2020)

- Discussing exacerbation of existing social and educational inequalities, the Institute for Government wrote in its blog that "Using data on schools' performance from the last three years meant that high-performing students from under-performing schools, and schools that had improved their performance rapidly in recent years, were penalised by the algorithm." (IfG, 2020)

- After the government received complaints on unfair result outcomes, it scrapped the algorithmic results and reconsidered CAG, which then led to 38% of entries with A/A* grades (Adams, 2021; Anders et al. (2021)

3. STRUCTURING FAIRNESS IN EXAM GRADING

Summary points:

- Exam standards are typically maintained using one of two approaches, norm referencing and criterion referencing.

- Choosing one approach over another is a political choice that impacts fairness in different ways.

- In the decade prior to covid-19, Ofqual's standardisation processes were closer in practice and outcomes to norm referencing.

- What's at stake for students under the attainment referencing and comparable outcomes policy is that improvement over time, due to better teaching say, or harder working students, does not show up in grades awarded.

- This choice has been upturned by covid-19, yet the implications of this have not been fully debated. This is an important matter for exam regulation in the future.

Approaches to standardising: norm vs criterion referencing

To understand how fairness is structured in exams we need to consider the process of standardising. Exam boards use a set of standardising methods to broadly ensure the same proportion of students achieve specific grades in different locations and from one year to the next (Newton, 2021). Ofqual's standardising policy maintains A-level exam standards by referencing attainment of previous years' cohorts with the current year's cohorts. This approach, both in its use of predictive statistical practices, and in its steady attainment levels produced over the past decade, displays many of the characteristics of norm-referencing. Ofqual has never explicitly mandated norm-referencing or alternatives, such as criterion-referencing (Newton, 2021). Nevertheless, shaped by changes in political and social attitudes towards exam results, its policy has swung more closely towards norm-referencing in recent years. We discuss some of the features and implications of this in Box 2.

Box 2. Grading frameworks: criterion-referenced versus norm-referenced approaches

The maintenance of grade standards from year to year and issues of grade inflation receive considerable attention in policy and media coverage. In thinking about the fairness of grades, it is vital to distinguish between **criterion-referenced and norm-referenced approaches**. Where grades are criterion-referenced, they aim to measure whether a student has met an absolute standard. Thus, if grades are criterion referenced, both the average mark and the percentage who receive A grades should rise if the standards achieved by students improve, for example as a result of improved teaching and resources available to all students.

Norm-referenced grades are assigned on the basis of relative performance. For example, the percentage of students who will get an A will be predetermined, and how good a performance will be necessary to receive an A will differ from year to year.

A level A grades rose from 10% in 1986 to 27% in 2010. From 2010 to 2019 the percentages of A grades has remained relatively stable, hovering between 25.5% and 27% (Smithers 2020). Historically, Ofqual has avoided strictly mandating norm-referenced or criterion-reference approaches and in practice it employs methods from both camps (Newton, 2021). What is likely however is that changes in grading since 2010 have placed greater emphasis on norm-referencing features such as the use of historic data and prediction models and relatively less on examiner judgement.

Thinking through whether norm referenced, or criterion referenced approaches to assessment are fairer requires reflection on the purpose of assigning grades. In some cases – such as the Driving Test – there are strong reasons for taking a criterion referenced approach: what matters is that someone has the right level of skill and knowledge to drive safely, rather than how good they are relative to other drivers. In other cases, such as awarding a merit scholarship, there are strong reasons for taking a norm referenced approach: what matters is which students are best relative to the other candidates.

In the case of A levels, which have switched from norm-referenced to criterion-referenced, and then back again, **we can see educators and policymakers attempting to respond to two competing constituencies:**

1. To the extent that it is believed that A level grades play a **signalling and sorting function,** allowing universities and employers to pick out the most academically able candidates, then a norm referenced approach would appear to be indicated.

2. To the extent that **education aims to be student-centred**, and to encourage each to achieve the best that they can, a criterion referenced approach would be indicated.

Ofqual's approach to fairness in exams: how A levels were graded in the years before covid-19

Traditionally students' final grades have been made up of two components: Non-exam assessments (NEAs) and exams. NEAs measure specific-subject knowledge that cannot be tested like timed written papers. Students' teachers marked NEA. Exams, conducted in tightly monitored conditions, were marked by the exam board for Ofqual regulated schools in England, Wales, and Northern Ireland. Based on the proportion of student's assessment through NEA and exam, a weighting of NEAs and exams was considered for final grades (Ofqual, 2021).

Exams are judged by Ofqual to be the cornerstone measure of ability. Ofqual aims to ensure that within the exam system students are competing on a level playing field (Ofqual, 2019). The main instrument it uses to level the playing field is the adjustment of grade boundaries each year (see Box 2). When setting grade boundaries, Ofqual considers fairness in two senses. First intergenerationally. Ofqual says that if the ability of any cohort is similar to historic norms from previous years, and the conditions in which the exams take place are broadly the same, then the outcomes should be similar. Second, spatially across all of the exam boards and centres under its remit (Ofqual, 2019). The idea is to ensure that a grade achieved in one year is commensurate with the same grades in another, or with a grade given by another exam board.

For this purpose Ofqual employ a principle of *attainment referencing* in years when there has been stability from one year to the next, and *comparable outcomes* to ensure that cohorts who are the lead year during structural changes to A levels are not disadvantaged (Ofqual, 2017. To make the outcomes of two cohorts comparable Ofqual uses statistical predictions for the given cohort based on historic norms (previous cohorts' grades) and senior examiners' expertise to help decide grade boundaries every year and thereby maintain standards, such that a student who achieved an 'A' grade in one year would achieve it again in another year (Ofqual, 2018).

While this process does standardise the relative number of students within grade boundaries over years there is some debate over who exactly this is fair to. It is not clear that it is fair to students who out-perform historic norms in lower-achieving schools. And it is not fair to groups of students when the grades of less-well performing students at higher performing schools are given the statistical equivalent of the benefit-of-the-doubt as happened in 2020.

This approach is different from the approach taken in the years prior to 2010, where the percent getting As and Bs increased significantly due to a change in policy (Corver, 2019). Reacting to an earlier round of grade inflation complaints, Ofqual then changed the concept of grades to be more relative in nature. It also changed the underlying assumptions of what grades measure through time. The danger here, according to Corver (2019), is that "instead of grades becoming easier to achieve through time (inflated relative to real attainment), they become harder to achieve (deflated against real attainment)". To be clear, **what's at stake for students under the attainment referencing and comparable outcomes policy is that improvements over time – due to better teaching say, or harder working students, – don't show up in grades awarded.**

4. WHAT DOES EXAM GRADING DURING COVID-19 TELL US ABOUT BROADER GRADING CONCERNS OVER THE LONG TERM

Summary points:

- The fairness of grading and standardising frameworks and their impact on inequalities following covid-19 needs to be better understood.

- Standardising using historic data means that some students get higher or lower grades than they deserve. In any given year, modelling will always lead to disadvantages for outliers, those individuals who outperform their school or cohort average

- This is unfair, especially if these students are already disadvantaged.

- Disadvantaged students from the A level 2021 cohort were already 18 months behind their peers before the pandemic (EPI 2020). They faced further challenges with technology and resources in home-based learning during the pandemic.

- Further data use that does not acknowledge the political choices inherent in grading frameworks, and their social outcomes, risks further exacerbating inequalities that these approaches structure into the current system.

In the aftermath of the 2020 controversy, much of the coverage focussed on data use and the role of the standardisation algorithm. The failure of the A-level algorithm highlights the need for a more transparent, accountable and inclusive process in the deployment of algorithms (Ada Lovelace Institute 2020). It also points to the need for a more transparent and trustworthy grading system for school exams and university admissions. In 2020 the algorithmic widening of inequalities was possible because of pre-existing inequalities structured into grading processes. The algorithm could perform calculations at scales that heightened and made the inequalities visible. Even the pre-pandemic standardised grading practice compared the performance of any ongoing year's cohort with the previous year such that grade standards are maintained across schools year on year. This indicates the influence of historic grades on the merit of the contemporary cohort.

For grading outcomes to be fair for students from diverse socio-economic backgrounds, we look at **necessary and sufficient conditions** for the correctness of learning outcomes (Lafont, 2003). As per JCQ (2021), the procedure for grading offers some flexibility to consider evidence if the student has missed a class or had incomplete work.

Even before the pandemic, the disadvantaged students of the 2021 cohort were 18 months behind their peers by the end of secondary school (EPI 2020). These students were often the most impacted by limitations on access to online resources during the pandemic. S**urvey data from Sutton Trust, Institute for Fiscal Studies and National Foundation for Educational Research** indicate issues of non-conducive environment and technological challenges of disadvantaged students in home-based learning compared to their affluent peers (EPI, 2020). So, a lack of necessary and sufficient conditions for desired learning outcomes across students would affect their grades. Moreover, the grading procedures would mask the learning losses and leave some students without the necessary skills necessary in higher education or work (EPI, 2021).

Of course, unfairness in A level exams are not the only issues of fairness in the education system. Debates about teacher assessment versus examinations and issues with appeals processes are likely to intensify in the coming years as covid-19 mitigation strategies evolve. Problems with unconscious bias amongst teachers and university admissions staff and the fairness of vocational pathways compared with academic qualifications are also relevant. As are diverging measures of inequality between the UK's devolved education systems. While these are outside the scope of this review, they will be a feature of ongoing policy debates, and where ethical guidance that is grounded in the realities of covid-19 responses is critical.

5. HOW DO ORGANISATIONS IN THE EDUCATION SYSTEM USE EXAM DATA AND WHAT ARE THE IMPLICATIONS FOR THEM?

Summary points:

- Student grades are data which flow through a complex system.

- Grades are used as individual data points and in aggregate in distinct settings across the education system. For instance, by university admissions; by future employers; by Ofqual to assess education standards across the country and from year to year.

- The burden of managing anticipated grade inflation in August will fall on universities if they accept more domestic students and bear the opportunity cost of fewer overseas students who typically pay higher fees.

- Unacknowledged uncertainties in the content and flow of data diminishes the accuracy of predictive data, affecting the decisions of data users such as universities.

- Data infrastructures don't just take data. They also shape data through processes of aggregation and standardisation. These processes can make existing inequalities in the education system worse as well as better.

Data infrastructures and data flows in the education system

Student grades are data, used for a range of purposes. These data flow through a complex set of data infrastructures which form an important part of a broader education landscape (Lane & Finsel, 2014).

A level grades are data that reflect the performance of individual students in their respective examinations and assessments. As individual data points, grades provide quantitative feedback to individual students and inform university admissions processes. In aggregate, grade data is used to assess school performance, and allow comparisons between regions and between cohorts.

Grade data is used at different scales: schools, higher education institutions such as universities, by researchers, national policymakers, and corporations. For instance, the National Pupil Database (NPD) collects and links various datasets from the DfE and local schools in order to publish the schools' performance tables (DfE, 2016). Data points include students' age, gender, attendance and level of attainment including A level results. This data is used for understanding student behaviour, the role of education, and policymaking. These data flows, linkages and processes are illustrated in Figure 1, which shows the complexity and interdependency of grade data in the broader education system.
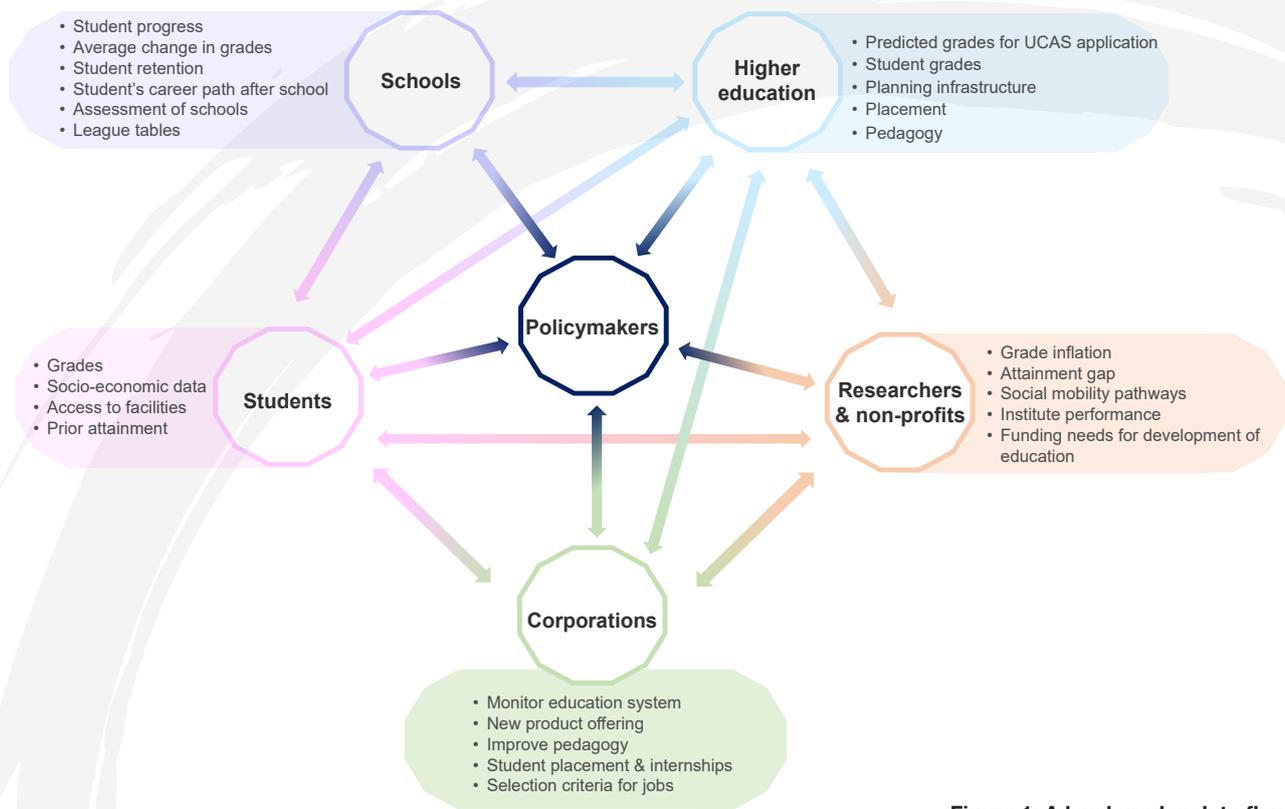
Schools
- Student progress
- Average change in grades
- Student retention
- Student's career path after school
- Assessment of schools
- League tables

Higher education
- Predicted grades for UCAS application
- Student grades
- Planning infrastructure
- Placement
- Pedagogy

Policymakers

Students
- Grades
- Socio-economic data
- Access to facilities
- Prior attainment

Researchers & non-profits
- Grade inflation
- Attainment gap
- Social mobility pathways
- Institute performance
- Funding needs for development of education

Corporations
- Monitor education system
- New product offering
- Improve pedagogy
- Student placement & internships
- Selection criteria for jobs

Figure 1: A level grades data flows

How exams grade data impacts universities

Universities and the government have diverging interests when it comes to managing the impacts of grade inflation. For universities, there is a risk that grade inflation emerging at the school level will shift the burden of managing the grade inflation to their admissions departments in the near term, and to teaching budgets in the coming years.

The increase in undergraduate applications during the pandemic has shifted the distribution of benefits across the higher education (HE) ecosystem. Universities had accepted more students in 2020 than in previous years. Predictive modelling techniques were used by admissions departments for making offers from 2017-19 and in 2020 but these are now unreliable because of the increasing uncertainties (Hall & Adams, 2021). The modelling techniques suggest reducing the number of offers with the surge in applications.

Nevertheless, ambiguity about how the A level grades would shape up in August; how many applicants from the last year who had deferred the offer would now consider taking a seat; how the pandemic would look in September 2021 for students to accept offers, or whether they would consider deferring are all missing

pieces of data which are further complicating the admissions data modelling.

Admissions: If a university makes a student an offer, and the student then meets the grades specified in the offer then the university is contractually obliged to make space available. Universities generally make more offers than the places they have available (cover ratio), assuming that a proportion of applicants will fail to meet the cut-off or not turn up. Covid-19 and uncertainties around grade inflation have made it more difficult for universities to make predictions about how students will perform in assessments, and how many students will accept their offers.

This year, universities are reducing their cover ratio to avoid repeating the surge in student intake they saw last year. For instance, Oxford and Cambridge have reduced their cover ratio by 9% and 10%, respectively (Whittaker, 2021). Universities are incentivised to do this in part because the government regulates student numbers by imposing a cap on how many domestic students universities can accept, and fines universities if they exceed this number.

This is exacerbated because some universities will bear the loss of the lucrative income from overseas

students (Foster & Cameron-Chileshe, 2021). The Education Policy Institute has suggested removing the cap on university places to manage grade inflation (EPI, 2020). But regardless of this policy, there are likely to be significant impacts on the university sector for the next few years.

Administrative uncertainty: Based on the final status of the accepted offers, universities will have to make provisions to organise the curriculum delivery and accommodation facilities considering social distancing. Even if the universities can accommodate more students in the coming year, they have imminent concerns over financial capacities to work with students' placement, which varies from course to course (Fazackerley, 2021).

Provision for students to cope with degree-level learning: Some universities anticipate admitting students with inflated grades that do not adequately represent actual learning. Such universities estimate that their potential undergraduate cohort will have lower proficiency. The institution will have to find ways of providing them with more support to manage the rigour of a degree-level course (Foster & Cameron-Chileshe, 2021).

Summary

The ethical considerations set out in this review have several implications for policy and the governance of exams in England and in other devolved nations. It seems that in an effort to avoid repeating the 2020 algorithm controversy, the government in 2021 have implemented a grading system that does not sufficiently serve the purpose for which it is designed (Timmins, 2021).

Issues of grade inflation have made headlines again in 2021 because of the uneven distribution of higher grades between schools and because of the difficulties it has caused for university admissions. But the focus on grade inflation neglects serious issues caused by the pandemic itself. For instance, teacher assessed grading, which standardises at school/exam centre level risks hiding learning loss by students. Because poorer students missed out on more learning than richer students during school closures, they have more to lose from mitigation policies that do not adequately identify schools and students most in need of help.

The impact of covid-19 on students is likely to be felt for years. Discussion about credible policies to address learning losses must be supported by data, however A level data in 2021 is not up to this. This must be addressed in coming years.

Planning for future years should incorporate a multi-year plan and must include contingency for exams and non-exam based assessment. In a report that looked back at the 2020 controversy, the Office for Statistics Regulation sets out three key principles that grade awarding frameworks: frameworks should be open and trustworthy; be rigorous and ensure quality throughout, and; they must meet the need for which they will be used and provide public value (Office for Statistics Regulation, 2021). These are useful principles, and in the coming months they should be augmented by serious debate, discussion and dialogue between those in policy, in the education sector and the public about what kind of exam system will best contribute to a covid-19 recovery.

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About this review

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This selective review was based on a study of academic and grey literature as well as commentary on education over the past year. The desk-based study focussed initially on ethical analyses of the impacts of covid-19 on the English A level system broadening out to include perspectives from contiguous domains such as education policy and data policy. Selection criteria were applied so that the returned material focussed on A level exams in 2020 and 2021, with historic data added where appropriate to address issues found in the contemporary snapshot and to support the review. The review has been organised around major themes found in the analysis. For further details about this review contact Cian O'Donovan at the Department of Science and Technology Studies, UCL.

Email: c.'donovan@ucl.ac.uk.

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About the UK Pandemic Ethics Accelerator

The UK Ethics Accelerator is a UKRI/AHRC-funded initiative that brings UK ethics research expertise to bear on the multiple, ongoing ethical challenges arising during a pandemic emergency. We provide rapid evidence, guidance, and critical analysis to decision-makers across science, medicine, government, and public health. We also facilitate public stakeholder deliberation around key ethical challenges.