



EVALUATION REPORT

ARGUING WITH CONFIDENCE

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Executive Summary

Overview

There are persistent gaps in attainment between advantaged and disadvantaged pupils. The Office for Students (2022) reported that “the gaps in development and attainment between advantaged and disadvantaged children are evident from the early years and widen throughout school.” Covid-19 and the impact of school closures has widened this attainment gap. Nationally, the disadvantage attainment gap is at its largest since 2012 (Education statistics, 2023). The dire need for breaching this deepening gap has led to a shift in outreach efforts towards attainment-raising initiatives nationally.

This divergence in attainment between advantaged and disadvantaged students could stem from the different pedagogical approaches and activities involved in the delivery of the curriculum between selective and non-selective schools. As reported by Debate Mate (2022): “Children from disadvantaged households are much less likely than their peers to take part in extracurricular activities, with academic activities the least likely of activities to be offered from students from disadvantaged backgrounds”. This is supported by findings that competitive debating is an activity that the majority of independent and selective schools engage in, as opposed to the non-selective institutions (Almeida-Hill et al, 2022).

The Arguing with Confidence intervention was, thus, designed to offer students of non-selective schools the opportunity to take part in an extracurricular debating activity that is believed to have strong associations to attainment-raising outcomes. Programmes and research conducted in the US have shown a connection between debating and attainment. Mezuk (2009), who conducted longitudinal research from 1997-2006, found that students who participated in the Urban Debate League (UDL) in Chicago generally had a high grade point average (GPA), were more likely to graduate high school and had higher scores in English and reading comprehension on college aptitude tests (p.300).

This debate-oriented programme was piloted in four schools across Kent and Medway in the 2023/24 academic year. In line with privacy measures outlined in the approved ethics submission, the schools will be referred to as A, B, C and D in the analysis. The analysis is for the most part conducted at the aggregate level, except for the focus group discussion data which is split by the schools to preserve the nuances in experiences between the different schools and to better inform the future approaches of the delivery team.

The first half of this report presents the rationale behind the development of the programme and its aspirations to raising KS4 attainment as a long-term outcome. The second part discusses the findings, current limitations and recommendations for greater efficacy in the next iteration of this programme.

Project Aims

The aim of the intervention is to improve literacy attainment through the development of key learning skills such as oracy, critical thinking and self-efficacy. The objective of the research

will be to evaluate the effectiveness of the programme by measuring whether or not students have made improvements to or gained confidence in using the key learning skills identified – and if these developments contribute to GCSE English Language attainment in the long term.

Participants

This pilot of the intervention worked with Year 10 students from low socio-economic backgrounds (identified by the use of metrics such as Free School Meals, as well as area-based indicators such as Index of Multiple Deprivation Q1 and TUNDRA Q1) from four participating schools. The intervention has specifically targeted those students who are currently predicted to achieve a 3-4 grade boundary for GCSE English Language and meet multiple widening participation criteria.

Data Collection Methods

A mixed methods approach has been adopted for this research study, with tools designed to capture qualitative and quantitative data. To mitigate the challenge of incomplete pre-post data as well as the over-reliance on external attainment data, collection tools have been embedded within the intervention activities. This has permitted the trial of novel methods of pre-post evaluation without the use of conventional pre-post surveys that have previously yielded unreliable self-reported data from students' disengagement with surveys, which are perceived to be 'extra work'. Bespoke methods used for assessing the programme's effectiveness looked to assess improvement in participants' key learning skills and overall performance in GCSE English. The mixed methods touch on an array of in-built evaluation tools to assess the desired short-term outcomes of the programme. These included: i) a comprehensive student handbook that encapsulated every activity delivered as part of the programme, with specific sections used as evaluative tools through tasks and reflective activities (data for pre-post evaluation collected at the start and end of programme); ii) records of pre-post time spoken in debates; and, iii) semi-structured post-intervention focus group discussions.

Methodological Limitations

It was planned that attainment data, presented in the guise of written English assignments, would be provided by the schools to feed into this evaluation study. However, this arm of the data collection design failed to materialise. Therefore, the analysis was based entirely on internally assessed metrics and self-reported measures. Moreover, since this was a pilot project, the opportunity was used to trial the newly designed evaluation tools – some of which were more effective collection methods than others. As a result, some activities registered far greater missing data than methods embedded in more close-ended tasks. The critical thinking test in particular is believed to have yielded misleading results. If the wrong tools are used to measure an outcome, the results could lead to erroneous conclusions. It is, however, commended that novel tools were trialled in this pilot project, which will hugely benefit the effectiveness of future evaluation designs.

Findings

The feedback from the FGDs and the skills reflection from the student handbook were overwhelmingly positive with regards to feeling more equipped to perform better in English as a result of the programme. Many students suggested it would be beneficial to extend the programme over a longer time period, while others wished the programme had been introduced a year earlier. The aforementioned group of students reflected on how the skills they've acquired during Arguing with Confidence could have been better utilised if they had the chance to participate in debating activities at an earlier stage of their academic journey. These reflective remarks are an indicator of how useful they deem the sessions to be for their academic development.

The most definitive method of measuring increased attainment is to analyse pre-post formal school grades in English Language; which is currently beyond the scope of this evaluative study due to data and temporal constraints. However, the overall conclusion from the research findings is that, through debating, there's been statistically significant positive improvements across some areas of the identified skills: oracy, critical thinking and self-efficacy. The programme has successfully encouraged students from non-selective schools to engage in an extracurricular activity otherwise not accessible to them, which has been empirically proven to improve academic achievements.

Overall, both qualitative and quantitative data revealed some positive outcomes for self-efficacy, critical thinking and oracy skills. Increased confidence was clearly evidenced in the quantitative findings and further supported by the FGDs reflections. Speaking and structuring skills also ranked quite highly in terms of the number of associated reflections. This is, again, consistent with the quantitative findings that indicated there were statistically significant improvements in speaking skills and organising and structuring.

Although critical thinking was not a topic present in all four school-level FGDs, many students had alluded to developing evidence-based reasoning when they had to debate from an opposing perspective to their incumbent view using information gained through research. This supports the finding that even if critical thinking was not directly reported to have been improved in the pre-post responses, evidence-based reasoning was found to be statistically significant.

In conclusion, there is satisfactory evidence to show that the positive short-term outcomes of developing identified skills were met. More can be done to ensure stronger outcomes in terms of critical thinking and problem-solving skills in the future.

Recommendations

There are areas of improvement in terms of delivery that have been recommended based on students' feedback. They are predominantly linked to increasing the length and timing of the delivery. Although only a recommendation, the number of students wishing for the programme to be extended attests to how successful it was in engaging the participants. Therefore, the delivery considerations are less important than the recommendations linked to improvements in methods of outcomes' measures and the evaluation plan. Contingency plans must be built into the programme to avoid missing attainment data for the next round of evaluation. There are some measures that did not work as intended, which will also need to be rethought.

1. Introduction

There are persistent gaps in attainment between advantaged and disadvantaged pupils. Arguing with Confidence is a pilot for widening participation in debating intervention, which will work with Year 9 or 10 students from low socio-economic backgrounds (identified by the use of metrics such as Free School Meals, as well as area-based indicators such as Index of Multiple Deprivation Q1 and TUNDRA Q1). The aim of the intervention is to improve literacy attainment through the development of key learning skills such as oracy, critical thinking, evidence-based reasoning and self-efficacy.

The programme is being piloted in four schools across Kent and Medway and will specifically target students who are currently predicted to achieve a 3-4 grade boundary for GCSE English Language and meet multiple widening participation criteria.

The objective of the research will be to evaluate the effectiveness of the programme by measuring whether or not students have made improvements to or gained confidence in using the key learning skills identified, as well as whether these developments contribute to GCSE English Language attainment.

This programme is funded by the Kent and Medway Collaborative Outreach Programme (KaMCOP), which falls nationally under the UniConnect funding umbrella. UniConnect partnerships are now required to "deliver evidence-based collaborative approaches to raise attainment at Key Stage 3, and into and through Key Stage 4, in local state secondary schools" (Office for Students). This means that, through KaMCOP, the University of Kent is obligated to deliver activities which support the attainment of disadvantaged students and report on the activities' effectiveness.

2. Programme Rationale

Context

For the academic year 2020/21, only 18.4% of students who were eligible for Free School Meals at any time prior to the age of 16 progressed to a Higher Education Institution in the

UK, compared with 81.6% of students who were never eligible for Free School Meals (Office for Students, 2023). Yet, if we control for prior attainment at GCSE, the chance of entering higher education is relatively equal regardless of FSM status. The inequalities in progression to HE are, in effect, explained by their attainment at the end of KS4. Attainment at GCSE is a key predictor of progression to HE, and supporting increased attainment at GCSE can be the key to increasing the participation of economically disadvantaged students in HE.

There are persistent gaps in attainment between advantaged and disadvantaged pupils. The Office for Students references that “the gaps in development and attainment between advantaged and disadvantaged children are evident from the early years and widen throughout school” (OfS,20232). Covid-19 and the impact of school closures has widened this attainment gap. Nationally the disadvantage attainment gap is at its largest since 2012 (Education statistics (A), 2023).

Looking at the local region, the latest data shows that in non-selective schools across Kent and Medway only 53% of learners achieve good passes at GCSE, and this figure drops to 37% when considering those classed as disadvantaged (DfE Performance Tables,2023).

Key areas identified

Evidence suggests that debating contributes to the development of key skills associated with academic performance, such as **critical thinking**, **oracy**, and **self-efficacy** (Mirra et al, n.a.). Mirra et al note: “One literacy practise gaining recognition for its ability to engage adolescents in academic reading, writing, listening, and speaking while also encouraging them to recognize the power of their voices and deliberate about the most important civic issues of the day is organised classroom and competitive debate” (Mirra et al, n.a.). Despite this, state-funded schools, particularly those in Kent and Medway, have fewer opportunities to participate in and develop key debating skills.

A) Critical Thinking

“Critical thinking is the art of making clear, reasoned judgements based on interpreting, understanding, applying and synthesising evidence gathered from observation, reading and experimentation” (Burns & Sinfield, 2016, p.94).

Critical thinking also underlies the development of other key skills. Wulandari et al (2021) argue that “Individuals need to think critically about new information as a basis for making decisions so that they can solve problems constructively, draw reasonable conclusions, and make appropriate decisions” (Wulandari et al, 2021, p3.).

Pearson Talent Lens developed the R.E.D model, which separates critical thinking into three constituent parts. They argue that these areas are essential building blocks of critical thinking. The RED module of critical thinking is depicted in Figure 1.



Figure 1: Critical thinking model created by Pearson Talent Lens.

Based on the R.E.D model, the University of Kent believes that there are 4 key areas that can support the development of critical thinking. These are detailed in Table 1 below.

Table 1: Key components of Critical Thinking

Key Components of Critical Thinking	Link to Critical Thinking Skills
Understanding and synthesising information	Understanding refers to the ability to grasp the meaning, significance, or implications of information or concepts. It involves making sense of the details, relationships, and context within the information. Synthesising information is the process of combining and integrating various pieces of information or ideas to create a new, cohesive understanding. It involves drawing connections, identifying patterns, and generating insights from different sources.
Evidence-based Reasoning	Evidence-based reasoning involves making logical and informed decisions or conclusions by relying on credible and relevant evidence. It emphasises the use of factual information, data, or observations to support claims, arguments, or judgments.
Problem solving	Problem solving involves resolving issues or challenges to achieve a desired outcome
Decision making	Decision making is the process of making a choice from multiple alternatives to achieve a specific goal or resolve a problem. It involves assessing available

options, considering relevant information, and making choices that align with desired outcomes.

Why does critical thinking matter to widening participation?

It can be argued that critical thinking is an essential skill for success within a university environment (Nold, 2017). Students are expected to move beyond fact and fiction and analyse the information in front of them. It has more recently been recognised as an independent academic discipline, which Cambridge Assessment argues “acknowledges that it is a skill which can be explicitly and purposefully taught and learnt” and is a discipline that can be applied to a range of contexts where reasoning occurs (Cambridge Assessment).

Despite this, Clifton (2012) discusses how students at all levels can struggle with critically evaluating and analysing texts (Clifton, 2012, p.30). Additionally, research indicates that individuals from disadvantaged backgrounds have lower critical thinking capabilities (Cheung et al., 2001 cited in Thompson et al, 2022). Therefore, developing students' critical thinking skills should be prioritised by widening participation practitioners. This will not only support students in making informed decisions on their future but will also support their success at university, should they progress.

How can critical thinking increase attainment?

Development of critical thinking skills has been shown to increase attainment in a range of subjects. For example, research undertaken by the University of Cambridge showed that students who had studied Critical Thinking as a discrete subject at AS level tended to do better in their other A level subjects (Cambridge Assessment Network). Additionally, Ren et al (2020) found that critical thinking “made unique contributions to academic performance even when general cognitive ability was controlled for” (Ren et al, 2020, p.1).

Students sitting GCSE English Language papers would also benefit from increased critical thinking skills as, in both language and literature papers, students are expected to critically evaluate texts by comparing ideas and perspectives in a clear and relevant way (AQA).

How does debating support the development of critical thinking skills?

Stockdale (2020) explains, “debating provides a space for students to confidently and critically explore, consider and challenge ideas and concepts with their peers” (Stockdale, 2020, p.286). Debating supports the development of critical thinking skills by getting the students to analyse both sides of the argument, asking to build an awareness of their own thinking to identify where they may become vulnerable in a debate (Tumposky, 2004, p.53). Following from Tumposky’s point, debating forces participants to choose a side and voice an opinion, but also potentially argue for something that they do not necessarily agree with. This forces students to consider different perspectives than their own.

B) Oracy

The English Speaking Union (ESU), defines oracy as "having the vocabulary to say what you want to say and the ability to structure your thoughts so that they make sense to others" (English Speaking Union, a). The University of Kent believes that there are four key areas that can support the development of oracy. These are detailed in Table 2 below.

Table 2: Key components of Oracy

Key Components of Oracy	Link to Oracy
Articulating an opinion or point	This involves expressing thoughts, beliefs, or viewpoints in a clear, coherent, and well-organised manner. When someone articulates their opinion, they are effectively communicating their perspective on a particular subject or issue. Articulating an opinion often involves more than just stating a viewpoint; it may include offering insights, presenting arguments and addressing counter arguments.
Organising and structuring arguments	Organising and structuring arguments involve arranging and presenting ideas in a logical and coherent way to effectively communicate a point of view. Organising arguments refers to the systematic arrangement of ideas and information in a way that makes them easy to understand. Structuring arguments involves building a framework that supports the main point, including the organisation of individual components within the argument.
Speaking and delivery skills	This is the ability to communicate effectively and persuasively through spoken words, taking into account various elements of presentation, expression and engagement. Key components include; clarity, pitch and tone, body language, confidence, engaging the audience and adaptability.
Listening skills	This is the ability to effectively receive, interpret and understand verbal and non-verbal messages during communication. Active listening involves more than simply hearing words; it involves giving full attention to the speaker, comprehending the message and responding appropriately.

Why does oracy matter for widening participation?

Research consistently states that students from low socio-economic backgrounds start school with lower levels of spoken language than their more advantaged peers – and that this gap increases as they move through school. For example, the National Literacy Trust found that the UK's most disadvantaged students leave secondary school around 18 months behind their advantaged peers in language and vocabulary (National Literacy Trust, a).

The pandemic has increased the language gap between disadvantaged students and their peers. “Two thirds of primary teachers (69%) and nearly half of secondary teachers (44%) say school closures had a negative effect on the spoken language development of students eligible for pupil premium, compared with one in five teachers for their most advantaged pupils” (English Speaking Union, b). Additionally, research into secondary school students’ reading assessment in the autumn term, 2020, noted that schools with a high proportion of pupils from disadvantaged backgrounds had 50% higher learning losses than those with fewer disadvantaged pupils (National Literacy Trust, b).

How can oracy increase attainment?

The Education Endowment Foundation’s (EEF) trials of oral language interventions in schools have demonstrated that pupils make up six months’ additional progress in reading comprehension over a year and are shown to have a larger impact on students from disadvantaged backgrounds (Education Endowment Foundation). Additionally, there is evidence to suggest that communication skills have a direct correlation to GCSE attainment. For example, evidence suggests that young people with good communication skills are four times more likely to get five A*-Cs (9-5s) at GCSE (Better Communication Research Programme cited in English Speaking Union, a).

Furthermore, oracy is assessed in GCSE English Language through a spoken language assessment. The spoken language assessment can be on a topic of the students choosing. Debating can help to support this element by providing students with knowledge and experience on social issue topics, which they can discuss as part of this assessment.

How does debating support the development of oracy skills?

Competitive debating addresses each of the areas identified above as essential components to oracy.

Table 3: Programme’s link to key components of Oracy

Components of 'Oracy'	Development of oracy skills through debating
Articulating a point	Participants are required to come up with logical reasons for or against a statement and clearly articulate these points to the opposition.
Structuring and organisation	Given that participants have limited time to get their point across, participants must organise their time effectively and consider how to order their arguments to maximise their impact.
Speaking and delivery	Debating promotes confidence in public speaking and also provides opportunities for participants to be creative and convincing with how they articulate a point. In debating they are asked to be convincing, and the competitive nature allows students to develop

	persuasive language skills.
Listening	Participants are required to listen carefully to their opposition in order to effectively respond and counter their arguments. This might include understanding the argument they are putting forward and identifying weaknesses and gaps in the argument they have presented.

Additionally, debating presents an opportunity for students to make connections between what they are learning in school and real-world social issues. Moorghan argues, “The use of topics of real-world significance shows students the connection between the oracy work they engage in in the classroom and the wider world” (Moorghen).

C) Self-Efficacy

Self-efficacy refers to ‘beliefs in one's capabilities to organise and execute the courses of action required to produce given attainments’ (Bandura, 1997, p.3). According to social cognitive theory, there are four main sources of information that develop students’ self-efficacy. These are detailed in Table 4 below.

Table 4: Key components of Self-Efficacy

Key Components of 'Self Efficacy'	Link to Self-Efficacy
Mastery experiences	Mastery experiences are the most powerful source of creating a strong sense of efficacy because they provide students authentic evidence that they have the capability to succeed at the task (Palmer, 2006).
Vicarious (observational) experiences	Students obtain information about their own capabilities by observing others, especially peers, who offer suitable possibilities for comparison (Schunk, 1987).
Social persuasions	This social persuasion helps students develop beliefs of self-efficacy. Persuasive communication and evaluative feedback is most effective when people who provide this information are viewed by students as knowledgeable and reliable, and the information is realistic (Bong & Skaalvik, 2003).
Physiological and psychological states	The fourth source of efficacy information that people draw from their physiological, emotional and mood states. A positive mood state strengthens someone’s self-efficacy, a

dejected mood state enfeebls it (Van Dinther, Dochy, & Segers, 2011).

TASO argues that, compared to confidence, “self-efficacy is a more specific construct as it is always defined in relation to a task, goal, or domain” (Thompson [et al, 2022](#)). They make the distinction between performance self-efficacy and academic self-efficacy. Performance self-efficacy is orientated toward a specific task or skill, whereas academic self-efficacy addresses academic ability as a whole. For the purposes of Arguing with Confidence, self-efficacy development will be assessed with regard to performance in specific skills as opposed to general academic self-efficacy.

Why does self-efficacy matter for widening participation?

Self-efficacy theory suggests that it is the responsibility of the government and society to provide everyone with sufficient opportunities to engage in mastery experiences, receive positive social persuasion and witness positively reinforcing models that will engender a strong sense of self-efficacy (Gallagher, 2021). Van Dinther, Dochy & Segers (2011) found that HE intervention programmes influenced and improved students’ self-efficacy and that programmes which intentionally tried to embed social cognitive theory were more effective at developing self-efficacy.

How can self-efficacy increase attainment?

Research has found a correlation between self-efficacy and academic performance (Imperial College). Students who have higher levels of self-efficacy are more likely to “participate more readily, work harder, persist longer when they encounter difficulties, and achieve at a higher academic performance level” (Schunk & Pajares, 2002 cited in Imperial College).

Performance self-efficacy has a stronger correlation with attainment than academic self-efficacy (Thompson et al, 2022). This assumption can be made on the basis that it is easier for students to report increased confidence in a specific task, as opposed to in academic performance more generally (Schneider & Preckel, 2017 cited in Thompson et al 2022).

3. Programme Design

Programme Aims

Arguing with Confidence is a debating programme specifically designed **to develop key learning skills**, which are linked to increased literacy believed to raise students’ academic attainment – especially their performance in KS4 English. The key learning skills identified include **oracy, critical thinking and self-efficacy**. The University of Kent has used academic research to identify how these key learning skills can support attainment and how these skills will be addressed and measured within the programme (See Section 2 of this report). These skills have been considered throughout the Arguing with Confidence debating programme and have been embedded into the activities that are delivered during each session.

As illustrated in the Theory of Change for this programme (see Appendix A), the desired long-term outcome is to **increase progression to HE for the disadvantaged participants** taking part in this outreach intervention. Evidence-based, short-term outcomes underpin the design of this debating programme in order to achieve the above mentioned result. At the core are these overarching objectives:

- 1. Increase Non-selective Participation:** To provide opportunities for students who would not otherwise participate in debating to do so.
- 2. Develop Academic Skills:** To provide opportunities for students to develop key learning skills, such as critical thinking, self-efficacy and oracy.
- 3. Increase Confidence:** To increase students' confidence in skills attributed with debating.
- 4. Improve Attainment:** To improve students attainment in GCSE English Language.

All the above are believed to have positive knock-on effects for raising aspirations and motivating students from widening participation backgrounds to progress to HE. To consolidate the prerequisites associated with successful progression to HE in the short-term, the programme aims to support participants in improving the following skills:

- Articulating an opinion
- Speaking and delivery
- Listening
- Organising and structuring arguments
- Understanding and synthesising information
- Analysis and evidence-based reasoning
- Problem solving
- Decision making

Development of Key Skills

A) Critical Thinking

How does Arguing with Confidence support the development of critical thinking skills?

Arguing with Confidence encourages critical thinking by getting students to think from multiple perspectives. There are three main activities that encourage students to engage critically with social issues. These activities are then embedded into debate planning each week.

Activity 1 – Questioning

Students are asked to break down the topic into separate questions to get a fuller understanding of the subject. These questions include:

- Why is this issue (and our arguments for or against it) a good or bad thing?
- Who is affected by this issue? How?
- What would the world look like if this was in place now?
- What might the other side argue?

Activity 2 – Creative arguments using topics

Students are asked to think about how the issue might be affected by different aspects of society. For example, the environment, workplace and education. This encourages students to think broader than the issue itself and consider how it might relate to other things.

Activity 3 – Using evidence effectively

Students are encouraged to think about different types of evidence and why they might relate to their topic. They spend one session thinking about collecting evidence and explaining its relevance. This is then embedded into the weekly debate planning.

Students also play icebreaker speaking games, which encourage critical thinking. For example, Hotseat asks students to argue from the perspective of a specific group that is impacted by the topic and the 'why game' encourages students to keep asking each other 'why', to drill down on the topic.

How does the University of Kent measure students' critical thinking development throughout the programme?

Students critical thinking skills will be assessed using questions taken from the Watson-Glaser Critical Thinking Appraisal. This test is one of the most established critical thinking tests used globally.

The Watson-Glaser test is designed to incorporate five elements: inferences, recognition of assumptions, deductions, interpreting, and evaluating arguments. Due to time constraints and applicability, it was decided that students would answer two questions at the start of the programme and two questions at the end. One question would require students to evaluate arguments and the other would deduce whether conclusions follow the information provided. These two areas were chosen on the basis that debating requires students to regularly practise these two elements.

B) Oracy

How does Arguing with Confidence support the development of oracy skills?

Oracy underpins the entire Arguing with Confidence programme. Speaking and listening skills are practised in every session through a variety of activities. As part of the curriculum, students are introduced to the use of PEEL (Point, Evidence, Explain, Link) to organise and structure their arguments effectively. Students also participate in a structured weekly debate, with the time that is allocated to each speaker gradually increasing each week.

How does the University of Kent measure students oracy development throughout the Arguing with Confidence programme?

The university has developed a workbook, which supports students in reflecting and tracking their progress throughout the programme. The workbook is also designed to support tracking students progress in key learning skills – particularly oracy.

Each workshop includes a reflective task, which asks students to reflect on how they

contributed to discussions throughout the session and also track how long they have spoken for. The aim is for students' speaking time to increase each week, which will be tracked through this reflective table. The table will also provide insight into how the students contributed to the debate and whether this changed as the sessions progressed.

C) Self-Efficacy

How does debating support the development of self-efficacy?

Debating supports the development of self-efficacy by providing opportunities for mastery experiences, vicarious experiences and social persuasion. Table 5 highlights the ways in which we believe components of self-efficacy are fostered through debating.

Table 5: Programme's link to key components of Self-Efficacy

Components of 'Self Efficacy'	Development of 'Self Efficacy' skills through debating
Mastery experiences	Students will practise skills related to debating on a repeated basis, allowing them opportunities to develop evidence of their capabilities
Vicarious experiences	By competing against other debaters, students are able to observe others and learn from each other. They may observe skills for being persuasive or structuring arguments and choose to practise these in the future
Social persuasions	Competitive debating provides an opportunity for students to receive feedback and measure their improvement

How does Arguing with Confidence support the development of self-efficacy?

Students will practise skills repeatedly over a period of six sessions, each week introducing a new skill while asking students to repeat the skills practised in the previous session. By repeating skills, students are able to develop mastery experiences through the process of seeing their progression each week. They will also compete against each other, which will provide opportunities for observational learning from others.

Student ambassadors will be employed to support the session and will serve to operate in a role-modelling capacity. Throughout the module, ambassadors and staff members will serve as positive reinforcement for the skills students are developing by providing positive feedback and acknowledging students' achievements. Given their position as role models, feedback from ambassadors is likely to be valued by the students as an indicator of success.

Finally students will also be encouraged to reflect on how the skills they have developed throughout the programme are valuable to them in school – and

particularly in English. By creating this opportunity for reflection, it is hoped that students will see some increase in their overall academic self-efficacy.

How does the University of Kent measure students' development in self-efficacy throughout the programme?

Students will complete a pre and post-evaluative question embedded in the students' handbook, which will measure their confidence in each of the identified skill areas as well as their confidence in doing well in GCSE English Language.

Programme Overview

Arguing with Confidence is intended to be delivered to Year 10 students from four schools in Kent and Medway. These schools are a part of the Kent and Medway Progression Federation (KMPF) and have agreed to participate in a collaborative attainment-raising working group, which aims to build knowledge and develop activities that support schools in raising the attainment of their young people.

The programme consists of four two-hour, in-school workshops and a day visit to the University of Kent Canterbury campus. Each group has a maximum of 20 students who are identified by the school as being on the 3-4 GCSE English grade boundary and meet multiple widening participation criteria. The schools choose the most appropriate lessons that the students will miss in order to attend the programme, to ensure they minimise the impact of missed lessons on students.

To achieve the outcomes elucidated in the Theory of Change (see Appendix A) – by fostering key skills to improve attainment at KS4 during the programme – the following sessions were designed as described in Table 6 below:

Table 6: Arguing with Confidence Format

Session	Aim	Description
Session 1: Build students confidence in voicing their opinion and engaging with the programme	<ul style="list-style-type: none"> ✓ Boost self-efficacy ✓ Build confidence to articulate an opinion ✓ Find out more about student interests 	<p>Students make choices on key social issues to help design their own utopian society. After deciding what to prioritise, they choose how much their chosen government would spend on each issue and then design their city. After this, they reflect on which social issues they feel are most prominent in today's society and consider how their society tackled those issues.</p> <p>This session is designed to gauge student interests, build rapport and develop confidence in students sharing their opinions.</p>

Session 2: Practice techniques for making confident presentations	<ul style="list-style-type: none"> ✓ Boost self-efficacy ✓ Build confidence to articulate an opinion ✓ Learn about how to come up with unique arguments ✓ Start developing presentation skills 	<p>Students are introduced to debating through games. These games support the students in coming up with ideas and articulating their opinions. They will think outside the box and try to link different topics to the one they are discussing for a debate.</p> <p>In this session, students will engage in their first of five debates.</p>
Session 3: Learn how to incorporate reasoning and evidence into their arguments	<ul style="list-style-type: none"> ✓ Identify different types of evidence ✓ Incorporate reasoning and evidence into their arguments 	<p>Students are introduced to different types of evidence and encouraged to undertake research to find this evidence. Students will collate evidence to enhance the points they raised the previous week.</p>
Session 4: Learn techniques to personalise and structure strong arguments	<ul style="list-style-type: none"> ✓ Learn techniques to organise, personalise and structure strong arguments 	<p>Students will consider how to effectively structure their arguments in order to be clear, concise and get their message across.</p>
Session 5: Create an awareness of the different strategies that can be used in effective persuasive writing and speaking	<ul style="list-style-type: none"> ✓ Build awareness of the different strategies that can be used in effective persuasive writing and speaking ✓ Practise incorporating persuasive language into presentations 	<p>Students begin to think about being persuasive and using different persuasive language techniques to support their arguments.</p>
Session 6: Students will pull together all that they have learned in the past six weeks and have a structured debate	<ul style="list-style-type: none"> ✓ Incorporate skills into a final structured debate 	<p>To finish the module, students complete a big final debate, with an increased time of four minutes each. Here they are encouraged to incorporate all the skills they have learned over the past five weeks.</p> <p>This debate allows participants to speak for up to four minutes, having slowly increased the</p>

	debate times over the previous weeks.
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4. Methodology

Research Aims and Questions

The aim of the research is to evaluate whether students have made any significant improvements in key learning skills through participation in the Arguing with Confidence programme. It also aims to understand whether development of these key learning skills supports improvement in GCSE English Language grades.

- Is Arguing with Confidence effective in supporting the development of students' key learning skills?
- Will improvement in these skills support attainment in GCSE English Language?
- Does Arguing with Confidence support schools' efforts in raising literacy levels and attainment in GCSE English Language?

Research Design

The evaluation has been carefully drafted based on the research questions. A mixed methods approach has been adopted for this research study, with tools designed to capture qualitative and quantitative data through methods described under the 'Data Collection' banner. We have taken measures to ensure a satisfactory sample of 80 participants, in light of expected attrition.

To mitigate the challenge of incomplete pre-post data as well as the over-reliance on external attainment data, collection tools have been embedded within the intervention activities. This has permitted the trial of novel methods of pre-post evaluation without the use of conventional pre-post surveys that have previously yielded unreliable self-reported data from students' disengagement with surveys, which are perceived to be 'extra work'.

Participants

This pilot of the intervention worked with Year 10 students from low socio-economic backgrounds (identified by the use of metrics such as Free School Meals, as well as area-based indicators such as Index of Multiple Deprivation Q1 and TUNDRA Q1).

Up to 20 Year 10 students from each school, have been selected to participate in the programme in collaboration with the schools. These students will comprise a range of different widening participation criteria, specified below, and have been identified as being on the 3-4 grade boundary for GCSE English Language.

The widening participation targeting criteria is as follows:

1. Live in an area deemed to have lower than expected participation in Higher Education, as specified by **Uni Connect wards**.
2. Live in an area deemed to have lower than expected participation in Higher Education as specified by other measures, including **POLAR 4, Tundra** and **IMD**.

3. In receipt of **Free School Meals**.
4. Are currently, or have previously been, **in local authority care**.

As the activity is focused on debating and requires students to feel comfortable speaking in front of each other, the session number has been restricted to 20 per school.

Data Collection

Bespoke methods used for assessing the programme's effectiveness looked to assess improvements in participants' key learning skills and overall performance in GCSE English. The mixed methods touch on an array of in-built evaluation tools to assess the desired short-term outcomes of the programme. The following tools were used:

Student Handbook

Throughout the duration of the programme students are asked to complete a series of different tasks designed to support the development of key learning skills. This handbook contributes to assessing students' development of these skills. Included within the booklet are some reflective tasks, which are designed to specifically measure participants' abilities or confidence in these skills. Appendix B presents the sections of the handbook associated with each metric measure. Table 7 below summarises the corresponding sections, their evaluative purpose and the timeline for the data collection.

Table 7: Built-in measurement tools and data capture intervals

<i>Applicable Sections of Handbook</i>	Purpose	Time interval of collection
Self-Efficacy, Oracy and Critical Thinking Skill Self-Evaluation	Designed to measure students' performance self-efficacy, they are asked to reflect on their skills and to respond to statements relating to expressing opinions, speaking in front of groups, listening, critical thinking and building confidence on an agreement scale.	Baseline: Students complete the task at the beginning of the first session of the event. Endline: Students repeat this exercise at the end of the last session of the programme as part of the 'Reflection' segment.
Critical Thinking Test	To assess how much their critical skills improve over the course of the programme they are given a test with two statements based on the Watson-Glaser test. Students are given a contextual question relating to a scenario and have to choose whether a statement is a strong or weak argument	<ul style="list-style-type: none"> ● Baseline: Students complete the task at the beginning of the first session of the event. ● Endline: Students repeat this exercise at the end of

	in response. The same task is repeated in the final session but with different questions.	the last session of the programme as part of the 'Reflection' segment. The statements are different from Session 1.
Debate Reflections and Self-Evaluation	Students fill out a table recording their time spoken during the debate, and record their open-ended reflection on their progress under different headings. They are required to fill out the table at the end of each debating session.	<ul style="list-style-type: none"> ● Baseline: Students complete the corresponding section at the end of Session 2 after their first debate activity. ● Endline: Students complete the table four times during the programme (Session 2-5). For the analysis, data from the last session is used for post-comparison.
Skills Reflection	Activity involves students reflecting on the whole programme and recording their thoughts on their skills and confidence relating to speaking, listening, structuring & organising and critical thinking elements. In the third column of the table they have to comment on how and when they used the respective skill over the course of the programme. This prompts some of the themes to be covered in the FGD and provides further qualitative data for triangulation purposes.	<ul style="list-style-type: none"> ● Single Point: This is part of the 'Reflection' section of the handbook and only captures data at the end of the last session, ahead of the focus group discussion.

The questions in the workbook are designed to specifically reflect on tasks they have completed and how these contribute to their skills. This does not include any sensitive topics, but is rather designed for the researchers to analyse their participation in the project. The progress of the students is tracked by comparing their responses and reflections in Session 1 to corresponding ones in Session 5. For example, the critical thinking exercise they complete in the first and last sessions is designed to inform us if participants saw an improvement in their critical skills based on the differences in their pre and post test results.

Focus Groups

A mini focus group discussion (FGD) was carried out with the students during the last session of the event. These were facilitated by trained student ambassadors and the

recordings of the FGDs are sent to UK Transcription to transcribe and anonymise ahead of the analysis. The participant groups from each school were split into three groups of no more than six students. In total, there were nine focus groups across all three schools.

The FGD did not involve any topics that are sensitive or embarrassing, but was rather a semi-structured, guided reflection discussing their experiences on the programme and how they feel they have developed their skillset. In so doing, the study incorporated student voice into the evaluation design, as the participants were given the opportunity to talk about what they felt they have gained from the programme and areas where the programme may need to be adapted. This exercise may provide more detailed knowledge of similar groups within the context of Kent and Medway and support in building an evidence base around this group. The FGDs are designed to inform process evaluation and gain insights into how the programme can be tailored to the specific needs of the targeted beneficiaries in future iterations of the programme.

In-School Written Task Assessment

As a metric to gauge distance travelled in attainment pre-post events, participating schools were requested to provide an assessment of students' performance in English at two intervals: at the start and at the end of the programme. This would help in assessing whether or not Arguing with Confidence has contributed to any observed improvements in performance.

This was intended to be straightforward for the school's personnel, as they would already be doing these tasks with them regardless of whether or not they participate in the research study and would not require any additional work from participating students. The format of this assessment would vary between schools as the ways in which schools decide to measure student attainment will be different. By taking this information, the Outreach & Widening Participation team will be able to see whether developing skills in Arguing with Confidence has contributed to improving their GCSE English grades. This will be further discussed in the 'Methodological Limitations' section, but unfortunately schools failed to comply with this request.

Data Analysis Methods

The Wilcoxon Signed Rank Test statistical test was used in conducting the quantitative analysis. The Wilcoxon Signed Rank Test is used to compare two related samples and to conduct a paired difference test of repeated measurements on a single sample in order to assess whether their population means ranks differ. The objective is to infer statistical significance from the differences between pre-post scores of the same sample of participants for each skill's proxy measure, to gauge the impact of the programme. This analysis would confirm whether the programme elicited a statistically significant change in attainment skills

of the participants. The IBM SPSS Statistics package was used to process this analysis. All of the tests were conducted at the 95 percent confidence level.

Both a deductive-thematic and inductive-reflexive approach was taken for the qualitative analysis. Since the qualitative data sets collected through the handbook and the FGDs were both semi-structured in nature, there were existing themes that had to be explored, such as: confidence, self-efficacy, perception of self, improvement of key academic skills. However, since the FGDs were about empowering students' voices, an inductive analysis drew a more comprehensive and nuanced narrative than if only preconceived themes were to be considered. As will be presented in the findings, themes of meta-cognitive strategies and the timing and application of the skills honed were discussed.

The analysis was conducted for each of the metric measures captured through the student handbooks. Unlike Pre-Post surveys, the matched responses against each metric fluctuated for different parts of the handbook depending on the attendance and engagement of students on the day or session in which they were asked to record their data. Hence, to represent the maximum number of participants in the study, the analysis was done against each measurement method separately first, which then coalesced to weave into the fuller narrative, linking back to the stipulated outcomes.

5. Findings

Number of Participants

A total of 67 participants took part in the programme. The minimum number of participants registered against a school was 14 students, while the maximum was 18 students. To give an adequately large sample for a meaningful statistical analysis, the data for all four schools has been aggregated in this study.

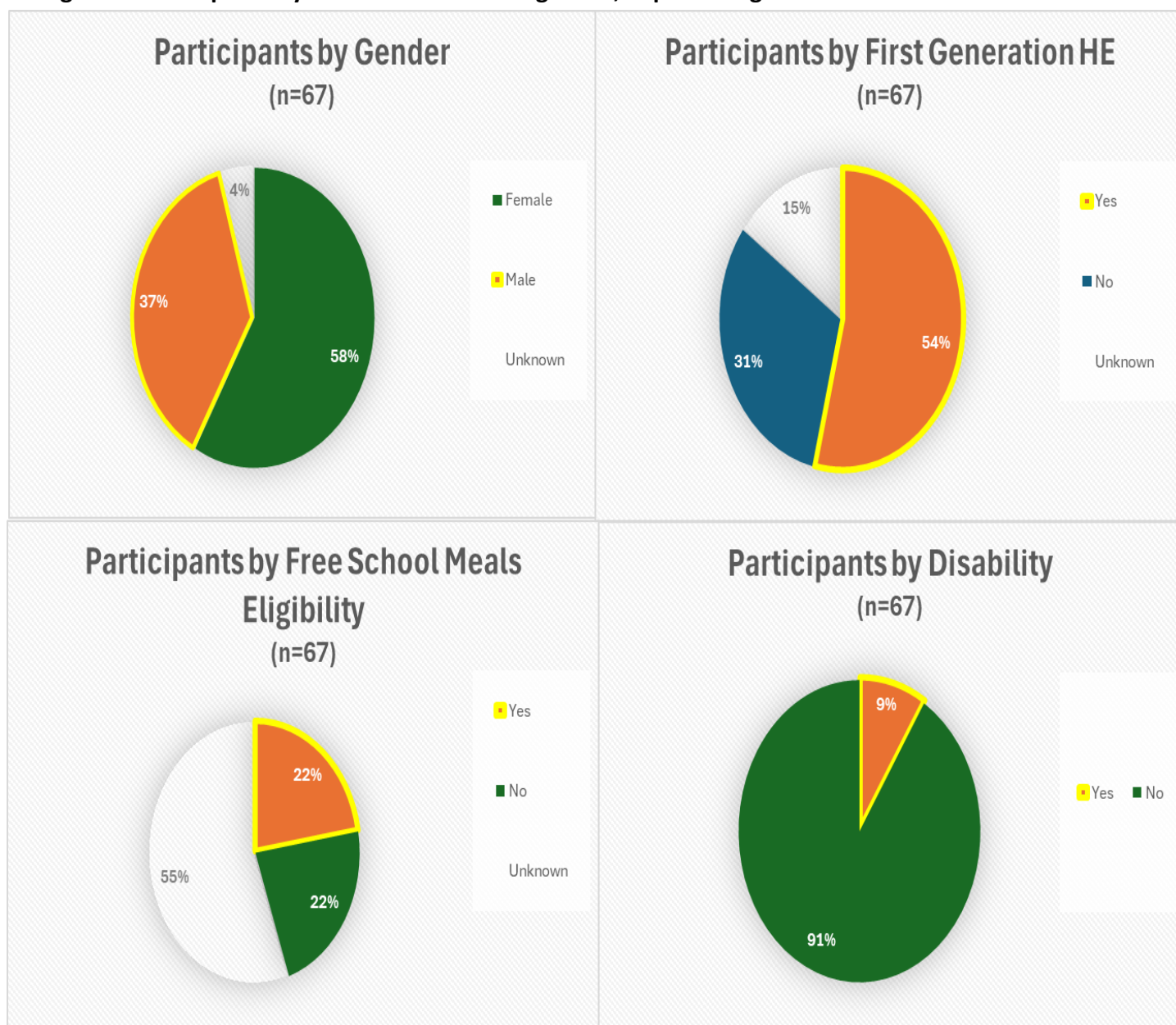
Table 8: Number of participants per school

Participating Schools	Number of Students
School A	17
School B	18
School C	14
School D	18
Total Participants	67

Nevertheless, there was further attrition in the sample population with multiple instances of missing or incomplete demographic and/or evaluation data.

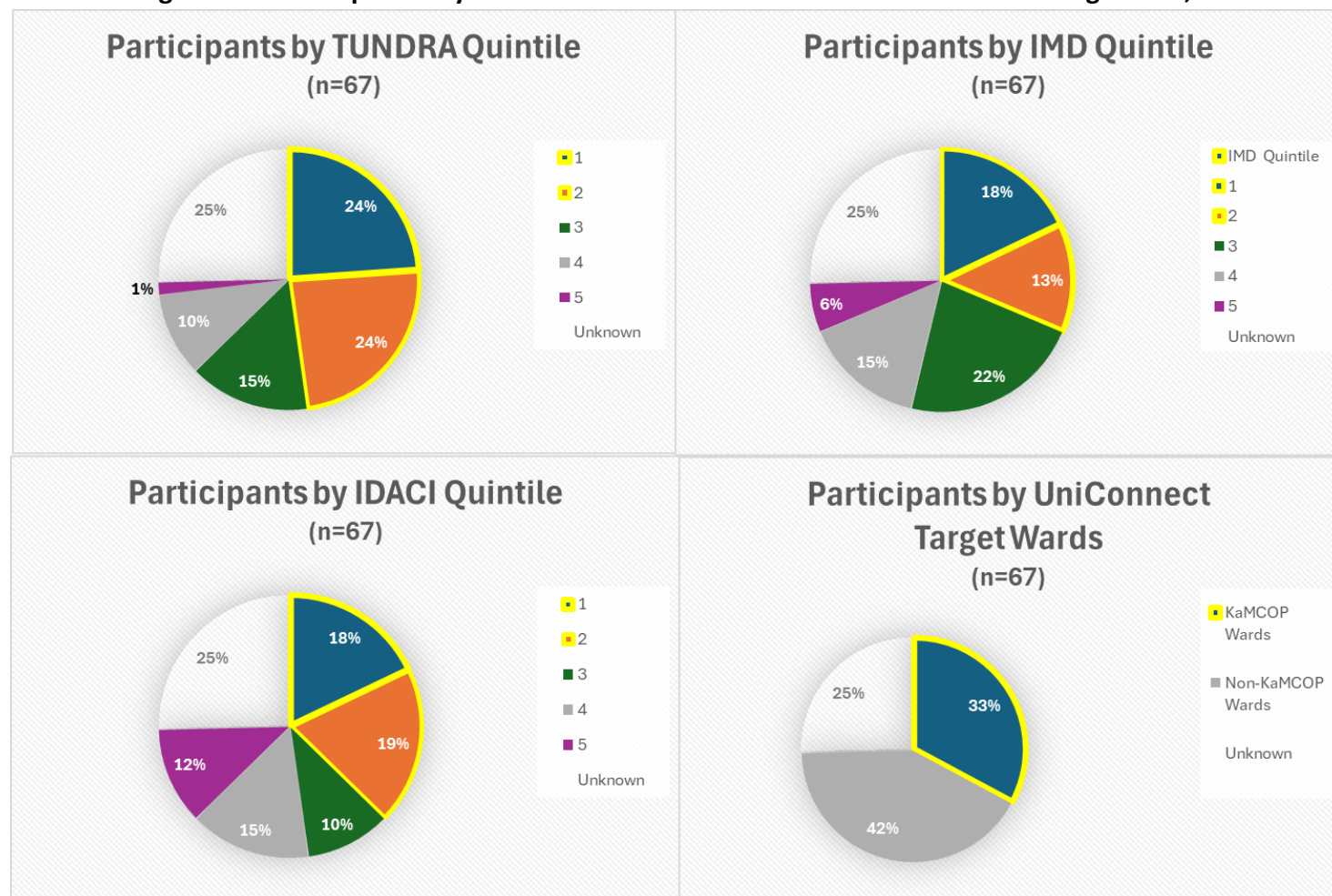
Demographic Data

Figure 2: Participants by socio-economic background, in percentages



There were disproportionately more female participants than male participants in the group. However, in terms of targeting low socio-economic backgrounds, the programme successfully engaged with large proportions of students whereby no parents had attended university (first generation HE). While over half of them were from first generation HE backgrounds, only 22% of the students were believed to be eligible for free school meals. Area-based indicators of low socio-economic backgrounds, such as Index of Multiple Deprivation (IMD) and low participation in education like TUNDRA, recorded higher proportions of participants.

Figure 3: Participants by area-based indicators of socio-economic backgrounds, in



percentages

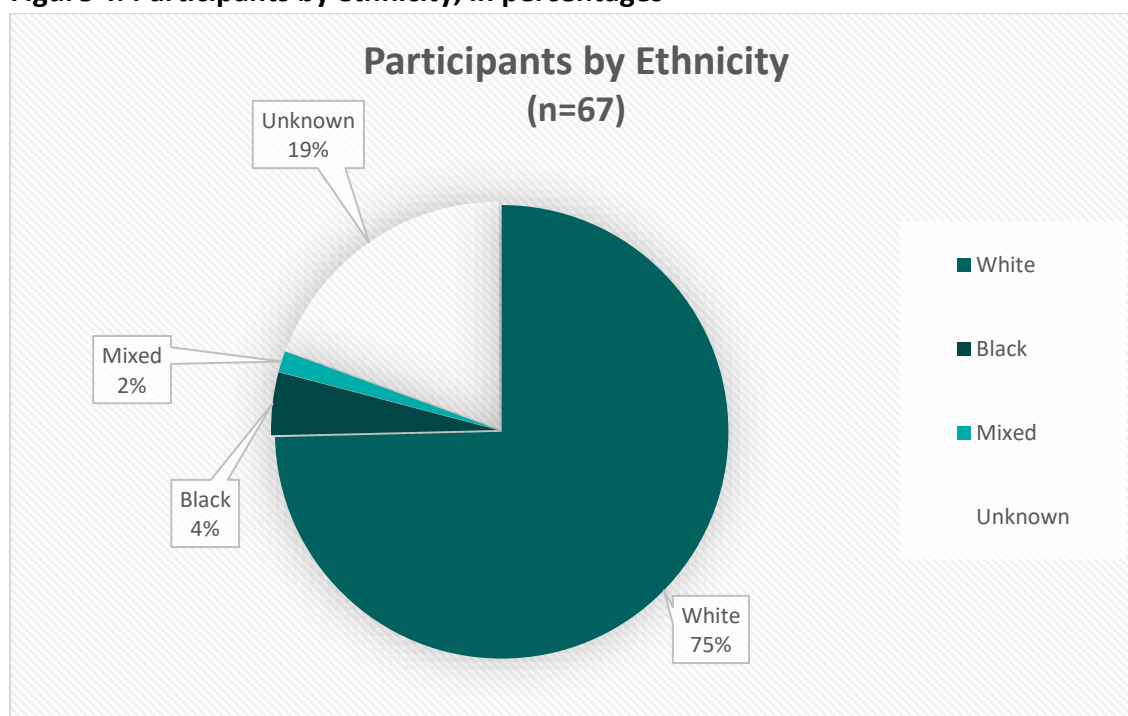
The majority of participants came from TUNDRA Quintiles¹ 1 and 2, which are the areas with the lowest proportion of young people participating in HE (24% from each quintile, nearly 50% of the whole group). If we discount the 'unknown' group from the data, out of the remaining 50 students, 32% came from the bottom quintiles, or 62% of the group came from TUNDRA Quintiles 1-2. Similarly, 50% of the 'known' group came from the bottom two IDACI quintiles. The corresponding proportion by IMD quintile was slightly lower at 42%.

Table 9: Participants by area-based indicators of socio-economic backgrounds, in percentages and numbers (N=50)

For sample (N = 50)	TUNDRA Quintile		IDACI Quintile		IMD Quintile	
<i>Bottom Quintiles</i>	Q1	Q2	Q1	Q2	Q1	Q2
Number of Participants	16	16	12	13	12	9
Percentage of Participants	32%	32%	24%	26%	24%	18%

¹ Based off MSOA TUNDRA data

Figure 4: Participants by ethnicity, in percentages



The majority of the participants were from a white background. There were also two participants who reported they were estranged from their family, and the same number reported to be service children.

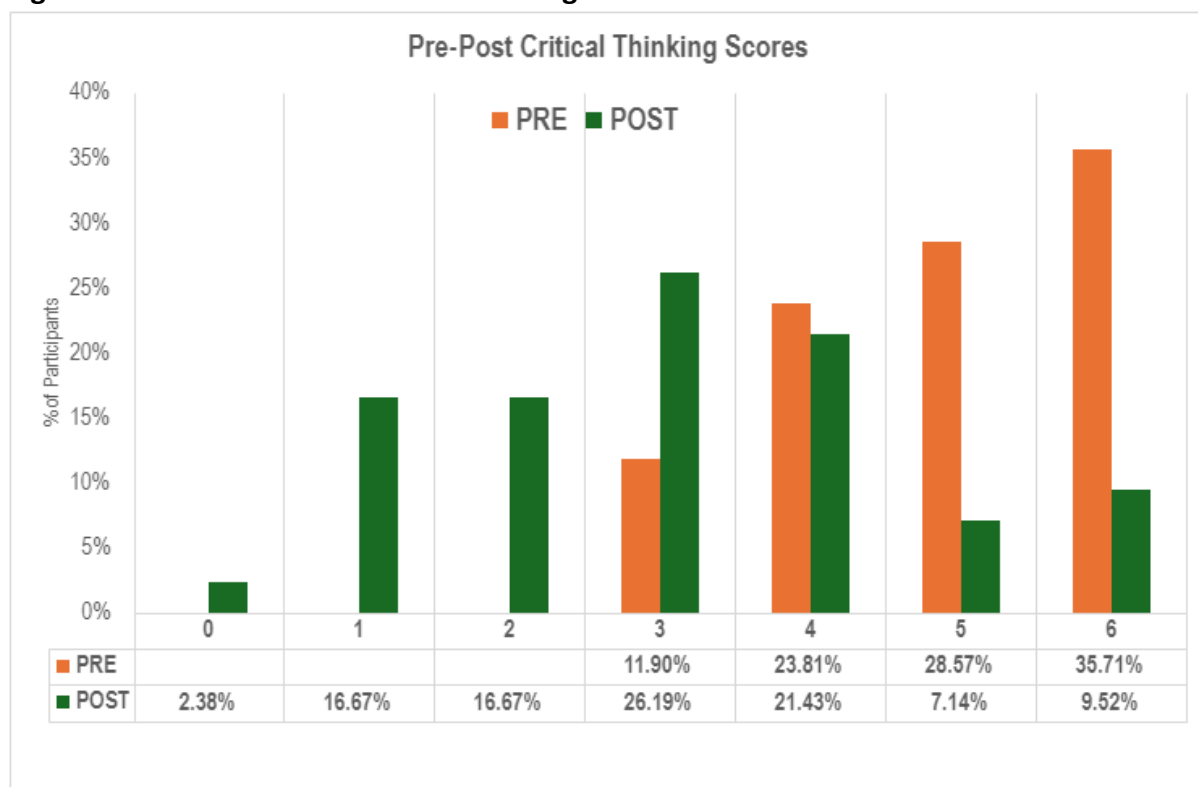
Quantitative Analysis

Critical Thinking Test Analysis

A critical thinking test was conducted at the beginning of session one to record baseline data on the pre-event critical thinking skills level of participants. This task was repeated at the end of the programme. However, due to incomplete or missing data we only had 42 matched responses out of the possible 67 – which accounted for 62.7% of the group.

Students had six PRE statements to respond to in Session 1. Each correct answer was awarded one point with the highest possible score being 6. Nobody scored lower than three points in the PRE exercise. The same exercise was repeated in the POST exercise, but with different statements to assess, which yielded lower scores on average. Figure 5 below illustrates lower scores were registered in the post-test. The median score from the PRE test was 5 and the average score 4.9. The corresponding POST figures were 3 and 3.1, respectively. The average difference in pre-post scores was -1.8. There's been a clear downward trend in scores at the end of the programme.

Figure 5: Results from the 'Critical Thinking Skills' Test



This counterintuitive finding was further investigated by breaking the data down at the individual level, whereby the difference in score for each student was calculated to observe if the data was being skewed by any anomalies. However, as shown in Table 10, only 10% (n=4) of the students had an improvement in their critical thinking scores at the end of the programme compared to their pre-intervention scores.

Table 10: Difference Pre-Post in Individual Critical Thinking Scores

PRE-POST Critical Scores	Change in Thinking	Negative Change	No Change	Positive Change	Total
No. of Participants		30	8	4	42
% of Participants		71%	19%	10%	100%

30 students seemed to score worse than they did in the PRE exercise, and eight of them had no change in scores. In conclusion, quantitative data would suggest that only 10% of the participants benefited from an improvement in their critical thinking skills over the course of the programme, with 71% showing a deterioration against the same measure. These differences in pre-post scores were found to be statistically significant at the 95 percent confidence interval ($p < 0.01$).

However, the above observations could be misleading as the measure used may not have been appropriate for the purpose of this study. The statements were not validated for the

audience this intervention engaged and the difficulty may have been too high. The pre-test statements were more relatable for Year 10 students than the more business management-focused statements presented in the post-tests. This may have led to greater disengagement of students in the post activity. There were more incomplete responses in the post-test compared to the pre-test. These could explain a worsening in scores of the students. This measure may be an appropriate tool to indicate the level of critical thinking in students of this age. Even if it is an established metric, it may not have been validated for the year group we're working with. Additionally, for a more accurate comparison of pre-post progress, the same statements as the pre-test should have been maintained for the post-test.

The conclusion that this metric is flawed is based on other qualitative and quantitative findings from this study that indicate that the curriculum has led to positive changes in components of critical thinking.

Oracy & Critical Thinking Skills

Matched data for this activity was **47 of 67 students (70.1%)**. The analysis was conducted for the 47 participants who were in attendance in both Session 1 and Session 5, and provided complete data for the purpose of this segment of analysis.

This section of the booklet was in the guise of a self-evaluation exercise to ascertain improvements against the main skills' outcomes of the programme. Participants had to reflect on nine statements in Session 1 and Session 5, which served as a proxy indication of their distance travelled. There were four agreement options per statement, which were coded 1 (Strongly Disagree) to 4 (Strongly Agree). The graph below summarises the number of students who demonstrated confidence (by responding positively to the agreement scales) in components of their oracy, critical thinking and academic self-efficacy skills. The overall analysis shows positive movement in six of the nine components being measured. These differences in pre-post responses are denoted by the yellow markers above the red line in Fig 6 below.

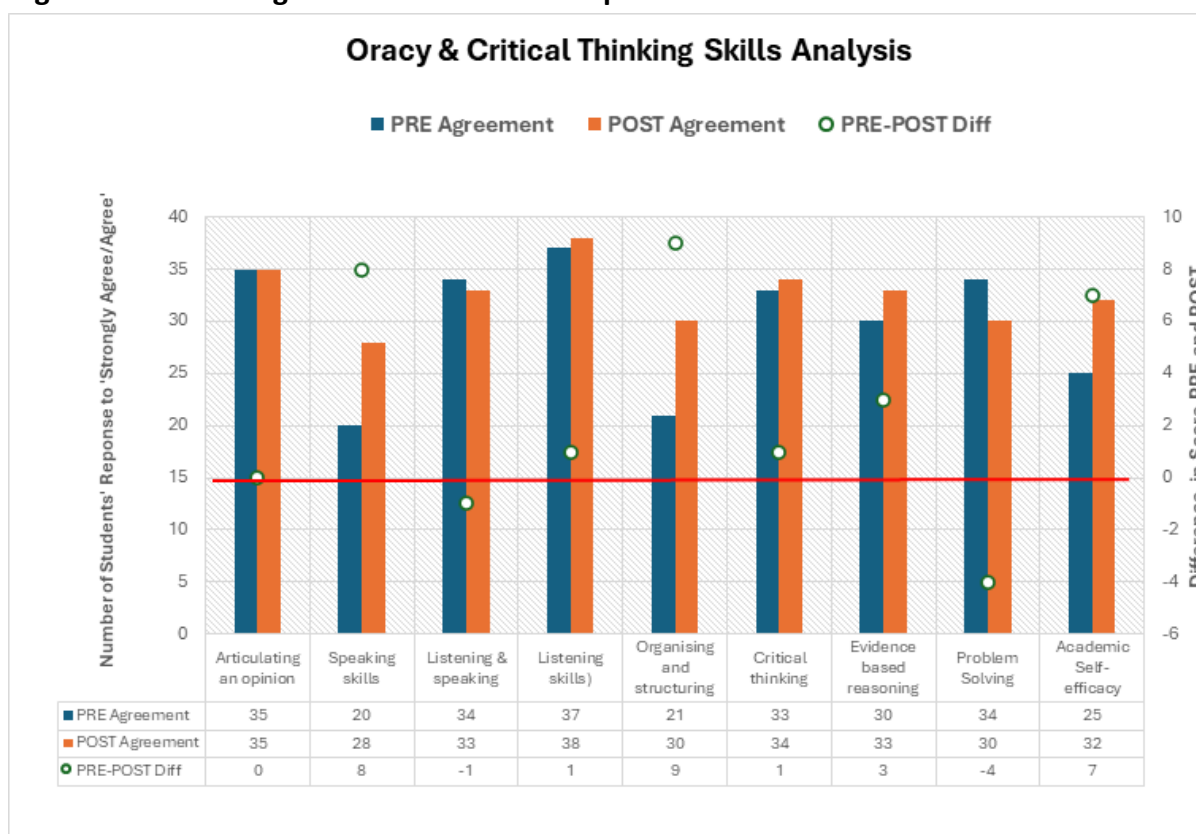
There was a clear positive impact on confidence relating to improvements in 'Speaking' and 'Organising and Structuring' oracy skills – with a 45% and 43% increase in positive responses against both measures (as summarised in Table 11 below). In other words, both aspects recorded the largest overall increases in the number of students who agreed they were 'Comfortable speaking in front of groups' and 'Are able to explain thoughts about a topic in a clear and organised way'. Both of these measures registered statistically significant pre-post changes (see Appendix D for summary of statistical testing).

Conversely, there were fewer students who agreed to having good 'Listening & Speaking' and 'Problem Solving' skills. There was an overall decrease of 3% (n=1) and 12% (n=4) in positive responses to the respective statements: 'Good at listening and responding effectively' and 'Good at finding solutions to problems'. This is denoted by markers below the red line in Figure 6. These negative changes were however not found to be statistically significant.

Table 11: Percentage change in pre-post positive responses against each skills measure

Overall number of positive respondents (N = 47)	% Change positive responses
Articulating an opinion	0%
Speaking skills	40%
Listening & speaking	-3%
Listening skills	3%
Organising and structuring	43%
Critical thinking	3%
Evidence-based reasoning	10%
Problem solving	-12%
Academic self-efficacy	28%

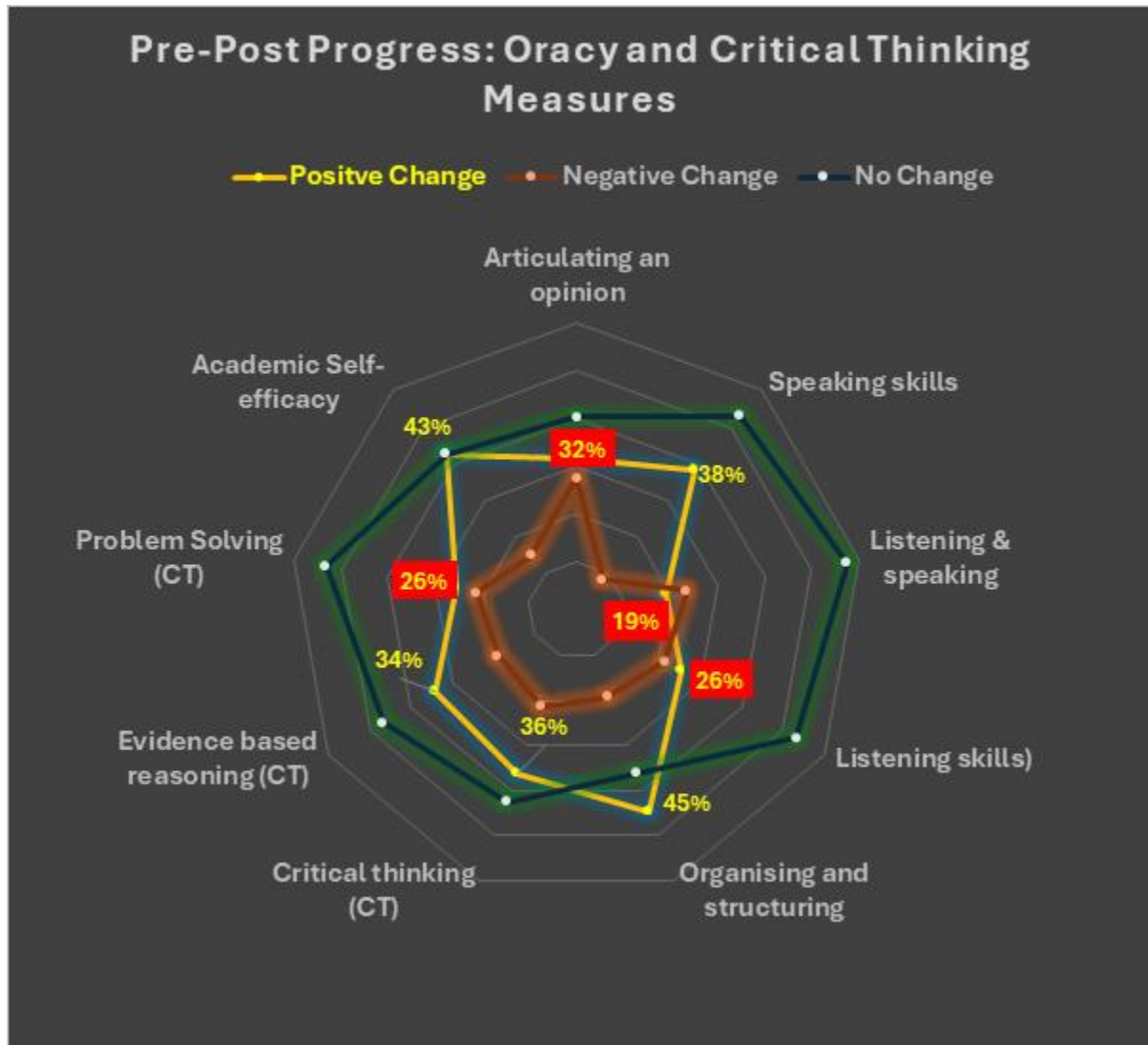
Figure 6: Pre-Post Agreement Statement Responses



The 'Academic Self-efficacy' marker, with the agreement statement – 'Confident in ability to do well in GCSE English exam', yielded good outcomes. As shown above, positive responses for this measure increased by 28% (n=7). This increase was also found to be statistically significant at the 95 percent confidence interval.

The above analysis was based on the overall change in the number of positive responses for the group as a whole. Below is a more fine-grained analysis, at the individual level, to gauge the progress recorded against each student per skills' measure. Meaning, if a student had responded negatively (Strongly Disagree/Disagree) PRE-intervention but responded positively (Strongly Agree/Agree) POST-intervention then we could infer that they have experienced a positive change, or improvement in a specific skills set, through the programme. Figure 7 below illustrates the aggregate percentage of students who reported positive outcomes by skills' category at the end of the programme.

Figure 7: Self-reported Pre-Post Changes in Oracy, Critical Thinking and Self-Efficacy Skills



'Organising and Structuring' skills recorded the highest percentage of positive outcomes at 45% (n=21). Likewise, 43% (n=25) of the 47 participants had an increase in confidence with regards to their ability to do well in their GCSE English exam compared to their PRE responses.

Dissecting the data at individual level reveals that 18 out of the 47 (38%) students reported improvements in speaking skills and confidence in speaking in front of a group. This positive change was found to be statistically significant at a 95% confidence interval.

Interestingly, there was also a positive change registered against the 'Critical Thinking' measure, with 36% (n=17) and 34% (n=16) of students reporting improvements in 'Making sense of new information and data' and 'Using evidence effectively to help explain a point', respectively. This result contradicts the finding from the critical thinking test, which suggested only 10% (n=4 out of 42) of the students exhibited an increase in critical thinking skills.

However, it must also be noted that, in most cases, the majority of students reported no change in skills against the different measures (i.e: No Change > Positive Change by category) – with the exception of the 'Organising & Structuring' and 'Academic Self-efficacy' categories.

This measure appears to have captured the data as intended and indicated a direction of progression, or regression in some cases. The finding from this measure contradicts the counterintuitive finding from the critical thinking test, which categorically suggested critical thinking skills were adversely impacted by the six-week programme.

Debating Skills Progress

This section of the quantitative analysis had the largest sample group, with data recorded for **50 out of the 67** participants (**74.6%**). The inclusion criteria were participation in at least three out of the four debate-centred sessions on the programme and having taken part in the Session 3 debate – even if they missed the Session 2 (the first debate of the series). For those who missed the first debate session, progress was measured as a difference in time between the last and the second debate session (i.e. time recorded in the second debate is used as the baseline). Similarly, if a participant missed the last debate session their progress was calculated by using the time recorded in the penultimate session as their endline.

The exercise required students to record their time spoken during each of the debate activities (at four time intervals during the programme). This measure was designed to track progress in their debating skills and all associated oracy skills. A progressive increase in time spoken would signal an increase in confidence and ability to speak publicly.

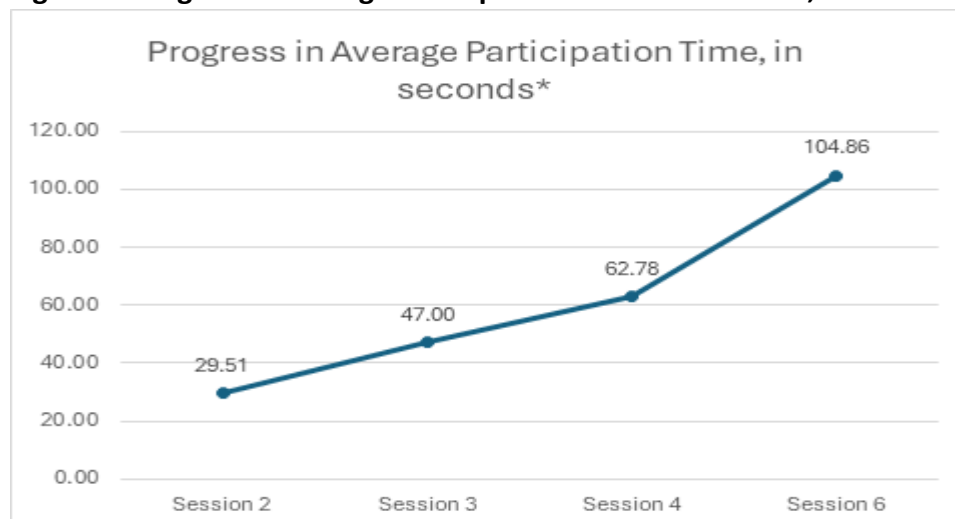
Analysis at individual level revealed that only three out of 50 students recorded a regression in performance (i.e. had a lower endline time than their baseline). 47 out 50 students (94%) had a clear increase in time spoken between the first session they attended and the last debate they participated in.

Table 12: Number of students who spoke over or under one minute in their last debate session

Time Spoken	Number of Students (<i>n</i>)	Percentage of Students (<i>N=50</i>)
<i>Over one minute ($T > 1$)</i>	22	44%
<i>Under one minute ($T < 1$)</i>	28	56%
<i>Total</i>	50	100%

Of the 47 who saw a progressive increase in time spoken during the debates, 22 of them spoke for over a minute (44% of total or 49% of sub-group). In other words, 22 out of 50 (44%) students who participated in three or more sessions have improved their speaking time by over a minute.

Figure 8: Progress in average time spoken over five intervals, in seconds



**The debate in Session 5 was merged into Session 6 of the programme.*

Overall, time spoken increased progressively across the debate sessions. The average time spoken for the cohort increased from 29.5 seconds in the first debate to 104.9 seconds in the last session. The average difference in time spoken between the first session of participation and the last was 69.9 seconds. The pre-post increase in median scores was statistically significant (p-value = 0.01).

This measure worked as intended. Students were consistent at recording their time spoken, which allowed for a better sample group for this analysis. It also suggests that students were very engaged in this section of the programme as they made sure to record their times in writing in their booklets. Student ambassadors closely monitoring this activity have benefited from the quality of the data and should continue to be focal to this data collection effort. This measure is important for building an internal metric in the event of not securing written assignments or attainment data from schools as initially planned. The recorded times provided a basis for evidencing the tangible impact of the oracy programme.

Qualitative Analysis

Debate Reflection

This section of the booklet is repeated for every debate session. The table students were tasked to fill out in this activity is also where they had to record their individual time spoken for each debate they participated in. It was designed to allow students to reflect on their progress during each session and self-appraise their growth and development. This was done in tandem with them recording their spoken time, however they were less disciplined in recording their qualitative reflections for each session. As with the skills reflection, data was

largely missing for the 50 participants, which has proven a challenging part of the evaluation process.

As with the critical thinking test, from an evaluation perspective it is believed that this element should be redesigned to fulfil its intended purpose as a reflection tool. It is advised that the prompts be rethought completely. This recommendation is further informed by qualitative data from the FGDs. When asked what could be improved, some students suggested they would have appreciated more prompts or guidance in the handbook. Presently, they may be too broad, which elicited irrelevant and misguided responses from students. It could be that the students needed more guidance and framing to respond more thoughtfully and deliberately to the prompts. Many participants also commented that time constraints prevented them from filling out the written exercises in the handbook. This may have further reduced the quality of the data recorded in this activity.

Skills Reflection

This section of the booklet was presented as a reflective exercise that captured short, open-ended qualitative data. Students were tasked with responding to 14 questions under seven headings (by various skills categories). However, akin to the debating reflection table, its utility as a data collection tool is questionable, considering the excessive gaps and missing data.

Data for students from School D was completely missing. The five students from School C who did contribute to the booklet for this section showed complete disengagement. The data is incomplete to the extent of being unusable. All five left at least nine questions unanswered.

Participants from School A (seven of 16 responded fully) and School B (four of eight responded fully) were better at recording their reflections in their booklet, despite some gaps in responses under certain headings. This still only amounts to half of the students in attendance on the day completing the task as required.

The prevalent opinion from students' responses in this section was that the skills achieved over the intervention will help them with their English exam and they've grown more confident in their ability to do well academically. Increased confidence and ability to improve their English language skills has been the most cited theme that emerged from the FGDs. This suggests that the programme may have positively impacted participants' self-efficacy skills as intended and will also lead to increased attainment in GCSE English results. Although there is no way of quantifying the latter yet.

During an informal debrief with the delivery team, it was revealed that this section of the handbook was not designed primarily for the evaluation process. The students make very specific reference to the sessions and techniques they've learnt, which is difficult for independent evaluators to analyse without context. The majority of the responses are overly concise with no added value to the task they are doing or for the evaluation reporting. However, there is merit to asking these questions during the FGDs. It is suggested that part of the skills reflection matrix is instead integrated into the FGD schedule. This would provide

a structured framework for students to more clearly and meaningfully reflect on the skills they've gained and why – and how – they deem these would be useful to them. Therefore, it is strongly advised that this section of the workbook is reviewed.

Focus Group Discussion Reflections

This arm of the analysis was done separately for each school to better understand the unique experience of each group and the differences in needs between them. For process evaluation it is more insightful to match the feedback back to the cohort, so that the delivery team can link potential differences in the programme delivery to the feedback provided.

The main questions included in the focus group schedule were:

- What have you enjoyed about the intervention?
- What skills have you gained or what have you learnt from the programme?
- What could be improved in the programme?

The thematic analysis of the focus group transcripts is summarised in Appendix E and is matched to the quotes coded against the themes. Please refer to Appendix E for the comprehensive coding of the qualitative data.

School A Analysis

Self-Efficacy

The majority of students from the School A group reported 'increased confidence' as the main skills gained from the programme, as a result of being taught how to engage in public speaking:

"I've gained confidence when arguing, now. I can speak more, or without- now that I've done this"

However, whilst a large majority reported a boost in confidence, there were a couple of students who admitted having a dip in confidence POST intervention:

"I don't know if I've gained that much confidence when speaking standing up"

These students even suggested they "stayed the same" when asked what they've learnt or gained from the intervention. In spite of being "friends with 90% of people [there]", thereby making the experience of speaking in front of the group less intimidating, it was nonetheless daunting to many.

Critical Thinking

Another point to consider is the level of comprehension and the relevance or relatability factor of the points of discussion, as mentioned above. This links back to findings in the 'Critical Thinking' test which had counterintuitive results. Interestingly, a number of students identified 'critical thinking', either directly or indirectly, as a skill they've improved during the programme, stating they are:

“Better at critical thinking”

This further **contradicts the findings** from the critical thinking test results presented in the ‘Findings’ section. In the previous section, it was postulated that the critical thinking test may have been skewed by the difficulty level, and a student did allude to struggling with understanding the material:

“I didn’t really understand, like, the way things were worded. Like, I think they should make it a bit easier. Because not everyone’s from this country, so, you know, you’ve got to make it a bit easier for other people to understand”

This makes a strong case to review whether the curriculum, and especially the critical thinking test, was age appropriate and adequately relatable for participants.

Oracy

Improvements in oracy skills were also mentioned in the FGD, with many sharing how they have improved in not only in public speaking but also in organising and structuring their arguments for the debate:

“[what I gained]...like, how to structure a debate properly”

They alluded to applying critical thinking to constructing arguments from a different perspective than their own:

“It gives you the chance to give your opinions on something you wouldn’t usually give”

They also made cognitive links between the skills acquired and their potential application in supporting their school work – especially in “build[ing] confidence for [their] English exams”.

Feedback and Suggestions

The potential explanatory factors for the negative outcomes discussed above can be better situated when considering the suggested improvements that emerged from this group. The students believed the pacing of the event was too rushed during the research and writing parts of the day. They suggested allowing “more [time for] research on the subject” and “more practice” ahead of the debate. They believed more time to practise would have been conducive to their development on the programme:

“So, maybe you could have more practise- stood at the front of the spaces. Which is always the worst part”

“We didn’t really have enough time to actually put our points right. So, like, if we wanted to write about something, we only had, like, 10 minutes, or 15, like, that was not enough”

Similarly, many requested more time to articulate their points and “expand on it more”, with suggestions of splitting up the writing sessions from the debating to have more time to prepare their debating points:

“Maybe even have one session where you have stuff written for where you just speak. And try and, like, structure my own ideas to make it make sense, and panicking that it doesn’t

make sense... And then you can always go on to doing actual debate debates, and you can think of subjects. Because then we would have ideas to go off"

Another suggested that the topics of discussion should be more relevant and relatable to them because "it's hard to know stuff that [they] haven't learned that much about". This point was raised by students of three of the four participating schools. It was also suggested that the topic should be narrowed and more focused:

"if we singled it down to, like, prison should focus on rehabilitation, maybe it would be, like, murderers in prisons, murders, or rapists... not just prison because that could be literally anything"

Another emerging theme from School A was the **timing and length of the delivery**. They all seemed to enjoy the programme and recognise the benefits of the intervention. However, they suggest the timing would have been better if it were delivered earlier. They were conscious of the missed classes, being in Year 10 and having to sit exams next term:

"We're in Year 10, and it's GCSEs. And I have mocks next term, and I've missed out quite a few history lessons. So, I understand that it is good - I like the idea. But just, if we did it last year, it would be a bit easier"

They also believed they would have benefited more from the intervention and would have been able to apply these skills to improve their Year 10 attainment/academic performance if it had been delivered when they were Year 9 students – specifically the skills to "structure" and "all the different points [they] can use", as well as "[having] practice of actually presenting":

"We've already done our English presentation. So, if we had the help beforehand, then it might have helped us present it... I think we need more of the help in Year 10. But now that we're actually in Year 10, we've gone halfway through. And I think we could have done with it last year"

There was one suggestion that the programme should be longer to maximise its impact. One student suggested five months, which seemed long to other students. But they concurred that it could be longer. This was another recurring theme from the other schools.

"Maybe on a longer term. Maybe not in the short-term. Because it was only a six-week..."

School B Analysis

Self-Efficacy

Unlike School A data, there was no sign of dip in confidence for School B students. All three FGDs unanimously registered positive impacts to confidence levels. This is consistent with the findings results from all four schools:

"Yeah, confidence. Because, normally, I even struggle to speak in front of my friend groups, because there's so many people. But now I can properly, like, actually speak freely"

In spite of recognising that public speaking is daunting, contrary to School A, students saw the benefits of having been pushed out of their comfort zone through the programme:

"It helped mainly by- basically by forcing us to speak, but having us, like, speak in front of people, and it doesn't matter how confident we are to start off with, because we gain confidence throughout"

"It helped me overcome my social anxiety"

Critical Thinking

Many of the participants also made strong references to developing their critical thinking skills:

"It, kind of, like, makes you want to question what someone says, and, like, you say, "Well, what if it's like this instead?"

They also acknowledged that they were able to make informed, evidence-based decisions when constructing their argument for a viewpoint they previously disagreed with by rationally considering the research they conducted:

"I liked that even if you didn't agree with the point that you were on, you eventually did, because you convinced yourself with the research that you were doing"

Oracy

There was also evidence that they had made improvements in their oracy skills:

"I liked that when people were counter-arguing, that was quite cool, because you saw how other people reacted to your points"

"Like, being able to properly structure an argument"

This reinforces the findings of statistically significant changes in speaking, and structuring and organising skills from the quantitative analysis.

School B's students came up with quite unique and interesting suggestions on how to structure the debates, which may be insightful to the curriculum designing team. Please refer to rows 1.2 and 1.3 of the table in Appendix E for details related to those suggestions.

Feedback and Suggestions

However, they concurred with their counterparts from School A on the need for additional time to prepare their arguments:

"Probably just extra time to, like, figure things out. Because obviously, you slowly go into it, and then it's, like, immediate. But maybe if it's slowly moved up"

School C Analysis

Self-Efficacy

Following the question prompting students to share what they gained from the programme, students in one of the three FGD groups emphatically stated “confidence” was the greatest takeaway from the event. They went further to elaborate on how their confidence has “grown over the sessions”, which demonstrates that the length of the session and multiple points of contact through an extensive period benefited the students’ development. The same outcome may not have been achieved over a shorter time frame. Therefore, the overall cohort’s call for the programme to be longer in duration is justified from this perspective.

One student revealed that the exercise he enjoyed the most was measuring “how long [he] could speak”. Measuring their progress and tracking their speaking time was a good tool not only for evaluation but also for allowing the students to quantify and track their own progress more tangibly. This proves the validity of the debate timing metric as a good indicator for increased self-efficacy, as well as speaking skills. The quality in argument may differ, but to many of these students, the ability to construct longer arguments and express these orally is not only a source of great confidence but also pride in their speaking ability:

“...a bit more pride and a bit more confidence when you speak”

Critical Thinking

Critical thinking discussions were less prominent in School C’s FGDs, but some students did reflect on the ability to be able to consider two sides of an argument and being able to use facts to support what is being said:

“And then speaking for a side that you don’t normally agree on”

Oracy

The participants as well as appreciating the importance of structuring and organising their arguments ahead of the debate:

“You need to make sure you plan it because then you’ve got the ideas down, so you know what to say”

; they also alluded to honing their listening skills as they enjoyed hearing different opinions to their own:

“Hearing other people’s points of view to how they feel about the argument”

These reflections suggest that even the oracy skills not, usually, explicitly associated to debating activities were recognised in this instance. The participants were able to make the link to other aspects of oracy other than speaking skills.

The facilitator prompted one group on their opinions regarding the research and writing parts of the programme, to which they all responded with positive feedback. Whilst they enjoyed the activity, they wished to have more time spent on researching and developing their arguments:

“We didn’t have enough time to research...I would want to research more”

Feedback and Suggestions

The delivery team at School C received a lot of positive comments about how they directly impacted on confidence and reducing anxieties:

“if I made a mistake, they would tell me when I went wrong, and I didn’t feel embarrassed or anything like that”

This came up again in a separate FGD group from School C:

“With the group of people that came into the school, they were very helpful, whether that be they were giving us confidence to talk and they were someone where it felt normal to talk to”

This could be suggesting that the team of student ambassadors involved in School C’s delivery were able to build rapport more effectively with the students than the ones in the other schools.

However, yet again time constraints were mentioned when discussing the student handbook. They believed there was too much content to go through considering the number of sessions they had to complete the exercises:

“I think considering the fact that we only had three or four lessons, I think they’re a bit big. Because we didn’t fill in all the pages, we only had to fill in certain pages, so I think it’s a little bit too big”

School D Analysis

Self-Efficacy

Reflections on increased confidence dominated the FGD across all three groups at School D:

“I’ve gained more confidence with speaking in front of crowds, and stuff. And it’s also given me the confidence to say my opinions without worrying about what other people say”

Critical Thinking

There were no direct references to critical thinking that emerged from this group. Instead, there were reflections on how skills gained from this programme could be transferred and applied to other subjects at school:

“You could also use the facts you’ve learned from doing this in science, when we’re speaking about certain subjects”

This links to TASO’s metacognitive skills outcomes. Interrogating more directly the ability of students to transfer their acquired skills to their schooling has the potential to have a greater impact on improving their academic attainment and leading to higher progression. It may be an outcome that is measured through the next iteration of this programme. Debating is not an academic subject, per se, that we would be able to measure attainment in. But if deliberate steps are taken to highlight how these skills can be used strategically in other aspects of

schooling, this programme could capture an outcome measure that it is possibly indirectly influencing.

Oracy

There were positive observations relating to oracy skills. This aligns with the recurring themes that filtered through from the other schools. Listening skills, although not found to be statistically significant during the quantitative analysis, was discussed repeatedly in all three school-level FGDs, and, once again, mentioned during School D's FGD:

"And [I've learnt] how to persuade people to see your point of view, and to understand their point of view as well"

There were also mentions of structuring and organising arguments when prompted by the facilitator:

"[I've learnt] how to write a debate"

Feedback and Suggestions

Being in a courtroom definitely had a huge impact on how students perceived the event. It added to the enjoyment factor. This is different from the disappointment expressed in School B's FGDs about not being able to have the debate in a courtroom setting:

"Also, I feel like a courtroom setting would be a bit more appropriate, thematically"

The students attributed their increase in confidence to feeling reassured by the delivery and that they would "not be judged for it". Not feeling judged is a phrase that was repeated by a number of students. It was a point raised in School C's FGDs, which also leans into developing resilience and learning how to become "less worried about what others say". They also enjoyed being able to interact with a wider pool of students and staff in a different setting:

"I like how it brought us as a class together, from different social groups. And I like how it taught us to argue, in a sensible way"

Interestingly, a few students from School D suggested the addition of more student ambassadors to the programme:

"I feel like there should be more ambassadors"

It is widely documented in the literature that student ambassadors can act as important role models for students from widening participation backgrounds. Therefore, there may be dividends to heeding the suggestion of allowing participants the opportunity to interact with more student ambassadors, if it can be afforded.

Conclusion

When asked what the main benefit of the programme was, the majority of the students stated that they've gained confidence as a direct outcome of the programme. This is an important

component underpinning self-efficacy skills, which was one of the programme's intended outcomes. This outcome was consistently cited in all FGD groups.

"I enjoyed how people were confident, and got the courage to stand in front of an audience and speak the points and facts, and pushing themselves further and being in front of an audience"

There was also strong evidence of positive outcomes in the programme's role in developing oracy skills. As shown in Table X, participants from all four schools mentioned speaking, listening and structuring skills during the FDGs.

Overall, qualitative data revealed positive outcomes for self-efficacy, critical thinking and oracy skills. Some components were more emphasised in the FDGs than others. For example, speaking skills were more frequently mentioned than listening skills; and critical thinking was not cited as much as the other intended outcomes of the project. Articulating a point was mentioned extensively during the discussions across the board, even if quantitative findings suggest otherwise.

Increased confidence in their ability to speak and construct arguments was by far the most highlighted outcome. This was clearly evidenced in the quantitative findings and further supported by the FGD's reflections. Speaking and structuring skills ranked quite highly as well, in terms of the number of associated reflections. This is, again, consistent with the quantitative findings that indicated there were statistically significant improvements in speaking skills and organising and structuring.

Although critical thinking was not a topic present in all four school-level FDGs, many students had alluded to developing evidence-based reasoning when they had to debate from an opposing perspective to their incumbent view, by using information gained through research. This supports the finding that, even if critical thinking was not directly reported to have been improved in the pre-post responses, evidence-based reasoning was found to be statistically significant.

Interestingly, there was also evidence that by participating on the programme and coming on campus the intervention has indirectly increased aspirations by providing greater insight into HE:

"I liked seeing what doing the first year had up for us. Like, in the summertime, they have, like, shows, and I liked the fact you can move out when you come to university, and have your own independence, and start to learn, like, life skills"

Making HE a more desirable option is a potential outcome for this programme, which would feed into its longer-term outcome of increasing progression to HE. This would contribute to participants making better-informed HE progression decisions when the time comes.

In conclusion, there is satisfactory evidence to show that the positive short-term outcomes of developing the identified skills were met. More can be done to ensure stronger outcomes in terms of critical thinking and problem solving skills in the future.

6. Discussions

Research Questions

- **Is Arguing with Confidence effective in supporting the development of students' key learning skills?**

The analysis suggests that, overall, the programme has had a positive impact on the development of the key learning skills identified. The qualitative findings in particular unveil the direct impact that the programme has had on the confidence level of participants and, specifically, their speaking skills. The quality and eloquence of the responses of the Year 10 students during the FGD sessions can also attest to the development of the students' abilities to articulate their opinions. In general, the groups approached the questions in a balanced manner, weighing all aspects that were conducive to their development. Many students suggested it would be beneficial to extend the programme over a longer time period, while others wished the programme had been introduced a year earlier. The aforementioned group of students reflected on how the skills they've acquired during Arguing with Confidence could have been better utilised if they had the chance to participate in debating activities at an earlier stage of their academic journey. These reflective remarks are an indicator of how useful they deem the sessions to be for their academic development.

- **Will improvement in these skills support attainment in GCSE English Language?**

Supporting students in developing and improving oracy, critical thinking and self-efficacy skills was at the core of the Arguing with Confidence programme design. This study has revealed that there were significant improvements in oracy skills (i.e. speaking and listening skills and confidence in public speaking). These findings were reinforced by participants in their reflections of their progress over the course of the programme. Having awareness of the skills they've gained on the programme and how they relate back to their school work, and more specifically their English lessons, will certainly lead to students utilising and applying the skills learnt to improve their attainment. It is beyond the scope (due to data access and temporal constraints) of this study to report on the actual attainment progress of participants outside of this programme. However, the evidence presented in the findings section suggests that the programme has led to positive improvements in latent skills linked to English language.

- **Does Arguing with Confidence support schools' efforts in raising literacy levels and attainment in GCSE English Language?**

The feedback from the FGDs and the skills reflection from the student handbook were overwhelmingly positive with regards to feeling more equipped to perform better in English as a result of the programme. The most definitive method of measuring increased attainment is to analyse pre-post formal school grades in English Language. We did not have access to attainment data in this iteration of the programme, however the participants could be tracked in the future to compare if they have achieved better than expected grades in their GCSE English Language. The schools would have to retrospectively provide pre-intervention KS3 attainment data in English Language, which could then be compared to their KS4 outcomes. The desired long-term outcome is to increase progression to HE through improved KS4 attainment. In isolation, it is unlikely that this programme will be able to single-handedly lead

to increased progression of participants. It has, however, successfully engaged students from non-selective schools to participate in an extracurricular activity otherwise inaccessible to them, which has been empirically proven to improve academic achievements. Not only has it engaged students but also the overall conclusion from the findings is that debating leads to statistically significant positive improvements across some areas of the identified skills: oracy, critical thinking and self-efficacy.

Methodological Limitations

- **Missing Attainment Data**

It was planned that attainment data in the form of written English assignments would be provided by the schools to feed into this evaluation study. However, this arm of the data collection design failed to materialise. Therefore, the analysis was based entirely on internally assessed metrics and self-reported measures.

- **Inappropriate Measurement Tool**

Moreover, since this was a pilot project, this opportunity was used to trial the newly designed evaluation tools. Some of which were more effective collection methods than others. As a result, some activities registered far greater missing data than methods embedded in more close-ended tasks. The critical thinking test in particular is believed to have yielded misleading results. If the wrong tools are used in measuring an outcome, the results could lead to erroneous conclusions.

- **Data Access, Time and Intertemporal Constraints**

The nature of educational data means that there is a time lag before the desired outcomes can be observed. For this cohort of Year 10 students it would take a minimum of one year to obtain their official KS4 attainment data, and three more years for their progression to HE data. Therefore, even though Arguing with Confidence is designed to be an attainment-raising programme, it is difficult to concretely comment on its effectiveness in improving the skills required for greater academic success. The other constraint was that we did not have prior attainment data from schools to gauge the distance travelled in the medium term either.

7.Recommendations

Process Review

- a. **Length and Pacing**

Qualitative data from all four schools was unanimous in one area that is in need of improvement. The length and pacing of the intervention was a recurring theme across all FGD groups. It is irrefutable that students would have benefited from having more time to spend on developing their research and writing skills. This would have further bolstered their confidence. The event was originally planned to be six sessions but for

logistical reasons was reduced to five sessions instead. Next year's iteration should strive to maintain a duration of at least six sessions, which would allow for better pacing of the event and more proportionately divided time spent across the different activities of the programme – including more time for students to complete the handbook exercises. As they rightly observed, they had insufficient time to review the content of the handbook. This could resolve some of the incomplete data issues we had for the evaluation sections. As noted in the FGDs, many students had wished for the programme to run for a longer time period. However, according to the delivery team, the maximum number of sessions that schools would allow for is six lessons. A suggestion to tackle this limitation is to review how the given time is split across the activities. Keeping in mind the findings from the qualitative data, the delivery staff may choose to focus more on certain aspects. For example, allocating more time for articulation in writing ahead of the debates.

b. Timing of Delivery

Participants in general appreciated the utility of the programme and its role in supporting their speaking and presentation skills. However, as revealed in the analysis, they purported that it would have been more useful had they had this opportunity while they were in Year 9, which is a more formative than assessed stage of schooling, so that they could have applied those skills when it mattered during their Year 10 assignments. This insight informs us that the programme could have greater impact if it were delivered one year earlier. It would also cause less anxiety for Year 10 students who are uncomfortable with missing lessons to participate in Arguing with Confidence, which may be subduing their engagement levels and attitude towards the programme.

c. Debate Topic

Making the debate topics more relatable was a common theme across the school level FGDs. There are many suggestions that were put forward by the students in the qualitative discussions. The curriculum development staff are urged to refer back to these suggestions, which may be insightful and beneficial to future iterations of the intervention.

d. Student Handbook

The student handbook was appreciated and was said to be a useful resource by participants. However, we need to review the difficulty level of certain sections, such as the critical thinking test and the debating topics, to make the experience even more impactful. More time should also be built in for students to make full use of the handbook as a resource.

Methods Review

- a. **Review validity of ‘Critical Thinking’ analysis tool:** The level and relevance of the questions might not have been appropriate for the students participating on this course. The POST questions, especially, were more business-oriented, which may be a subject alien to the students. That could explain the adverse results in the POST exercise
- b. **Rethink POST Skills Reflection Framework:** There is utility to collecting this data, however the format needs to be redesigned. There is potential for extracting meaningful data that would highlight the skills acquired by students and indicate the level of self-efficacy at an individual level through the student’s reflection on how they intend to apply these skills to do better academically. However, there may be the need for more guidance from the implementers in improving the quality of the data collected. Perhaps it could be done in small reflective groups, as with the reflective FGD – time allowing. Or it could be ***built into the reflective POST FGDs*** and allow a more a structured approach to the discussions. It was noted by the delivery team that time constraints impeded the completion of this section of the handbook, which was primarily designed for the students’ benefit instead of as an evaluative tool. However, as mentioned, there is merit to capturing this data for evaluation purposes.
- c. **Review utility of ‘Debate Session Reflection’ tables:** We need to decide exactly what type of data we’d like to collect from this tool and its contribution to the evaluation of the programme. The prompts are too broad and open to various interpretations, which complicates the data cleaning and thematic analysis of the data.
- d. **Design Robust Internal Metric:** The first debate and final debate can be given a score, which will be for internal use only. Students will not be formally “graded”. Instead, it will only be for staff to be aware of the different marking criteria that the programme designers can agree on. For instance, different aspects of the programme could be monitored and fed into a progressive grading system to assess growth and development against different markers that map onto the overarching outcomes of the programme.
- e. **Attainment Data:** In light of the challenges in receiving data from schools to feed into an internal metric as proxy to assess distance travelled PRE and POST, we need to think of an alternative measure for next year’s cohort. Please refer to discussions of a pseudo internal metric.
- f. **Time Constraints:** As highlighted by students in the qualitative data, the utility of the student handbook was lost on them, given the limited time they had on the programme to interact with the handbook. They also suggested having more

prompters in the handbook for them to have greater guidance on how to approach some of the exercises.

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9. Appendix

Appendix A: Theory of Change

Situation/Context		There are persistent gaps in attainment between advantaged and disadvantaged pupils. The latest data shows that in non-selective schools across Kent and Medway only 53% of learners achieve good passes at GCSE, and this figure drops to 37% when considering those classed as disadvantaged (DfE Performance Tables).			
Aims		<ul style="list-style-type: none"> To provide opportunities for students who would not otherwise participate in debating to do so. To provide opportunities for students to develop key learning skills such as critical thinking, self-efficacy, and oracy. To increase students' confidence in skills attributed with debating. To improve students attainment in GCSE English Language. 			
Inputs	Activities	Outputs	Short-term outcomes	Medium-term outcomes	Impact
Process			Impact		
Budget to run outreach interventions. Staff expertise – development. Staff expertise – delivery. Staff expertise – admin. Staff expertise – evaluation & evaluation resources. Student ambassadors & debating tutors Relationship with teachers in schools Provision of student resources, printed and online	<u>Activity Provision</u> 6x in-school workshops aimed at developing critical thinking communication and writing skills. Workshops cover the following: <ul style="list-style-type: none"> Making a point Evidence & reasoning Structuring arguments Persuasive language Public speaking 	Delivered to 4 schools per year 15-20 students per school 12 contact hours Students discuss a range of different social justice issues Participate in 2.5 hours of debating Students are expected to increase the time they can speak up to 4 minutes each.	SO1: Students have increased confidence in specified areas which contribute to key learning skills <ul style="list-style-type: none"> Articulating an opinion Speaking and delivery Listening Organising and structuring arguments Understanding and synthesizing information Analysis and evidence based reasoning Problem solving Decision making SO2: Students have opportunities to utilise and develop key learning skills: critical thinking, oracy and self-efficacy. SO3: Students are able to apply these key learning skills to their academic studies SO4: Students has an increased belief in their ability to do well at GCSE	MO1: Increased attainment at KS4 particularly GCSE English Language	Increased progression to Higher Education

Appendix B: Handbook

Self-Efficacy, Oracy and Critical Thinking Skill Self-Evaluation

	Strongly Disagree	Disagree	Agree	Strongly Agree
I feel confident to say what I think (Oracy – articulating an opinion)				
I am comfortable speaking in front of groups (Oracy – speaking skills)				
I am good at defending my opinions (Oracy – listening & speaking)				
I am good at listening to others and responding effectively (Oracy – listening skills)				
I can explain my thoughts about a topic in a clear and organised way (Oracy – organising and structuring)				
I am usually able to make sense of new information and data (Critical thinking)				
I can use evidence effectively to help explain my point (Critical thinking – evidence based reasoning)				
I am good at finding solutions to problems (Critical thinking – problem solving)				
I am confident in my ability to do well in my GCSE English exam (academic self-efficacy)				

Critical Thinking Test

Session 1

Read the statements below and decide whether you think the argument is a strong argument. You do not need to agree with the argument, you just need to decide if it is strong or weak:

Should university level study be free for all students?	Strong argument	Weak argument
No, too much education can lead to over-qualification, and therefore unemployment		

Yes, having a highly qualified workforce ensures high levels of employee productivity in organisations		
No, research has shown that students that are not required to pay tuition fees tend to slack off more and learn less during their degree		

Read the statements below and decide whether you think the conclusion makes sense. You do not need to agree with the conclusion, you just need to decide if it makes sense based on the statement:

Sarah owns a new company. New companies are more likely to fail than well-established companies. Therefore:	Conclusion makes sense	Conclusion do not make sense
Conclusion 1: Sarah's company will fail		
Conclusion 2: Sarah's company is more likely to fail than a well-established company		
Conclusion 3: Well-established companies are more likely to succeed than new companies		

Session 5

Read the statements below and decide whether you think the argument is a strong argument. You do not need to agree with the argument, you just need to decide if it is strong or weak:

Should governments implement a minimum wage, outlining a minimum amount an employee has to be paid per hour?	Strong argument	Weak argument
Yes, the existence of minimum wages is a key part of a civilised society.		
Yes, countries that do not have a minimum wage are often impoverished and dysfunctional		
No, minimum wage leads to under-employment by forcing companies to take on staff part-time, as they cannot afford to hire them on a full-time basis.		

Read the statements below and decide whether you think the conclusion makes sense. You do not need to agree with the conclusion, you just need to decide if it makes sense based on the statement:

Statistics have shown that companies selling baked goods, such as cakes and pastries are more likely to be successful if they are advertised as French or Belgian Therefore:	Conclusion makes sense	Conclusion do not make sense
Conclusion 1: French and Belgian products are more expensive		
Conclusion 2: French and Belgian baked goods must taste better		
Conclusion 3: It is a sound business model to advertise baked goods as "French" or "Belgian" as this is more likely to result in successful sales.		

Debate Reflections and Self-Evaluation

Use this space to reflect on how you contributed to this debate

During the debate I spoke for ... (minutes and seconds)	
Contributed to the discussion by....	
Challenged the opposition when...	
Used evidence when I was challenged by the opposition	
Made my argument more effective by ...	
I am proud of myself for ...	
In the future I would like to	

Skills Reflection

Think about the different workshops you have completed and how you can utilise what you have learned in your studies, by completing the reflection below.

Skill	When did you use this skill during arguing with confidence?	How can I implement this into my studies?
1. Speaking “The ability to communicate effectively through spoken word”		
2. Listening “The ability to pay attention to and effectively interpret what other people are saying”		
3. Structuring and organising arguments “Presenting a point by clearly explaining an issue and why this is an issue. This might be by specifying that		

something must change or a way of thinking is not working”		
4. Critical thinking "The ability to effectively analyse information and form a judgement”		
5. Evidence based reasoning “The process of using credible and relevant information to support your claims, arguments, or decisions.”		
6. Problem solving "The process of finding solutions to difficult or complex issues”		
7. Decision making “the process of making choices by identifying a decision, gathering information, and assessing alternative resolutions”		

Appendix C: Changes in Pre-Post responses for skills measures

Change in Pre-Post	Articulating opinion		Speaking skills		Listening & speaking		Listening (skills)		Organising and structuring		Critical thinking (CT)		Evidence based reasoning (CT)		Problem Solving (CT)		Academic Self-efficacy	
	n	%	n	%	n	%	n	%	n	%	n	%	n	%	n	%	n	%
Positive Change	15	32%	18	38%	9	19%	12	26%	21	45%	17	36%	16	34%	12	26%	20	43%
Negative Change	13	28%	4	9%	11	23%	10	21%	9	19%	10	21%	9	19%	10	21%	7	15%
No Change	19	40%	25	53%	27	57%	25	53%	17	36%	20	43%	22	47%	25	53%	20	43%
Total	47	100%	47	100%	47	100%	47	100%	47	100%	47	100%	47	100%	47	100%	47	100%

Appendix D: Statistical Significance Testing Results

	Significance Testing Results								
	Articulating an opinion	Speaking skills	Listening & speaking	Listening skills	Organising and structuring	Critical thinking	Evidence based reasoning (CT)	Problem Solving (CT)	Academic Self-efficacy
<i>p-value</i>	0.591	0.003	0.868	0.362	0.04	0.365	0.037	0.462	0.006

Appendix E: Qualitative Feedback

Themes	School A	School B	School C	School D
1. Self Efficacy				
1.1. Confidence	<p>“Definitely gave me more confidence to say your opinions on the debate”</p> <p>“I’ve gained confidence when arguing, now. I can speak more, or without- now that I’ve done this.. [talk for longer]”</p> <p>“I don’t know if I’ve gained that much confidence when speaking standing up”</p> <p>“I stayed the same” (x2)</p> <p>“I’ve gained confidence when arguing,</p>	<p>I can speak in front of people without, like- I never used to be able to do that.</p> <p>It’s allowed me to be more comfortable projecting my voice, and being confident in front of a group of people I don’t necessarily know.</p> <p>Speaking in front of everyone. Because I couldn’t do it properly</p>	<p>I feel a lot more confident talking to a larger crowd of people</p> <p>Yeah, a bit more pride and a bit more confidence when you speak</p> <p>Not being so nervous. So if I were more confident, I would be able to speak more.</p> <p>I’ve gained a lot of confidence as well and</p>	<p>I’ve gained more confidence with speaking in front of crowds, and stuff. And it’s also given me the confidence to say my opinions without worrying about what other people say.</p> <p>“[I want to] remember how proud we are and how confident we were in doing this type of experiment that we just did today</p>

	<p>now. I can speak more, or without"</p>	<p>beforehand and I was able to come up and properly, like, confidently speak in front of people</p> <p>Yeah, confidence. Because, normally, I even struggle to speak in front of my friend groups, because there's so many people. But now I can properly, like, actually speak freely.</p> <p>It helped mainly by- basically by forcing us to speak, but having us, like, speak in front of people, and it doesn't matter how confident we are to</p>	<p>just gained more knowledge about different stuff.</p> <p>Originally, I used to have a stutter every now and then but it's a lot better now</p>	<p>I enjoyed how people were confident, and got the courage to stand in front of an audience and speak the points and facts, and push themselves further and be in front of an audience.</p> <p>I enjoyed talking in front of people, even though I'm not really a confident person. Yeah, I enjoyed talking to everyone and just socialising with many people, and learning new things</p> <p>I've gained to trust myself, and just say what I think, instead of just holding it in</p> <p>I gained confidence, and to be</p>
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		start off with, because we gain confidence throughout		<p>able to speak what I think...And speaking aloud, I will show I can be heard</p> <p>Confidence. Because it made me really confident, and I learned how to really make people understand what I'm saying.</p> <p>I used to be very shy. If you put me in a group with random people, I'd be shy. But now, it's like I feel like I could talk to anyone and create conversation</p>
1.2. Metacognitive Strategies	<p>It builds confidence for your English exam.</p> <p>"I think it will be helpful, but not particularly. Because English spoken isn't really done, so, it's not strictly, like, directly transferable"</p>		I think the lessons were good, they actually helped us.	<p>You could also use the facts you've learned from doing this in science, when we're speaking about certain subjects</p>

<p>1. Critical Thinking</p>	<p>It gives you the chance to give your opinions on something you wouldn't usually give</p> <p>"Better at critical thinking" (x2)</p>	<p>I can come up with arguments quite quickly now.</p> <p>It, kind of, like, makes you want to question what someone says, and, like, you say, "Well, what if it's like this instead?"</p> <p>I liked that even if you didn't agree with the point that you were on, you eventually did, because you convinced yourself with the research that you were doing</p> <p>"...learning properly how to figure out how to argue things through</p>	<p>And then speaking for a side that you don't normally agree on</p>	
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		information provided.”		
2. Oracy				
2.1. Speaking & listening	“I enjoyed the speaking aspect of it. I liked seeing what other people had to say”	It helps you project your views I liked that when people were counter-arguing, that was quite cool, because you saw how other people reacted to your points	Viewing other people’s opinions Hearing other people’s points of view to how they feel about the argument.	It helped me learn to speak up for myself, and put my opinions across, and not be so, like, anxious when speaking in front of big crowds “And [I’ve learnt] how to persuade people to see your point of view, and to understand their point of view as well
2.2. Structuring & Organising	“[what I gained]...like, how to structure a debate properly” “Definitely, like, [how to] structure”	The actual, like, having the option to have a point, given time to develop our own arguments for it, and actually having our own mini-debates, just actually pushing it into our minds. And I just really	You need to make sure you plan it because then you’ve got the ideas down, so you know what to say	“[I’ve learnt] how to write a debate” And being able to give out ideas and examples, instead of just holding them in.

		<p>enjoyed most of it, to be honest</p> <p>Like, being able to properly structure an argument, and, like</p> <p>I used to not be able to properly counter people, and now I can counter an argument, like, very well.</p>			
3. Programme Debating Experience	/	<p>“I’m friends with 90% of people here, so it was more comfortable. Like, I wouldn’t do it- it would be harder if it was people I didn’t know, or not close to”</p> <p>“It was fun”</p> <p>“I was happy with my experience”</p> <p>“It boosts your confidence, you can speak a lot, and you can just argue with people”</p>	<p>It helped me overcome my social anxiety</p> <p>Speaking in front of others was quite fun</p>	<p>You know the first time we did it and we got to draw on that massive piece of paper. That was fun, I probably liked that, I miss it.</p> <p>“[my favourite part] doing the debate, actually giving your argument”</p> <p>The people, for example,</p>	<p>I mean, it was okay, honestly, I loved all of it. Especially, like, how everybody was so communicative and that, that’s what I liked</p> <p>The topics and the campus. It’s not every day you’re in a court</p> <p>I liked seeing what doing the first year had taught us. Like, in</p>

			<p>when Penny, Amy and Connor came to our school I didn't feel judged. For example, if I made a mistake, they would tell me when I went wrong, and I didn't feel embarrassed or anything like that</p> <p>With the group of people that came into the school, they were very helpful whether that be they were giving us confidence to talk and they were someone where it felt normal to talk to</p> <p>I've enjoyed coming out to the university</p>	<p>the summertime, they have, like, shows, and I liked the fact you can move out when you come to university, and have your own independence, and start to learn, like, life skills</p> <p>I like how it brought us as a class together, from different social groups. And I like how it taught us to argue, in a sensible way.</p> <p>People seemed really nice. Like, there were a lot of nice people. They don't look like they would judge people, to be fair</p> <p>I enjoyed that it's different from what you usually do. And it gets you out</p>
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				<p>of school. And learning new things, so you're a bit able to talk to people, and have straight-up conversations with them and debate in a reasonable way</p> <p>I liked that we were doing different things almost every time. And my favourite was the last day, when we came to the big course, and we were arguing, because I like arguing and shouting at people. So, I really enjoyed it.</p> <p>You guys have done a really good job. Everything is perfect.</p>
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4. Suggested Improvements

4.1. Time Management (Pacing)	"We didn't really have enough time to actually put our	"Probably just extra time to, like, figure	"More time to do debates in the	I think you could improve by bringing
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	points right. So, like, if we wanted to write about something, we only had, like, 10 minutes, or 15, like, that was not enough"	things out. Because obviously, you slowly go into it, and then it's, like, immediate. But maybe if it's slowly moved up"	sessions leading up to coming out to the university" Make the overall programme longer whether increasing it from, I don't know, four weeks to six weeks. Having longer than four weeks, yeah	more people, like, more ambassadors. Because it's interesting. I feel like there should be more ambassadors. (x2)
4.2. Session Structure / Event Organisation	"Maybe even have one session where you have stuff written for where you just speak...otherwise, when you're doing both thinking, you don't know what- if that's going to be a real point...try and, like, structure my own ideas to make it make sense, and panicking that doesn't make sense"	"Instead of having one person versus the whole group, one person versus one person" "Also, I feel like a courtroom setting would be a bit more appropriate, thematically"		
4.3. Debate Topic	"if we singled it down to, like, prison should	Like, if we get given someone's		More relatable topics

	<p>focus on rehabilitation, maybe it would be, like, murderers in prisons, murders, or rapists, or- not just prison because that could be literally anything”</p> <p>“...something maybe we’ve experienced. Because I think it’s hard to know stuff that we haven’t learned that much about”</p> <p>“And maybe something a bit more- a lot of the subjects we were covering had a very vast range to them”</p>	<p>point of view, then we have to decide whether we agree or not, using our own points. I think that could be pretty fun.</p>		
4.4. Delivery Timing / Duration	<p>“We’re in Year 10, and it’s GCSEs. And I have mocks next term, and I’ve missed out quite a few history lessons. So, I understand that it is good- I like the idea.</p>	<p>“[to improve event] I’d say a few extra sessions”</p>		

	<p>But just, if we did it last year, it would be a bit easier”</p> <p>“We’ve already done our English presentation. So, if we had the help beforehand, then it might have helped us present it”</p> <p>“Maybe on a longer term. Maybe not in the short term. Because it was only a six-week”</p>			
4.5. Student Handbook	<p>“In the book, you could put suggestions, like, ideas of what you could write...Yeah [prompts], because it just was blank, and doesn’t really make it clear what you have to write, sometimes”</p>		<p>“I think considering the fact that we only had three or four lessons, I think they’re a bit big. Because we didn’t fill in all the pages, we only had to fill in certain pages, so I think it’s a little bit too big”</p>	

<p>4.6. Difficulty Level</p>	<p>"I didn't really understand, like, the way things were worded. Like, I think they should make it a bit easier"</p>			
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