

**Student and staff perceptions of student digital competencies
on an English-Medium international foundation year programme in
Europe, with reference to the EU's Digital Competence Framework
for Citizens (DigComp).**

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DECLARATION

I hereby certify that this dissertation, which is 16,480 words in length, has been composed by me, that it is the record of work carried out by me, it conforms to the University's GAP Policy, and that it has not been submitted in any previous application for a higher degree. This project was conducted by me at the University of St Andrews from 11/2022 to 04/2023 towards fulfilment of the requirements of the University of St Andrews for the degree of MSc TESOL (Technology for Teaching Specialism) under the supervision of Eoin Jordan

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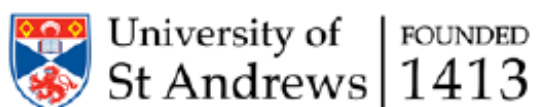
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I agree to my anonymised dissertation being shared electronically with future TESOL students. **YES**/NO

Proofreading declaration

I, 210030742, received particular assistance in the writing of this work in respect of matters of grammar, style, vocabulary, spelling or punctuation. The assistance was provided by my partner, Eilidh Webster. In addition, the editing and proofing tools of Microsoft Word guided some of my choices in proofreading and editing.

Ethics approval letter



International Education Institute Ethics Committee

06 February 2023

Dear Paul

Thank you for submitting your ethical application which was considered at the School Ethics Committee meeting on 06 February 2023.

The International Education Institute Ethics Committee, acting on behalf of the University Teaching and Research Ethics Committee (UTREC), has approved this application:

Approval Code:	ET16726	Approved on:	06-Feb-2023	Approval Expiry:	06-Feb-2028
Project Title:	Student and staff perceptions of student digital competencies on an English-Medium international foundation year programme in Europe, with reference to the EU's Digital Competence Framework for Citizens (DigComp).				
Researcher(s):	Paul Robertson				
Supervisor(s):	Eoin Jordan				

The following supporting documents are also acknowledged and approved:

1. Participant Information Sheet
2. Participant Consent Form
3. Participant Debrief
4. Interview Questions

Approval is awarded for 5 years, see the approval expiry data above.

If your project has not commenced within 2 years of approval, you must submit a new and updated ethical application to your School Ethics Committee.

If you are unable to complete your research by the approval expiry date you must request an extension to the approval period. You can write to your School Ethics Committee who may grant a discretionary extension of up to 6 months. For longer extensions, or for any other changes, you must submit an ethical amendment application.

You must report any serious adverse events, or significant changes not covered by this approval, related to this study immediately to the School Ethics Committee.

International Education Institute Ethics Committee

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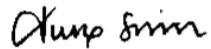
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Approval is given on the following conditions:

- that you conduct your research in line with:
 - the details provided in your ethical application
 - the University's [Principles of Good Research Conduct](#)
 - the conditions of any funding associated with your work
- that you obtain all applicable additional documents (see the ['additional documents' webpage](#) for guidance) before research commences.

You should retain this approval letter with your study paperwork.

Yours sincerely,

A handwritten signature in black ink, appearing to read 'Julie Smith'.

Julie Smith

cc. Eoin Jordan

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Many individuals have supported me throughout researching and writing this dissertation. Firstly, I would like to express my gratitude to my supervisor for his enthusiasm, support and encouragement. I benefitted greatly from his experience and advice, which has helped me become a better researcher and writer. Secondly, I would like to thank all the lecturers, tutors, and support staff at St. Andrews's International Education Institute. Their expertise and guidance have helped me develop the skills, knowledge and confidence to undertake this project. I would also like to acknowledge the contributions of my fellow students, who have provided intellectual stimulation and support throughout. I am indebted to all of my participants, without whom this project would not have been possible. Finally, I would like to thank my friends and family for all their support throughout. I would especially like to thank my partner, Eilidh Webster for believing in me, and for all of her support and understanding throughout.

Abstract

Digital competence (DC), the ability to confidently use technology, is increasingly regarded as critical to effectively participate in 21st-century society and especially education. At many higher education institutions, technology mediates learning and assessments (Ahmed & Roche, 2021), and high levels of DC have been linked to positive academic achievement (Martzoukou et al., 2020). However, it is not always clear what is expected of students or what skills they possess. This qualitative study, based around the EU's DigComp 2.2 Framework (Vuorikari et al., 2022), employs semi-structured interviews and document analysis to explore the perceptions of staff and students at an English-Medium International Foundation Year programme. In particular, it focuses on which competencies are considered most relevant, levels of perceived student competence, to what extent an Academic English Skills (AES) course addresses DC and implications for course design.

The results indicate that both students and staff regard 'information and data literacy', 'communication and collaboration' and 'problem solving' as the most relevant and valuable competencies for higher education. These are also the areas that students were considered most competent and that the AES course was perceived as addressing. Students rated themselves as relatively competent in these three areas, however, staff noted varying levels of student DC and in general considered students slightly less competent than they viewed themselves. 'Safety' and 'digital content creation' were valued to a lesser degree and students were considered somewhat competent in these areas. The AES course was regarded as explicitly addressing 'information and data literacy' and developing 'problem solving' indirectly. 'Communication and collaboration', however, was seen as developing primarily through a locally-implemented collaborative project. These findings suggest several

recommendations to improve provision including more explicitly addressing 'communication and collaboration' and 'problem solving', implementing an interdisciplinary approach to curriculum design to prevent gaps in provision and incorporating diagnostic testing of DC.

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List of abbreviations

AES	Academic English Skills
BS	Business Student
CD1	1 st Global Pathway Network Curriculum Designer
CD2	2 nd Global Pathway Network Curriculum Designer
CD3	Western European Foundation Centre's Curriculum Designer
DC	Digital Competence
DL	Digital Literacy
EMI	English Medium Instruction
ES	Economics Student
EU	European Union
GPN	Global Pathway Network
HE	Higher Education
HEI	Higher Education Institution
ICT	Information and Communications Technology
IELTS	International English Language Testing System
IFY	International Foundation Year
SSS	Social Sciences Student
T1	1 st Western European Foundation Centre Teacher
T2	2 nd Western European Foundation Centre Teacher
VLE	Virtual Learning Environment
WEFC	Western European Foundation Centre

1.0: Introduction

As technology continues to proliferate throughout our lives, the ability to effectively use technologies is increasingly considered critical for participation in society. Academics and policymakers have recognised this importance, which is reflected in the growing interest in the interrelated concepts of digital competence (DC) and digital literacy (DL). In this context, DL has come to be seen as a "survival skill" (Eshet, 2012, p.268) potentially shaping life prospects by impacting education, work, culture, health, and political and civic participation (Tinmaz et al., 2022). Furthermore, DC is regarded as a transversal boundary competence supporting the development of language, learning aptitude and arithmetic (Lucas et al., 2022; Spante et al., 2018). Therefore, DC is now considered "both a requirement and a right" (Ferrari, 2012, p.3), in much the same way as numeracy and literacy. The importance of a digitally competent population has been acknowledged by policymakers, who see it as key to staying economically competitive (Tinmaz et al., 2022) and have set targets such as the European Union's (EU) Digital Decade goal of having 80% of its population possessing basic digital skills (Vuorikari et al., 2022). However, despite this increasing prominence, DC remains misunderstood (Spante et al., 2018) and it is unclear how these targets will be met.

1.1: Professional context

My interest in the topic stems from my teaching experience, particularly in my current context of teaching an Academic English Skills (AES) course for International Foundation Year (IFY) students in an English-Medium Instruction (EMI) environment in Western Europe. IFY programmes aim to bridge the gap between students' existing qualifications and those necessary to enter undergraduate degrees (Jones et al., 2020). They usually include classes

addressing English language, content subjects and academic skills, but also help students develop confidence and resilience to cope with other challenging aspects of the transition, such as acclimatising to social, cultural, and academic practices (Jones et al., 2015, 2020). Furthermore, some IFY programmes now include an explicit focus on DL (University of Bradford, 2023). While IFY programmes are most common in countries where English is the main language, they also exist in other contexts, including EMI institutions. EMI programmes take place at higher education institutions (HEI) where academic subjects are taught in English, rather than the first language(s) of the institutions (Macaro et al., 2018). The past two decades have seen a rapid expansion in the provision of EMI programmes at HEIs around the world and in Europe in particular (Wächter & Maiworm, 2014). In part, this has been driven by a desire by HEIs to recruit more foreign students (Macaro et al., 2018) and HEIs in the Global North continue to recruit large numbers of international students (Morgan et al., 2022). The concept of an international student can be complicated. There are varying definitions in different countries (Shkoler & Rabenu, 2020) and increasing numbers of students study through distance education and at international branches in their home country, or transnational institutions (Steyn & Gunter, 2021). This dissertation focuses on international students whose first language is not English and who are on a pathway to study on an English-medium undergraduate programme outside of their home country. In the contexts of both IFY and EMI, it is important to understand the additional challenges that these students face (Ahmed & Roche, 2021). While there is literature addressing other key areas for these students, my initial reading revealed a lack of literature addressing DC in these contexts. This represents a gap in the literature which this study aims to partially address.

This study was conducted at an IFY provider located in Western Europe, which is part of a larger global network of international pathway institutions. To provide a degree of

identity protection, these institutions will be referred to as WEFC (Western European Foundation Centre) and GPN (Global Pathways Network). This means that if this dissertation is published online, it will not be identified by any keyword searches including the institutions' names. More detailed description of the context of this research has been included in the research context in section 3.2.

1.2: Key terms

The concept of DC is often broadly defined to reflect its impact on a wide variety of areas and further elaborated in frameworks giving more specific details. Although there are various definitions of DC, many echo the broadness captured in the European Commission's (2019) definition of DC as one of the eight Key Competences for Lifelong Learning:

Digital competence involves the confident, critical and responsible use of, and engagement with, digital technologies for learning, at work, and for participation in society (European Commission, 2019, p.10).

This definition reflects how deeply technology has impacted life in general, particularly education and employment. Furthermore, the emphasis on *confident, critical, and responsible* use signals that DC includes not just technical skills to operate digital technologies, but also cognitive and social skills, and the critical knowledge and attitudes required to use them effectively (Spante et al., 2018). Such a broad definition would be difficult to use practically in research and policy, therefore a range of frameworks have been developed to outline what DC includes more clearly. Some of the key frameworks will be analysed in section

2. The EU's DigComp 2.2 Framework (Vuorikari et al., 2022) is adopted for this dissertation because it is regarded as comprehensive and shapes educational policy across Europe (Balula, 2016). This framework groups 21 competencies into five broad areas – 'information and data literacy' (hereafter referred to as 'information literacy' for brevity); 'communication and collaboration' (hereafter referred to as 'communication'); 'digital content creation'; 'safety'; 'problem solving.'

1.3: My relationship to the research

When considering my dissertation topic, I wanted to investigate something that would help me support my students and improve the provision of the AES course. I was partially guided by Borg's (2010) conception of teacher researcher as aiming to enhance teachers' understanding of their work and inform educational improvement. Therefore, I elected to conduct research within my current workplace. However, while the insider perspective offers advantages such as ease of access and rapport, there are also potential challenges especially around power and confidentiality (Mercer, 2007; Poulton, 2021). Furthermore, as a teacher researching my students, there were several ethical issues that I would have to consider. These ethical considerations will be discussed in more detail in section 3.4. Both issues meant that I had to carefully reflect on my role and conduct throughout the research.

My practice has evolved over time and now technology is an almost indispensable and everyday part of my classroom, with learning activities and assessments mediated through technology. I am aware that the HEIs that I am helping students prepare for are similarly technology-rich, and that DC has an impact on academic performance and engagement (Martzoukou et al., 2020; Zhao et al., 2021). However, I have noted that students' abilities

and interest in using technology to learn varies greatly and that some struggle to adapt to the expectations of technical fluency. The Covid-19 pandemic and the rapid move to fully online education drew sharper attention to this issue. Speaking with colleagues revealed a range of barriers that students experience, which are reflected in the wider academic community (Coldwell-Neilson, 2018; Martzoukou et al., 2020; Simonics, 2013). These issues range from a lack of basic computer skills to more critical and cognitively engaging skills such as identifying suitable sources of online information, and more social issues such as appropriate email communication. I wanted to help these students address these challenges to enable them to learn more effectively, however, I was uncertain which competencies were most important for their studies, which they already possessed and how to incorporate support in an already packed curriculum, a challenge noted by other teachers (Coldwell-Neilson, 2018). I felt that the AES course was helping students to develop some DC but was unsure to what extent and which activities were most effective.

1.4: Research questions

Therefore, I am interested in finding out what staff and students perceive to be the most important DC for these students as they prepare for higher education (HE), which they already possess, and how their DC can be developed in courses like AES. To explore these issues in more depth this study aims to answer the following four research questions:

1. What do students and staff within and related to WEFC perceive to be the most relevant digital competencies for English-Medium international foundation students?

2. What are staff and students' perceptions of the degree of digital competence that these students possess?
3. Which areas of digital competence does the current Academic English Skills course aim to help students to develop?
4. What implications do the findings have for how this and other similar courses are designed and delivered in future?

2.0: Literature Review

This section first outlines the approach taken to searching the literature on DC. It then examines the development of the concept of DC and some key frameworks used to conceptualise DC, before explaining the rationale for the choice of the DigComp 2.2 Framework for this dissertation. Next, the literature on DC in the context of HE is examined in relation to research questions of this study - which competencies are seen as relevant for HE, students' existing levels of DC, DC in relation to EMI and IFY students, and how DC is incorporated into curricula.

2.0.1: Approach to searching the literature

I conducted an initial search within the St. Andrews university library database, limiting sources to those available online and published in English, using the following search string:

- (“digital literac*” OR “digital competenc*”) AND (“higher education” OR university)

I complemented this with additional search terms relevant to the study, including:

- (IFY OR “International foundation year” OR pathway)
- (EMI OR “English medium instruction” OR “English-medium Instruction”)

I repeated these searches in Google Scholar and the research databases ProQuest, JSTOR and ERIC. I filtered the sources to ensure relevance using the following criteria:

- written in English
- related to HE or IFY
- focused on students or teachers in the HE context
- published in academic journals, conference proceedings, or book

As I read, I identified further sources from the reference lists of these articles. This yielded a total of 62 articles related to DC which have been cited in this dissertation.

One limitation is that the term DC is commonly used in European contexts (Spante et al., 2018), and hence I was unable to read several articles of interest published in languages other than English. For example, Sales et al. (2020) explore perceptions of digital competence in the context of Covid-19 lockdowns. However, Tinmaz et al.'s (2022) and Zhao et al.'s (2021) systematic reviews provided indirect access.

2.1: Unpacking digital competence

The terminology associated with DC is complicated because different terms are used to describe similar or overlapping concepts. The most common term in the literature is DL (Ilomäki et al., 2016) and since 2010 DC is increasingly used (Spante et al., 2018); however, Ilomäki et al.'s (2016) review of terminology found a total of 34 terms used in literature. These vary in meaning and context and are interpreted differently in academic research, policy, and practice, resulting in a “jargon jungle” (Ferrari, 2012, p.11) which can be difficult to untangle. This complicated and evolving terminology presents several problems. Firstly, it is difficult to compare research because it is unclear what exactly is referred to, potentially reducing the validity of research (Spante et al., 2018). Secondly, what exactly it means to be digitally

competent in practical terms is ambiguous (Janssen et al., 2013), making it more difficult to develop programmes addressing DC. Finally, defining and conceptualizing DC and DL involves adopting an ideological stance regarding the degree to which technologies are neutral or shaped by economic, social and political factors (Hinrichsen & Coombs, 2013). Additionally, what is included and what is not is likely to be shaped by the background of the person offering the definition. Therefore, it is necessary to establish a clear understanding of what DC means in the context of this study and the following section will discuss the development of the concept of DC before identifying the operational definition chosen.

2.1.1: The development of DC and related concepts

The multi-faceted concept of DC emerged from a discourse of related concepts such as DL but has its own distinct connotations. The two terms overlap somewhat, are sometimes used interchangeably in the literature, and sometimes underpin each other (Spante et al., 2018). Therefore, it is necessary to explore each term to understand what they entail.

The concept of DL focuses on the understanding of meaning and includes a pluralistic view of the literacies necessary to interpret meaning in digital contexts. The most frequently cited origin of increased academic interest in DL is Gilster's book, *Digital Literacy* (1997), which defined it as "the ability to understand and use information in multiple formats from a wide variety of sources when it is presented via computers" (Gilster, 1997, p.1). Gilster emphasised "mastering ideas not keystrokes" (1997, p.15), reflecting the common understanding of DL involving emotional-social and cognitive skills, alongside technical skills (Gallardo-Echenique et al., 2015). This focus on understanding information reflects DL's origins in literacy discourses, which emphasise encoding and decoding meaning (Ferrari, 2012). Although there have been numerous updated definitions of DL, many retain this

textual focus, for example, see Kern (2021). However, texts are now often multimodal including images, links, video or audio. The New London Group argued that multiliteracies are required to understand such multimodal texts which are situated within specific social and institutional contexts (Cazden et al., 1996). There is general agreement that a plurality of literacies is required, rather than a monolithic concept (Pegrum, 2019), shifting focus from stable traditional literacy to multiple, dynamic, dialogic, and situated literacies (Ware et al., 2016). This is reflected in conceptualisations of DL which see it synergising with other literacies. For example, Ala-Mutka (2011) modelled DL as overlapping ICT, Internet Literacy, Media Literacy, and Information Literacy (Figure 1).

Figure 1

DL and Other Related Literacies (Ala-Mutka, 2011, p.30)

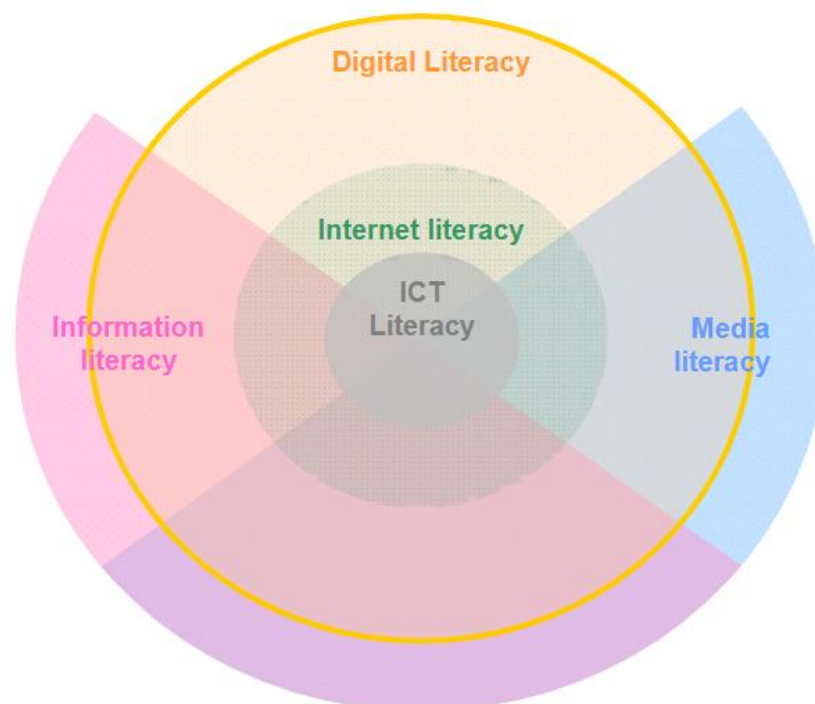
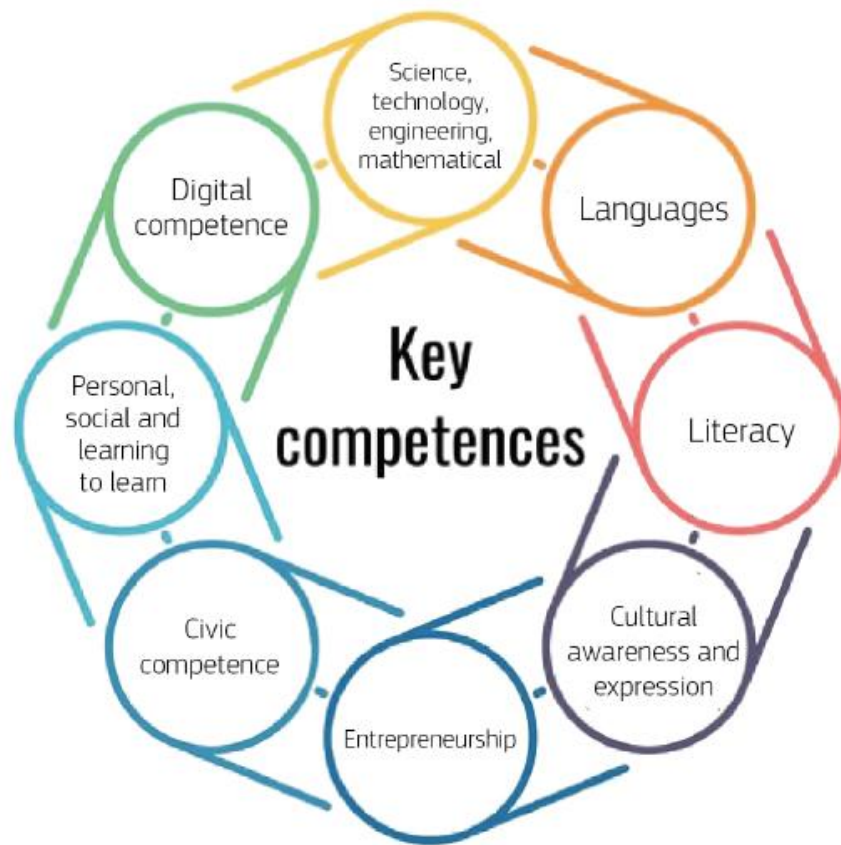


Figure 2

The EU's Key Competence for Lifelong Learning Framework (Vuorikari et al., 2022, p.5)



In contrast, the concept of DC has primarily been shaped by policy-related documents, particularly gaining currency since 2010 due to the EU's Key Competences for Lifelong Learning (Spante et al., 2018). The EU have identified these key competencies (Figure 2) as essential to citizens for life, employment, and citizenship (European Commission, 2019). DC is considered a key transversal competence that supports the development of other competencies. Due to these origins, DC can be seen as inherently political and related to employability and economic agendas (Ilomäki et al., 2011). This focus can be seen in Ferrari's broad definition of DC as "the confident, critical and creative use of ICT to achieve goals related to work, employability, learning, leisure, inclusion and/or participation in society"

(2013, p.2). DC has emerged from the convergence of several fields including library studies, computer science, media studies and literacy studies (Ilomäki et al., 2016), reflected in the inclusion of information literacy, programming, and media literacy in several DC frameworks such as the DigComp Framework (Vuorikari et al., 2022). As such, DC is underpinned by both basic IT skills and by DL (Spante et al., 2018). The focus on situations also highlights that DC is considered contextualized and embedded within social practices (Ferrari, 2012), meaning that the broad conceptualization of DC will be operationalized differently in varying contexts.

Although there are a variety of alternative definitions of DL and DC, explored in Spante et al.'s (2018) systematic review, Gilster's (1997) and Ferrari's (2013) definitions capture the similarities in the common definitions while also revealing the different emphasis. Where DL is more focused on interpreting meaning, DC is more broadly focused on the abilities necessary for effective participation in 21st century life. Gallardo-Echenique et al.'s (2015) table summarizing the differences (Table 1) is useful in distinguishing the nuances between the two concepts. When discussing definitions of DL, Lankshear and Knobel (2008) differentiate between conceptual definitions which present an ideal or general idea, and operational definitions which identify tasks and skills as a standard for adoption. This distinction is useful for DC, which is defined through broader definitions such as Ferrari's (2013) but given more specificity through detailed frameworks such as the DigComp Framework. Ferrari's (2013) definition is adopted as the conceptual definition for this dissertation, because it is relatively comprehensive. Furthermore, it is the conceptual definition that is associated with the DigComp Framework, which is used as the operational basis for this study. Therefore, for this dissertation DC is defined as "the confident, critical and creative use of ICT to achieve goals related to work, employability, learning, leisure, inclusion and/or participation in society" (Ferrari, 2013, p.2). While this is the definition that

is used in this dissertation, I am drawing on literature that uses other definitions and focuses on the concept of DL. In each case I have made a judgement as to whether the definition used overlaps sufficiently to justify inclusion in the review.

Table 1

Differences Between DC and DL (Gallardo-Echenique et al., 2015, p.11)

Digital competence	Digital literacy
An employability requirement of the digital age	Conceptualizations of the changing learning paradigm in the digital age
A 'skills' connotation, implying competency with some of today's computer applications, including word processing and e-mail, etc.	Deictic approaches to learning and communication
Set of abilities needed to apply digital technologies to work, leisure and education	Set of understandings needed in the digital era to understand, produce and negotiate meaning in a culture made up of powerful images, words and sounds
Skills people should have in the digital era	An assumption that skills, awarenesses and understandings exist that will enable individuals first to survive and second to be more effective in their e-encounters
Skills to communicate with others and address a wide range of texts in all media	A combination of technical-procedural, cognitive and emotional-social skills
A range of capabilities (knowledge, skills and competences) covering three main categories: ICT practitioner skills; ICT user skills, and e-business skills	Processes of awareness, confidence, evaluation, reflection, adaptability and willingness to meet the digital age challenges
Demonstrated ability to apply knowledge, skills and attitudes to achieve observable results; measurable performance through rubrics	Ability to understand and use information in multiple formats from a wide range of sources when this is presented via computers
Confident and critical use of Information Society Technology (IST) for work, leisure and communication	Complex cognitive, motor, sociological, and emotional skills that users need in order to function effectively in digital environments
Underpinned by basic skills in ICT: the use of computers to retrieve, assess, store, produce, present and exchange information, and to communicate and participate in collaborative networks via the Internet	Awareness, attitude and underlying abilities needed to use digital tools appropriately and to reflect upon this process

Ferrari's (2013) definition is broad, allowing adaptability, but more specific delineation is necessary for more practical purposes. This looseness has been considered a strength, as the definition is adaptable to shifts in technology and focus (Bawden, 2008), which Ferrari (2013) noted as a conscious choice. This flexibility can be seen in the latest update of the DigComp Framework, which explicitly addresses emergent issues of AI and remote working (Vuorikari et al., 2022). Furthermore, Ilomäki et al. (2016) argue that looseness allows DC to act as a boundary concept, adapting to local needs and operating across crossing disciplinary lines, and policy and research discourses. This is particularly important for DC, which operates across multiple fields, countries, and contexts.

2.1.2: Key frameworks and models

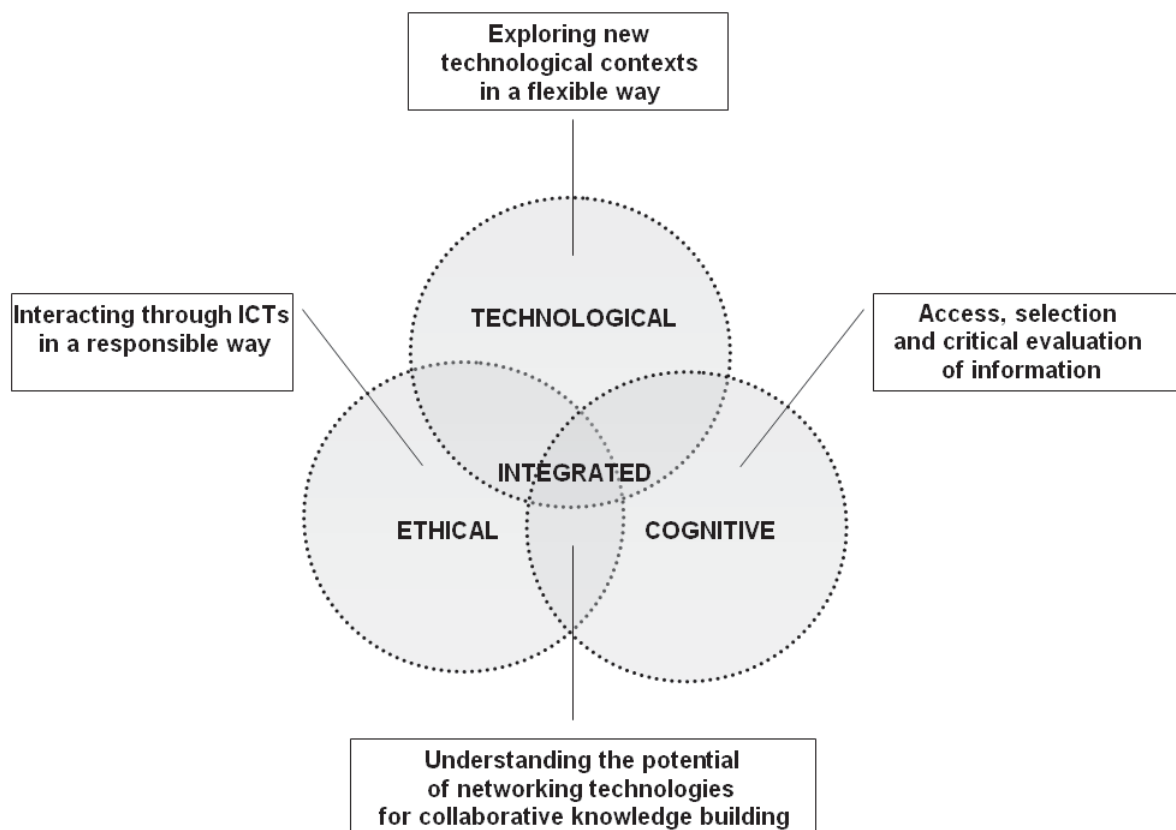
This section will introduce some of the key frameworks contributing to the conceptualization of DC. Over 100 models and frameworks of DC or DL have been developed (Brown, 2017a, 2017b), reflecting different conceptions and contexts. The frameworks reviewed have been chosen to reflect a variety of conceptual approaches and based on impact, judged by the number of citations and influence within the literature. They are presented in chronological order of publication. It is not possible to introduce all the models due to the space limitations of this dissertation, but other models were considered including Sharpe and Beetham's (2010) pyramid model of e-learning, Falloon's (2020) teacher digital competency framework and JISC's (2022) digital capabilities framework.

Calvani et al.'s (2008) digital competence framework was developed to scaffold the creation of DC assessment tools for schools. They emphasise that DC is multidimensional, complex, and sensitive to sociocultural context and that it is interconnected with other key competencies such as literacy and numeracy. Their framework is formed from three

overlapping dimensions (Figure 3); technological, cognitive, and ethical. This conceptualization of overlap is a common feature of DC frameworks, and the framework emphasises the integration of the three dimensions.

Figure 3

Calvani et al.'s (2008, p.187) *Digital Competence Framework*

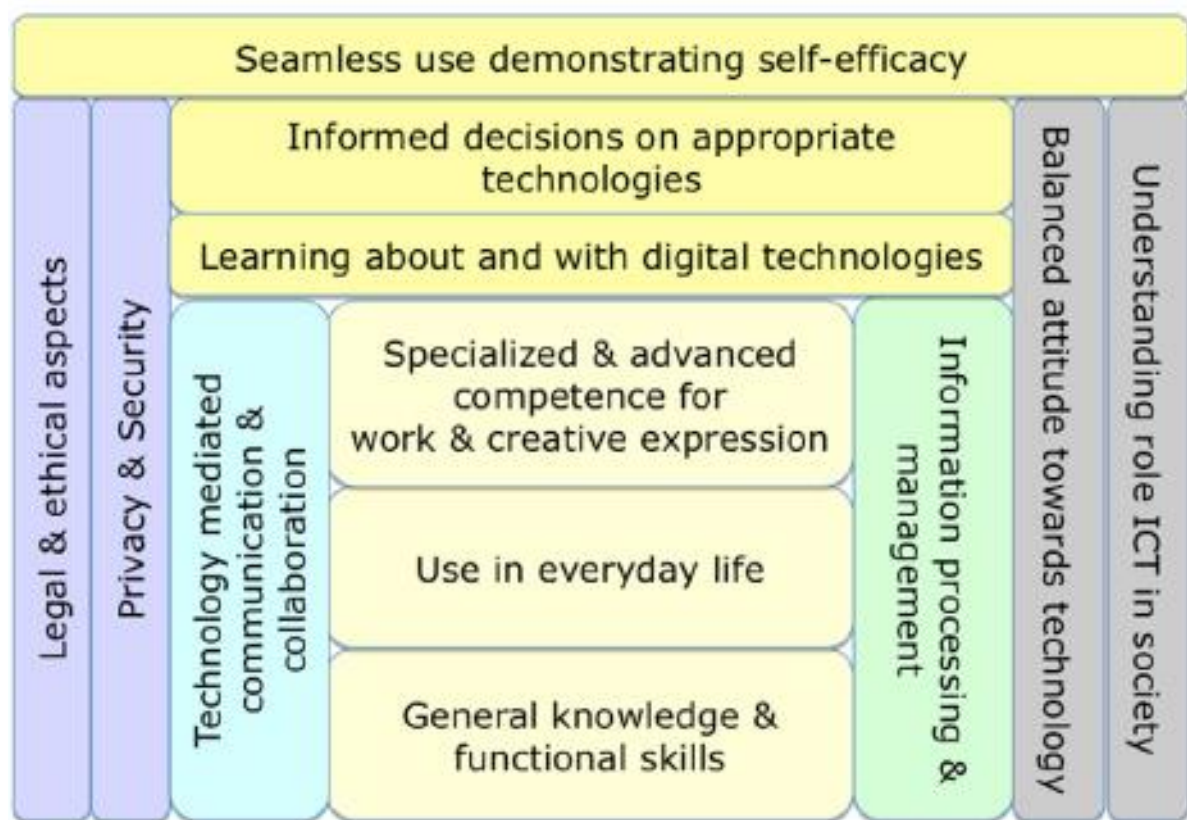


Janssen et al. (2013) interviewed 95 experts from various fields and different countries to create their framework. They conceptualized DC as consisting of twelve areas, involving technical, attitudinal, and cognitive skills, viewed as 'building blocks' (Figure 4). This conception views elements such as 'Privacy & Security' as transversal, represented by vertical blocks relevant to the areas they overlap. Proficiency varies between and within blocks but is

also seen as increasing through the central blocks, from the foundation of ‘general knowledge & functional skills’ to the heights of self-efficacy. The strength of this framework is that it combines hierarchical elements of Sharpe and Beetham’s (2010) pyramid with the overlap present in Calvani et al.’s (2008) framework while providing more breadth and depth. However, this framework lacks elaboration on the individual building blocks and so would be difficult to implement in policy or research.

Figure 4

Digital Competence Building Blocks (Janssen et al., 2013, p.478)

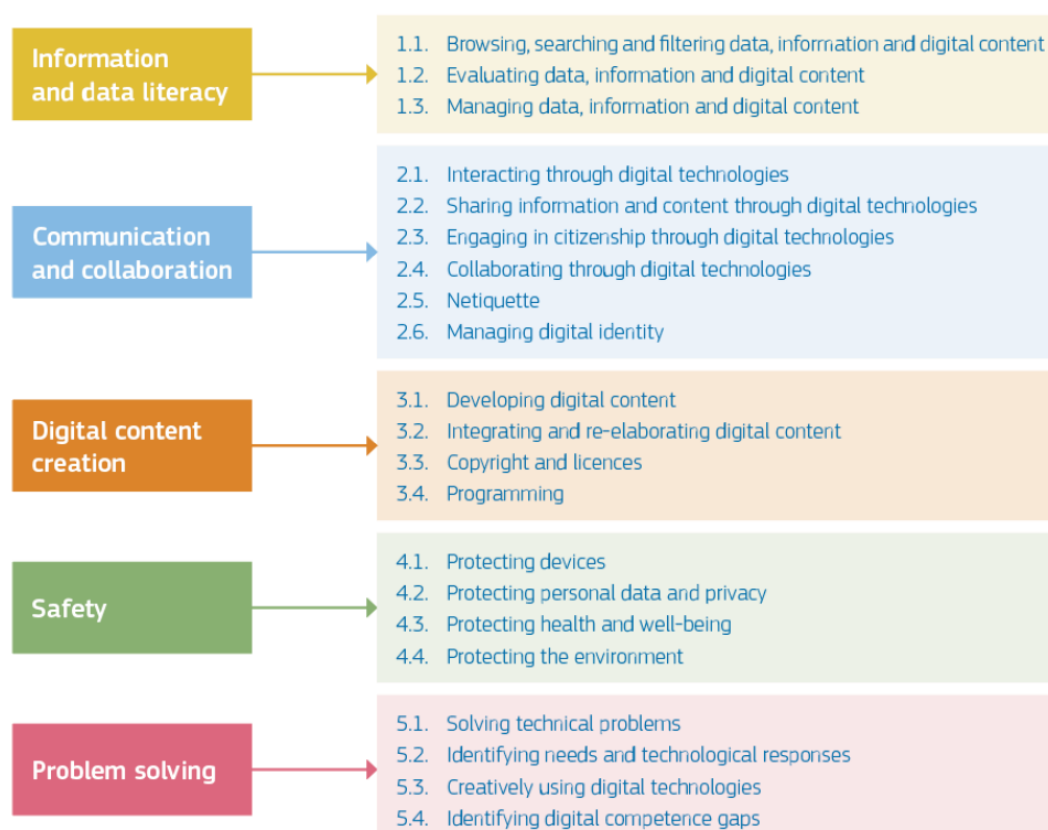


The DigComp Framework was developed in 2013, following the EU’s acknowledgement of DC as one of 8 Key Competences for Lifelong Learning (Ferrari, 2013) and is used as the framework for this study. It was created following several studies and an

analysis of 15 other frameworks (Balula, 2016; Ferrari, 2012) to support the European Commission's goal for all citizens to be digitally literate. It explicitly acknowledges the need to consider technological developments and has most recently been updated to DigComp 2.2, referencing recent developments such as remote working, and advancing AI tools (Vuorikari et al., 2022). It comprises five broad areas, including a total of 21 competencies as illustrated in Figure 5. All five areas are seen as overlapping, however areas 1-3 link more closely to specific activities, while areas 4 and 5 are considered particularly transversal (Ferrari, 2013). Each competence comprises knowledge, skills, and attitudes suitable to the context and is divided into eight proficiency levels, based on task complexity and level of autonomy, as can be seen in the graphical representation of competency 1.1 (Appendix IV).

Figure 5

The Competencies of the DigComp 2.2 Framework (Vuorikari et al., 2022, p.4)



The DigComp 2.2 Framework was chosen for this study because it is one of the most comprehensive and well-developed frameworks describing DC, has had a significant impact and is increasingly used in research. Firstly, it is considered to be relatively comprehensive and covers the main areas addressed in other frameworks (Sánchez-Caballé et al., 2020). Lucas et al. (2022) argue that an appropriate framework for assessing DC levels in HE should reflect the transversal nature of DC, but also include tangible aspects that can be assessed, which the DigComp Framework does. Secondly, this framework has had substantial influence, establishing a common understanding of DC across the EU and influencing national policies and initiatives for a decade (Lucas et al., 2022). Furthermore, it is directly applicable to education as it includes specific education related examples (Vuorikari et al., 2022) and has been found suitable for characterising HE students' DC (Evangelinos & Holley, 2015). Finally, it is increasingly used in academic work to define and conceptualize DC (Spante et al., 2018), as a means of assessing perceptions (Sicilia et al., 2018) and in developing assessment tools (Lucas et al., 2022; Vishnu et al., 2022). Because it is used as the basis of research investigating DC, studies using it can provide comparable results contributing to knowledge in this area.

2.2: DC in higher education

DC is increasingly important to HE due to its link to employability and its importance for effective learning. Both employers and students regard DC as important and HEIs are considered to have a responsibility to develop graduates' DC (Payton, 2012), however, there is a gap between employer expectations and graduates' abilities (Coldwell-Neilson, 2018; Morgan et al., 2022). Alongside preparing students for work, DC is necessary for learning at HEIs increasingly suffused with technology. Technology is seen as enabling innovative learning

and teaching (Fedorova & Nikiforova, 2022), and has therefore proliferated. Laptops and smartphones are considered necessities (Yu & Zadorozhnyy, 2022) because many learning activities are mediated through technology. Students access learning resources hosted on Virtual Learning Environments (VLE), collaborate and communicate online, and often require technologies to complete assessments (Ahmed & Roche, 2021; Coldwell-Neilson, 2018). In such a technology-rich environment, it is unsurprising that studies have shown the positive impact that higher levels of DC have on academic performance and engagement (Martzoukou et al., 2020; Zhao et al., 2021). Given this situation, it is vital to understand which elements of DC are most important for students and which they need to develop, particularly in the context of IFY programmes preparing students for undergraduate studies.

2.2.1: Relevant DCs for higher education

Despite broad agreement on the importance of DC for students at HEIs and evidence of high expectations, there is relatively little information about what is specifically expected. Indeed, students are often presumed to arrive at HE with the necessary DC level for study, but universities rarely make explicit statements about what students should be able to do (Coldwell-Neilson, 2018). Furthermore, based on the database searches conducted for this literature review Coldwell-Neilson's (2018) study is the only one explicitly examining this issue. Coldwell-Neilson surveyed lecturers on specific skills, knowledge, and abilities they expect their first-year students to possess and found that for each item at least half the respondents expected the students to be capable (Table 2). Although this study is limited to one Australian institution and the list is not comprehensive, it indicates the high expectations of students' DC levels.

Table 2

Expectations and Perceived Capabilities of First-year Students (Coldwell-Neilson, 2018, p.107)

	I expect my students to be able to ... (expectation)	... of my students can ... (observation)		
		All	some	none
	# (%)	# (%)	# (%)	# (%)
Send me an email	143 (96)	130 (88)	15 (10)	3 (2)
Attach a document to an email	140 (94)	116 (78)	27 (18)	5 (3)
Locate unit resources online	131 (89)	53 (35)	90 (61)	5 (3)
Submit an assignment online	92 (62)	60 (40)	77 (52)	11 (7)
Manage their online storage	105 (71)	43 (29)	93 (63)	12 (8)
Word-process a document	141 (95)	115 (78)	31 (21)	2 (1)
Understand file types	115 (78)	54 (36)	87 (59)	7 (5)
Locate resources online in the library	107 (72)	31 (21)	110 (74)	7 (5)
Use search engines effectively	117 (79)	45 (30)	96 (65)	7 (5)
Understand data privacy and security	99 (67)	24 (16)	117 (79)	7 (5)
Understand digital copyright	85 (57)	24 (16)	96 (65)	28 (19)
Be able to use a discussion board	117 (79)	49 (33)	92 (62)	7 (5)
Manage their online identity	119 (80)	38 (26)	106 (72)	4 (3)
Have proficient keyboarding skills	117 (79)	59 (40)	86 (58)	3 (2)
Use social media to support their learning	74 (50)	40 (27)	93 (63)	15 (10)

‘Information literacy’ and ‘communication’ are both identified as key for students in HE, and both can present challenges. Handling information is critical to study in HE, especially now that so much is easily accessible online. Therefore, students need to be able to successfully identify and evaluate online content and integrate it effectively into their work (Ahmed & Roche, 2021; Morgan et al., 2022). Although finding information has become routine, students are still seen to have difficulties due to ineffective search strategies and low awareness of the ‘filter bubble’ or biases of search algorithms (Ahmed & Roche, 2021; Godwin-Jones, 2015; Reinhardt & Thorne, 2019). Moreover, students must ensure they avoid academic misconduct when using information, through effective citation and attribution practices (Godwin-Jones, 2015; Secker, 2018a), especially as many HEIs use software to detect

plagiarism (Roche, 2017). This area is further problematized by recent advances in AI tools such as ChatGPT (<https://chat.openai.com/>), capable of generating text and information and some HEIs have already explicitly stated that using such tools is cheating (UvA, 2023). Furthermore, ChatGPT poses a variety of ethical issues because the origin, ownership and even veracity of the information and data it uses are unclear (Bryant, 2023). Electronic communication is now also an expectation in most HEIs. University students are often required to communicate through email, online forums, and discussion boards (Dhillon & Murray, 2021) and doing this appropriately requires pragmatic language skills (Roche, 2017).

Sicilia et al.'s (2018) study in five countries specifically investigated which aspects of DC were prioritized by staff, students, employers, and civic organizations and found significant differences in which aspects of DC were most valued. All groups prioritized information searching and evaluation, and communication abilities. However, only students prioritized safety issues, and no groups prioritised problem solving. The present study will hopefully contribute to further understanding of which competencies are prioritised by staff and students.

2.2.2: Students' existing levels of DC

Effectively assessing DC is important but has proved problematic, and so far, the most common approach in research is self-assessment. To effectively improve students' DC, it is necessary to accurately identify them (Son et al., 2017), but HEIs rarely explicitly assess DC (Murray & Perez, 2014). The broad nature of DC can make measurement difficult (Lucas et al., 2022) and rapid technological innovation makes DC an ever-shifting target (Zhang & Wei, 2021), meaning that comprehensive assessment tools are challenging to create. The most common approach to measuring DC in research seems to be self-assessment through

questionnaires (Zhao et al., 2021) which has been noted to be problematic. Coldwell-Neilson (2017) cites several studies reporting that students consistently overestimate their levels of DC and later argued a poor understanding of DC meant students assumed skills with social media and Google (<https://www.google.com/>) made them digitally competent (Coldwell-Neilson, 2018). There are also assessment tools that test knowledge rather than asking for self-evaluation, for example, the Europass Digital Skills Assessment Tool (European Union, 2023). Such tools might provide more accurate assessments but based on my literature search they have not been used in research so far. Despite these issues, self-assessment gives a useful picture of how students perceive their level.

There is conflicting evidence regarding students' perception of their overall DC levels and the competency areas where they feel proficient. Although Zhao et al.'s (2021) systematic review identified five studies showing evidence of students possessing intermediate to more advanced skill levels, they also found five articles reporting more basic levels. Other studies have found similarly conflicting evidence. For instance, Reddy et al. (2020) used a self-reporting questionnaire and found 86.15% of respondents rated themselves as average to highly digitally literate. However, 14.71% reported a low level of DC, suggesting a significant proportion of students lack confidence in their digital abilities. Furthermore, Lucas et al. (2022) and Martzoukou et al. (2020) found that although students rated themselves as relatively competent in most basic aspects, ratings decreased as the level of complexity increased, for example in areas such as digital content creation and identity management. While both Lucas et al., (2022) and Morgan et al., (2022) found students rated themselves as competent with 'communication', the former reported high levels of proficiency in 'information literacy' and the latter found that students reported lowest proficiency in digital information use. In contrast, in Lucas et al.'s (2022) study students evaluated themselves as

particularly low in 'safety', 'problem solving' and 'digital content creation.' This conflicting evidence may be due to the different contexts of the studies.

Several factors have been identified as influencing students' DC levels, including gender, age, varying levels of access and experience, and socio-economic factors. Much research exists on the relationship between gender and DC; however, much is contradictory and there is not a consistent correlation (Lucas et al., 2022). Age has also been linked to DC levels since Prensky's (2001) concept of the digital native proposed that growing up with technology has made the younger generation digitally competent. This notion has been contested because of the lack of empirical evidence (Benini & Murray, 2014). On the contrary, Eshet-Alkalai and Chajut (2010) argue that experience with technology is more important than age. Prior access to technology and experience with its use is seen as influencing students' perceived DC (Morgan, 2018). Related to access is the issue of the digital divide, which describes groups' unequal access to technology, consequently impacting ability (Ilomäki et al., 2011). Socio-economic background has been identified as having a significant impact on DC levels (Vishnu et al., 2022), with less privileged students having less access to devices and less experience. Furthermore, the digital divide has been used to refer to the gap between the richer countries of the Global North and poorer countries of the Global South (Habib et al., 2014; Morgan et al., 2022).

Staff perceptions of students' DC seem to be mixed, with some authors reporting a persistent image of students as competent digital natives, while others note serious concerns expressed by staff about students' DC levels. Dhillon and Murray (2021) and Lucas et al. (2022) report a widespread assumption that students are digital natives who are digitally competent in researching and communicating online, and completing work electronically using institutional platforms. Furthermore, Coldwell-Neilson (2018) noted that HE students are

expected to have acquired DC in prior education. However, the same lecturers in Coldwell-Neilson's (2018) study reported a range of concerns about students' insufficient DC including a lack of ethical awareness, not evaluating online information, not using technology responsibly and struggling with VLEs (Coldwell-Neilson, 2018).

2.2.3: DC in relation to English-Medium Instruction and International Foundation Year

Students are not a homogenous group and those studying in EMI and IFY contexts are likely to face unique challenges. However, there is currently relatively little research addressing these specific contexts. Based on the databases searched for this literature review, there are only two studies addressing DC in an EMI context (Ahmed & Roche, 2022; Ahmed & Roche, 2021) and one in an Australian pathway programme, a context resembling IFY (Roche, 2017). Therefore, this is a gap in the literature that this study aims to address. Roche (2017) found that English as Additional Language international students receiving explicit instruction in DL during a pathway programme reported less difficulty in their later undergraduate studies and a better understanding of academic integrity and course requirements. Similarly, Ahmed and Roche (2021) found that although learners in an EMI institution in the Gulf reported high levels of digital access and confidence in their use of digital technology, they lacked awareness of academic practices such as evaluating online sources. Ahmed and Roche (2022) later emphasised the need to create institution-wide approaches to DC. While little literature focuses specifically on these contexts, the wider literature addresses some issues that are likely to challenge students studying in these contexts.

For students studying in a second language, operating digitally is likely to present linguistic challenges. As Hockly (2012) noted, it is difficult to separate language from the digital environment it is used in. For example, English uses the QWERTY keyboard setup, but

many languages use alternative configurations or different character sets. One specific problem is that information seeking poses a challenge as it is difficult to reformulate search terms if an initial search fails (Mutta et al., 2014). In addition, language learners may face pragmatic challenges interpreting written digital messages (Kern, 2021) and students studying abroad have been identified as less proficient in digital etiquette, reflecting the fact that this is contextual and related to cultural and linguistic differences (Morgan et al., 2022). Furthermore, HEIs often deliver large amounts of written information aimed at all student groups via email and VLEs but may not consider the divergent language capabilities among students (Habib et al., 2014).

As students studying abroad come from a wide variety of backgrounds, there is the potential for international digital divides to play a role. These students are not a homogenous group (Habib et al., 2014) and due to their varied backgrounds, it can be difficult to know which technologies they are comfortable with (Secker, 2018a). For example, at one Indian HEI, almost all students reported owning a smartphone, but less than 40% owned a laptop (Vishnu et al., 2022) and students from the Global South are more likely to lack familiarity with technology (Habib et al., 2014). These students may not have had the opportunity to develop the DC necessary for academic study at a Western University.

2.2.4: Incorporating DC into curricula

Despite the importance of DC in HE, there is evidence that it is not being systematically addressed appropriately by HEIs and that students primarily develop their DC informally. Often HEIs focus on functional skills, which may mean that DC is not directly incorporated into the curriculum (Secker, 2018b) but supported through additional courses, which may neglect areas of DC (Sicilia et al., 2018). Furthermore, when HEIs do offer training related to DC, it is

usually targeted at a basic level (Martzoukou et al., 2020) and therefore may not provide adequate support to develop more advanced skills. Instead, many students are left to develop their DC levels independently (Murray & Perez, 2014). Students tend to learn DC informally in various manners, including on an ad hoc, trial-and-error basis, the use of video tutorials, and through peer support networks (Ahmed & Roche, 2021; Kern, 2021; Ng, 2012; Reinhardt & Thorne, 2019). However, such learning does not always lead to DC suitable for academic situations (Coldwell-Neilson, 2018). Therefore, it seems that DC development is under-supported.

There is evidence that students do appreciate the inclusion of DC development activities within curricula, and although relatively few studies focus on pedagogy related to DC (Zhao et al., 2021) those that do identify task-based approaches reflecting authentic activities as an appropriate approach. Research underlines the value of embedding DC instruction, particularly for first-year and IFY students (Ahmed & Roche, 2021) and both students and educators are reported to appreciate the inclusion of DC training in curricula (Sánchez-Caballé et al., 2020). Students have been noted to prefer support in developing DC in the context of the subjects (Hall et al., 2013), supporting the studies which argue that authentic tasks are an appropriate approach for developing competencies (Fedorova & Nikiforova, 2022). Such tasks reflect actual situations that learners will encounter and how knowledge is applied in real-world contexts (Morgan, 2018), and help develop autonomy rather than skills related to specific tools (Kern, 2021). Similarly, situated and problem-based learning approaches are also seen as helping develop autonomy (Sicilia et al., 2018), which is important because students need to develop transferrable skills to adapt to evolving technologies (Ng, 2012). Some specific examples of such activities were presented by Reinhardt and Thorne (2019), including activities such as online role-play, simulation, and

advert analysis. However, there are a variety of challenges concerning incorporating DC in curricula including the need for teacher training, challenges in training students, constantly evolving technology, and difficulties in making room in curricula (Dhillon & Murray, 2021; Martzoukou et al., 2020; Sánchez-Caballé et al., 2020).

3.0: Methodology

This section will first explain the research paradigm underpinning this study, and then give more detail about the specific context. Next, the research approach taken will be outlined, describing the procedures used in data collection, treatment, storage, and analysis. The section will conclude by exploring some of the ethical concerns raised and the steps taken to minimise these issues.

3.1: Research paradigm

In any research, it is important to consider the philosophical beliefs underpinning the study because of their fundamental impact on the whole process. Researchers convey a view of the world inherently shaped by their values and principles (Kivunja & Kuyini, 2017) and stating these beliefs helps to enhance the credibility of the work by allowing the reader to understand the intellectual biases that inform the design and interpretation (Mays & Pope, 2000). These views are often expressed by researchers aligning themselves within a research paradigm reflecting their beliefs and principles about the world, which is a “conceptual lens” (Kivunja & Kuyini, 2017, p.26) through which they examine their methodological approach, related to the ontological and epistemological beliefs underpinning the research.

My personal and professional experiences have shaped my values and philosophy and led me to view reality as relative, subjective, pluralistic, and socially situated. This is broadly in line with the constructivist paradigm, in which individuals create subjective and varied meanings, reality is viewed as socially constructed with no one absolute truth, and knowledge is considered local, specific, and co-constructed (Guba & Lincoln, 2008). Therefore, constructivist researchers seek to interpret and understand the complex variety of views and

specific situations (Creswell, 2009). This study is rooted in the qualitative approach because it is well suited to understand complex, socially situated phenomena taking place in natural settings through the perspectives of those experiencing them (Creswell, 2007). In conducting this research, I have attempted to bear in mind Lincoln and Guba's (1985) four criteria for trustworthiness to ensure quality; credibility, transferability, dependability, and confirmability.

It is important to consider the role of reflexivity in qualitative research, which involves critically reflecting on the researchers' role as an instrument and their subjective involvement in the research. Such reflexivity is regarded as improving the credibility of qualitative research (Mays & Pope, 2000). This involves consciously acknowledging and experiencing the self as both a researcher asking questions, but also someone responding to the experience and learning through the experience (Guba & Lincoln, 2008). This is particularly important for this research due to my insider status as well as the issues involved in conducting research with my own students. This meant that I had to carefully consider my relationship with the research and the participants and reflect at every stage. Including discussion of my decision making and such reflexive auditing is one approach to increasing dependability (Stahl & King, 2014).

3.2: Research context

It is important to provide more detailed context for this study to allow the reader to better understand the results. Furthermore, thick description of the context can improve the validity of qualitative research by allowing the reader to judge the transferability (Mays & Pope, 2000). WEFC prepares students for various undergraduate programmes at different

universities in a Western European country. Students are streamed into three pathways (Table 3); economics, business, and social sciences. They study subjects relevant to their degree for one academic year and require a minimum IELTS (IELTS, 2023) level of 5.0 to enter the programme. The curriculum for AES is designed centrally by GPN curriculum designers, defining course learning outcomes and assessment methods, including exams and three related pieces of coursework (Table 4). However, the course is adapted by a local curriculum designer to fit the needs of each centre. At WEFC the course takes a blended learning approach, combining preparation materials hosted on a VLE with 6 hours of classes. Students bring laptops to lessons, using them for many activities. The data collection for this project took place in the second term of the 2022-2023 academic year at WEFC, from February to March 2023.

Table 3

Progression Routes at WEFC

Term	Business Route	Economics Route	Social Sciences Route	All-year core modules studied by all students
1	• Introduction to Microeconomics	• Introduction to Microeconomics	• Introduction to Microeconomics	• Academic English Skills (AES)
2	• Introduction to Macroeconomics • Introduction to Business and Business Environment I	• Introduction to Macroeconomics • Introduction to Programming and Computing I	• Introduction to Macroeconomics • Introduction to Social Sciences	• Mathematics • Research, Academia and Employability (RAE) • Academic and Pastoral Tutorial
3	• Introduction to Accounting and Finance • Introduction to Business and Business Environment II	• Introduction to Accounting and Finance • Introduction to Programming and Computing II	• Introduction to Philosophy • Introduction to Political Science	

Table 4*AES Assessments*

Assessment	Description
Reading and writing exam	A combined reading and writing exam.
Listening exam	A listening exam including short conversations and a lecture.
Seminar	An interactive speaking exam with 3-5 students discussing a topic they have researched.
Coursework 1: Source report	A reading assessment in the form of a report testing students ability to identify, evaluate and read five appropriate academic sources related to their essay title.
Coursework 2: Presentation	A speaking assessment in the form of a 5-8 minute presentation of student research and position on the topic of their essay, supported by slides.
Coursework 3: Research Essay	A writing assessment involving an extended research essay of 1,500 words on the same topic as coursework 1 and coursework 2, referencing academic sources.

3.3: Research method

The present study seeks to understand staff and student experiences of DC at WEFC. To understand these experiences, I conducted semi-structured interviews with staff and students, and the following section will outline the participants, the data collection instruments and the approach to data treatment and analysis. To add triangulation for the 3rd research question I have also analysed the local scheme of work for WEFC's AES course (Appendix VII), to identify learning objectives related to DC.

3.3.1: Participants

I was interested in finding out what different stakeholders thought about DC and the provision within the AES programme. Therefore, I purposefully selected the individuals who could best help me understand the issue (Creswell, 2009). I decided to consult stakeholders who might have differing perspectives, including students, teachers of the AES course at WEFC, the local curriculum designer at WEFC and the GPN curriculum designers. In qualitative research, it is important to ensure that different perspectives are offered on the phenomenon (Creswell, 2007; Mays & Pope, 2000), and I felt that these different groups would provide the most interesting insights.

A small number of staff are involved in the design and delivery of the AES course at WEFC, therefore I decided that it would be feasible to invite all relevant staff to participate. All staff agreed and in total five participated: two WEFC teachers, WEFC's local curriculum designer, and the two GPN curriculum designers. I elected to interview one student from each of the three pathways outlined in Table 3 to access a range of perspectives. I followed the procedure outlined in section 3.4 to ensure that students were recruited ethically and I selected the first student that responded from each route. The students selected came from differing cultural and geographic backgrounds, including Southeast Asia, South America, and the Gulf.

3.3.2: Research instrument

Semi-structured interviews were chosen as the most suitable data collection tools for the project, but questionnaires and focus groups were considered as alternatives. Although interviews can be time-consuming (Dörnyei, 2007) and it can be difficult to create good questions (Creswell, 2007), they were chosen because they allow researchers to probe the

subjective perspective of individuals, and can provide rich, in-depth data (McGrath et al., 2019). Semi-structured interviews ensure the same topics are addressed so interviewees' answers can be compared, but also allow flexibility to probe in more depth (Mackey & Gass, 2016). While questionnaires have been regularly used to investigate DC (Zhao et al., 2021), my experience with WEFC students and questionnaires influenced my decision to avoid them. Students regularly complete feedback surveys, so the effects of survey fatigue reduce the quality of responses and questionnaire answers can be superficial (Dörnyei, 2003). While focus groups can be more time-efficient than individual interviews, it can be difficult to manage interaction to ensure everyone participates and no one dominates (Creswell, 2007). This was particularly important in the context of WEFC, with students of varying cultural and communicative backgrounds.

I developed two interview protocols based on my research questions and used the DigComp Framework as a scaffold, with one for staff and the other for students. The protocols included 18 and 15 questions respectively and were largely similar, allowing for comparison (Appendix V). Good interviews require careful design and ideally would be piloted (Dörnyei, 2007). Unfortunately, this was not possible due to time restrictions. To check the quality, I consulted my dissertation supervisor and incorporated their feedback on the format of the interview.

In total, I conducted eight interviews lasting 30-60 minutes, held either on Microsoft Teams or in person, depending on participants' preferences. In both cases, the interviews were recorded, and a transcript was autogenerated using software. There are differing perspectives on conducting interviews, with a debate about whether an interviewer can be neutral or not (Dörnyei, 2007). Considering my roles as a teacher and colleague I believe that complete neutrality would not be possible. However, I regard this as a strength because the

interviewer can be viewed as a co-creator of knowledge playing an active role in understanding the context and experiences of the participants (McGrath et al., 2019), and as an insider I have extensive knowledge of the situation.

3.3.3: Data treatment and storage

In transcribing the interviews, I aimed to be as accurate as possible and to capture the essence of what was said. Transcription is underdiscussed in research, however it is particularly important for qualitative research which relies on transcripts for evidence, analysis and enhancing trustworthiness (Davidson, 2009). I used software to automatically generate a transcript as a starting point. I then listened again to the interviews to edit the transcript for accuracy. Where there was a discrepancy between what I heard and the transcript, I followed my judgement. I have left grammatical errors uncorrected, and I have indicated where I could not make out a word using ***. Where the interviewee has referred to one of the masked organisations or aspects of the learning infrastructure which may identify them, I have replaced it with an appropriate acronym or hypernym. I have included finalised versions of the transcripts in Appendix VI.

Once the transcription was completed, participants were emailed the completed transcript and the recording and asked if they noticed any discrepancies. This process of participant validation is seen as increasing the trustworthiness and credibility of qualitative research (McGrath et al., 2019) as well as reducing errors (Mays & Pope, 2000). No changes were requested.

Securely storing data is an important part of ethical research, however, it is given relatively little attention (Creswell, 2007). All interview data was stored in a pseudonymised form, meaning that a unique identifier was used to refer to participants. All data was stored

on a secure and password-protected laptop and a St. Andrews One Drive account, only accessible by the researcher throughout the research. All recordings were destroyed once the participants had confirmed that the transcription matched their recollection of the interview.

3.3.4: Approach to thematic analysis

Thematic analysis was used to analyse the interview data. Braun and Clarke's (2006) influential paper defined thematic analysis as "a method for identifying, analysing and reporting patterns (themes) within data" (p.79), and it is regarded as a flexible approach offering the possibility of rich accounts of data (Braun & Clarke, 2006). Because the term thematic analysis has been used to refer to various approaches, it is important to state the specific approach used (Braun & Clarke, 2020). I have chosen Braun and Clarke's (2020) reflexive thematic analysis because it highlights the researcher's "subjectivity as a resource" (p.3), making it particularly appropriate for this study where I am an insider and hence my perspective shapes the interpretation. Braun and Clarke also emphasise the need for "reflexive engagement with theory, data and interpretation" (2020, p.3). As highlighted by Braun and Clarke (2006), themes do not 'emerge', rather they are shaped by a researcher's judgement throughout the analysis process and I acknowledge that my voice has shaped the selection, editing and interpretation of the data throughout.

One of the decisions that must be made in thematic analysis is whether codes are generated inductively/bottom-up from the data, or deductively/top-down from theory (Braun & Clarke, 2006). My approach was based on inductively generating codes from the data, however, a degree of top-down influence resulted from the questions that I asked and the DigComp Framework used to structure the interview protocol. I discussed this issue with

my supervisor, and they noted that it was natural that there would be a certain degree of influence from the research questions, DigComp Framework and the interview questions.

Braun and Clarke (2006) recommend six phases of coding: familiarizing yourself with your data; generating initial codes; searching for themes; reviewing themes; defining and naming themes; producing the report. I followed these stages coding the data in NVivo 12, although the process is recognised as being non-linear, with overlaps between stages (Braun & Clarke, 2006). During my initial coding, I generated 90 codes. Once I had completed the initial coding, I re-read the data aiming to reduce the number of codes by grouping similar codes and removing those beyond the scope of the study. I then attempted to identify themes, which Braun and Clark define as multi-faceted “patterns of shared meaning” (2020, p.4). Because discussing analysis and interpretation can help improve dependability and confirmability (Stahl & King, 2014), I discussed the initial themes and codes with my supervisor. One point of discussion was a code with few instances in the data, and it was noted that although the prevalence is one indicator of a code’s importance, infrequent items can still be pertinent and hence retained in the analysis. I incorporated their feedback, for example renaming some codes and themes to ensure they were phrased as statements rather than questions. I then reviewed all my data and themes, resulting in 67 codes grouped into 6 themes with several subthemes, as reported in section 4.

3.3.5: Document analysis

Documents can provide background information and corroborate or refute interview data (Owen, 2014), and I have analysed the scheme of work for WEFC’s AES course (Appendix VII) to provide triangulation for research question three. For administrative reasons, a finalised version was unavailable in time for this study, so my analysis was based on a draft. I

have only analysed the first two terms because the students had not experienced the third term when the interviews were conducted, and the third term did not address different areas of the DigComp Framework.

It has been noted that document analysis is under-discussed in research, assuming that their use is self-evident (Karppinen & Moe, 2023). However, no analysis is entirely neutral, and reflection is beneficial. I used descriptive coding to provide labels for the data (Saldaña, 2013), using the five broad areas of the DigComp Framework as topics. I evaluated the learning objectives of each lesson and identified how many learning objectives and lessons addressed each area of the framework. Owen (2014) notes that even descriptive coding is an interpretive act, and my subjective judgement was informed by my knowledge of what happened in lessons to assess whether learning objectives addressed competencies.

3.4: Ethical considerations

In any research, it is important to consider ethical issues and this is even more imperative in studies involving human participants. Therefore, I carefully considered potential ethical issues before beginning my research and I received ethical approval from both St. Andrews University and GNP before data collection began. These forms are not attached as appendices because they contain information that would reveal the identity of the masked organisations. As stated in the introduction, participants and institutions have been pseudonymised to protect their identity. I collected a paper or electronic informed consent (Appendix II) from participants before conducting interviews and discussed the contents of the form at the start of each interview to ensure understanding. This section outlines the further steps that I took to ensure that my research was as ethical as possible, considering

limiting the participant pool, ensuring informed consent and protecting the identities of participants.

It is important to consider the potential for vulnerable individuals to participate in the research, and to minimise unnecessary risk. Some of the students who were part of the initial potential participant pool might be members of vulnerable groups, including some under 18s. Furthermore, I am not aware of every student's welfare issues. I took several steps to mitigate these potential issues. Firstly, I removed students under the age of 18 from the potential participant list. Then I discussed the research with WEFC's safeguarding lead, explaining the procedures and providing a copy of the interview questions for them to review. Finally, I asked the safeguarding lead to remove any students who might be adversely impacted from the participant pool.

Informed consent is a key criterion for any research to be considered ethical. Some of the key issues include making sure that there is enough information, that participants fully understand the research and that participation is voluntary (Mackey & Gass, 2016). However, because I was approaching my own students this presented a potential ethical problem as a teacher requesting student participation can be considered undue pressure (Mackey & Gass, 2016). Therefore, I fully briefed a colleague about the research and asked them to explain the research and provide the participant information sheet (Appendix I), and students were given time to ask questions and given five working days to volunteer. In both the explanation and the participant information sheet it is made clear that choosing to take part in the research, or not, would in no way impact the student's grade. I also provided all participants with a debrief (Appendix III) to give them more information about the continuation of the study.

4.0: Results

This section will first report the results of the thematic analysis of the interviews, presenting the overall themes, with quotations from the participants illustrating the results. The participants have been referred to using abbreviations (Table 5). Finally, the results of the document analysis of WEFC's AES scheme of work will be reported.

Table 5

Participant Abbreviations

Abbreviation	Participant
CD1	GPN Curriculum Designer 1
CD2	GPN Curriculum Designer 2
CD3	WEFC Curriculum Designer
T1	WEFC Teacher 1
T2	WEFC Teacher 2
BS	Business Student
ES	Economics Student
SSS	Social Sciences Student

4.1: Thematic analysis results

After completing my thematic analysis six major themes were developed, with sub-themes and a total of 67 codes, as can be seen in Table 6. Each of these themes will be discussed in the following sections. A complete copy of the NVivo codebook detailing the themes, sub-themes, codes and their relative frequency is attached in Appendix VIII.

Table 6*Final Themes and Codes*

Themes	Sub-themes	Codes
Barriers to competence	Digital divide	Lack of equipment and access Limited experience resulting in very low level of DC
	External factors	Background – cultural Ease of use prevents students developing DC Language barrier Reliant on a phone
	Internal barriers	Age and maturity impacting competence levels Competent, but not doing Lack of awareness Lack of student effort Leave it at a basic level Reluctant to be independent Student lack of confidence Student over-confidence
	No sub-theme	Struggling with simpler tasks
Formal learning about DC	Student learning of DC on the AES course	Developing competencies through assessments Group project work helping to develop competencies Learning about academic misconduct Problem solving is indirectly addressed by AES Texts related to DC topics
	No sub-theme	Educational past addressing DC Other subjects Past education did not prepare them for DC Pastoral side
Important and relevant for students	Non-digital higher order skills	Critical thinking Independent
	Safety at university	Avoiding committing academic misconduct Health and well-being Protecting university work
	No sub-theme	Access, understand, evaluate and use information Basic competencies required for study Communicate effectively and appropriately Need to create digital content at university Relevant – especially for international students Relevant for life Relevant for working Solving problems at university

Themes	Sub-themes	Codes
Informal learning about DC	Attitude	Enjoyment
		Positive attitude
		Student awareness of the need to improve
	Digital native	Experienced with the use of technology
		Pick up basics quickly
		Unknowing competence
Issues around incorporating DC into curricula	Informal and social aspects	Creating transferrable skills
		Narrow competence
	Self-directed learning	Learn by doing or practice
		Learning from the internet
	DigComp	Peer teaching
	Assessment	Assessments could be updated
		Diagnostic assessment of DC is necessary
		High stakes assessment
	Limiting factors	Cultural issues
		It can take a long time to use technology in the classroom
		Lack of freedom
	No sub-theme	Skewing our approaches
		Teachers need training
Relevance depends on the context		Too little time to cover everything
		AES is primarily a language and academic skills course
		Benefits of technology use for learning
		Bridging formal and informal
		Collaboration could be more formally covered
		Competence levels vary depending on the individual
	No sub-theme	Depends on the country
		Depends on the field
		Depends on the university
		Not at this level
		Relevance depends on the individual

4.1.1: Important and relevant for students

All five broad areas of the DigComp Framework were deemed relevant by both students and staff, however, all groups regarded 'information literacy', 'communication', and 'problem solving' as most relevant to learning in HE. 'Safety' was considered relevant,

however with more focus on life in general and ‘digital content creation’ was judged least relevant.

CD2’s comment that ‘information literacy’ is “massively important” highlights the value that all respondents placed on this area. ES linked the area to essays and assessments, while both CD2 and SSS emphasised research and the need to “navigate the appropriate search engines” (SSS). Similarly, CD3 highlighted the necessity to independently identify “worthwhile and relevant information” from the “huge amount” available and linked this to employment. Most respondents noted that browsing and evaluating information were extremely relevant but considered managing information less important at foundation level.

‘Communication’ was similarly emphasised as “critical” by CD1, and participants noted the importance of communicating online. CD2 commented that the “international context of knowledge sharing and higher education” necessitated online communication, while SSS highlighted an “expectation to do group work... over platforms.” Furthermore, both CD3 and BS recognised the impact that Covid had on restricting in-person interaction, increasing the importance of online communication. Additionally, ‘communication’ was recognised as “fundamental” (ES) for employment. T2 emphasised the importance of netiquette for international students to “operate and survive the university environment” and CD1 similarly noted the impact of “how they express themselves.” In contrast, citizenship and digital identity were regarded as less directly relevant for studies at foundation level.

‘Problem solving’ was also deemed very relevant by both staff and students. BS noted that “you need to know how to solve the technical problems” because technology is used “constantly to [do] everything” in education. T2 similarly commented that problem solving “covers a lot of things”, indicating the transversal nature of this competence, and ES noted

the relevance to life and “future jobs”, which was echoed by CD2’s observation that it was important even before “the age of post-Covid.”

‘Safety’ was regarded as somewhat relevant and was discussed by all participants, with a focus on academic misconduct, health and well-being. All students emphasised protecting their data, as BS noted that “If someone steal my work, I will get into trouble.” Staff also reported this concern and CD2 further identified the threat of viruses. However, staff concentrated more on students not committing academic misconduct themselves and helping them find and use information and “not to sort of, you know, cheat” (T2). Health and well-being were also a concern, with BS stating the need to “take care of yourself” and SSS highlighting that constant access can be “detrimental to our mental health.” Furthermore, CD2 noted a “clear correlation between physical and mental health and well-being and academic achievement.” In contrast, the environment was deemed less relevant, with only CD3 considering it particularly important.

‘Digital content creation’ was the least mentioned area but considered somewhat relevant by most. Comments focused on creating digital content for “working on projects or presentations” (SSS) and CD2 observed that assessments in higher education increasingly require digital content creation. CD2 regarded this area as very relevant, connecting it to employability and emphasised that awareness of copyright and licences are “life relevant” and important for students bound by university policies. Furthermore, both staff and students linked copyright and licenses to plagiarism and academic impropriety.

Finally, staff highlighted the connection to non-digital and foundational skills and attitudes necessary for university study, for instance, CD2 highlighted critical thinking and the need for students to be “independent... and reflective learners.” Also, more foundational

technical skills were also deemed important, with CD1 emphasising the “very basic digital” skills required to function in HE.

4.1.2: Relevance depends on the context

This theme was the least discussed in the interviews, yet all participants discussed the contextual nature of DC and the importance of field. ‘Digital content creation’ was the focus of staff comments, for example, CD2 thought its relevance “would very much depend on the pathway of the students”, and staff deemed programming especially field dependent. BS noted that content creation was relevant for their plan to work in marketing, whereas SSS observed that ‘information literacy’ and citizenship were particularly relevant for their sociology course. Meanwhile, ES considered all broad areas relevant to economics.

Individual preference, country and destination university were also discussed as contextual factors. The discussion regarding individual preference focused on ‘communication.’ BS observed that netiquette and digital identity “depends on the personality.” They also saw engaging in citizenship as a personal choice, whereas CD2 emphasised family background because the issue was only likely to interest those with “diplomatic families or... socially engaged families”. Both CD3 and ES raised the issue of collaboration as particularly important in WEFC’s country. Finally, only CD3 identified the specific future university environment as a contextual factor, suggesting that “more forward-thinking universities” are more likely to require ‘digital content creation’ for a “diverse range of assessments” than a “traditional university.”

4.1.3: Barriers to competence

This theme incorporates a variety of barriers to students developing DC, including internal factors, external factors, and the digital divide. This theme primarily involves staff reporting a range of issues limiting student competence.

Various internal factors were seen as inhibiting learners' DC levels including maturity, awareness, independence, effort, and confidence. Staff viewed maturity and age as impacting 'safety', with CD2 noting that lower levels of maturity made it more difficult for learners to disengage and SSS echoed this by observing that their age group "are very easily sucked into their devices, especially their phones." CD2 also connected maturity and age to citizenship, netiquette and the "higher order thinking skills" necessary to effectively evaluate sources. 'Safety' was also linked to a lack of awareness in terms of students not understanding "the dangers of... sharing data" (CD2). Next, a lack of independence and effort was connected to 'problem solving' as some students seem "very reluctant to try and solve a problem themselves" (CD1) and ES observed that some students "gave up" rather than attempt to fix a problem. Furthermore, T2 connected effort to overall competence level and stated that some students did not "dedicate enough time" and superficially "just use the technology to finish the task." Additionally, T2 suggested that students tend to leave their abilities "at the basic level" and T1 observed that they do not fully explore the "capabilities of other tools." Finally, there was conflicting evidence from staff and students regarding confidence. Most staff reported that students are mainly capable in social and informal uses of technology but believe they are "more competent than they are" (CD2) in educational uses. However, two students reported that they were not very confident. This could be a case of modesty because they also described actions indicating competence, for example, BS described effective steps to solve the problem of converting a Word document to a PDF.

Alongside these internal factors, external factors were discussed, including linguistic barriers, cultural issues, and the reliance on phones. T2 identified “more complex language” as a potential barrier to evaluating sources, understanding safety issues and effective ‘problem solving’. Similarly, CD1 and CD2 suggested that certain social and cultural backgrounds might inhibit ‘problem solving’ because it is not prioritised. In addition, staff noted that many students are “really familiar with phones, but not so much with computer” (T2), leading students to assume that they were digitally competent. However, CD1 noted that because academic work requires a “different set of skills”, phones did not prepare students to use digital packages. Furthermore, staff commented that some students struggled with “simple digital tasks such as... file management or email management” (T2).

Finally, curriculum designers identified the digital divide as a significant barrier for students from certain backgrounds. CD2 noted growing numbers of students coming from “less privileged backgrounds”, especially students from some countries in the Global South, who might not have previously had access to technology, and CD1 observed some lacked “proper equipment” on arrival. Staff commented that this meant some students have little “knowledge or experience in how to use a laptop” (CD1) and lacked basic digital skills like mouse use.

4.1.4: Informally learning DC

Students tended to identify their past informal technological experiences as positively shaping their DC. Staff did echo some positive comments, however, also indicated a conflicting viewpoint that informal learning of DC can hinder competency. In contrast, student participants displayed a positive attitude towards technology and seemed “open to improve their skills” (T2) and were aware that they “still have got room to improve” (BS). Indeed, both

ES and SSS stated that they enjoyed interacting with technology and ES commented that it made learning easier. Alongside this sub-theme of positive attitude, I identified three other sub-themes around self-directed DC development, issues connected to the concept of the digital native and how informal and social technology use shape DC.

Firstly, students believed that they had developed much of their DC independently, through the internet and learning by doing. Both ES and BS reported that their previous educational experience did not help them. Instead they felt that they learnt by themselves “outside of the school” (BS) and “have to learn from the internet a lot” (BS), identifying several sources including YouTube (<https://www.youtube.com/>), Google (<https://www.google.com/>) and Reddit (<https://www.reddit.com/>). Staff also observed students learning from the internet, with CD2 citing a range of external resources available and T2 noting one student using YouTube to teach themselves. In addition, BS highlighted that they learnt through doing and by “repeating how to do this.”

The concept of the digital native is connected to learning by doing as students regarded their extensive experience of technology as positively shaping their DC, while staff suggested a degree of unknowing competence. Several staff commented that students have “grown up with” (CD1) technology and T2 noted that these students tended to pick up the basics quickly. Students emphasised how this experience had translated into DC, with ES expressing confidence in solving problems because of experience and SSS stating that they “had a lot of experiences communicating with people online, even if that may not be in an academic setting.” However, staff suggested students had developed unknowing competence because technology forced them into certain behaviours of which they are not necessarily aware. For example, CD2 noted students “almost inadvertently” protect devices because “developments in software and hardware... almost removed the need to be competent”, for

example with two-step authentication. Similarly, CD3 believed that students' grasp of netiquette and digital identity might be something they have "instinctively" but are "not really clear on."

Finally, while staff acknowledged that familiarity with social and informal technology use created some transferrable competencies, they also indicated that it could narrow competencies. CD2 identified video content creation and the sharing of information as strengths, however, observed that students lacked abilities with traditional tools such as PowerPoint and communicating with non-peers. They suggested that informal technology use produced "narrow... but high level of competency" and that sometimes students had trouble "extrapolating from one area to another" and hence struggled to apply skills learnt in AES more widely. In contrast, T2 mentioned that activities such as online searching and purchasing and computer games helped students acquire "motor skills" transferrable to more academic activities. They also observed that students were able to translate existing skills to "Google Scholar or... academic databases" and rapidly pick up the basics of new technology. However, they suggested that although students are "fluent" and do things quickly, it is "not always very competently."

4.1.5: Formally learning DC

Alongside the informal ways that students develop DC, participants discussed the ways DC can be acquired through formal education. Staff and students noted several ways that the AES course had helped develop DC, as well as discussing pastoral programmes and other subjects, and how the educational backgrounds of students influenced DC.

The AES course was reported to develop DC through assessments, group projects, indirectly and through lesson topics. All students commented that Coursework 1 helped improve 'information literacy' because they had to "analyse and describe how we found sources" (SSS), which was echoed by staff. Furthermore, the Coursework 2 presentation was seen as "creating content" (CD3), although T2 did question the extent to which the assessments genuinely developed DC because some responses were shallow. A formative collaborative group writing project using shared documents (hereafter referred to as collaborative project) was similarly considered beneficial, improving 'communication' and 'information literacy' by "working together through the internet, using data, evaluating sources" (ES) and improving 'problem solving' because "sometimes we can struggle" (ES). This indirect development of 'problem solving' was mentioned by all eight participants, for example, T1 commented "you just come across issues and then we can help them develop this competency." Finally, some staff noted that health and environmental topics were covered in "a number of texts" (CD1) used in the course, however, this was not expressed as strongly addressing competency.

Aside from AES, students were also reported to receive DC support in pastoral programmes and other subjects. All three curriculum designers noted pastoral programmes address DC through coverage of appropriate email communication, "keeping devices safe" (CD1) and issues such as "cyberbullying" (CD2) and "trusting anonymous persons on the internet" (CD3). BS echoed this, noting that 'safety' was addressed in tutorials. Finally, there was limited discussion of how areas not covered in AES were addressed in other subjects, although most staff could only guess the content of other subjects. However, CD3 is also responsible for the Research, Academia and Employability module at WEFC, and could hence state that document creation and file management were addressed in this subject.

Although students believed that they developed DC more independently, several staff indicated that school background shaped competency. As already discussed, students from less privileged backgrounds might be negatively impacted by a lack of access and experience at school. In contrast, CD3 noted that some backgrounds provided familiarity with the use of office programs. Furthermore, both teachers reported that International Baccalaureate (International Baccalaureate, 2023) and similar backgrounds “encourage them to be a bit more independent” (T1) and to develop a “different attitude towards... learning” (T2), which positively influences DC.

4.1.6: Issues around incorporating competencies into curricula

Staff discussed a range of issues that could potentially impact the incorporation of DC into curricula. All staff explicitly recommended more focus on ‘communication’ as “an area for further development” (CD2), for instance, CD3 noted that currently “there’s no collaboration explicit” and “no group assignments.” However, on a local level, WEFC did implement a group project, which students referred to extensively. ES also stated they would like to more attention on ‘safety’ in the AES course because it is “hugely important.” Beyond these specific recommendations, I identified two sub-themes around assessment and limiting factors, and other issues around the incorporation of DC in curricula.

Assessment was deemed an important area, and staff discussed diagnostic assessment of DC, alternative assessments, issues around high-stakes assessment, and potential academic integrity issues. Both CD1 and CD2 focused on diagnostic assessment, with CD2 citing diagnostic tests in English and Maths as examples and suggesting that diagnostic testing would allow staff to “create interventions to address any gaps.” In addition, T2 emphasised updating assignments because students focus on areas “attached to a grade” and

hence assignments should covertly encourage students to develop DC. They also suggested incorporating more “creative assignments”, which was echoed by CD2. However, both CD1 and CD2 noted that digital assessment produced emotional reactions from students, creating “a lot of anxiety” (CD1) and sometimes “almost a feral reaction” (CD2). CD2 speculated that students might perceive that it “could potentially have negative effect on their outcomes.” Finally, CD3 discussed issues around collusion, buying essays and AI tools such as ChatGPT (<https://chat.openai.com/>), as well as an “extraordinary increase” in impropriety in examinations during Covid.

Possible limiting factors in addressing DC in curricula were raised, including the focus of the AES course, administrative restrictions, time restrictions and teacher competency. Both CD1 and CD3 noted that AES is primarily a “language and academic skills” (CD1) course, and this focus limited which DCs should be addressed in AES. Similarly, despite CD2’s enthusiasm for creative alternative assessments, they felt restricted by the need for “accreditation.” Moreover, CD3 highlighted university language requirements and “numerous other frameworks” to be covered, hence limiting what could be covered. Likewise, T1 observed that sometimes incorporating digital activities in the classroom “just takes too much time” and suggested that effective classroom use of technology is “part of the digital competence to develop for ourselves.” CD2 echoed this, and T2 noted that “teachers need to be trained” to support implementing DC into curricula.

Beyond these themes, staff also discussed the benefits of incorporating technology and challenges posed by divergent student abilities. Curriculum designers identified “great benefits... of digital learning materials” (CD1), including automated digital assessment, available “fully interactive and actually engaging” (CD1) learning resources allowing independent study, and technology making lessons more interactive. However, widely

varying levels of student competence were seen as a potential barrier. Indeed, both CD1 and CD2 reported increasing numbers of students from certain countries in the Global South, who lack basic competency. CD1 saw this as a particular issue because provision had “skewed towards supporting these students” meaning that the benefits of technology in education were not fully realised.

4.2: Scheme of Work analysis

A descriptive analysis of WEFC’s AES scheme of work for the first two terms was conducted, counting the number of lessons and learning objectives which addressed each of the broad areas of competence identified by the DigComp Framework. The results (Table 7) indicate that ‘information literacy’ was addressed in learning objectives 44 times, ‘communication’ 13 times, and ‘digital content creation’ 8 times. Neither ‘safety’ nor ‘problem solving’ were directly addressed by learning objectives.

Table 7

Scheme of Work Analysis Showing DC Coverage in AES

DigComp Framework Competency	Learning objectives addressing this DC	Lessons addressing this DC
1. Information and data literacy	44	16
2. Communication and collaboration	13	9
3. Digital content creation	8	5
4. Safety	0	0
5. Problem solving	0	0

**Note: The colours in this and the following tables relate to the DigComp Framework illustrated in Figure 5.*

5.0: Discussion

This section will discuss the findings of this study concerning each of the four research questions in turn, before considering some of the limitations. I have not presented my own perspectives because I wanted to foreground the participants' voices as much as possible, however a lot of the points raised resonated with my own views.

5.1: RQ1 - What do students and staff within and related to WEFC perceive to be the most relevant digital competencies for English-Medium international foundation students?

All five broad areas of the DigComp Framework were judged relevant to varying degrees by both students and staff, as summarised in Table 8. There is a strong degree of alignment between the three groups regarding the perception of the relevance of the areas and competencies of the DigComp Framework. 'Information literacy', 'communication' and 'problem solving' were considered very relevant by all groups. The prioritisation of 'information literacy' and 'communication' aligns with Sicilia et al.'s (2018) findings that both staff and students prioritised these areas, however, they noted surprise that no stakeholders prioritised 'problem solving'. In contrast, all groups in the current study judged it very relevant. While 'safety' was generally regarded as relevant, students prioritised it most, in line with Sicilia et al.'s (2018) findings. 'Digital content creation' was considered less relevant than the other competencies, particularly by teaching staff.

Table 8*Perceptions of DC Relevance*

DigComp Framework Competency	Students	Teachers	Curriculum designers
1. Information and data literacy	Very relevant	Very relevant	Very relevant
1.1. Browsing, searching and filtering data, information and digital content	Very relevant	Very relevant	Very relevant
1.2. Evaluating data, information and digital content	Very relevant	Very relevant	Very relevant
1.3. Managing data, information and digital content	Somewhat relevant	Less relevant	Somewhat relevant
2. Communication and collaboration	Very relevant	Very relevant	Very relevant
2.1. Interacting through digital technologies	Very relevant	Very relevant	Very relevant
2.2. Sharing information and content through digital technologies	Very relevant	Very relevant	Very relevant
2.3. Engaging in citizenship through digital technologies	Less relevant	Less relevant	Less relevant
2.4. Collaborating through digital technologies	Very relevant	Very relevant	Very relevant
2.5. Netiquette	Somewhat relevant	Very relevant	Very relevant
2.6. Managing digital identity	Less relevant	Less relevant	Less relevant
3. Digital content creation	Somewhat relevant	Less relevant	Somewhat relevant
3.1. Developing digital content	Somewhat relevant	Somewhat relevant	Somewhat relevant
3.2. Integrating and re-elaborating digital content	Somewhat relevant	Somewhat relevant	Not discussed
3.3. Copyright and licences	Somewhat relevant	Relevant	Somewhat relevant
3.4. Programming	Somewhat relevant	Less relevant	Less relevant
4. Safety	Somewhat relevant	Somewhat relevant	Somewhat relevant
4.1. Protecting devices	Very relevant	Less relevant	Somewhat relevant
4.2. Protecting personal data and privacy	Very relevant	Less relevant	Somewhat relevant
4.3. Protecting health and well-being	Somewhat relevant	Less relevant	Somewhat relevant
4.4. Protecting the environment	Less relevant	Less relevant	Somewhat relevant
5. Problem solving	Very relevant	Very relevant	Very relevant
5.1. Solving technical problems	Very relevant	Relevant	Relevant
5.2. Identifying needs and technological responses	Very relevant	Relevant	Relevant
5.3. Creatively using digital technologies	Relevant	Relevant	Somewhat relevant
5.4. Identifying digital competence gaps	Relevant	Relevant	Relevant

‘Information literacy’ was deemed extremely important for study, work, and life by all. Both staff and students emphasised the need to use information in assessments, showing an understanding of the central importance of identifying, evaluating, and integrating online

content in university study (Ahmed & Roche, 2021; Morgan et al., 2022). Staff also observed that this area was important for general life and work due to the amount of untrustworthy data available online, an issue that is similarly recognised in the literature (Ahmed & Roche, 2021). Although managing data was regarded as less relevant, some staff did note that it would become more important at university.

‘Communication’ was similarly considered very relevant, impacting interactions and assessment. Both staff and students acknowledged the importance of electronic communication, recognising the need to use email, forums, and discussion boards (Dhillon & Murray, 2021). Staff focused on netiquette, reflecting the difficulties that the pragmatics of online communication pose for second language users (Hinrichsen & Coombs, 2013). Furthermore, online collaborative groupwork was identified as very important. Collaboration receives relatively little focus in the literature related to DC in HE, although Ware et al. (2016) did identify a move towards collaborative authorship. The effects of Covid might explain the recognition of this area as staff and students noted the impact of restricted face-to-face communication, which increased familiarity with collaborative tools. However, the expectation of groupwork at universities in the country of this study may provide an alternative explanation. Finally, all groups regarded digital identity and citizenship as less important and somewhat dependent on the individual circumstances.

‘Problem solving’ was judged very relevant for education, work, and life. All groups in the current study prioritised ‘problem solving’, in contrast to previous findings (Sicilia et al., 2018). ES provided a possible explanation of this difference, noting that they solved many technical problems during the Covid pandemic. Perhaps this increased appreciation reflects the fact that problem solving became a more widespread experience during the pandemic. Finally, participants in this study noted the prevalence of technology in education and work

and the need to regularly fix problems, indicating that they regard it as transversal, in line with the DigComp Framework's presentation of this area (Ferrari, 2013).

'Digital content creation' and 'safety' were viewed as less directly relevant for study, and discussion focused on assessment, issues of academic misconduct and health and well-being. 'Digital content creation' was generally considered less relevant, but relevant to certain fields and programming was considered especially field dependent. Although staff identified the need to create digital objects such as documents and presentations for assignments, this was not emphasised as particularly important. Possibly, this could indicate that staff feel that students should already have the ability to produce those kinds of digital objects, which would mirror staff expectations in Coldwell-Neilson's (2018) study. Participants connected copyright with concepts of academic impropriety, noting the need to avoid plagiarism through effective citation and attribution, an important area for students (Godwin-Jones, 2015). Students and staff furthermore emphasised the need to protect devices and data to prevent work from being stolen, indicating the increasing importance of effective safety practices. Finally, health and well-being were highlighted and connected with academic performance, reflecting increasing awareness and concern with the impact of technology on individuals. Indeed, it has been argued that DC is indispensable for mental health (Sánchez-Caballé et al., 2020).

5.2: RQ2 - What are staff and students' perceptions of the degree of digital competence that these students possess?

Although staff and student perceptions of student competence were relatively aligned, they diverged more than regarding relevance. Staff tended to view students as less competent than students viewed themselves, as can be seen in Table 9. In general, students

were more confident in 'information literacy' and 'communication', corresponding with Lucas et al.'s (2022) finding that students rated themselves most competent in these areas. Perceptions of 'digital content creation' and 'safety' were also relatively aligned, where students were viewed as only somewhat competent. The greatest divergence between staff and student opinion concerned 'problem solving', where students viewed themselves as competent, while staff regarded them as not competent.

Overall, competence was rated as intermediate to more advanced by students, while staff identified quite varying levels of competence. Student perception of their abilities as relatively competent is broadly in line with Zhao et al.'s (2021) findings. Students regarded themselves as competent in most basic aspects but expressed less confidence in more complex areas such as 'safety', mirroring the results of Lucas et al. (2022) and Martzoukou et al. (2020). This might also be explained by the relative modesty of the student participants, who expressed a lack of confidence in 'safety' while simultaneously displaying relatively strong knowledge and attitudes. Staff did acknowledge strong competence among some students; however, they also identified some students who possess very basic skills. They highlighted the issue of the digital divide and noted that students from less privileged backgrounds lacked access to and experience with technology, an issue that is recognised in the literature (Habib et al., 2014; Pegrum, 2019).

Table 9*Perceptions of Student Competence*

DigComp Framework Competency	Students	Teachers	Curriculum designers
1. Information and data literacy	Somewhat competent	Somewhat competent	Somewhat competent
1.1. Browsing, searching and filtering data, information and digital content	Competent	Somewhat competent	Competent
1.2. Evaluating data, information and digital content	Somewhat competent	Less competent	Not competent
1.3. Managing data, information and digital content	Less competent	Less competent	Not competent
2. Communication and collaboration	Somewhat competent	Less competent	Somewhat competent
2.1. Interacting through digital technologies	Competent	Somewhat competent	Competent
2.2. Sharing information and content through digital technologies	Competent	Somewhat competent	Somewhat competent
2.3. Engaging in citizenship through digital technologies	Less competent	Not competent	Not competent
2.4. Collaborating through digital technologies	Somewhat competent	Somewhat competent	Not discussed
2.5. Netiquette	Less competent	Less competent	Less competent
2.6. Managing digital identity	Not discussed	Less competent	Not discussed
3. Digital content creation	Somewhat competent	Somewhat competent	Somewhat competent
3.1. Developing digital content	Somewhat competent	Somewhat competent	Somewhat competent
3.2. Integrating and re-elaborating digital content	Not discussed	Less competent	Not discussed
3.3. Copyright and licences	Not competent	Less competent	Less competent
3.4. Programming	Not competent	Less competent	Not discussed
4. Safety	Somewhat competent	Less competent	Somewhat competent
4.1. Protecting devices	Somewhat competent	Somewhat competent	Somewhat competent
4.2. Protecting personal data and privacy	Somewhat competent	Somewhat competent	Somewhat competent
4.3. Protecting health and well-being	Not competent	Less competent	Less competent
4.4. Protecting the environment	Somewhat competent	Less competent	Not competent
5. Problem solving	Competent	Somewhat competent	Not competent
5.1. Solving technical problems	Competent	Somewhat competent	Somewhat competent
5.2. Identifying needs and technological responses	Competent	Less competent	Less competent
5.3. Creatively using digital technologies	Competent	Less competent	Less competent
5.4. Identifying digital competence gaps	Competent	Less competent	Less competent

Both staff and students identified social and informal uses of technology as having influenced student competence levels in ‘information literacy’, ‘communication’ and ‘digital content creation.’ Students felt more confident in certain competencies (1.1, 1.2, 2.1, 2.2, 2.4

and 3.1) because they felt experienced with the application of these competencies in informal settings, and they noted that enjoyment of content creation positively impacted ability. This supports Martzoukou et al.'s (2020) finding that higher self-perceived competency in everyday life positively impacted self-perceived competency related to education. Staff did observe that students sometimes possessed transferrable skills, could be considered 'fluent' and were able to grasp the basics of new tools quickly. However, staff focused more on the idea that competence in mobile phones and informal and social technology did not make students academically competent. One participant labelled this 'narrow competence', a term which encapsulates a concept recognised in the literature (Ahmed & Roche, 2021; Coldwell-Neilson, 2017). CD2 gave a clear example by highlighting that students may be able to produce videos for social media, but struggle with more traditional forms of content creation such as PowerPoint.

Perceptions of student competence varied in some specific competencies in these three areas. In 'information literacy', 1.2 and 1.3 were seen as less competent, although students viewed themselves as relatively competent in 1.2. Students had just completed coursework related to this area at the time of the interviews, and so they may have felt increased competence. In contrast, staff observed that students developed competence in 1.2 throughout the AES course, suggesting that their evaluation of students as less competent might be based more on the start of the course than the end. Several staff noted student difficulties in managing files, the main issue noted concerning 1.3. In 'communication', students were deemed less competent in 2.3, 2.5 and 2.6, which is interesting because netiquette and digital identity could be considered closely linked to social technology use. Finally, students were seen as less competent in areas 3.2, 3.3 and 3.4 of 'digital content creation.'

Staff and students held somewhat contradictory views regarding student competence in 'safety'. Students themselves demonstrated strong awareness of the dangers to their data, devices, and health. They expressed significant concerns regarding these areas and discussed various methods of protecting their data. However, despite this awareness, they still expressed wariness and a lack of confidence. In contrast, staff considered students almost unknowingly competent in protecting devices due to developments in technology such as two-step authentication, suggesting that they perceived student devices to be protected but not through student competence. Students also demonstrated awareness of the negative impacts of technology on mental and physical health but expressed an inability to disengage and this concern was echoed by staff.

'Problem solving' saw the most disagreement between staff and students, with staff regarding students as less competent. Students considered themselves relatively strong in this area, contrasting with Lucas et al.'s (2022) participants who rated themselves lowest in this area. This might be explained by the fact that the students in the current study seem to possess relatively positive attitudes and experiences towards technology and 'problem solving.' They discussed solving problems by self-learning supported by websites and video tutorials, which has been noted as a common support for students in the literature (Ahmed & Roche, 2021). Generally, staff saw students as less competent and independent, although some commented that students developed this competency during the academic year.

Finally, although staff did discuss students as digital natives, they did not seem to have an inflated sense of student competence. Previous literature reports that HE staff commonly assume that students are digital natives and are hence digitally competent (Dhillon & Murray, 2021; Lucas et al., 2022). While staff did discuss students growing up with technology, and being experienced, they believed that this did not necessarily mean that students were

competent. Hence, staff in this context did not seem to believe in the myth of the digital native. Perhaps this might be explained by the fact that, in the author's experience, there tends to be closer contact between staff and students in IFY contexts than in HE more broadly.

5.3: RQ3 – Which areas of digital competence does the current Academic English Skills course aim to help students to develop?

Staff and students generally agreed on which areas of the DigComp Framework AES aimed to address, as seen in Table 10. All groups agreed that there was a lot of coverage of 'information literacy', little coverage of 'digital content creation' and no coverage of 'safety.' 'Problem solving' was not considered an aim of the course, but all groups noted that the course developed this area indirectly. The only area of disagreement concerned 'communication.' Students perceived this area to be well addressed, while staff considered it somewhat covered but not a main aim. This difference might be explained by the fact that staff are more familiar with the learning outcomes and documentation of the module which does not explicitly address digital communication. In contrast, students' experience of 'communication' seems to have been strongly influenced by the collaborative project.

Table 10

Perceptions of DC Coverage in AES

DigComp Framework Competency	Students	Teachers	Curriculum designers
1. Information and data literacy	A lot of coverage	A lot of coverage	A lot of coverage
2. Communication and collaboration	A lot of coverage	Somewhat covered	Somewhat covered
3. Digital content creation	Little coverage	Little coverage	Little coverage
4. Safety	No coverage	No coverage	No coverage
5. Problem solving	Indirectly covered	Indirectly covered	Indirectly covered

These perceptions are corroborated by the analysis of the scheme of work. 'Information literacy' was the most addressed area in learning objectives, followed by 'communication' and 'digital content creation.' Neither 'safety' nor 'problem solving' were directly addressed in the scheme of work. As staff pointed out, the main aim of the AES course is to develop language and academic skills, and the course as implemented at WEFC does address the areas of the DigComp Framework that are most directly related to this focus.

The AES course was seen as helping students to develop DC through assessments, group projects and indirectly. Both staff and students discussed how the coursework assessments helped students develop 'information literacy'. Coursework 1 assesses students' ability to find, evaluate, and read appropriate academic sources and identify useful evidence related to an essay question. Students were instructed in the use of academic search engines and evaluative criteria, which seemed to enhance existing skills acquired through informal technology use. This supports Ahmed and Roche's (2021) argument that educators should leverage students' existing skills and enhance them by enabling students to transfer them to academic situations. Coursework 2 was also discussed as supporting students in creating presentation slides, with staff noting this helped develop 'digital content creation.' Some students did mention this but gave it relatively little weight. As already noted, university assessments often involve presentations, research, and finding and evaluating information and hence these coursework projects are authentic tasks. Morgan (2018) argues that authentic learning happens when task design and context mirror those the students will encounter in HE, and this finding supports this argument.

Similarly, students and local staff perceived the collaborative project as helping to develop 'communication' and 'problem solving' abilities. This supports Fedorova and Nikiforova's (2022) argument that project and task-based learning are appropriate

approaches to developing DC. Students and staff also commented that ‘problem solving’ was developed indirectly when problems were encountered during assessments and learning activities, supporting Sicilia et al. (2018) argument that situated and problem-based learning can potentially enhance students’ autonomy.

5.4: RQ4 – What implications do the findings have for how this and other similar courses are designed and delivered in future?

This section will first review the provision of DC on the AES course and make a specific recommendation for development. Next, it will make recommendations that may be considered transferable to other contexts, including taking an interdisciplinary approach to curriculum development to avoid gaps, incorporating diagnostic assessments, and reviewing assessments and course content more generally.

Comparing the perceptions of relevance, competence and AES coverage shows that the AES course implemented at WEFC does successfully address several key areas of the DigComp Framework, although not always explicitly. As can be seen in Table 11, ‘information literacy’, ‘communication’ and ‘problem solving’ are all seen as very relevant and addressed, and students recognised that the course had helped them develop their DC in these areas. Coursework 1 explicitly develops ‘information literacy’, WEFC’s collaborative project helped students develop ‘communication’ and both activities helped students develop ‘problem solving’. Therefore, this study supports Roche’s (2017) finding that explicitly addressing DC in university preparation programs helps prepare students for undergraduate studies.

Table 11*Comparing the Perceptions of Relevance, Competence and Coverage in AES*

DigComp Framework Competency	Relevance, competence or AES coverage	Students	Teachers	Curriculum designers
1. Information and data literacy	Relevance	Very relevant	Very relevant	Very relevant
	Competence	Somewhat competent	Somewhat competent	Somewhat competent
	AES coverage	A lot of coverage	A lot of coverage	A lot of coverage
2. Communication and collaboration	Relevance	Very relevant	Very relevant	Very relevant
	Competence	Somewhat competent	Less competent	Somewhat competent
	AES coverage	A lot of coverage	Somewhat covered	Somewhat covered
3. Digital content creation	Relevance	Somewhat relevant	Less relevant	Somewhat relevant
	Competence	Somewhat competent	Somewhat competent	Somewhat competent
	AES coverage	Little coverage	Little coverage	Little coverage
4. Safety	Relevance	Somewhat relevant	Somewhat relevant	Relevant
	Competence	Somewhat competent	Less competent	Somewhat competent
	AES coverage	No coverage	No coverage	No coverage
5. Problem solving	Relevance	Very relevant	Very relevant	Very relevant
	Competence	Competent	Somewhat competent	Not competent
	AES coverage	Indirectly covered	Indirectly covered	Indirectly covered

However, all staff noted that ‘communication’ is not directly addressed in the course design and recommended that it should be. Ahmed and Roche (2021) note that preparation programmes like IFY play a key role in encouraging students to communicate using technology appropriate for study. Nevertheless, collaborative elements of digital competency are sometimes overlooked (Falloon, 2020), hence this would be an appropriate adjustment to address a neglected area. Unlike staff, students did perceive WEFC’s AES course as strongly addressing ‘communication’ and primarily discussed the collaborative project with shared documents. Therefore, this kind of formative project appears to satisfactorily address ‘communication’ and should be considered for wider implementation throughout the GPN network. Secondly, there could be more clear signposting of activities that support problem solving. Problem solving is regarded as very relevant by staff and students, who acknowledge the transversal nature. Moreover, it is considered important for students to develop

autonomy and transferrable skills in problem solving to learn successfully at university (Morgan et al., 2022; Morgan, 2018). Since the students already regard this area as being indirectly covered, it would be a relatively small adjustment to signpost activities that help support this, but it might help students better apply skills developed in the course to other areas.

Although digital content creation and safety are regarded as relevant, they are unaddressed by the AES course. Arguably, AES is not the most appropriate place to address these because AES is primarily a language and academic skills course, as staff observed. Students stated that safety was addressed in tutorials, however, their lack of confidence in this area indicates that it should be more thoroughly addressed within the IFY programme. Secker (2018b) notes that there can be gaps and overlaps in the provision of DC. Therefore, to ensure appropriate DC coverage when updating programmes and curricula, institutions should follow Fedorova and Nikiforova's (2022) recommendation of an interdisciplinary approach to addressing DC in curriculum design, ensuring that competencies are mapped to appropriate subjects. Furthermore, awareness of frameworks such as the DigComp Framework and relevant competencies would be useful for staff and students. It could help staff better develop programmes and be more aware of gaps, and help students understand what they might need to do at university.

Currently students' digital competency on entry to the course is not diagnostically assessed, and this would be beneficial. Students often arrive at HE with highly divergent digital abilities (Martzoukou et al., 2020; Secker, 2018a), and their abilities are rarely assessed on entry. In my experience, this is also the case for IFY programmes with students from a wide variety of backgrounds. Staff acknowledged the challenge presented by varying levels of student competence and curriculum designers noted this is currently under discussion within

GPN. DC has been recognised as comparable to literacy and numeracy (Ferrari, 2012), and one curriculum designer observed DC should be diagnostically assessed in the same manner as Maths and English. Son et al. (2017) argue that student DC levels need to be accurately assessed to implement effective learner training. This would allow for staff to provide more differentiated and targeted support so that students who need more baseline support can receive it, while those with more advanced abilities are given opportunities to develop these further. This would seem to be particularly important for IFY programmes because staff noted increasing numbers of students coming from less privileged backgrounds. Therefore, it is strongly recommended that a diagnostic test is administered for students at the start of IFY programmes. This could take the form of a specifically designed test; however, it would be easier and perhaps more cost-effective to use existing tools such as the EU's Europass Digital Skills Assessment Tool (European Union, 2023).

Finally, courses and assessments need to be regularly reviewed to ensure that DC support accounts for evolving technology. The recent development of more advanced AI tools such as ChatGPT (<https://chat.openai.com/>) has reinforced this necessity because students now need to be made aware of the implications of AI and how to avoid academic integrity issues. Furthermore, such tools are likely to impact many industries and students may need training on how to use them productively and ethically. Assessments will also need to be regularly updated to account for evolving technologies, associated academic integrity issues, and to integrate more creative assessments as suggested by staff. One teacher argued that students are more likely to engage in activities when a grade is attached, and the success of Coursework 1 seems to bear this out. Therefore, assessments should be designed to directly support the development of DC. However, careful consideration is needed when developing

any assessments because staff noted some strongly negative emotional reactions from students when engaged in high-stakes assessments administered digitally.

5.5: Limitations

This was a small-scale qualitative study and so the conclusions are not generalisable, and it is important to recognise the limitations of any research. Firstly, although I attempted to conduct a systematic and thorough literature search, it is possible that some relevant literature was missed. Secondly, the number of participants was small, consisting of five staff and three students. Although I attempted to consult a range of student views by selecting students from different pathways, I was unable to access as wide a range of views as possible. In particular, all the students I spoke with seemed relatively confident with technology, and it would have been interesting to interview less confident students. This may have occurred because students were asked to volunteer for the study, and therefore perhaps only relatively confident students volunteered. Additionally, I would have consulted other stakeholders to access a broader range of perspectives, for example, alumni, support staff, and university partners. However, the limited size of the project prevented this. The research took place in the middle of the academic year towards the end of term two, due to the dissertation's timing. This meant that students could not discuss activities from later in the academic year, including the Coursework 3 essay, and summative exams administered through an online proctoring system.

An important limitation is that participants may not have had a full understanding of the DigComp Framework, and the individual competencies. Although Evangelinos and Holley (2015) found the framework suitable for qualitative research in HE, the meaning of certain

areas may be ambiguous, and participants may not have shared a common understanding. Indeed, this seems to be supported by the fact that students asked for clarification of what was meant by several competencies.

As Mackey and Gass (2016) note, good interviewing is a skill and as a novice researcher, I may not have been as effective as possible. As an insider researcher, I was interviewing colleagues with whom I share a close professional relationship. This presents both positives and negatives as detailed by Poulton (2021). I attempted to minimise the negatives through reflection on my role. Despite this, sometimes I might have led interviewees with my attempts to interpret what they were saying, and I could have given them more time to formulate responses. Furthermore, my insider perspective may have shaped the interviews, while my position as a researcher meant my conceptions of emerging themes may have impacted my questioning. In reviewing the transcripts, I realised that I had asked some participants what they would like to see changed about the AES course, and some valuable comments were made. In retrospect, I should have asked all participants to access more opinions on that point.

6.0: Conclusion

This study aimed to investigate DC in the context of IFY students studying in an EMI environment, to help me improve my practice and to partially address a gap in the literature. I wanted to discover what staff and students within my current teaching context thought about DC, especially which competencies they considered most relevant, levels of perceived student competency, to what extent the AES course addresses DC and possible implications for course design.

Staff and students place a high priority overall on DC and all five broad areas of the DigComp Framework were regarded as relevant to some degree, but both prioritised 'information literacy', 'communication' and 'problem solving' most. The prioritisation of the first two areas corresponds with Sicilia et al.'s (2018) findings, but the current study's participants focused on 'problem solving' to a greater degree. Staff and students broadly agreed on which competencies were most relevant, although students prioritised 'safety' more, again in line with previous findings (Sicilia et al., 2018). However, 'safety' was regarded as more important for everyday life, rather than specifically related to undergraduate studies. 'Digital content creation' was considered mainly field dependent, although there was some acknowledgement of the need to create digital content for assessments.

Overall, staff considered students to be slightly less competent than students viewed themselves, however, there was general agreement about which areas students were more competent in. In general, students rated themselves as relatively competent, especially in 'information literacy' and 'communication.' This corresponds with the findings of Lucas et al. (2022). However, these students also considered themselves competent in 'problem solving', in contrast to Lucas et al.'s (2022) participants. While students focused on the positive

impacts of informal technology use in providing experience, staff considered this a narrow competence that did not automatically transfer to academic and professional settings.

Generally, the AES course at WEFC was considered to help students develop 'information literacy', 'communication' and 'problem solving'. These areas were judged the most relevant for students, and so the AES course can be considered to appropriately support DC. 'Information literacy' was seen as being directly developed through coursework focused on the identification and evaluation of online sources. Students and staff disagreed somewhat about the degree to which 'communication' was addressed. While staff noted that it was not a main aim of the course, students felt that a locally implemented collaborative project helped them develop this area. This project and the coursework can be viewed as examples of authentic, project and task-based activities, supporting the argument that these types of activities are suitable for developing DC (Fedorova & Nikiforova, 2022; Morgan, 2018). Although 'problem solving' was not an explicit aim of the course, all participants noted that students developed this area indirectly through encountering and solving problems while completing learning activities. Finally, 'digital content creation' and 'safety' were not significantly addressed by the AES course, although there was an element of content creation involved in a presentation assignment.

Several recommendations for this course can be made based on these findings, which may apply to other similar courses. Firstly, GPN's AES course should more explicitly address both 'communication' and 'problem solving' because they are directly relevant to AES's focus on language and academic skills. WEFC's collaborative project is recommended as an appropriate activity for this. Secondly, an interdisciplinary approach should be taken to DC provision in curricula (Fedorova & Nikiforova, 2022), to avoid gaps and ensure that appropriate DC are mapped to subjects. Students expressed a lack of confidence around

'safety'; therefore, the IFY programme should ensure this area is adequately covered. Thirdly, because students arrive with greatly varying levels of DC, diagnostic testing would be beneficial and allow staff to provide appropriate differentiated support for students. Finally, courses and assessments need to keep pace with evolving technology to ensure DC is appropriately supported.

There are several avenues of further research on the topic that could prove fruitful. Firstly, there is relatively little research around DC that focuses directly on pedagogical issues (Zhao et al., 2021), and it would be beneficial for more studies to focus on this aspect. If DC is to be effectively supported, teachers need to know what kind of activities work best and how to best support students. Secondly, further studies should be conducted into how to effectively assess DC, especially cost-effective diagnostic assessments and how to design assessments that encourage students to learn DC. Thirdly, staff discussed barriers to the implementation of more creative assignments and integration of DC into the curriculum. These barriers and how to mitigate them could be investigated. For example, how to lower institutional barriers and how to support both new and in-service teachers in their development of DC. Finally, there should be more research into the implications of emergent technologies such as more advanced AI tools including ChatGPT (<https://chat.openai.com/>), investigating possible pedagogic applications as well as potential academic integrity issues.

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Appendix I: Participant Information Sheet

Participant Information



University of
St Andrews

Student and staff perceptions of digital competencies for English Medium international foundation year students in a Western European country, with reference to the EU's Digital Competence Framework for Citizens (DigComp).

Paul Robertson

What is the study about?

I invite you to participate in a research project about the perceptions of students, teachers and course designers regarding digital competencies for international foundation year students in an English Medium environment. The study aims to determine which digital competencies are perceived to be relevant, which competencies students are already perceived to possess, and which areas of digital competence the current Academic English Skills course aims to develop.

Why have I been invited to take part?

You have been invited to take part because you are either a student at WEFC, a teacher on the foundation year program, or contribute towards the design of the Academic English Skills course.

Do I have to take part?

This information sheet has been written to help you decide if you would like to take part. It is up to you and you alone whether you wish to take part. If you do decide to take part you will be free to withdraw at any time without providing a reason, and with no negative consequences.

What would I be required to do?

You will be invited to take part in a one-to-one interview which I anticipate would last approximately 30-45 minutes. The interview would take place either on the premises of WEFC or online via Teams, and would be recorded for the purposes of transcription. Prior to the interview, you will be given a list of questions to consider.

Are there any risks associated with taking part?

It may be inconvenient for you to attend the interview and there may be technical issues if the interview takes place online. However, I will endeavour to schedule the interview at the most convenient time for you and to minimise technical issues.

Students: Your decision to take part in the research, or not, will not impact your grades in any way.

Are there any benefits associated with taking part?

The topic of digital competencies is increasingly relevant for both students and educators in higher education. Participating in this research may give you the opportunity to reflect on your own skills, knowledge and abilities and hence may allow you the opportunity to help further develop those.

The research aims to contribute towards the growing body of research on the topic of digital competencies. In particular, the context of international foundation year students and English Medium instruction have received relatively little attention and this represent a gap in the literature, which this study hopes to address.

One aim of the research is to suggest how the design and delivery of the Academic English Skills course may be influenced by the findings of the study in the future. Therefore, this will hopefully benefit future students and educators like yourself, by providing an improved learning experience.

Informed consent

It is important that you are able to give your informed consent before taking part in this study and you will have the opportunity to ask any questions in relation to the research before you provide your consent.

What information about me or recordings of me ('my data') will you be collecting?

I will collect information about your opinions on questions relating to your perceptions of digital competencies via an interview. I will also make an audio recording of the interview, for the purposes of transcription. I will give you the opportunity to check the transcription for accuracy, and once this is complete I will delete the original recording.

How will my data be securely stored, who will have access to it?

Your data will be stored in a **PSEUDONYMISED** form, which means that your data will be edited so that you are referred to by a unique reference such as a code number or different name, and the original data will remain accessible only to the researcher. Your data will be stored in a password protected laptop and One Drive account, and only the researcher will be able to access it. There will be a 'key' document, which will link your unique reference to your real identity. The key will be kept in the researcher's home, and only the researcher will have access to it and be able to reconnect your data to you at a later date.

The data will be retained in this form until I have fully completed the assignment that it will be used for. After this assignment is completed, the key document that allows the pseudonymised data to be deciphered will be destroyed and the data will be retained indefinitely by the researcher in a completely **ANONYMISED** form

Audio recordings will be taken on an encrypted device and transcribed at the earliest opportunity before being archived for future use.

How will my data be used, and in what form will it be shared further?

Your research data will be analysed as part of the research study. It will then be published in my dissertation, and possibly in research publication(s) later. It will also be shared i.e. by placing it in a database accessible by others.

If shared, any interview data will be in a **PSEUDONYMISED** form, which means that your data will be edited so that you are referred to by a unique reference such as a code number or different name. There will be a 'key' document, which will link your unique reference to your real identity. The key will be kept in the researcher's home, and only the researcher will have access to it and be able to reconnect your data to you at a later date. Furthermore, the identity of the institution involved will be masked, further decreasing the identifiability of the data.

It is expected that the project to which this research relates will be finalised by April 2023.

Where can I find out about the results of the study?

I expect the study will be completed by the end of April 2023. I will then email a summary of the results to everyone who was invited to participate, before the end of July 2023.

When will my data be destroyed?

The data collected will be stored in a password protected One Drive account, and on a password protected computer. The data will initially be stored pseudonymously until I have fully completed the assignment that it will be used for. Then the key connecting participants to their data will be destroyed, meaning that the data is stored anonymously from then on. The data will be kept indefinitely for future publication purposes.

International data transfers – Personal data

Your data will be stored and processed in **The Netherlands**. No matter their physical location, researchers are required to store and make use of personal data as if they were in the UK; University requirements and the provisions of the data protection law apply at all times.

Will my participation be confidential?

Yes, your participation will only be known to the researcher

Use of your personal data for research and data protection rights

The University of St Andrews (the 'Data Controller') is bound by the UK 2018 Data Protection Act and the General Data Protection Regulation (GDPR), which require a lawful basis for all processing of personal data (in this case it is the 'performance of a task carried out in the public interest' – namely, for research purposes) and an additional lawful basis for processing personal data containing special characteristics (in this case it is 'public interest research'). You have a range of rights under data protection legislation. For more information on data protection legislation and your rights visit <https://www.st-andrews.ac.uk/terms/data-protection/rights/>. For any queries, email dataprot@st-andrews.ac.uk.

You will be able to withdraw your data before 6th March 2023.

Ethical Approvals

This research proposal has been scrutinised and subsequently granted ethical approval by the University of St Andrews Teaching and Research Ethics Committee. This project has also been reviewed and approved by GPN's Research Ethics Committee.

What should I do if I have concerns about this study?

In the first instance, you are encouraged to raise your concerns with the researcher. However, if you do not feel comfortable doing so, then you should contact my Supervisor or School Ethics Contact (contact details below). A full outline of the procedures governed by the University Teaching and Research Ethics Committee is available at <https://www.st-andrews.ac.uk/research/integrity-ethics/humans/ethical-guidance/complaints/>.

Contact details

Researcher(s)

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Appendix II: Participant Consent Form



University of
St Andrews

Consent Form

Student and staff perceptions of digital competencies for English Medium international foundation year students in a Western European country, with reference to the EU's Digital Competence Framework for Citizens (DigComp).

Paul Robertson

The University of St Andrews attaches high priority to the ethical conduct of research. We therefore ask you to consider the following points before signing this form. Your signature confirms that you are willing to participate in this study, however, signing this form does not commit you to anything you do not wish to do and you are free to withdraw your participation at any time.

Please initial box

- I understand the contents of the Participant Information Sheet (marked 'PIS_[07/02/2023]_[V0.4]_[Perceptions of digital competencies for EM IFY students]') ☐
- I have been given the opportunity to ask questions about the study and have had them answered satisfactorily. ☐
- I understand that my participation is entirely voluntary and that I can withdraw from the study at any time without giving an explanation and with no disbenefit. ☐
- I understand who will have access to my data, how it will be stored, in what form it will be shared, and what will happen to it at the end of the study. ☐
- I understand that I will be able to withdraw my data before 6th March 2023 and I understand that if my data has been anonymised, it cannot be withdrawn ☐
- I agree to take part in the above study ☐

Audio recordings & video images

I understand that part of this research involves recording audio data. These will be kept securely and stored separately to any identifiable information, i.e. consent forms and questionnaires.

Audio data can be a valuable resource for future studies and therefore we ask for your additional consent to maintain this data for this purpose.

- I agree to being audio recorded ☐
- I agree to my audio material to be published as part of this research. ☐
- I give permission for my audio material to be used in future studies without further consultation. ☐

I confirm that I am willing to take part in this research

	Print name	Date	Signature
Participant			
Person taking consent			

Appendix III: Participant debrief

Debrief



Student and staff perceptions of digital competencies for English Medium international foundation year students in a Western European country, with reference to the EU's Digital Competence Framework for Citizens (DigComp).
Paul Robertson

Thank you for taking part in my research project; your contribution is very valuable and appreciated.

Nature of study

This study sought to gain an understanding of student, teacher and course designer perceptions of relevant digital competencies for International Foundation Year students in an English Medium instruction context. The study aimed to discover the understanding that these different stakeholders have about digital competencies, what they believe to be the most relevant digital competencies for these students, and whether these perceptions align. You have been invited to participate in this research because you are one of these stakeholders, and as such your opinion was valuable.

Data

As outlined in the Participant Information Sheet (marked 'PIS_[07/02/2023]_[V0.4]_[Perceptions of digital competencies for EM IFY students]');

- The information (data) you have provided will be stored in a pseudonymised form until I have fully completed the assignment that this data will be used for. After this assignment is completed, the key document that allows the pseudonymised data to be deciphered will be destroyed and the data will be retained indefinitely by the researcher in a completely anonymous form.
- Your information (data) will be stored in a password protected survey account and a password protected One drive folder and only the researcher will be able to access it.
- Your data will be shared (published and/or placed in a database accessible by others) in a pseudonymised.
- Participants' data will be shared as described above, and then the data held by the researcher will be kept indefinitely in accordance with the safeguards detailed by law.
- Your data may be used for related research projects in the future without further consultation.
- If you no longer wish to participate in the research, you are free to withdraw your data before 6th March, 2023. If your information (data) is anonymous at the point of collection or subsequently anonymised, we will not be able to withdraw it after that point because we will no longer know which information (data) is yours.

Sources of support

If you have been affected by participating in this study and you wish to seek support, you can contact Student Services.

Further reading of interest

If you are interested in the topic of digital competencies in higher education, the following reading may be of interest:

- Ahmed, S. T., & Roche, T. (2021). Making the connection: Examining the relationship between undergraduate students' digital literacy and academic success in an English Medium instruction (EMI) university. *Education and Information Technologies*, 26(4), 4601–4620. <https://doi.org/10.1007/s10639-021-10443-0>
- Sánchez-Caballé, A., Gisbert-Cervera, M., & Esteve-Mon, F. (2020). The digital competence of University Students: A Systematic Literature Review. *Aloma: Revista De Psicologia, Ciències De L'Educació i De L'Esport*, 38(1), 63–74. <https://doi.org/10.51698/aloma.2020.38.1.63-74>
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- Tinmaz, H., Lee, Y. T., Fanea-Ivanovici, M., & Baber, H. (2022). A systematic review on digital literacy. *Smart Learning Environments*, 9(1). <https://doi.org/10.1186/s40561-022-00204-y>
- Vuorikari Rina, R., Kluzer, S., & Punie, Y. (2022). *DigComp 2.2: The Digital Competence Framework for Citizens - With new examples of knowledge, skills and attitudes* (JRC Research Reports, Issue JRC128415). Joint Research Centre (Seville site). <https://doi.org/10.2760/115376>

Contact

If you have concerns or if you would like to view a summary of the results of my research, please email the researcher or the supervisor detailed below.

Researcher(s) Paul Robertson
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Supervisor(s) Eoin Jordan
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Appendix IV: Example of DigComp Graphical Representation

(Vuorikari et al., 2022, pp.9-10)

9



DIMENSION 1 • COMPETENCE AREA

1. INFORMATION AND DATA LITERACY

DIMENSION 2 • COMPETENCE

1.1 BROWSING, SEARCHING AND FILTERING DATA, INFORMATION AND DIGITAL CONTENT




To articulate information needs, to search for data, information and content in digital environments, to access them and to navigate between them. To create and update personal search strategies.

DIMENSION 3 • PROFICIENCY LEVEL

FOUNDATION	1	At basic level and with guidance, I can:	<ul style="list-style-type: none"> • identify my information needs, find data, information and content through a simple search in digital environments, • find how to access these data, information and content and navigate between them, • identify simple personal search strategies.
	2	At basic level and with autonomy and appropriate guidance where needed, I can:	<ul style="list-style-type: none"> • identify my information needs, • find data, information and content through a simple search in digital environments, • find how to access these data, information and content and navigate between them. • identify simple personal search strategies.
INTERMEDIATE	3	On my own and solving straightforward problems, I can:	<ul style="list-style-type: none"> • explain my information needs, • perform well-defined and routine searches to find data, information and content in digital environments, • explain how to access them and navigate between them, • explain well-defined and routine personal search strategies.
	4	Independently, according to my own needs, and solving well-defined and non-routine problems, I can:	<ul style="list-style-type: none"> • illustrate information needs, • organise the searches of data, information and content in digital environments, • describe how to access these data, information and content, and navigate between them, • organise personal search strategies.
ADVANCED	5	As well as guiding others, I can:	<ul style="list-style-type: none"> • respond to information needs, • apply searches to obtain data, information and content in digital environments, • show how to access these data, information and content and navigate between them. • propose personal search strategies.
	6	At advanced level, according to my own needs and those of others, and in complex contexts, I can:	<ul style="list-style-type: none"> • assess information needs, • adapt my searching strategy to find the most appropriate data, information and content in digital environments, • explain how to access these most appropriate data, information and content and navigate among them, • vary personal search strategies.
HIGHLY SPECIALISED	7	At highly specialised level, I can:	<ul style="list-style-type: none"> • create solutions to complex problems with limited definition that are related to browsing, searching and filtering of data, information and digital content, • integrate my knowledge to contribute to professional practice and knowledge and guide others in browsing, searching and filtering data, information and digital content.
	8	At the most advanced and specialised level, I can:	<ul style="list-style-type: none"> • create solutions to solve complex problems with many interacting factors that are related to browsing, searching and filtering data, information and digital content. • propose new ideas and processes to the field.

DIMENSION 4 • EXAMPLES OF KNOWLEDGE, SKILLS AND ATTITUDES

NEW
IN 2.2

KNOWLEDGE 	<ol style="list-style-type: none"> 1. Knows that some online content in search result may not be open access or freely available and may require a fee or signing up for a service in order to access it. 2. Aware that online content that is available to users at no monetary cost is often paid for by advertising or by selling the user's data. 3. Aware that search results, social media activity streams and content recommendations on the internet are influenced by a range of factors. These factors include the search terms used, the context (e.g. geographical location), the device (e.g. laptop or mobile phone), local regulations (which sometimes dictate what can or cannot be shown), the behaviour of other users (e.g. trending searches or recommendations) and the user's past online behaviour across the internet. 4. Aware that search engines, social media and content platforms often use AI algorithms to generate responses that are adapted to the individual user (e.g. users continue to see similar results or content). This is often referred to as "personalisation". (AI) 5. Aware that AI algorithms work in ways that are usually not visible or easily understood by users. This is often referred to as "black box" decision-making as it may be impossible to trace back how and why an algorithm makes specific suggestions or predictions. (AI)
SKILLS 	<ol style="list-style-type: none"> 6. Can choose the search engine that most likely meets one's information needs as different search engines can provide different results even for the same query. 7. Knows how to improve search results by using a search engine's advanced features (e.g. specifying exact phrase, language, region, date last updated). 8. Knows how to formulate search queries to achieve the desired output when interacting with conversational agents or smart speakers (e.g. Siri, Alexa, Cortana, Google Assistant), e.g. recognising that, for the system to be able to respond as required, the query must be unambiguous and spoken clearly so that the system can respond. (AI) 9. Can make use of information presented as hyperlinks, in non-textual form (e.g. flowcharts, knowledge maps) and in dynamic representations (e.g. data). 10. Develops effective search methods for personal purposes (e.g. to browse a list of most popular films) and professional purposes (e.g. to find appropriate job advertisements). 11. Knows how to handle information overload and "infodemic" (i.e. increase of false or misleading information during a disease outbreak) by adapting personal search methods and strategies.
ATTITUDES 	<ol style="list-style-type: none"> 12. Intentionally avoids distractions and aims to avoid information overload when accessing and navigating information, data and content. 13. Values tools designed to protect search privacy and other rights of users (e.g. browsers such as DuckDuckGo). 14. Weighs the benefits and disadvantages of using AI-driven search engines (e.g. while they might help users find the desired information, they may compromise privacy and personal data, or subject the user to commercial interests). (AI) 15. Concerned that much online information and content may not be accessible to people with a disability, for example to users who rely on screen reader technologies to read aloud the content of a web page. (DA)

DIMENSION 5 • USE CASES

FOUNDATION

1

EMPLOYMENT SCENARIO: job seeking process

With help from an employment adviser

- I can identify, from a list, those job portals which can help me look for a job.
- I can also find these job portals in my smartphone's app store, and access and navigate between them.
- From a list of generic keywords for job seeking available in a blog on job hunting, I can also identify the keywords that are useful for me.

LEARNING SCENARIO: prepare group work with my classmates

With help from my teacher

- I can identify websites, blogs and digital databases from a list in my digital textbook to look for literature on the report topic.
- I can also identify literature on the report topic in these websites, blogs and digital databases, and access and navigate among them.
- Using a list of generic keywords and tags available in my digital textbook, I can also identify those which would be useful for finding literature on the report topic.

Appendix V: Interview Protocols

Student Interview Protocol

Introduction

Thank you for volunteering to do an interview with me about your perceptions of digital competencies for English Medium international foundation year students. Before we start, I would like to confirm your responses to the statements from the consent form that I emailed you before the interview. A copy of the form is on the table in front of you/has been emailed to you beforehand and is now displayed on screen. Please can you say “agree” or “disagree” after each of the following four statements from the form?

1. I confirm that I have read and understood the participant information sheet dated January 27, 2023 for the above study. I have had the opportunity to consider the information, ask questions, and have had any questions answered satisfactorily.
2. I understand that my participation is voluntary and that I am free to withdraw at any time without giving any reason, without my rights being affected. In addition, should I not wish to answer any particular question or questions, I am free to decline.
3. I understand that, under the Data Protection Act, I can at any time ask for access to the information I provide and I can also request the destruction of that information if I wish.
4. I agree to take part in the above study.

Thank you. We'll now move on to discuss your perceptions of digital competencies.

Background

(follow up as appropriate)

1. What is the area of your future degree? [Business / Economics, Econometrics & Business Analytics / Social Sciences]
2. What does the term digital competencies mean to you?
3. What has been your experience, so far, with the use of technology for educational purposes?

Digital competencies – relevance and competence

(follow up as appropriate)

I'd like us to look a bit more closely at the DigComp Framework and discuss your thoughts and perceptions, looking through each area in turn.

4. Thinking about the area of **“Information and data literacy”**
 - a. How relevant do you think this area is for your studies? Why?
 - b. How confident do you feel about this area? Why?
 - c. To what extent do you feel the Academic English Skills (AES) course has addressed this area?
 - d. Did any particular activities help you develop this area?

5. Thinking about the competencies that make up this area:
 - i. Browsing, searching and filtering data, information and digital content
 - ii. Evaluating data, information and digital content
 - iii. Managing data, information and digital content
 - a. Do you think that any of the competencies are particularly relevant for you, or not? why?
 - b. Do you feel particularly confident or unconfident about any of the competencies? why?

6. Thinking about the area of **“Communication and collaboration”**
 - a. How relevant do you think this area is for your studies? Why?
 - b. How confident do you feel about this area? Why?
 - c. To what extent do you feel the Academic English Skills (AES) course has addressed this area?
 - d. Did any particular activities help you develop this area?

7. Thinking about the competencies that make up this area:
 - i. Interacting through digital technologies
 - ii. Sharing information and content through digital technologies
 - iii. Engaging in citizenship through digital technologies
 - iv. Collaborating through digital technologies
 - v. Netiquette
 - vi. Managing digital identity
 - a. Do you think that any of the competencies are particularly relevant for you, or not? why?
 - b. Do you feel particularly confident or unconfident about any of the competencies? why?

8. Thinking about the area of **“Digital content creation”**
 - a. How relevant do you think this area is for your studies? Why?
 - b. How confident do you feel about this area? Why?
 - c. To what extent do you feel the Academic English Skills (AES) course has addressed this area?
 - d. Did any particular activities help you develop this area?

9. Thinking about the competencies that make up this area:
 - i. Developing digital content
 - ii. Integrating and re-elaborating digital content
 - iii. Copyright and licences
 - iv. Programming
 - a. Do you think that any of the competencies are particularly relevant for you, or not? why?
 - b. Do you feel particularly confident or unconfident about any of the competencies? why?

10. Thinking about the area of **“Safety”**
 - a. How relevant do you think this area is for your studies? Why?
 - b. How confident do you feel about this area? Why?
 - c. To what extent do you feel the Academic English Skills (AES) course has addressed this area?
 - d. Did any particular activities help you develop this area?

11. Thinking about the competencies that make up this area:

- i. Protecting devices
 - ii. Protecting personal data and privacy
 - iii. Protecting health and well-being
 - iv. Protecting the environment
 - a. Do you think that any of the competencies are particularly relevant for you, or not? why?
 - b. Do you feel particularly confident or unconfident about any of the competencies? why?
12. Thinking about the area of **“Problem solving”**
- a. How relevant do you think this area is for your studies? Why?
 - b. How confident do you feel about in this area? Why?
 - c. To what extent do you feel the Academic English Skills (AES) course has addressed this area?
 - d. Did any particular activities help you develop this area?
13. Thinking about the competencies that make up this area:
- i. Solving technical problems
 - ii. Identifying needs and technological responses
 - iii. Creatively using digital technologies
 - iv. Identifying digital competence gaps
 - a. Do you think that any of the competencies are particularly relevant for you, or not? why?
 - b. Do you feel particularly confident or unconfident about any of the competencies? why?
14. Has the AES course helped you develop your digital competencies?
15. Would you like to make any further comments or suggestions related to digital competencies?

Thank you very much for your time and for sharing your thoughts on this topic.

Staff Interview Protocol

Introduction

Thank you for volunteering to do an interview with me about your perceptions of digital competencies for English Medium international foundation year students. Before we start, I would like to confirm your responses to the statements from the consent form that I emailed you before the interview. A copy of the form is on the table in front of you/has been emailed to you beforehand and is now displayed on screen. Please can you say “agree” or “disagree” after each of the following four statements from the form?

1. I confirm that I have read and understood the participant information sheet dated January 27, 2023 for the above study. I have had the opportunity to consider the information, ask questions, and have had any questions answered satisfactorily.
2. I understand that my participation is voluntary and that I am free to withdraw at any time without giving any reason, without my rights being affected. In addition, should I not wish to answer any particular question or questions, I am free to decline.
3. I understand that, under the Data Protection Act, I can at any time ask for access to the information I provide and I can also request the destruction of that information if I wish.
4. I agree to take part in the above study.

Thank you. We'll now move on to discuss your perceptions of digital competencies.

Background

(follow up as appropriate)

1. What does the term digital competencies mean to you?
2. Do you think that students have an accurate assessment of their own digital competence?
3. What have been your experiences, so far, with students' use of technology for educational purposes?

Digital competencies – relevance and competence

(follow up as appropriate)

I'd like us to look a bit more closely at the DigComp Framework and discuss your thoughts and perceptions, looking through each area in turn.

4. Thinking about the area of **“Information and data literacy”**:
 - a. How relevant do you think this area is for our students' studies?
 - b. How competent do you think our students are in this area?
 - c. To what extent do you feel the Academic English Skills (AES) course has been designed to address this area?
5. Thinking about the competencies that make up this area:

- i. Browsing, searching and filtering data, information and digital content
 - ii. Evaluating data, information and digital content
 - iii. Managing data, information and digital content
- a. Do you think that any of the competencies are particularly relevant for our students, or not? Why?
- b. Do you think they are particularly competent in any of the competencies? Why?
- 6. Thinking about the area of **“Communication and collaboration”**:
 - a. How relevant do you think this area is for our students’ studies?
 - b. How competent do you think our students are in this area?
 - c. To what extent do you feel the Academic English Skills (AES) course has been designed to address this area?
- 7. Thinking about the competencies that make up this area:
 - i. Interacting through digital technologies
 - ii. Sharing information and content through digital technologies
 - iii. Engaging in citizenship through digital technologies
 - iv. Collaborating through digital technologies
 - v. Netiquette
 - vi. Managing digital identity
 - a. Do you think that any of the competencies are particularly relevant for our students or not? Why?
 - b. Do you think they are particularly competent in any of the competencies? Why?
- 8. Thinking about the area of **“Digital content creation”**:
 - a. How relevant do you think this area is for our students’ studies?
 - b. How competent do you think our students are in this area?
 - c. To what extent do you feel the Academic English Skills (AES) course has been designed to address this area?
- 9. Thinking about the competencies that make up this area:
 - i. Developing digital content
 - ii. Integrating and re-elaborating digital content
 - iii. Copyright and licences
 - iv. Programming
 - a. Do you think that any of the competencies are particularly relevant for our students, or not? Why?
 - b. Do you think they are particularly competent in any of the competencies? Why?
- 10. Thinking about the area of **“Safety”**:
 - a. How relevant do you think this area is for our students’ studies?
 - b. How competent do you think our students are in this area?
 - c. To what extent do you feel the Academic English Skills (AES) course has been designed to address this area?
- 11. Thinking about the competencies that make up this area:
 - i. Protecting devices
 - ii. Protecting personal data and privacy

- iii. Protecting health and well-being
 - iv. Protecting the environment
 - a. Do you think that any of the competencies are particularly relevant for our students, or not? Why?
 - b. Do you think they are particularly competent in any of the competencies? Why?
12. Thinking about the area of **“Problem solving”**:
- a. How relevant do you think this area is for our students’ studies?
 - b. How competent do you think our students are in this area?
 - c. To what extent do you feel the Academic English Skills (AES) course has been designed to address this area?
13. Thinking about the competencies that make up this area:
- i. Solving technical problems
 - ii. Identifying needs and technological responses
 - iii. Creatively using digital technologies
 - iv. Identifying digital competence gaps
 - a. Do you think that any of the competencies are particularly relevant for our students, or not? Why?
 - b. Do you think they are particularly competent in any of the competencies? Why?
14. Are you familiar with any digital competency or digital literacy frameworks?
15. Have digital competencies influenced your decisions in the design and implementation of the AES course?
16. Are there any areas of digital competence that the AES course might develop more?
17. Do you think that reflecting on the DigComp Framework will affect the way that you design and/or deliver the AES course, or other similar courses in the future?
18. Would you like to make any further comments or suggestions related to digital competencies?

Thank you very much for your time and for sharing your thoughts on this topic.

Appendix VI: Interview Transcripts

GPN Curriculum Designer 1 (CD1)

Paul Robertson

Thank you very much for volunteering to do an interview with me about your perceptions of digital competencies for English Medium, International Foundation year students. Before we start, I'd like to confirm your responses to the statements from the consent form that I emailed you before the interview. I'm just gonna quickly display a copy of the form.

GPN Curriculum designer 1

Yep, I've got that in front of me. Oh Yep, that's fine. OK. Yep.

Paul Robertson

Great, OK. Well then if you've got that in front of you, that's yeah. And yeah, can we just please say agree or disagree after each of the following four statements? So, I confirm that I have read and understood the participant information sheet dated 7th February 2023 for the above study. I have had the opportunity to consider the information, ask questions and have had any questions answered satisfactorily.

GPN Curriculum designer 1

Uh, yes, agreed or whatever it is, whatever the correct response is.

Paul Robertson

Excellent. Yes, that is the correct response. I understand that my participation is voluntary and that I am free to withdraw at any time without giving any reason, without my rights being affected. In addition, should I not wish to answer any particular questions, I am free to decline.

GPN Curriculum designer 1

Agreed.

Paul Robertson

I understand that under the Data Protection Act I can ask any time for access to the information I provide, and I can also request for the destruction of information if I wish.

GPN Curriculum designer 1

Agreed. OK, yeah, agreed.

Paul Robertson

Yeah. And I agree to take part in the above study.

GPN Curriculum designer 1

Agreed

Paul Robertson

OK, great. So, yeah. So, yeah, just in terms of, we'll move on now to think about your perceptions of digital competencies. So, can I ask, what does the term digital competencies mean to you?

GPN Curriculum designer 1

So, I think. I mean, obviously there's a very good definition, on the DigComp Framework. So not trying to paraphrase that too closely. I thought initially that it's about the engagement and ability to produce information digitally and also being able to evaluate the quality and or reliability of the information and sort of, thirdly, to sort of be aware of the potential shortcomings and your responsibilities, umm, with regards to kind of digital information. So, I think I kind of think about it in three kind of ways. Initially, obviously just being able to use digital information, evaluate it and thirdly of be aware of its shortcomings, which I guess is slightly to deal with evaluation.

Paul Robertson

Yes. No, it's good. Yeah. Excellent. And thinking about our students, do you think they have an accurate assessment of their own digital competence when they arrive?

GPN Curriculum designer 1

No, I don't think it's something that many students have thought of. I think in many cases they've they've grown up with technology. So, they assume that they're familiar with it, and I think they can potentially confuse being able to access information with being able to use it responsibly or to evaluate it in any way. And then we have in some cohorts, we have groups of students who have very, very limited digital experience. And so start from a point where they assume they have a knowledge of zero and beyond being able to use a mobile phone, so we frequently have students in centres that don't know how to type. Don't know how to do very very basic digital functions like double click or use a mouse even and I think they they I they can assume that they do have digital competence because they've got a phone, but they don't realize that it's a very different area and different set of skills being able to navigate things online or being able to understand how to use very basic digital packages like Microsoft Word or Excel or anything like that.

Paul Robertson

Very interesting and thinking about that, you said there's certain groups of students who have this limited digital experience. I was just wondering if those students, if there was anything kind of in common or any kind of groups of students who that's more frequent with.

GPN Curriculum designer 1

Yeah. I mean, a lot of the students which we, we, they're called obviously the GRSS centres, which is so-called because they are they come into the UK on a particular visa which permits them to to work and those are essentially students from the Indian subcontinent. And we found that particularly students who have come from the Bangladesh regions are very, very limited.

Paul Robertson

Yeah. Yeah, yeah.

GPN Curriculum designer 1

They come to the UK to study without proper equipment on the assumption that they can buy laptops and devices in the UK, but then they frequently buy things second hand or that doesn't work properly, and they have no knowledge or experience in how to use a laptop once they've bought it.

So yeah, those that particular region is very difficult, is very challenging and they are very reliant on a phone. And think because I've got a phone they can access the Internet, that's enough. And clearly it isn't.

Paul Robertson

Yeah. No, I think that chimes with quite a bit of the literature and also my own experience thinking a little bit about so far what have your experiences been with students' use of technology for educational purposes.

GPN Curriculum designer 1

So I guess because there has been because that particular group has the numbers of students coming into UK universities from that particular area has risen significantly in the last couple of years, our experiences have been skewed towards supporting these students and we've all been kind of made acutely aware of the challenges that these students in particular have and how we're essentially we only have one year or less than one year to get them to a place where they can start a university course where they will be absolutely required to engage with virtual learning environments, submit work electronically. Work, you know, be able to take notes probably on devices and they can't type, you know, they have absolutely no knowledge and experience so.

So, the last couple of years we have really, because the demographic has kind of shifted that way. We've been, it's the challenges have been far more kind of dominant than before where we would have really seen the benefits of learning technologies and we had students who were very capable and when we produced online materials that were very well received. So, when we did that during lockdown and then most of the students were well spread across the world, but there were significant numbers of Chinese or Asian students who are very competent.

It was very, very successful and it was very well received. But then as you start to get more of these students who don't actually know how to access it or can't access it because they don't have a device. It's been it's been more challenging, and I feel we're sort of slightly we're skewing our approaches.

So, at the moment, and I'm speaking very from very, very recent personal experience, we're undermining the great benefits that we have of digital learning materials and digital assessment because this concern that some students can't access it. And I think we're, we're almost focusing on the problems way more than we should be. We should be and we should actually be, yeah, really celebrating the the benefits of technology and how that enhances learning, but we've been dragged into this endless discussion of shall we go back to paper, which I just think is, is just completely the wrong direction, so we're going in.

Paul Robertson

So that that's very interesting. Then. So do you think this particular cohort has well, so it sounds like this particular cohort has had a big impact, but when you were talking about earlier about students' experiences in general, you sounded a lot more positive about their use of technology for educational purposes.

GPN Curriculum designer 1

Yeah. And I think that that has been brilliant in in the use of you know the the learning resources being available and being fully interactive and actually engaging that was really positive. We had

really positive feedback from students. And then with the shift to using digital platforms for assessment, that has you know that.

The benefits that come with that, for, for, for tutors and for institutions in terms of kind of being able to mark and moderate and all of those things and cost and then for students with all of the accessibility features which online assessment affords and the flexibility that it gives them that you can't, you can't replicate if you drag them into an exam hall and give them photocopied bits of paper. So, there's been, you know, I think it's, it's really been kind of it's really revolutionized how we we're able to monitor how students are doing. Look at there's all the all the statistics that are available on the assessment side but also on the learning platforms you can see who's engaging who's not. They can collaborate when they're in different parts of the world, you know, there's, there's huge numbers of benefits and I think it's been a really, I mean, for all Covid's, many, many, many.

Paul Robertson

Yeah, yeah.

GPN Curriculum designer 1

Disastrous impacts it. It's had a brilliant it's given everybody the kick up the arse they needed to actually move things online and realize that probably common practice before where people were standing up and talking and not recording it so students couldn't access it before or, or after, and, and stuff. You know the, the quality of some of the universities VLEs, you know, you couldn't find anything you know. And, and now they've had to sort it out and make it so much, you You know a much better experience for students. So, I think it's been, it's been amazing and I think you know when you think back to my previous, not my masters, and things cause that wasn't that long ago, but my undergraduate in the 90s, you know, you didn't have this like you know you have anything like this, you know, if you missed a lecture, you missed it.

Paul Robertson

No, no, no. I remember. Blackboard was dreadful.

GPN Curriculum designer 1

That was it. If you didn't have notes, that's it. You didn't have them. So, it's you know you, you, you could literally do nothing independently in terms of reviewing and things like that. There was no access to anything. So, it's completely, it's completely changed education for, for the better. I think the challenge is just getting everybody else up, you know, getting students who want to study in that environment and enjoy the benefits of a UK or European education, but not embrace the technology? It's kind of that's, that's the challenge.

Paul Robertson

So that's very interesting. I think in some ways you're also saying you're, kind of one of the things which is really changed is actually the universities and technology. Uh, this provision has made it much more accessible for students as well recently.

GPN Curriculum designer 1

Yeah.

Paul Robertson

And made it much more easy for them to use technology to study.

GPN Curriculum designer 1

Yes.

Paul Robertson

So, the actual infrastructure has improved greatly.

GPN Curriculum designer 1

Yeah.

Paul Robertson

Yeah. OK, great. Interesting. Great. Thank you very much. And I'd like us to like talk a little bit about this specific framework now and your thoughts and perceptions about each area in turn.

So, I think thinking about the area of information and digital literacy and data literacy, sorry. How relevant do you think this area is for our students' studies?

GPN Curriculum designer 1

Em, yeah, very relevant. I think all of the all of the different areas that you that are in that the framework that and that you've listed out there, all of it is important and relevant for students.

I don't think the AES course specifically develops some of these core skills and and there's it's probably debatable whether or not it's appropriate that we try to do that. There are certain things that we can embed in all courses across the curriculum, but there comes a point where you know you can't. We can't do everything. And essentially our primary function is to improve language and academic skills. But within this, within the academic skills area, obviously digital literacy is is really critical and we certainly do develop and even assess students' ability to browse and search, filter information and evaluate data and information. So those two things in that competency area we specifically do focus on and and even assess, but not so much the managing data information and digital content, we probably don't really focus on that.

Paul Robertson

And do you think it would be beneficial to have any kind of focus on that or do you think that it's it's not so relevant for AES?

GPN Curriculum designer 1

I don't think it's so relevant for AES, because I'm imagining that would come under the remit of some of the subject areas where they need to be gathering kind of larger quantities of data, whereas ours is primarily looking at written or kind of recorded sources.

But obviously our we generally get students who are quite competent at browsing.

Paul Robertson

Yes. No.

GPN Curriculum designer 1

And but not good at evaluating and that we that area, we do have a lot of emphasis right throughout the course on critical thinking and and it all kind of is is, you know, part of the same the same area. That any information you read, you need to question the provenance and also the reliability and everything else and the currency and all of that. So, in that sense, it doesn't matter if the information is technology, is digital or if it's in a book they approach is the same. So, we we do, you know, we do develop that and highlight that as a critical academic skill.

Paul Robertson

OK.

GPN Curriculum designer 1

Throughout the course. And there's probably less emphasis on the browsing searching, because students generally are quite good apart from showing them where to search like online journal articles and things, search engines and Google Scholar, et cetera. But that's not really a particular challenge to students.

GPN Curriculum designer 1

Yeah. Yeah.

Paul Robertson

No. So they kind of already got transferable competence in browsing and then just need to be kind of directed to the academic browsing. But the ability to evaluate data is lacking.

GPN Curriculum designer 1

Yeah.

Paul Robertson

And their ability to manage data is maybe not so strong either, but then not particularly focus on developing in AES.

GPN Curriculum designer 1

Yeah, correct.

Paul Robertson

And then so overall, would you say that this area information and data literacy is quite well addressed by the AES course?

GPN Curriculum designer 1

Yeah, yeah. As I say, the first two, particularly the third one less so, but yeah.

Paul Robertson

OK, excellent. Cool. Yeah. Anything else about information and data literacy?

GPN Curriculum designer 1

No, I don't think so.

Paul Robertson

No. OK. So, thinking about communication and collaboration and how relevant do you think this area is for our students?

GPN Curriculum designer 1

Again, very very relevant. I think all of these things are critical for kind of for wider academic study.

Paul Robertson

Yeah.

GPN Curriculum designer 1

And things that the students are. So how competent do you think students are? Generally, I think they're quite, well, competent or we develop competency in the interacting through digital technologies, the sharing information, the collaborating, the netiquette.

I don't think in AES, we do much and possibly across kind of curricular, we don't do much about engaging in citizenship. That's not really something we would embed because the students are international and they're not coming to settle in the UK. So, it's not something we would particularly promote or would be appropriate to promote so we, you know, we include in all of our learning materials, things on World Englishes and global perspectives, et cetera. We don't focus on on particular citizenships. I think that would be potentially disastrous with the political spectrum that we've got. You know there are so many areas we have to stay away from that. I think that would be that would be challenging.

Paul Robertson

OK, that's interesting I hadn't thought about that, as like citizenship, because it's an international audience is, actually citizenship is contextual and specific. And to try and like, look at that as an international level is quite difficult sometimes fraught, in certain areas.

GPN Curriculum designer 1

And I think, yeah, there's there's more focus both on AES and in the employability skills on things like global mindset and what's the other one that they have, global mindset and...

Paul Robertson

Global knowledge, yeah.

GPN Curriculum designer 1

Global knowledge. Yeah. So that's the focus rather than particular citizenship.

Paul Robertson

Interesting. So maybe citizenship is maybe, well, it's it's all framed in the European framework for so maybe this is kind of like got this kind of European overview there and that's where it's broken.

GPN Curriculum designer 1

I was, find it really quite problematic. You know, the and, cause I've spoken to ***GPN Curriculum designer 2*** quite a lot about the the things, the hoops she's having to jump through to try and become a British citizen. And there's all this stuff about what it is to be British and they're just. I just

think you you can't own things like pride and being moral and but that's not a British thing. That's just find it really problematic to start declaring that you know you have to behave a certain, you know, certain people behave in a certain way because their nationality, I just find that really...

Paul Robertson

Yeah, it's it's very political.

GPN Curriculum designer 1

It's a very yeah, a response. You know, we're responsible and considerate and you know. Take care of society at like you just think A, no we don't. And B that's not a uniquely British thing at all.

Paul Robertson

No. So it's kind of a. It's fascinating that lens.

GPN Curriculum designer 1

You know, it's ridiculous. You know, really. If you mean talking about the war and going on about winning a World Cup 50 years ago, yeah, that's what makes you British.

Paul Robertson

And those are kind of like real key bits of British character, actually that and talking about the weather.

GPN Curriculum designer 1

So, I don't think, yeah, about that one. But the netiquette we do, we do have a focus on particularly when it comes to, you know, communicate peer-to-peer communication or peer to tutor and how how to communicate effectively and appropriately with your peers and your and your tutors because you know we do have quite a bit on the impact and the impression that you can make by writing emails inappropriately or, you know, moderating your tone or you know what kind of response and when and not to send a million follow up emails and that kind of thing. So, there is there is focus on that.

I don't think there's much on digital identity.

Paul Robertson

No.

GPN Curriculum designer 1

And again, I think that that sort of thing tends to be covered in slightly younger years education. There's a lot in schools, isn't there, about being responsible and what you share online. And again, because we've got an international, you know, adult, young adult audience. It's not something that we can embed within our curricular about being aware of what you share online. I don't think, we'd be a bit preachy if we start telling people what they should and shouldn't be sharing. I mean, there is stuff about being safe online, but that tends to be more framed as how to recognize spam emails and how to know when. Communication that's coming to you is genuine and things like that so that you don't give away personal information but not in the sense of how you manage your, what information is out there about yourself. We don't really do that, yeah.

Paul Robertson

Not how you project yourself in the world on the digital world?

GPN Curriculum designer 1

Yeah.

Paul Robertson

Interesting. So, in terms of the relevance for students and their studies. Are there any of these competencies which which particularly jump out, is like being particularly relevant?

GPN Curriculum designer 1

So sharing information and content and obviously interacting through digital technologies are both critical now because, there are, you know, even if you're not studying in an online environment, there is now still the expectation that you you have kind of study groups or you have communities of learning which are often facilitated online, and there's a lot of forums and discussion and things that happens online now, whereas previously it didn't. So essentially, if you're not on top of that, you're missing out on.

Paul Robertson

Umm, definitely.

GPN Curriculum designer 1

Opportunities to collaborate with other people or to arrange meetings or whatever. And so, so the interacting sharing information and collaborating are really important.

And netiquette I think important for our particular cohort because in an international context, it's often quite different and getting students to understand the Impact of the way you know the impact of how they express themselves and what that communicates about them and how that fosters you know, how that will more likely lead to somebody responding to you and helping you or actually ignoring you, you know, is is sort of important.

Paul Robertson

And then thinking in terms about of how competent you think our students are with these so and I'm getting the feeling that maybe netiquette they're not quite so competent yet, but maybe with interacting, sharing, engaging, collaborating, do you think they're currently competent when they arrive or varying levels?

GPN Curriculum designer 1

I think varying. I don't think many of them unless they have actually studied online. I don't, which are most of them haven't. I think you only get that through studying so once you start, you learn about all the different platforms that you need to interact with and through and how to share information and where to find information and how to collaborate. I don't think many of them have done that before because they've come from a school background or a background where information is given to you. You don't have to find it and you don't have to share it. It's just you know it it's given to you, and you take it, and you learn it, it's not. So, I think it's something that they develop throughout the programme, and you know, not just in AES. Obviously, this is, you know, throughout the whole whole programme. But it's, yeah, it's something that probably the netiquette is, is focused on quite a lot in AES and then reinforced in, probably not just in AES. Professional services I know have to

speak, you know, speak actually do speak to students about, you know, don't put your entire e-mail in the subject line and don't write in all caps and they know they regularly speak to students about that.

Paul Robertson

Yes, and and then thinking a little bit about the managing digital identity, do you think that's something that currently competent at or is it something where we just can't we we don't really touch on that so much?

GPN Curriculum designer 1

I don't think we really touch on that other than the kind of we we touch on online safety. And I think there are especially for the younger, you know, foundation level and and kind of younger students, we definitely do. But I don't think there's much. There's no focus on that in kind of PMP courses or anything like that.

Paul Robertson

Yeah, I said. I suppose we've also got kind of that extra barrier that we we don't have any contacts with their social media or any contact with their digital identity. So, in a sense, it's actually cut off on purpose.

GPN Curriculum designer 1

Yeah, we're yeah, exactly. And we're, we're not, we're not allowed to have any contact with them digitally. So, it in in a any kind of social media platform or or WhatsApp or anything so.

And yeah, we essentially wouldn't know and possibly wouldn't be appropriate if we started showing that we had looked at it yet.

Paul Robertson

OK. Interesting. Oh, great. And then thinking a little bit about digital content creation. Um, yeah, do you think this is relevant, do you think they're competent at this?

GPN Curriculum designer 1

I mean the only kind of things that they have to create, obviously are written texts and you know kind of presentations and potentially recording themselves, but unless they're studying one of the kind of arts pathways where they may need to actually produce new work in a particular medium. It's not something that we would, it's not something that we cover cause it's not applicable to all students and it's that's a particular skill that is is not particularly generic, so it's not something we would cover.

So, I don't. Yeah, I mean. Yeah, I mean we we do the, I'd say the basics. You know you have but not not anything that's actually creation of materials. We don't you know we're not unless they're doing computing and they're programming and things we wouldn't cover that.

Paul Robertson

No, no, I think that's, that's fair. I think I think you're right in some points about the the texts and the digital documents and like also digital, PowerPoint as well as also being a an element of digital content creation. But I think there's a lot of other things we don't really look at.

GPN Curriculum designer 1

Probably we do the the very low level. I mean we don't even, I mean we do from a kind of the learner designer perspective the the copyright and the things that we produce that's been important, but not not so much for students. We're coming. I don't think there's because that whole thing comes more under kind of plagiarism and and academic good practice and things about citation and stuff. It's not, you know, they're not using it enough to be breaching any copyright law, you know we're in big trouble if they are you know breaching copyright licence.

Paul Robertson

OK, interesting. So then from what you're saying, really the academic English Skills course isn't very much designed to address this particular area. But then it might not be particularly appropriate because it's it's not transversal or is it were. It's not cutting across for all students. Yeah. OK. And then like can be thinking about those individual competencies, developing digital content integrating and real elaborating copyright and licenses and programming. So, apart from developing digital content or any of the other ones particularly relevant or yeah, how do you competent do you think are students are of these things?

GPN Curriculum designer 1

No, I don't think. I don't think we really cover any of those explicitly. No, not don't really cover those.

Paul Robertson

And to do you think any of those are particularly relevant, don't sorry. And and that our students are particularly competent with any of those or not competent.

GPN Curriculum designer 1

I don't. No, I don't think we'd really know. And I mean, there may well be, but not that not. That would become apparent during our programme.

Paul Robertson

OK. So, we wouldn't really see that. OK. And then we've we've talked a little bit about safety already, yeah, how relevant do you think that is for our students and how competent do you think they are?

GPN Curriculum designer 1

So, thinking it's it's definite, it's relevant. Potentially, not just for studies, though. I mean, I think it's relevant because, particularly international students, if they are in a different country rather than studying from home, they are potentially at risk. So, there is quite a lot of emphasis, not necessarily through AES, but through the the centre and and and departments and processes that are put in place to support students, so around kind of keeping devices safe and making sure you're not, you know you're managing your screen time and things like that. Those sort of things are a part of the kind of more pastoral sort of side of things. It's not something that's explicit, although, you know there are a number of the texts that we that we use on cover things, topics like the impact of technology on the environment and health and well-being and the use of technology and the impact of technology on sleep and work and those kind of things. So those sort of topics are covered quite a lot. So, but it's. Yeah, they are covered, but in a kind of in that they're covered in the texts that we incorporate in the course.

Paul Robertson

Yes. So that covered kind of is it content, but not as a learning objective as it were.

GPN Curriculum designer 1

Yeah.

Paul Robertson

Yeah. OK. And so, from what you're saying, this area isn't really directly addressed by AES, but is within the programme as a whole, OK.

GPN Curriculum designer 1

Yeah.

Paul Robertson

And then those individual competencies, protecting devices, personal data and privacy, health and well-being environment, I think we're any of those particularly relevant or not relevant.

GPN Curriculum designer 1

Uh, not really. Didn't look particularly relevant for for AES, no.

Paul Robertson

Yeah. And do you think our students are competent in the this area of safety?

GPN Curriculum designer 1

I think I mean not that I would have particularly, you know, great first-hand knowledge because I work from home most of the time and I see students coming in and saying they've lost their phone or or whatever. But I think so I mean because partly because they've grown up with it. They know how to make; you know they don't walk around and leaving it on tables and put you know. Yeah, they probably they probably are and also things like protecting, I mean protecting devices, as in not losing them and protecting devices, as in not opening, you know, virus emails and things are quite different, but I think they're probably quite a lot more savvy than older people are because the it's been they've been around it for so long that it you know it, they are more competent because they they even if you don't have to, you know if if you've got a phone, then whichever, all of them have. You know it's it's something to be a, to be aware of.

Paul Robertson

They just kind of know because they've gotten used to it over the course of their lifetimes. OK, cool. And then thinking about problem solving. How, how, do you think is this relevant for our students' studies? Are they competent with this area?

GPN Curriculum designer 1

It's important and I don't think they're competent. Many of them, and I think this has been a big this has been a big area in a big challenge for us with particularly the digital assessment where students are very reluctant to try and solve a problem themselves and would much rather somebody else just just did it for them.

Erm so I think I think that's really. Yeah, I think that's that's difficult.

Paul Robertson

OK. That's interesting.

GPN Curriculum designer 1

I mean, I think yeah, it's it's very difficult because it's some we we we have lots and lots of guidance and there are ways in which we support students and encourage them to try and solve their own technical problems, but they seem very reluctant to actually do that themselves, and I don't think it's confidence, I think. Yeah, they they just would, you know?

Yeah, I'm not quite sure, what, why they don't. I'm sure some of them do. And I'm sure if you spoke to ***GPN Assessment expert***, she would say some of them, you know, she can e-mail and say, have you tried doing this and they will get on and try it. But others will come back and say I don't know what you mean. I can't. And it's straight into panic mode without just going right. Well just look at how how would you deal with this normally. It's, I think potentially around the area of kind of digital assessment, it becomes, where it's high stakes. That there's a lot of anxiety around it and assumption that things are going to go wrong when off, you know, 90% of the time they don't, but they you know also possibly looking for a way to say that they need another opportunity or it wasn't their fault or the, you know, it's it's a, you know, it's an, it's an excuse which they would have done..

Paul Robertson

Yes, definitely.

GPN Curriculum designer 1

Previously by saying the room was too noisy or I was distracted, or I couldn't hear it. So, it's a kind of it's just replaced old.

Paul Robertson

A different get out.

GPN Curriculum designer 1

Old really old excuses for new excuses, yeah.

Paul Robertson

It's interesting what you're saying about the autonomy, because like when you look at the framework, like being able to do something yourself is kind of where you're seeing it. OK, you're you're moving beyond the foundation. We're coming more intermediate and more advanced. And so maybe that's stuck there in terms of their development in problem solving.

GPN Curriculum designer 1

Yeah, I do wonder. I don't. I mean, again, I think it is a, it's particularly a a an issue with with some of our cohort who are generally from backgrounds where they they they don't really expect to have to do things themselves.

So, I think you know they've they're in, in, in, in, in an education context, they've they've had a background where they're told what's going to be in the exam, what you need to do, what time you need to be there, what you need to read, you know everything. So, there's that. But then they also come from a particular class of society, their society where they don't really do, they don't really fix things. So, I do sometimes, not all, but you know, you do come across students who do seem to think that your purpose is to be there to do this for them. And why would they sort it out

themselves? Because that's what they're paying for is for you to do it. And it's quite it's quite challenging, like. Well, can you just like? No.

Paul Robertson

No, no, no. You need to learn how to do that.

GPN Curriculum designer 1

You can do that. Yeah. You need to learn to do it, yeah.

Paul Robertson

Interesting. And then so from what you're saying, the AES course doesn't so much really develop these skills or isn't designed to develop these skills?

GPN Curriculum designer 1

It's it's not. No, I mean there are, There's, there's a lot of support about how to sort, how to solve technical problems. So, we do have that. It's not part of the course. It's kind of added on, but, but no, we don't really cover other things like identifying digital competence. Now we don't do that.

Paul Robertson

That's right. And then so those four, kind of, sub-competencies, solving technical problems, identifying needs creating and using digital technology or creatively using digital technology and identifying gaps. Are any of them particularly like relevant or particularly where students are particularly struggling or particularly competent?

GPN Curriculum designer 1

And so, I mean, we do, there is some focus on the creatively using digital technologies where we've got resources on kind of good learner like learner training and becoming an autonomous learner and how to use things like Quizlet or Padlet or whatever to make your own notes and to collaborate. And so, we do focus on that and how to kind of have good ways of learning and reviewing your work and things. But yeah, so generally we do focus on that, and I think some students have got really good ways of kind of organizing their notes and bookmarking things and and that kind of thing. But definitely the the solving technical problems or solving their own problems, I don't think the student. I don't think students, especially foundation students, are very good.

Paul Robertson

Now and then we like. So, we kind of think discussed the whole framework in quite a lot of depth. I think I was wondering are you were you familiar with any digital competency or digital literacy frameworks before hand?

GPN Curriculum designer 1

I had seen something that had come up on a project that a **GPN Senior Manager** was looking at that was about digital literacy skills, but I don't think it was organized in anywhere near. It wasn't as organized as this. It was more a thing for kind of school level child kids about, it was very much about how to how to perform particular functions on technology, which was not really appropriate, not really getting to what we wanted to to do.

And I know we've we've been looking quite a lot at how to how to assess students' digital literacy at the start of a course, but the problem that obviously having is a lot of these things are kind of online and you're like, well, if they if they have no digital literacy, they really can't even do any of this. So isn't the test that if you can effectively log in and do it, then you're all right. But if you don't know how, but. So no, I hadn't come across anything that was, that formally set set out skills between particular areas I thought. Yeah. So that's that's very useful.

Paul Robertson

Interesting. And so, when thinking about reflecting on the framework, do you think reflecting on that will affect the way that you design or deliver or like design the AES course or similar courses in the future?

GPN Curriculum designer 1

I think, yeah, I mean when we so when we first obviously it was very much a kind of shift from kind of what we've got to online. And then we've we have re-structured it.

And and I think in any kind of an in further revisions, yes, then definitely we will, we will. And I think it would be useful like we do with the kind of employability skills stuff we're trying to kind of flag, this is helping you develop this particular skill, and this is transferable. I think we will try to build more of that into a yes in when it's a kind of, you know on the platform, obviously not when it's just delivered face to face, and highlight the the importance and the usefulness of being able to edit your work electronically, use kind of the turn-it-in software properly. How to, you know all of those things? We will try and signpost why that's important across the board cuz often it's, like anything it is, it's sometimes thought of by students as being very much an isolated or this is a thing I have to do for English. I have to use this.

Paul Robertson

Yeah. Yeah, yeah, yeah. And then often actually. Yeah.

GPN Curriculum designer 1

But they don't see that actually it is getting you to to use platforms and to do other things which which is important.

Paul Robertson

OK, great. And do you think the AES course could develop any of the areas of digital competence more? Or would it? Would it be appropriate for any of the areas in particular?

GPN Curriculum designer 1

Just looking back through it, I mean, I think the with there are things that we, I mean the key thing really is the evaluating data and digital content.

Paul Robertson

Yeah. OK.

GPN Curriculum designer 1

And we do focus on that quite heavily.

Paul Robertson

Yes.

GPN Curriculum designer 1

And possibly the collaborating through digital technologies, I think we would like to maybe do that more formally.

Paul Robertson

OK.

GPN Curriculum designer 1

Because they can engage in kind of the forums, and they have changed the format of the forums. So, it's more in a format that students are kind of familiar with, like the WeChat type thing. But I think we, you know, we we could try and embed that more because I think that is something that's going to carry on throughout their further studies.

Paul Robertson

OK. So, then it's not different areas, but just more depth to the areas which are currently covered. OK, cool. And then final question, would you have any other further comments or suggestions, or anything related to digital competencies?

GPN Curriculum designer 1

No, I mean the only thing I think that is important is obviously this is as as you know we've noted, and you've mentioned before, this is very much written kind of from a European person's perspective. And I think things like the citizenship thing, and it is not necessarily appropriate for for an international context, and things like netiquette as well, yeah obviously varies dependent on you know where you're from and how you communicate. So, some of these things, possibly the there seems pretty less of a focus on global perspectives here.

Paul Robertson

Yeah.

GPN Curriculum designer 1

Which I think is slightly lacking about awareness of where information's come from and how. Because when you've got things like evaluating, you know, as you know when when you do the initial stuff about, you know, where's the website from and they kind of go .gov. Oh, well, then it's definitely true, you know, and you can, like. No, it isn't. You know. It's yeah. So, there's a bit more there that we could be done around international perspectives and and and how how competencies are different and which technologies are most prevalent in particular areas like we were saying about Asian subcontinent they they're very familiar with mobile technologies but not, not things like uh, actually typing and things which to us are very basic, but it's not to them. So, yeah, things like really basic stuff isn't covered here. Things like, you know, being able to to use devices isn't isn't really covered. It's assumed that you can.

Paul Robertson

Yeah. Interesting. Yeah. No, it's kind of lacking that, like, foundational level almost.

GPN Curriculum designer 1

Yeah, like right at the very basic is just actual, you know.

Paul Robertson

Yeah, kind of the access there.

GPN Curriculum designer 1

Actually, using and executing tasks on devices. This is kind of more, it's it's a broader kind of technology stroke sort of digital perspective, which is definitely valid, but of course. Yeah. Anyone who's older.

Paul Robertson

Yes.

GPN Curriculum designer 1

Or, you know, older or from a different background.

Paul Robertson

Hmm.

GPN Curriculum designer 1

Doesn't, you know, don't, can't necessarily just type at the same same rate that they can write and.

Paul Robertson

Yeah. No, absolutely no.

GPN Curriculum designer 1

Things like that, you know, it's.

Paul Robertson

And that was it was an interesting comment I was reading where someone was saying uh yeah, as soon as the kids go to school, I can't turn on the laptop anymore.

Paul Robertson

Well, that was like.

Paul Robertson

Yeah.

GPN Curriculum designer 1

Yeah. Well, I mean, it used to be the joke, didn't it, that people couldn't work out remote controls and couldn't you know, that kind of thing so.

Paul Robertson

And yeah, that was ten years ago, but I think there is still an element of that. But no, that's quite interesting. So, it's it's interesting that you've got that kind of critique of the framework that's lacking that kind of foundational level almost, which is so key.

GPN Curriculum designer 1

Yeah.

Paul Robertson

Yeah, OK. Interesting. Excellent. Thank you very much. It's been really nice talking to you.

GPN Curriculum Designer 2 (CD2)

Paul Robertson

Thank you very much for volunteering to do an interview with me about your perceptions of digital competencies for English Medium, International Foundation year students. Before we start, I'd like to confirm your responses to the statements from the consent form that I emailed to you before the interview.

GPN Curriculum designer 2

Umm.

Paul Robertson

So yeah, I'll just read out kind of the statements and if you could say agree or disagree to each of those. So, I confirm that I have read and understood the participant information sheet date of 7th of February 2023 for the above study and have had the opportunity to consider the information, ask questions and had any questions answered satisfactorily. Do you agree?

GPN Curriculum designer 2

Agreed.

Paul Robertson

Excellent. Thank you. And I understand that my participation is voluntary, and I am free and willing to, uh, withdraw at any time without giving any reason without my rights being affected. In addition, should I not wish to answer any particular question or questions, I'm free to do so. Agree

GPN Curriculum designer 2

Agreed.

Paul Robertson

...or disagree. Yeah. And I understand that under the Data Protection Act, I can at any time ask for access to information I provide. And I can also request the destruction of that information if I wish, agreed on this.

GPN Curriculum designer 2

Agreed.

Paul Robertson

Yeah. And finally, I agreed to take part in the above study.

GPN Curriculum designer 2

Agreed.

Paul Robertson

Great. Thank you.

GPN Curriculum designer 2

Umm.

Paul Robertson

Yeah, it feels like like since GDPR feels like these kind of things are a lot longer.

GPN Curriculum designer 2

Yeah, they they definitely are.

Paul Robertson

Yeah, excellent. Great. So now we'll move on to discuss your perceptions of digital competencies. So first, a little bit about background and what does the term digital competencies mean to you?

GPN Curriculum designer 2

Umm. For me digital competency means the ability to use all sorts of digital tools, and that would include both software and hardware, to perform actions with it that are required of me in a different settings, so whether it is a learning, whether it is professional setting, or whether it is everyday tasks that living in the digitalized world we need to perform on a daily basis.

Paul Robertson

Yeah. Yeah. So, a kind of, did you have a chance to have a look at the did you comp framework?

GPN Curriculum designer 2

I did, yeah, I did the test. It was quite, it was quite interesting. Ah.

Paul Robertson

Yeah, it is quite interesting. Were the results what you expected?

GPN Curriculum designer 2

Uh, it did, although I was slightly disappointed that getting only a 5 out of six in one of the uh in one of the bits, but it's, uh, but looking at it because I also have to say and looked at it from the point of view. Oh, can we use it with our students?

It got into bits that perhaps I found slightly more advanced or more technical than I had expected, such as for example encryption or of file formats.

Paul Robertson

Yeah, but my my I'm not sure, but my suspicion is that it might be reactive to questions that you've given before.

GPN Curriculum designer 2

Oh, is it adaptive? OK, interesting.

Paul Robertson

So, I I'm not sure. So, you could test it out.

GPN Curriculum designer 2

I will.

Paul Robertson

...as doing like, oh, I'm a terrible student and see if that gives different questions.

GPN Curriculum designer 2

Umm.

Paul Robertson

When I did it, there were certain things where I looked at and I was just like actually, that is like I've never heard of that software.

GPN Curriculum designer 2

Umm.

Paul Robertson

Uh. I just always just kind of guessing sometimes.

GPN Curriculum designer 2

Yeah.

Paul Robertson

So, I think it has limitations, as any only tech tool does.

GPN Curriculum designer 2

Hmm.

Paul Robertson

But I thought it was quite interesting. OK, cool. But yeah, cause your definition kind of very closely hit a lot of the points in the DigComp Framework. So, thinking about our students, do you think our students have an accurate assessment of their own digital competence?

GPN Curriculum designer 2

No, I think short answer is no. I think in a lot of cases and this is, this is a generalization, but I think quite a well founded generalization, particularly when we're using looking at foundation year students because we have a lower percentage of mature learners within that group, whereas on Pre-Masters Programmes there are higher percentage of those students, there is a sense of slightly inflated perception of the digital capabilities and competencies within within that group.

Paul Robertson

OK. And why? Why do you think they have that inflated sense of ability?

GPN Curriculum designer 2

I think that I think perhaps me saying inflated it does an give an an unnecessarily incorrect or negative perception of it because. Perhaps inflated is not the right word. It's very one sided or perhaps skewed perception of digital capabilities...

Paul Robertson

Yeah, yeah.

GPN Curriculum designer 2

...because I would say a lot of our students have quite good working knowledge of content creation software and mobile technologies, whereas the, and, and I'm looking for the right word that the practical aspects of digital competencies.

Paul Robertson

Yeah.

GPN Curriculum designer 2

This is what suffers in their kind of development, so the whole idea of them being digital natives.

Paul Robertson

Yes.

GPN Curriculum designer 2

It just it's like the almost live in a different digital country...

Paul Robertson

Umm.

GPN Curriculum designer 2

...than what will be expected of them as they grow and as they enter the world of work.

Paul Robertson

Yes. Yeah.

GPN Curriculum designer 2

So, it's perhaps not an inflated, erm, sense of competency. It's perhaps a narrow...

Paul Robertson

Umm.

GPN Curriculum designer 2

...but high level of competency, if that makes sense.

Paul Robertson

Yes. No, certain things are very competent at, but maybe not all, all things or not, things which are particularly relevant to them. OK, interesting. Yeah. And I don't think they're aware of that other side that they that they're perhaps where their competency is lower.

Paul Robertson

Umm.

GPN Curriculum designer 2

So that's why they they I think they think that that more competent they than they are because they're not aware of the whole other sphere of competency.

Paul Robertson

Yeah. So, they they have an idea that the things they have, informal competency...

GPN Curriculum designer 2

Yeah.

Paul Robertson

...transfers to formal.

GPN Curriculum designer 2

Yeah.

Paul Robertson

OK. Interesting and, erm, so far, what have your been, what have been your experiences with students' use of technology for educational purposes?

GPN Curriculum designer 2

It has been again. It depends how that's, you know, what kind of technology we're talking about and how this technology is being used when we're looking at technology that tutor uses in the classroom and that requires students to engage in through technology as well. That is aimed by design to increase engagement and motivation. I'm talking here, for example, about things such as any form of gamified learning and things such as student.

The response systems my experience has always been a very positive with students after the initial, perhaps confusion, what do I click? Where do I go?

Paul Robertson

Yeah.

GPN Curriculum designer 2

Has been very positive and to the point where students would be requesting the use the most frequent use of that technology.

Paul Robertson

Umm.

GPN Curriculum designer 2

On the other hand, however, when we're looking about the more boring side of technology, such as the use of certain platforms and, erm, and, and plug-in so to give an example, things such as *the exam proctoring platform...*

Paul Robertson

Yeah.

GPN Curriculum designer 2

...but also, things such as VLEs, Moodle, and things that're theoretically as simple as turn it in.

Paul Robertson

Yes.

GPN Curriculum designer 2

This very often causes problems and, uh, sort of almost a feral reaction. I don't want to.

And so yeah, that would be that, I would say this, it does tend to, they tend to get more competent in using that, but their attitude towards it very often doesn't change to be significantly more positive than at the beginning.

Paul Robertson

Yeah.

GPN Curriculum designer 2

Than at the point when it is introduced.

Paul Robertson

OK, so so technology or tools where there's a significant barrier or is something which is intimidating for whatever reason then that kind of almost raises the effective filter and almost kind of?

GPN Curriculum designer 2

Yeah. And also, I think where where they potentially see that, that platform, that technology doesn't, offers some sort of negative, that could potentially have negative effect on their on their outcomes. So, to give an example of turn it in, they know that using it might have an effect on their mark and there's also this fear of not understanding the technology and thinking that unintentionally, it will detect plagiarism that had never been there, and therefore they will fail. It's almost the sort of, was it, was it called slippery slope thinking in terms of technology that?

Paul Robertson

Yeah.

GPN Curriculum designer 2

It might have some effect. Yeah.

Paul Robertson

OK, so they maybe don't have like a good conceptualization of this kind of technology. OK, interesting. And then do you think that that when they arrived, do you think that they're effectively able to use technology to study?

GPN Curriculum designer 2

Very much depends on on our students, so more and more we are obviously at dealing with the GRS students, of course *** the graduate route to success.

Paul Robertson

Yeah.

GPN Curriculum designer 2

Where they also come from a less privileged backgrounds again. Our context is quite difficult...

Paul Robertson

Yes.

GPN Curriculum designer 2

...because historically we have dealt primarily with students from very privileged, financially privileged and backgrounds where they had been exposed to technology, erm, from an early age, whereas now we have this larger proportion of students who come from less privileged backgrounds and who perhaps did not have access to technology and within their education system prior to joining us, technology wasn't asking utilized. So, it's, it really does depend I think majority still are capable of using it, but we are now witnessing some cohorts where this is not a given.

Paul Robertson

Yeah. So, there's a degree of digital divide...

GPN Curriculum designer 2

Definitely.

Paul Robertson

...and it to do with like geographical location.

GPN Curriculum designer 2

Absolutely.

Paul Robertson

But I mean there's also maybe some others. OK, cool. Excellent, erm, great. I'd like us to move on and think a little bit more closely about the DigComp Framework and discuss your thoughts and perceptions about each of the areas. So, there's five areas. The first one is information and data literacy.

GPN Curriculum designer 2

Umm

Paul Robertson

Uh, how relevant do you think that is for our students? And do you think they're competent with this?

GPN Curriculum designer 2

I don't. Uh. So, I think it is relevant because one of our jobs is obviously prepares students for the further stages of their education and for work and obviously data literacy and information literacy is an massively important part of it. Even talking at the beginning and the GDPR kind of thing, it's very important, but it's also hugely relevant to their security, and particularly we're talking about the vulnerable adults. So, under 18 under 18, yes.

Paul Robertson

Umm.

GPN Curriculum designer 2

So, I think that's very relevant. I don't necessarily think that they are, that they're very competent in that and that they understand how their data and information that they put online is processed. I think media is doing better job these days at publicizing the dangers of, of that of uh, sharing data and information, but I still think there's a massive gap in understanding.

Paul Robertson

I think I'm, I'm wondering is that maybe something which is more to do actually with the safety element...

GPN Curriculum designer 2

Yeah, it is.

Paul Robertson

...actually, because that's about like privacy...

GPN Curriculum designer 2

Yeah.

Paul Robertson

...and their data...

GPN Curriculum designer 2

Yeah.

Paul Robertson

...and I think that the information and data literacy is more about them browsing, evaluating and managing data. So, like looking at information themselves and evaluating.

GPN Curriculum designer 2

Yeah. No, absolutely. I mean, obviously, we're trying to tackle that. I don't we we've evaluating the information, but erm, just from the experience of teaching students how to evaluate information, my perception of their. Understanding of it is that it's quite weak that all familiar with the idea of fake news.

Paul Robertson

Yes.

GPN Curriculum designer 2

But when it comes to identifying it, it's not very competent.

Paul Robertson

That they're familiar but aren't able to do it themselves.

GPN Curriculum designer 2

Yeah.

Paul Robertson

OK. And do you feel like the academic English Skills course addresses this area of information and data literacy?

GPN Curriculum designer 2

It does. Obviously, we're focusing very much on academic texts and our students. I feel, erm I have trouble extrapolating, uh what we teach them in our academic courses, and that includes AES to everyday life. And I don't always feel that they they they know how then to use what we teach them in AES to assessing information that they find in the free time on on the web.

Uh, but as myself and I must make a lot of other tutors as well make it very clear point of that when they teach that particular particular skill, or at least I hope they do.

Paul Robertson

Yeah, I think so. But yeah, I think it is a bit of a divide, a bit of a like lack of bridging between the home and the work and study. OK, interesting and thinking about those specific competencies, browsing, searching, filtering data and information and digital content, evaluating data information and digital content, and managing data and information and digital content, do you think any of those competencies are particularly relevant for us students, or not relevant?

GPN Curriculum designer 2

I think they are at the they. They definitely are. I'm just. I'm just trying to sort of perhaps if I could ask you a question, when you say when you're asking where they are relevant for our students, are you asking in terms of their academic development or?

Paul Robertson

Primarily academic development, I think.

GPN Curriculum designer 2

Then yes, I mean the the simple idea of browsing and locating information is very important. Essentially, this is something that they will be required when conducting research, and because of certain limitations, particularly in contexts such as **WEFC** and other centres, where they don't when they're not necessarily centre based and don't have access to libraries and library assistance, they are very much relying on Internet searches.

Paul Robertson

Yeah, definitely. And erm, do you think any of those three areas that browsing, evaluating and managing, do you think they're particularly competent or not competent in any of those areas? Yeah.

GPN Curriculum designer 2

I think particularly incompetent would be evaluation and this is completely understandable. It is a higher order thinking skills and our international foundation year students are 17, 18, so it's harsh to saying that they're incompetent, but it's not necessarily for the lack of trying, it's just they need

guidance and maturity. I think they're getting better with browsing, and this is partially due to what we are doing, but partially because more and more and more, there's more and more resources available for them outside of the of us of the of the educational settings that show them how to browse.

Paul Robertson

Yeah. OK, so there's informal information about that...

GPN Curriculum designer 2

Yeah.

Paul Robertson

...as well that they have access to

GPN Curriculum designer 2

Yeah.

Paul Robertson

Ok, interesting. OK, cool. And then thinking about collaboration and communication, so that is the kind of yeah, areas are interaction through digital technology, sharing information and content engaging in citizenship, collaborating netiquette and managing digital identity. And that overall area, how relevant and competent, do you think that is for students?

GPN Curriculum designer 2

Relevant very because again we as, the academic, umm, community, we're at a very much moving, not moving. I think that that again is a misconception. We have always been very much digital based because of the international context of knowledge sharing and higher education. Erm, but so, and obviously, students entering that world as they enter university education, they're going to be, they will need to be able to do that obviously, again, both within the context of higher education and for employability, so that they're on, they will be required to share information and collaborate with people who might be distant geographically distant, and therefor relying on technology so very relevant.

In terms of competence, it's quite difficult to say because I think again, it does differ quite significantly, and I can also see a massive shift from when I start the teaching.

Paul Robertson

Yes.

GPN Curriculum designer 2

Umm my, you know, in in 2010 to now where the idea of netiquette, was not as, was not as, prevalent that the the idea of of, of sort of communicating, of the specific rules of communication within the digital world and the difference between that and the physical world were not as familiar to many of the students. I feel this is now becoming more and more familiar, and I feel where that our areas of lack of competency or lower competency, it doesn't necessarily stem from, uh, not understanding netiquette, but again stem from the lack of maturity of our students...

Paul Robertson

Yeah.

GPN Curriculum designer 2

...where they haven't been exposed to, um, communicating with, uh, other cultures, and with people who are perhaps in a positions of authority, they're very competent in using netiquette when discussed when communicating with their peers but not necessarily with uh others.

Paul Robertson

So, they're kind of they're not pragmatically competent in that way.

GPN Curriculum designer 2

Yeah.

Paul Robertson

OK, interesting. And to what extent do you feel that the academic English Skills course has been designed to address communication and collaboration?

GPN Curriculum designer 2

Digital communication and collaboration.

Paul Robertson

Yes, yes.

GPN Curriculum designer 2

Ah, it's it's a very good question because, er, we're definitely, when designing the course, we're talking about the particularly about the digital aspect of the course and the idea of collaboration and communication has been very much at the forefront of design as we had, umm, used the the community of inquiry framework for online learning design as the guidance as the guidance for designing the course. So, definitely it has been done. However, the communication collaboration was very much peer based...

Paul Robertson

Yeah.

GPN Curriculum designer 2

...and it was that the principles were again based on ensuring that there is an element of interactivity and communication and language immersion that might be missing in normal asynchronous courses, what I feel it is missing and this is an area for further development. Is teaching the parts that I had mentioned what we're talking about the the sort of, two term, er, student.

Paul Robertson

Yeah.

GPN Curriculum designer 2

Or erm, communication the appropriate level of it. I don't think it necessarily lies with the AES. Well, no, it lies with with study skills.

Paul Robertson

Yeah.

GPN Curriculum designer 2

So, it should be there, but I think it needs to be developed better to a degree where kind of looking at it when we're talking about the academic style, which is transferable to communication with others, but I feel that definitely it should be a greater opportunity to for practice.

Paul Robertson

Yeah, definitely. OK. Excellent. And thinking about those individual competencies, would it help if I projected the...

GPN Curriculum designer 2

Yes, please.

Paul Robertson

...like the questions just because with this, the other one, it's only four, but this one is 6. And so, it's quite a lot to try and remember in one go. So yeah, thinking about these individual competencies interacting through digital technologies, sharing information and content through digital technologies, engaging in citizenship, collaborating netiquette and managing digital identity. Do you think any of those competencies are particularly relevant for our students or not and why?

GPN Curriculum designer 2

Umm.

Paul Robertson

Yes.

GPN Curriculum designer 2

Err, I would definitely say that uh, collaborating through digital technologies is very relevant also on a very pragmatic level when they need to complete group tasks. Um, and, um I'll probably say that this is the most relevant.

In terms of sort of lower relevance, depending on the interpretation of competency of the 6th, of the 6th competency, managing digital identity and whether we are now going here again about the safety and, um, and associated um, um, points, um. This probably would be less of a of relevant, um, competency if we disengage it from...

Paul Robertson

Yes.

GPN Curriculum designer 2

...maintaining privacy and safety.

Paul Robertson

So, I I think with all these competencies they they overlap...

GPN Curriculum designer 2

Umm.

Paul Robertson

... and certainly, with the safety and the problem solving they overlap more because...

GPN Curriculum designer 2

Yeah.

Paul Robertson

...they're seen as transversal that they kind of crept across things. But I so I think that there is an element of that with the managing the digital identity, but I think that's more about the identity that you project into the digital world. So, for example your LinkedIn profile and your Facebook profile and all the tick tocks you've made.

GPN Curriculum designer 2

Yes, that's the personal branding, yeah.

Paul Robertson

Excellent. Cool. Do you think our students are particularly competent in any of those competencies? And why or why not?

GPN Curriculum designer 2

Uh, so I feel that they are quite competent in sharing information and content for digital technologies. It might be done in an informal context.

Paul Robertson

Yes.

GPN Curriculum designer 2

Every single student I had ever met are very aware of how to text how to use communication apps. The way they do it, so netiquette not always a great, but they definitely find ways of sharing content and I think they're quite good at it...

Paul Robertson

Yes.

GPN Curriculum designer 2

...sometimes better than we are.

Paul Robertson

Yeah. And are there any that particularly not competent at? Yes Yes.

GPN Curriculum designer 2

Well, I think engaging in citizenship through digital technologies, I would say it's very, very low on the list and that would be kind of almost it ends almost sort of limited to students from particular

backgrounds. So those students who come from almost diplomatic families or the highly engaged, socially engaged families. But for most of them even not through digital technologies. So, this is obviously framed in terms of digitalism, but generally engaging in citizenship 17, 18 year olds.

Paul Robertson

Yes. No, no.

GPN Curriculum designer 2

Not very high on the competitive space.

Paul Robertson

Apart from, erm, going on protests to skip school, I I don't think I was engaged in citizenship as a 17-year-old either.

GPN Curriculum designer 2

Yes.

Paul Robertson

Oh, OK. Interesting and thinking about digital content creation. So that's developing digital content integrating and re elaborating digital content. So, like remixing things, copyright and licenses and programming that whole area, do you think how relevant do you think that area is for our students studies?

GPN Curriculum designer 2

Again, I would say massively, massively, massively. I feel particularly for students in humanities, but not only, I think STEM also, but also thinking about the current world of work, and if we're thinking of, you know, higher education, being linked to employability. I think this is massively relevant, being able to create portfolios, being able to create uh, tangible visualization or, uh, interpretation of the of their work? Very relevant.

In terms, in terms of competency, it's of how competent they are. It is so it is difficult to quantify, isn't it...

Paul Robertson

Yeah.

GPN Curriculum designer 2

...because there are aspects of it that I feel a lot of the students are quite competent. Give them if you ask them to, for example, create a video. And I think video content creation is in particular is the area that students are quite competent in.

Paul Robertson

Really.

GPN Curriculum designer 2

Lovely way of. I mean, if if you ask them to create something on flip grid, if you ask them to create a TikTok video, they will very often come up with something really nice and creative. But the

traditional content creation tools, complication sounds slightly bad, such as you know, PowerPoint not as competent as you would think...

Paul Robertson

Yeah.

GPN Curriculum designer 2

...where it also, I think the competency is really low is also in copyright...

Paul Robertson

Yes.

GPN Curriculum designer 2

...and that the understanding of copyright is very, very poor. However, let's be honest, even among teachers that requires some improvement.

Paul Robertson

Yeah, very much so. And I wonder how much is well, the the international student audience that we have maybe also enhances that further erm...

GPN Curriculum designer 2

Absolutely.

Paul Robertson

...concepts of copyright are not universal.

GPN Curriculum designer 2

Yeah.

Paul Robertson

So yeah, that's definitely an area, and how, to what extent do you feel the AES course has been designed to address this area?

GPN Curriculum designer 2

Almost not at all. Umm. No. I don't think and again if we if we had more space and time and freedom, let's be honest, there will be many opportunities for that where we could even encourage alternative formats of of assessments in terms of videos etcetera. We know that this what that there are many restrictions on that partially due to our accreditation partially due to, um *** the classroom and partially due to skills, competencies of tutors as well.

Paul Robertson

Yes.

GPN Curriculum designer 2

Umm, but I also find it quite difficult to think how in terms of, for example, copyright issues, how it could easily be embedded within that and so no. In answer the question, I don't think it's been designed to address that at all, which is a shame.

Paul Robertson

Yes. No. Yeah, I think this is questions about how much could be addressed.

GPN Curriculum designer 2

Umm.

Paul Robertson

As you say, in terms of your amount of content and where it could be addressed in different parts of the curriculum. But I think also you know, I I don't think this was ever intended as every every person has every single thing.

GPN Curriculum designer 2

Oh, no

Paul Robertson

So, I think that is, yeah, yeah. But it's interesting to think about the course.

GPN Curriculum designer 2

Hmm.

Paul Robertson

Thinking about the individual competency, so developing digital content, integrating re-elaborating, copyright and licenses programming. Erm, yeah, do you think any of those are particularly relevant or not? I think you've already talked about developing digital content.

GPN Curriculum designer 2

Yeah, I mean, I suppose and in terms of the copyright, copyright and licenses, you could extend it and extrapolate it to, to and connect it to the the link to plagiarism and inappropriate academic impropriety that we teach already. So, in that way, it is also relevant and obviously because the students are going to be bound by those licenses. In particular when on a on the universe, on university campus and using university Wi-Fi, it is relevant. Not necessarily academically relevant, but life relevant, so to speak.

Paul Robertson

Yes.

GPN Curriculum designer 2

I think in terms of, you know, in terms of focusing more on about the academic development of our students, developing digital content is very relevant.

Paul Robertson

Yeah. OK.

GPN Curriculum designer 2

Cos that essentially, even within assessment in higher education, this is kind of the way we're going.

Paul Robertson

Umm yes.

GPN Curriculum designer 2

And so, I would say I would say this, yeah.

Paul Robertson

Interesting. And do you think they're particularly competent or particularly not competent in any of these areas?

GPN Curriculum designer 2

So partially, we already discussed this, I don't think they're competent at all in copyright and licenses.

Paul Robertson

Yes.

GPN Curriculum designer 2

Of of those four I would say, they're quite competent in the in developing some digital content, but it's not very high up the scale. But out of those four, I would say the first one.

Paul Robertson

OK, interesting. And then thinking about safety. So yeah, how relevant is that area for our students are protecting devices, protecting personal data and privacy, health and well-being and also protecting the environment, which is an interesting one to add in the digital kind of aspect, I think.

GPN Curriculum designer 2

Yeah, I yeah. Because that's yeah. It's very relevant. Whether for their studies, because I notice that there's students' studies, rather than pastoral.

Paul Robertson

Umm. Yes. For us and just in general, yeah.

GPN Curriculum designer 2

Erm, it is obviously very relevant, even if you're thinking about, ah, losing their work to viruses...

Paul Robertson

Yeah.

GPN Curriculum designer 2

...and and and stuff like that. So, I would say that is very relevant to their studies in terms of the competence. I think it's interesting. And again, it would vary widely because there are students that I had encountered who knowhow to protect themselves. They also even know how to spot phishing

emails and have you know the latest version of of antivirus programs, and they know those who don't even know what an antivirus program is. And once the free version on the laptop lapses, forget about that.

It's not particularly also helped by universities in some ways. It is and it isn't, because uh, depending on the institution. For example, one *UK university* and I know in many other universities within the UK, students get the free version of they're getting basically get a compliment complimentary, though they pay for their fees, software package, including including antivirus protection but if they don't know what it is and how it works and why it's important once they finish the studies, they let it lapse

Paul Robertson

Yeah.

GPN Curriculum designer 2

So, it's difficult to assess the competency here. I think it would be very much differ from one student to another.

Paul Robertson

Yeah.

GPN Curriculum designer 2

Erm, to what*** to uh. Not at all. Uh.

Paul Robertson

No, no, no, I think that's that's OK. Yeah, I think there's only a certain degree we can cover everything. And do you think there's any of those particular areas which are particularly relevant for our students or not? Or not relevant as well. Yeah, that's also interesting.

GPN Curriculum designer 2

In a, we're looking at a point ten, yes? Umm.

Paul Robertson

Yeah. Protect. Yeah, yeah, safety. Sorry. So protecting devices, personal data, health and well-being. And in protecting the environment. And again, yeah. For their studies, really.

GPN Curriculum designer 2

I think all of them. Uh. Potentially, um, difficult to say about number 4.

Paul Robertson

Yeah.

GPN Curriculum designer 2

But certainly 1, 2 and 3 are extremely important for their studies, even though we're talking about health and well-being. But we know that there is a very clear correlation between physical and mental health and well-being and and academic achievement. So extremely important, same with protecting devices and protecting the data and privacy as anything that endangers them physically

and endangers their files will also and they will also put their studies and academic results at at risk, the protecting the environment, I really find it difficult to make a clear connection apart from perhaps erm, not changing their devices too too often. Yet perhaps this is slightly less relevant to their studies.

Paul Robertson

Yes. No, anything. I think that maybe not so much.

GPN Curriculum designer 2

Yeah. Although we are introducing education for sustainable development. So that will kind of fall under that under that remit.

Paul Robertson

Yes, but I wouldn't imagine it would be the main thing that you would push with the sustainable development.

GPN Curriculum designer 2

Probably not.

Paul Robertson

Unless they're doing Bitcoin mining and huge er, factories or whatever. So I think, OK. And do you think there are any particularly competent or particularly not competent in any of these areas?

GPN Curriculum designer 2

Umm. I think there have been a lot of developments in software and hardware as well that make, that almost removed the need to be competence of things like protecting the device, the rollout of two step of of authentication that is almost it's you have to have it.

Paul Robertson

Yes.

GPN Curriculum designer 2

Erm, so they protect the devices without even thinking about the and saying because so many students use Google Play or Apple Pay and therefore they are forced to use, erm fingerprint or any other verification so again it's done almost automatically without them thinking about it. So it's a it's a, they are competent in this, but almost inadvertently so.

Paul Robertson

Yeah. OK, that's very interesting.

GPN Curriculum designer 2

In terms of what I possibly would say that they are less competent is protecting their health and well-being.

Paul Robertson

Yes.

GPN Curriculum designer 2

Particularly mental health and well-being, because even though there's a lot about it in the media and our personal tutors, uh, do a lot of very hard work to ensure that students are able to recognize cyberbullying and all that stuff. I think the young generation, uh, god, I'm sorry.

Paul Robertson

Yeah. Yeah. No, no, no, it's it's difficult ***

GPN Curriculum designer 2

At the ripe old age of 40.

Paul Robertson

Yeah, yeah, yeah.

GPN Curriculum designer 2

I think and perhaps it's because of their age, no matter how aware they are of the need to protect their health and needing to disengage when it starts affecting them, I don't think many of them are able to consciously make that step in time and just withdraw when needed. So I think that's where the competency which is linked to the level of maturity is quite a bit lower.

Paul Robertson

Yeah. No, it's interesting. Yeah, there are some frameworks which do actively kind of connect age as well to different levels. So I think that's another thing which to, really important thing to consider here, interesting, cool. And then yeah, final of the five areas, problem solving how, how relevant. So that solving technical problems, identifying needs and technical responses creatively using digital technologies and identifying digital competencies, competency gaps. How relevant is that overall area for our students studies.

GPN Curriculum designer 2

Massively.

Paul Robertson

Yeah.

GPN Curriculum designer 2

I mean, because technology is so deeply embedded in learning and I'm not just talking at the age of post-Covid, but it has always been being able to solve technical problems is of utmost importance both now in their degree studies and later on at work. I *** the same with identifying the needs and technological responses and competence gaps as you know, we always say how important it is for students to be independent learners and and reflective learners. So very, very, very relevant. And again, particularly the context of the broadly defined Western education, because we need to, remember that the cultural context of some of our students were problem solving wouldn't necessarily be as high up the hierarchy of, um, of needs of our students. Umm for many different reasons. So I think very, very relevant.

Potentially the creatively using digital technologies. This one, possibly less relevant, although that would very much depend on the pathway of the students, and I suppose using, maybe I can think of

the need everywhere because you know, historians using, but um, yeah, that would be at the bottom or as all the other ones are a bit at a bit higher. So yeah, very, very relevant.

Paul Robertson

OK. And how competent do you think our students are in problem solving?

GPN Curriculum designer 2

Umm. If you look at particular. So if you ask the **GPN assessment expert** about that I think you'll have a very specific response. I don't, ah, I think it's a competency they build throughout their studies. Let's put it this way. I'm joking about the **exam proctoring platform** here because that has been area where we where problems arise and students struggled the most with solving them. But even with the **VLE** and previously with Moodle, with turn it in, we always have, I've always had students that needed help solving those technical problems. However, what I found for majority of students and those who genuinely had technical problems rather than. I haven't done it on time and therefore I need to blame somebody...

Paul Robertson

Yeah.

GPN Curriculum designer 2

...problems, um, they develop that competency throughout the academic year. So when they would have finished with us, they would be much better equipped to solve those technical problems. So depends, and particularly obviously those technical solving those technical problems with software that they hadn't, that this new to them.

Paul Robertson

Hmm.

GPN Curriculum designer 2

This is where it needs development.

Paul Robertson

Yes.

GPN Curriculum designer 2

But in terms of things like issues with the computer or with e-mail.

Paul Robertson

Yes.

GPN Curriculum designer 2

It's the it's the digital divide we talked about, uh, initially. So majority of students are those coming from the more affluent backgrounds would be thoroughly competent in, whereas those from the, whereas GRS students might struggle with it quite quite a bit.

In terms of the identifying digital competencies gaps, it's again I think linked to age.

Paul Robertson

Yeah.

GPN Curriculum designer 2

In order to identify the gaps you need to, you need to realize what you need and what you don't have, and I feel it's a big ask very often of young students, so not they, they tend not to be very competent at the beginning.

Paul Robertson

But then it said something they developed with access and with exposure, erm.

GPN Curriculum designer 2

And I think that this is actually one area where not just in AES, but in all our programmes where our programmes in GPN are designed to help students with it and to develop those comp, those competencies. Umm.

Paul Robertson

Yeah.

GPN Curriculum designer 2

Umm, because we teach them actively, teach them problem solving in general and critical thinking with all of which contribute to being able to identify gaps in their own knowledge. Or at least we hope it would allow them to do so.

Paul Robertson

So would you say the AES course is explicitly designed to address that, or is it that the AES course addresses skills which are related to that in a sense?

GPN Curriculum designer 2

Uh, it's not designed, uh, with the digital uh problem solving in mind, but because.

Paul Robertson

No

GPN Curriculum designer 2

Critical thinking is embedded so deeply within our curriculum and we also kind of get the student that explicitly we ask students to, it was not ask, we showed the importance of being a reflective learner. It's the soft skill is the skills that can be extrapolated later on to digital world.

Paul Robertson

Yes.

GPN Curriculum designer 2

But as we said, students do struggle with extrapolating from one area to another. Umm.

Paul Robertson

Yes. No. Well, yeah, the digital competence framework is actually linked with the other kind of there's eight lifelong European competency frameworks or like areas that they kind of. So it's it's quite transversal in itself. So yeah, definitely cuts across. So I think we've definitely talked about the relevance for them and I think. I think we've kind of addressed the competence levels of all of them.

GPN Curriculum designer 2

Umm.

Paul Robertson

So thinking a little bit about, yeah, before I I sent you the link to DigComp, did you were you familiar with any digital competency or digital literacy frameworks?

GPN Curriculum designer 2

No, nothing to be *** nothing this formalised. So it was very, very interesting. And thank you for that because as we now thinking how we can roll it out our students.

Paul Robertson

OK, good. Excellent. That's that's nice to hear. So do you think reflecting on the DigComp framework will affect the way you designed the AES course or similar courses in the future?

GPN Curriculum designer 2

Definitely. It's not possible within every like you mentioned, within every subject to, embed all those competencies. In an ideal world, given the freedom...

Paul Robertson

Umm.

GPN Curriculum designer 2

...I would absolutely love to embed with an AES. More opportunities to develop the use of critical of critical and creative use of technologies and content creation.

Paul Robertson

Yeah.

GPN Curriculum designer 2

I'm very aware of the fact that I won't be allowed to for many different reasons, believe I had complete freedom, I would absolutely love to do it, in particular with assessment.

Paul Robertson

OK, interesting. Do you foresee a point in the future where the freedom might become available that they might become like the the things which the barriers which are preventing you from doing that might be lowered?

GPN Curriculum designer 2

Within ***GPN***?

Paul Robertson

Either **GPN** or elsewhere.

GPN Curriculum designer 2

Elsewhere definitely as I know that this is an area of interest of several higher education institutions and different programmes. Within **GPN**, without being massively pessimistic, I think it would be, It's highly unlikely without a major shake up of, of everything.

Paul Robertson

Yeah. Yeah, that's fair to say I think. But then I think we have had a recent major shake up of everything

GPN Curriculum designer 2

Yeah.

Paul Robertson

With Covid and everything. Excellent. I think that's most of my questions. I don't think we need the extra questions. The only other question I would have is that you have any other comments or suggestions or anything else related to the topic of digital competencies?

GPN Curriculum designer 2

Ah. Umm well suggestions. It's not exactly suggestion for you, it's just kind of suggestion for the organization and something that we wanted to do is that because the digital competencies now and again post-Covid era in particular, but it started so much earlier, it's so so important that students have the opportunity to develop their digital literacy within the context of their education. I know and I think we as a company are quite behind that because when you think about I've got. I've got the child in primary school and the freaking learning coding he's 7.

Paul Robertson

Oh wow. Yeah.

GPN Curriculum designer 2

They learn, and you know, there's really a great push from the government to do that. But, students will come to us, come from a slightly, you know, different generation than you know my 6 year old.

Paul Robertson

Yeah.

GPN Curriculum designer 2

They haven't necessarily been taught that, so there is there are gaps there and we should be addressing it or we should be helping to address those gaps. But we don't have anything in place at the moment. So there is work that needs to be doing. But I feel like we do diagnostic tests in math, we do diagnostic test in English. I think we need to do diagnostic tests in digital skills and create interventions to address any gaps because it's to the benefit of us all you know, if fewer students complain about not being able to upload something on turn it in. We as English teachers will have too much less hassle and headache later on.

Paul Robertson

I think that's that's a common issue within higher education as well, but I think it's very interesting what you've said about the actual school age that actually I think the International Foundation year is, it's a point where it's a bridging in between school and university obviously and actually maybe that the idea was to get people to the kind of level where they would be if if they'd finished a **Western European education** or wherever and that maybe or maybe we're not aware of where the digital education finishes at high school, secondary school anymore? Or maybe we haven't caught up to that bridging element?

GPN Curriculum designer 2

Yeah.

Paul Robertson

So that's quite an interesting. Yeah, it's quite like having school aged children's. Actually, that's a really interesting new perspective, actually. It's excellent, cool, great. So thank you very much. And do you have any other thoughts or anything else you'd like to add? Thank you.

GPN Curriculum designer 2

No, just a very interesting dissertation topic, so good luck and I'd love to read it once it's finished.

WEFC Curriculum Designer (CD3)

Paul Robertson

So thank you very much for volunteering to do an interview with me about your perceptions of digital competencies for English Medium, International Foundation year students. Before we start, I would like to confirm your responses to the statement from the consent form that I emailed you before the interview. A copy of the form is on the screen.

Please can you say agree or disagree after each of the following four statements from the form, I confirm that I have read and understood the participant information sheet dated 7th of February 2023 for the above study. I have had the opportunity to consider the information, ask questions, and have had any questions answered satisfactory, satisfactorily.

WEFC Curriculum designer

I agree, I confirm.

Paul Robertson

I understand that my participation is voluntary and that I am free to withdraw it anytime without giving any reason, without my right being affected. In addition, should I wish not to answer any particular question or questions, I am free to decline.

WEFC Curriculum designer

I confirm. I understand.

Paul Robertson

I understand that under the Data Protection Act, I can at anytime ask for access to inform the information I provide, and I can also request the destruction of that information if I wish.

WEFC Curriculum designer

I confirm.

Paul Robertson

I agree to take part in the above study.

WEFC Curriculum designer

I agree.

Paul Robertson

Thank you. We'll now move on to discuss your perceptions of digital competencies. It's good, all the ethics stuff, yeah.

WEFC Curriculum designer

Yes, of course.

Paul Robertson

Yeah. Yeah. So, yeah, it's thinking about digital competencies. What, what does that term mean to you?

WEFC Curriculum designer

I guess when I think of competencies I think of abilities to do something independently.

And when you're think of digital competencies, you're looking at digital environment, digital worlds and how to navigate that successfully, really, I think for me. Yeah.

Paul Robertson

Yeah, OK, great. And do you think that our students have an accurate assessment of their own digital competencies?

WEFC Curriculum designer

Our students in particular, no. I think they're experience is limited to the more social aspects of the digital sphere, and with a lot of experience navigating the most current apps and social media, TikTok and Instagram through certain degree. But I don't think they have the skills to navigate the wider, much more broad and deeper, Internet in particular, and not to mention then the kind of digital tools that we would use in a more workplace productive professional environment that's quite foreign to them.

So I think it's a misunderstanding or misconception of today's students of being super digital digitally literate when they're not, they're only in one particular aspect literate that you know, you know, older people who may not have, you know, grown up with apps are are not. So it's a balance. But I don't think they're particularly skilled from my experience anyway.

Paul Robertson

So you're thinking about your experiences. What are your experiences so far been with the use of students technology for educational purposes?

WEFC Curriculum designer

For educational purposes, I think is quite broad. We've been quite digitally focused. I have been over the past, let's say 7-8 years most in particular and my very first years here. It wasn't particularly, it was very much a copy photocopy type environment and that that changed. Then with the development of the **VLE** and the understanding that students need to navigate online sources and and online information and a much more, what's the word systematic manner.

Because in particular for our students, we don't have access to a physical library, so that was never really there. So I think, yeah, we've yeah the past 7-8 years. We've definitely focused on that. And over the course of that time, we've really kind of pivoted more to helping them navigate that.

And but because our students are from a wide variety of different backgrounds, educational backgrounds. So they all have different levels of skills and understanding from quite good, they've they've, used the word and they created them type documents and such to absolutely very little at all, they struggle with the basic concepts of digital tools and digital world as well. And so we definitely an incredibly mixed bag, but very few I would say have a strong set of digital broad, strong broad set of professional digital tools for educational purposes. I think.

Paul Robertson

Interesting. And just picking up on that point that you use is quite different levels. I just wondered how much do you think our courses or our programme differentiate support for students on their different levels?

WEFC Curriculum designer

I think on a formal level. It's there, to a certain degree, but it's not a key priority for, for example the AES course.

I think it's, a lot of it's down to the teachers to give students time and guide them. I think from a from a centre point of view we've tried an ad hoc manner to provide for a digital tools, but the idea is that they know how to access the **VLE** and do, you know, click on this button here and download those sorts of things. Some students still also struggle and they come to us then without the preparation work and we've geared up for the students having done XY&Z and then not, so that, I think definitely holds some of them back...

Paul Robertson

Umm.

WEFC Curriculum designer

...and creates a negative first impression or a negative association with the work environment for the students, erm, yeah we have indeed have tried one or two years with a particularly big cohort to have a digital tool session. So, erm, kind of walking through with some students and that didn't necessarily turn out very well due to poor attendance for I'm sure other reasons. So there has been some attempts, but I wouldn't say it's integrated within the programme to a, any major degree.

Paul Robertson

OK. Interesting. Yeah. And that great so.

WEFC Curriculum designer

Explicit, explicit within the programme. I think

Paul Robertson

Yeah, yeah.

WEFC Curriculum designer

I would say explicit. Rather, cos we do do as teachers do walk students through and demonstrate here... Click here, click here. So it's very much dependent on OK what we need and what to what the students looking at us right there you need and.

Paul Robertson

Yeah.

WEFC Curriculum designer

Yeah.

Paul Robertson

So, yeah, it's reactive...

WEFC Curriculum designer

Yeah. Yes.

Paul Robertson

...yeah in a sense. And it's it's not not formalized, not explicit within the programme itself, but it's it's kind of yet ad hoc almost that's cool. No. And then thinking, I'd like to think about the relevance and the competence levels of the different areas of the digital comp comp framework. So I'd like to still a bit more closely at this, discuss your thoughts and perceptions, looking through each area in turn. And can I just check, did you have a chance to have a look at the DigComp Framework?

WEFC Curriculum designer

I did. I did. I glance through. Indeed, yes.

Paul Robertson

So if there's any bits which are a bit confusing on, you're quite sure what it means. We can talk through it, because I mean there there's there's a lot of stuff there. It's 21 competencies. So yeah, there's anything quite like or I'm not quite sure what this entails. We can talk through it. So thinking about that area of information and data literacy, how relevant do you think this area is for our students studies?

WEFC Curriculum designer

That incredibly relevant, really. And looking at it now, I'm like, well, actually we kind of do digital comps within our programme. Let me rephrase that. So yeah, this is of course a big element of what students are expected to do in university and in the professional sphere and helping the student navigate that is incredibly important because especially nowadays most of the materials are online and even in the universities with libraries, majority of work is accessed via students personal devices, so being able to understand what is, worthwhile and relevant information, I think is a yeah. One of the key things students need to be able to identify the idea of critical thinking, to understand how to access the information and sort through it because it's such a huge amount, I think that's really, really important.

Paul Robertson

And how competent do you think our students are in this area?

WEFC Curriculum designer

I think coming in, not particularly competent. Leaving, I would say they are. So there I need to amend my previous statements, regards to how well the programme delivers them and so yes, cos it's definitely a big focus of what we do and multiple programmes or multiple modules are in the programme.

Paul Robertson

Yeah. OK. And so to what extent do you feel the AES course has been designed to address this area?

WEFC Curriculum designer

Particularly the AES course I think has a big component of the coursework focused on this and it's something we do throughout each term. In our case from the very beginning, identifying well, this is a good source that you can use and are expected to use. So we really introduced that at a very early stage to differentiate between you know, the usual IELTS style writing and, and then moving through the year, you have different coursework assessments that test this ability explicitly and then have it implicitly within. Are these good sources and you blah blah blah, and for example in the course work two, and with the course work three there is marks awarded to, erm, proper sources, proper academic sources, and so I think there's quite a big focus on this one in particular with the AES module.

WEFC Curriculum designer

Are we only talking AES module here? Just to confirm.

Paul Robertson

Yes, that's that's the focus, yeah.

WEFC Curriculum designer

OK. Yeah, yeah, yeah. So I got, yeah.

Paul Robertson

But I mean, any anything's relevant if you mention other things in the programme as well, that's that's OK as well. That's fine because it's it's the, the, the my research question is the, uh, about, OK, the AES course. But also similar courses. So you know, RAE has an element of study skills. So it's kind of some overlap there as well. But the main focus is the.

WEFC Curriculum designer

Yeah, I mean RAE in particular looks at digital tools and particular with regards to how to organize, set up meetings and communicate via zoom and all these sorts of things so...

Paul Robertson

Umm.

WEFC Curriculum designer

That would switch my perception of this a little bit, but within the AES programme I think this is definitely a module. This would be the yeah, definitely something that explicitly addressed, addressed. Yeah.

Paul Robertson

Yeah, yeah, maybe it's it's more relevant thing for AES in a way. Yeah.

OK. Well, thinking about the individual competencies that make up the information in data literacy area. So browsing, searching and filtering, evaluating and managing data information in digital content, do you think any of these competencies are particularly relevant for us students or not and why?

WEFC Curriculum designer

Absolutely. The first two, in particular are very relevant, erm, because the students will need to, they're expected to find information independently and so then how they actually find information that is relevant to what they need is always a huge challenge. Every year it's a case of there's just no sources on my topic. I can't find anything. But of course that's definitely not true. It's just that the students haven't built that ability up. So that's something then that within the course we go through different databases where to find information and give the students a practical experience in doing that and then link to that. What exactly are they looking at? So looking at the credibility of sources and data and you know, how good is it and what does that mean and how does that impact the reliability and value of the work you are producing? So I think those two in particular are really important. The third I don't think, it's not really a focus of the AES courses, it's done elsewhere, somewhat as in it kind of comes up within different types of assignments. For the AES course. Managing the data and storing it is not a key focus. It's not assessed either.

Paul Robertson

Yeah, and just in general for them, not necessarily for relevant for their AES, but just in general for their studies next year, this year is it do you think that's not so relevant for them then?

WEFC Curriculum designer

You know, I think it's relevant, especially next year when they have a lot of assignments and data to manage. And I do think it is an important skill for them to have as well. It's potentially overlooked because it's something perhaps as simple as setting up folders and having dates and file name formats, erm, which seems yeah to be self-explanatory, but it isn't. It's taken takes with a long time to realize that ohh. My life is a lot better this way, and I think today actually with apps and the type of interface students are used to working with, that does not come naturally using folders and files and stuff like that doesn't necessarily click potentially or not, that I've seen anyway.

Paul Robertson

That's interesting.

WEFC Curriculum designer

Yeah.

Paul Robertson

So that's interesting. Actually, it was an element to which the device is actually dictating their level of competence in that in that we all we learned how to use digital devices on computer first. And so we learned about hierarchies of files and whatnot, whereas for them, your phone doesn't have that.

WEFC Curriculum designer

Exactly, it's a phone, it's a tablet, it's the ease of access. I literally read a article on this two days ago that Gen Z are already struggling in the office environment with regular tech that you know they're, they've they've grown up with using devices and systems that have been designed to make their use of the most easiest intuitive type of thing. So when it comes to other things they are not prepared for that I thought that was quite interesting, erm, the fax machine the printer, the things like that, and it's then when you look at Windows in particular, I definitely preference for being able to control and manipulate and go into the the bowels of the computer, whereas potentially students don't understand that concept yet because they haven't been exposed to it.

Paul Robertson

So, that's really interesting. And so it's the ease of use of the user interface means they don't go through the hard work in a sense and don't develop the skills. OK, that's really interesting. Cool.

And then thinking about the particular areas browsing, evaluating, managing, do you think they're particularly competent or particularly not competent in any of these areas and why?

WEFC Curriculum designer

I wouldn't call students *** in any area. I'd say they need to develop it. Yeah, there we go. Less competent. And you were saying when they're, before we've finished with them type of thing. Or when they come in.

Paul Robertson

Either or both, yeah.

WEFC Curriculum designer

I mean, they're they're they understand searching. They understand Google, they understand those concepts and they haven't moved beyond Google because they never had to really. Unless that's been part of their education beforehand. And so that potentially is not too bad.

The evaluating data one and you know who said this and why is is always more of a struggle and no matter there their levels and then as I said yeah managing data the ones who are serious and motivated generally get that. The ones who kind of skim over, you'll find that the end of year, don't have files still, at that level, because it takes time to manage and they don't those those who aren't motivated don't see the time of valuable.

Paul Robertson

OK. That's interesting.

WEFC Curriculum designer

I think.

Paul Robertson

Really interesting. Great. Excellent. Thank you. So moving on to our second area, the area of communication and collaboration, how relevant do you think this overall area is for our students studies and why?

WEFC Curriculum designer

Again, it's quite important and quite relevant and particularly given what the students have gone through and in with COVID pandemic. And, I think we've been surprised as to the lack of digital communication skills the students have developed, suggesting that they're not necessarily been zooming all the time or having online lessons that we would say are useful in that regard. I think from our own experience with the centre, we were a lot more proactive and really from the get go, we moved into quite a while developed and comprehensive means of educating in an online environment and that has not been the case for, I don't know, I'd probably not say the vast majority, but definitely I think the majority of students globally for sure and so, this, these kind of yeah how to interact through digital type, the use of them.

Citizenship as well definitely, doesn't really occur to them, I think, but that could be because of their, eh, age in some instances, although we do have those students who are interested in social sciences and stuff, they're they're they're generally more clued in with what's happening, and are quite passionate with social issues. So that's definitely not all students. Erm, so I think it's definitely really, really important, but they don't necessarily have it especially coming in.

Paul Robertson

OK.

WEFC Curriculum designer

Was that the question?

Paul Robertson

Yeah, I mean how, how relevant...

WEFC Curriculum designer

How relevant? Very relevant I'd, yes.

Paul Robertson

...and why. And and the next one is about, yeah, how, how competent do you think they are and why?

WEFC Curriculum designer

Yeah, I mean the the relevancy, definitely is gonna, is only gonna increase and within the world of work now, we're just witnessing a change to more remote work, or there's a push for more remote work that's not necessarily listened to across the world and and depending on your industry. But there is definitely really a from my view, a seismic shift in how work is organized, managed and the expectation that what you can do, erm, through the use of online tools, so absolutely completely relevant definitely.

Paul Robertson

OK. Interesting. And so, yeah, I think we've kind of got in terms of the level of competence...

WEFC Curriculum designer

Yeah.

Paul Robertson

...that they're maybe not as competent as we would have been expected.

WEFC Curriculum designer

Yeah. I mean for for most of them as well, digital identity as well, I think is interesting netiquette, that, is also something that they're not really clear on, although it's potentially, it's just that the terminology and they have it instinctively. They know not to do XY and Z, but it's not really come up massively within within our remit and but yeah, the digital identity one is interesting as it was addressed in some way, shape or form in different courses, looking at LinkedIn and such and such like. But, erm, yeah.

Paul Robertson

OK then.

WEFC Curriculum designer

Not great with them.

Paul Robertson

An old to what extent do you feel that the AES course has been designed to address this area?

WEFC Curriculum designer

Not explicitly at all, I think how we deliver it within the centre enables students to engage with digital tools, communicate digitally in some way, shape or form. That's only because we would push that, such as sharing documents, for example, and at the beginning of the term.

But there's very little, if any, collaboration through digital tools. There's no group assignments or group work, really, erm, they might collaborate with the teacher, but again it's not explicit.

Paul Robertson

So then.

WEFC Curriculum designer

And while netiquette or man*** dig***, it might be a topic that is looked at, I think in term 1 or term 3, there is a, there's a theme or there was a theme. That's not necessarily well adhered to, teaching them that not necessarily.

Citizenship. Yeah. Let me think. I'm thinking here.

I mean, the only area. Again, that we would encourage them is through **VLE** the the **VLE** platform, but that's not, we're not testing them on the **VLE**. Unless the students actually said that, they don't know how to work it, they don't work it. So we have to find a way around and teach about that. But that again on a needs to know basis and, again, there are tools where students communicate and comment and like, but they're not, depending on the teacher, necessarily used 100%, used all the time it's it's it's a tool rather than a teaching aid. So, does that makes sense.

Paul Robertson

Yeah, no, really. Makes sense actually, so, to go back a little bit. If what you're, if I'm reading you correctly, you're saying that on a network level, the network kind of programme of AES doesn't really actually explicitly address this in terms of the learning aims or the assessments, but the on a local level, the way we are implementing the AES course and our design and approach, does kind of force some of this?

WEFC Curriculum designer

Well, I mean on the network level, all students do use the AES platform, erm, but because the each of the centres are subject specific to the universities and the they have different resources, it's quite nebulous in that regard. So I think it's good. It's yeah, over the past few years the use, the use of the **VLE**, **VLE** and the platform is a unifying factor amongst the ISCs, although I do believe, there's various degrees of use of that platform in the end and in in that some centres don't use it at all, but, yeah

Paul Robertson

OK, cool.

WEFC Curriculum designer

Support interacting. I'm trying to think we would do it, but with yeah, it's not a focus of the course, of course, is looking at academic English skills and developing that and the tools that you use then are on, you know, digitally based indeed, and we expect them to use as we like, searching and browsing online things and creating a presentation. There's no collaboration explicit unless the teacher or the local programme wants that, and it's not an aim, it's a by-product.

Paul Robertson

Yeah, yeah. Good way of putting it.

WEFC Curriculum designer

I think if that makes sense.

Paul Robertson

Yeah, no, makes sense complete sense so then.

WEFC Curriculum designer

As we do it, the more I think about it that we do it, but we do it, but I'm not sure that's the aim of the course.

Paul Robertson

Yeah, OK, cool. And then thinking about these particular areas, do you think any of these competencies, interacting through digital technology, sharing information and content through digital technologies, engaging in citizenship, collaborating, netiquette, managing digital identity. Do you think any of those are particularly relevant for us students or not and why?

WEFC Curriculum designer

Interacting. Sharing. Engagement. Collaboration. I mean it's all quite relevant. As I said, their future will be online and in university as well as in work. So I think gaining an understanding of all of these things is important. To what extent it should replace other competencies. I don't know. I think it needs to be a blend. So student, they can't do everything all the time and there's various other competency frameworks out there that are equally as valuable, but indeed you know some element of these things is really important and even the ones that don't seem to be a case of give me one second. Sorry.

Paul Robertson

Yeah, that's OK.

WEFC Curriculum designer

No he's gone. It's OK and it's *** So yeah, really important. That's what I was talking about and, is there one more?

Paul Robertson

And does anything spring out was kind of more important or less important.

Paul Robertson

Yeah, that's OK.

WEFC Curriculum designer

I mean at this stage and what they need, the students we have that they need and I think interacting and sharing is really important plus collaboration, it's, this is done at another areas of the course. So they they do get this but within the AES it's not yeah that's focus. It's not OK yeah, yeah.

Paul Robertson

And do you think any of these particular areas, they are particularly competent or particularly less competent and why?

WEFC Curriculum designer

I think it's depending on the tool, collaboration, I think it's quite they will be good at, they're used to communicating online rather than face to face in some instances.

Citizenship. Not really. But then again, as I said, they're not necessarily civic minded apart from the other, the few socially inclined ones and and yeah, but, depending on they can share things so they can do it, but it if we want to do professional manner using professional tools then I would say no they don't have that ability. But again depending on what we view as the right way that can have an impact.

Paul Robertson

And then thinking about the area of digital competency content creation, how relevant do you think this overall area is for our students studies and why?

WEFC Curriculum designer

So it depends on what the student is going on to study, I think and the environment they find themselves within university. You could have a more traditional university that really focuses on researching, writing, presenting or you could have the more, engaging courses and approaches and kind of more forward thinking universities that integrate more and yeah, diverse range of assessments such as you know they actually have to produce and create content or they have to engage in a marketing campaign. So those more practical ones.

And there's also business and the University of Applied Sciences have internships that are integrated as part of the students degree so they will be expected to learn on produce, potentially and content there. So I think it very much depends, depends on what they're going to, what environment they're gonna find themselves in the future.

Paul Robertson

OK. And how competent do you think that our students are in this area and why?

WEFC Curriculum designer

Erm, majority, not particularly competent there. They're avid consumers of digital content, I think and potentially given the right tool such as TikTok or Snapchat, they can create content, if the tools

are you know, something they they are used to and copyright and license is not something that enters their vocabulary, as indeed most people I think.

Paul Robertson

Yeah.

WEFC Curriculum designer

And and programming. DYou have those who are interested again, if it's relevant for them. If they're interested, they they are those who have programmed. We do programming course here in the centre. So yeah, again, it depends on what they want and what they are interested in, will dictate then their abilities here.

Paul Robertson

OK. And to what extent do you feel the AES course is being designed to address this area?

WEFC Curriculum designer

There is no, not really the there's a main, some more focus on creating presentations, for example, and so that technically is creating content, and, but aside from document creation, there's not really a huge amount that I can see again being explicit. Other centres may focus on different things and depending on the students workload, there could be very interesting projects elsewhere, erm, to do that. But it's. Yeah, unless it's again the locally based or teacher based. I don't think that's that. I considered an aim of the students.

Especially considering students have a lot of other assignments to do so at this is not an aim of the programme then I don't think it should be an aim of the AES itself.

Paul Robertson

OK. And then so thinking about those, I think individual competencies would, I kind of think you discussed that really, about if you think any of them are particularly relevant or not, they're really depends on their individual university course, individual future and also that relates to their level of competency.

WEFC Curriculum designer

Yeah. So have they engaged with this before? You know, they they might have experienced this in the previous educational institutes, erm, yeah, it's not something that they really have, aside from the more basics developing, you know Microsoft tools.

Paul Robertson

OK. Yeah. Yeah. So like a basic familiar with some office packaging, but nothing really beyond that. OK. And yeah, I think we only.

WEFC Curriculum designer

When I think of digital content, I'm thinking of videos. I'm thinking of, you know, websites and stuff like that, so that when I would see the word digital content, that's what I think of, necessarily, Word, but you could argue it could be digital content

Paul Robertson

I I think it can include all of that, that, but it depends on kind of well where, where you kind of placing it that I think like the office programs would be more considered more foundational. And the I could do video creation, etcetera. Yeah, maybe not more advanced, actually, like a complex Word document sometimes can be more complicated, like section breaks, etcetera.

WEFC Curriculum designer

Yeah. When we do in the RAE course, we do that kind of programme report format, which has you know table of contents and students have to update that. And they have appendices and they have to have all those sorts of stuff. So we do cover that. But yeah, when I think of digital content, I think of something else. But I mean, we get them to again create their own graphs in RAE, so, then you know within the group projects, they're encouraged to create, engage in creating digital content. So in the AES course, no, but in the RAE course we do do this. So I think there is some need indeed.

And a copyright, would you call that referencing. You know, who owns what, so you could twist referencing as you know what's the concept of it not claiming ownership over something you didn't actually do and create. So we don't we don't say copyright and licenses, although we do mention, you know, if you use an image you have to reference it. So it's an academic perspective on this topic.

Paul Robertson

Yeah, rather than a working perspective.

WEFC Curriculum designer

Yeah. Yeah. I guess the **VLE** does have some collaborative features, but I don't see much evidence of that being used on a local level.

Paul Robertson

Yeah.

WEFC Curriculum designer

Whereas maybe the course creators think it's great, but I don't think it's it's utilized. So, I'd love to see the result of these comparisons.

Paul Robertson

And then so thinking about the individual areas, do you think any of those, they're particularly relevant or not relevant or students are particularly competent or not competent? I think we've discussed this quite a bit, but just if there's any kind of anything else?

WEFC Curriculum designer

Yeah, I mean, an understanding awareness of what these are. I think is what I've had every student. But then what they need at this moment in time depends on what environment they will find themselves. This is a preparation year. We're preparing them for what they'll experience next year. And I think the world of work and and that depends on where they're going. Not all areas need a deep understanding of this, these. If that makes sense.

Paul Robertson

Really interesting. Cool. Yep. And then moving on to think about our 4th area, which is safety. How relevant do you think this is for our students studies? And why?

WEFC Curriculum designer

I think this is again, I think all the areas are important, but this is quite, yeah, overlooked area, so to speak, erm, by everyone that protecting the devices, in particular, data and privacy, there's been a refocus, I think, and reprioritization of this with, especially with GDPR and from a company point of view and a legal point of view, which is filtered down and reach people's ears, so to speak. And so that has improving. And to what extent we in AES. So, you're looking importance, so I think it is important, especially if students are going to be looking at research which they do and primary research. So it was this, make sure it's anonymous, that sort of stuff. So they do understand that and health and well-being again that's something we have discussed within the programme as being important because we've said previously the majority, not majority a lot of their, a significant proportion of their lives is digital and that's open to abuses for sure. And, carelessness or trusting of anonymous persons on the Internet can lead to distressing situations, so definitely quite important.

I like the last one, protecting the environment. I think that's that's hardly ever mentioned. It's the assumption that IT and using our phones and stuff is, is more environmentally friendly. That's not the case, and particularly when it revolves around what goes into creating these devices and recycling them and where the power come and leaving your phone on all the time. And so all of these questions is definitely. I think it's important. I think it's important to raise awareness within the students, for sure.

Paul Robertson

It really interesting and how competent do you think our students are in this area? The whole area of safety. Why?

WEFC Curriculum designer

They will use tools and then not really understand potentially that what they put out there is, there.

Again, they're very adapt at using particular digital apps on particular digital systems, but, the awareness of what goes on and what it actually means is not there. It's just a system they've used all their life, so to speak. They they know how to swipe, they know how to upload their password. They have everything on the cloud so as well, maybe not the cloud.

But they might have it, but not realize it. So I think in particularly you look at the controversy around TikTok and who owns TikTok and where's information go and that data and the previous revelations that not just companies where governments are also collecting data and harvesting it, there's very little understanding of that and within the student population that I can see.

Paul Robertson

Yeah.

WEFC Curriculum designer

Unless you really pushed them like. Oh, yeah, maybe. But that's not something that concern something I think.

Paul Robertson

OK, interesting. And then to what extent do you feel so overall the area has been addressed by the AES course? Or designed to be addressed by the AES course. Oh, sorry, I can't hear you. Hope that.

WEFC Curriculum designer

*** OK, yeah.

Paul Robertson

Yeah.

WEFC Curriculum designer

So I mean, are we talking about the the the the module itself or how we deliver it on **VLE**? Is that also the AES module? Is that the AES course?

Paul Robertson

Both of those are the AES course.

WEFC Curriculum designer

Yeah, yeah.

Paul Robertson

I mean how it's designed, how we deliver it, all these things are relevant.

WEFC Curriculum designer

We do, particularly when it comes to using and storing student data. That is something we've asked them to acknowledge, erm, so we can, you know, use data safely and securely. And so we that is built in that as a concern for the developers of the course I believe, but, to what extent do we teach the students or instruct the students in how to protect their privacy? It's not a again, incidental. It might be something that is there and built into a program, but it's not the purpose of the AES course.

Paul Robertson

No. So then it's there's there's things in the course where it's designed, but that's about like how it's designed in terms of making sure that we're getting the legal right to use students data and that sort of stuff. But we don't teach students in the course doesn't doesn't the designed to help students understand how to protect their data or how to protect their devices or their well-being or environment.

WEFC Curriculum designer

No, unless it's a topic and one of the readings or listenings I would.

Paul Robertson

OK, cool. And then thinking about the individual area, so protecting devices, protecting personal data, protecting health and well-being and protecting the environment, do you think that any of those competencies are particularly relevant or not relevant for our students and why?

WEFC Curriculum designer

I think an understanding for everyone, not just the students, but everyone of device protection and personal data and privacy is important, erm. To what extent then, now is the remit of the, this programme in particular.

Given the purpose of the programme, is to prepare students for university next year and get them in there, I don't I'm not completely convinced that it's a good use of time. Secondly, when students have what subjects they need to pass and assignments, they need to do so, I see it as important, but not within, explicitly our remit, with this type of education that we provide.

Paul Robertson

And do you think that for these four competencies, do you think our students are particularly competent or not competent with any of these?

WEFC Curriculum designer

They they're not competent.

Paul Robertson

Not competent with any of them. That's OK. That's fine. Yeah, yeah.

WEFC Curriculum designer

I don't. I mean it's again depends. They can surprise you sometimes, but from what I've seen, not really. It's not entered their frame of reference.

Paul Robertson

That makes sense. OK, then thinking about the area of problem solving. How relevant do you think this area is for our students studies and why?

WEFC Curriculum designer

For us, all very relevant, really solving technological problems, troubleshooting links, then to that in more independent and you have a problem when you fix this type of thing. To what extent can they identify technical problems? Can anyone identify technical problems? Erm, I don't know. So this is a bit, you know to what to what degree is anyone able to fix anything? And I think that's not necessarily digital skill, it's more of a skill skill that regular competency in life and the needs and technical responses, I mean that comes with experience, I think.

Yeah. When they understand that what the purpose of the tools do more, I think that comes with with time

Creativity, again that depends on the person, and what they are going to do in the future and what they need to do, not everyone needs to know how to design a website, so to speak, and then the gaps identifying to cover the gaps. What you know, what you need to do again, that's more of a case of general competency in in life. What? What are you missing to achieve your aim? I think that's more of a a thought process rather than specific to digital, digital sphere, so problem solving in general I think is something that can be applied in all context, not just digital.

Paul Robertson

Yeah.

WEFC Curriculum designer

Learning and ***.

Paul Robertson

Yeah, OK, cool. And how competent do you think our students are in this overall area?

WEFC Curriculum designer

Fixing their technological problems, I would say not competent and very often they need us to step in for basic things erm, and even just suggest Google it if they have a problem. So it's that. But again, I don't think that's necessarily digital, I think that's just in all aspects, they don't have those competencies. They're developing as as grown adults...

Paul Robertson

Yeah, yeah.

WEFC Curriculum designer

...so to speak, who theoretically would have these, although not always so I think, yeah, they they're not particularly competent in this.

Paul Robertson

And to what extent do you feel the AES course has been designed to address this area?

WEFC Curriculum designer

It's not a concern for the AES, aside from the incidental of using the platform and the tools surrounding it. But again, using the platform is not for me an aim of the course.

Paul Robertson

Hmm.

WEFC Curriculum designer

Yeah.

Paul Robertson

Yeah.

WEFC Curriculum designer

What's the point? Because we could get rid of the platform and the course, the course is still there as well as we used to. I'm thinking maybe I'm looking at it from more of a, in the last 10 years, what is the aim of the AES course or the whatever you want to call it course, and, and this is not one of them.

Paul Robertson

OK. Then I think we've kind of talked about the four areas a little bit that we've said like solving technical problems, identifying needs. And also identifying the gaps little bit with relevant, but that students weren't necessarily so competent and creatively using was a bit more kind of dependent on their future. Yeah.

WEFC Curriculum designer

Yeah.

Paul Robertson

I think we probably addressed question for 13 then, and then question 14. Are you familiar with any digital competency or digital literacy frameworks?

WEFC Curriculum designer

Outside of this one, the EU frame framework. Erm, am I?

Not off the top of my head. I probably have encountered one before, but not off top. I think this is one of the first ones in this regard no?

Paul Robertson

There's actually over 100 models in 2015 and frameworks, but in terms of this kind of depth and this kind of level framework out, I would say, there are others, but this is the most comprehensive by a long way for for a while.

WEFC Curriculum designer

Yeah, yeah.

Paul Robertson

Umm, but I'm have digital competencies influenced your decisions in the design and implementation of the AES course.

WEFC Curriculum designer

Yeah, I think. Again, as a by-product of what we need to prep students for, digital skills are, competencies are are integral to that.

And while not all of them are core aims of the course, I think we are would be doing the student disservice if we did not, at a local level help students prepare for the types of interactions that they will be required to engage in in both the university and career.

Paul Robertson

So maybe the the course itself isn't fully designed to address all these, but that the implementation is more designed to address this.

WEFC Curriculum designer

Yeah. I mean, I think, it's still it, it's with the AES course. In particular, it can just be a catch all.

Paul Robertson

Hmm.

WEFC Curriculum designer

Potentially, and it's, it is still a language based course. That is still the, you know, the priority really and aside from identifying and assessing information online.

The other competencies I think are incidental so to speak.

Paul Robertson

Umm.

WEFC Curriculum designer

They're not the the core priority, very often in the centre we end up doing a lot of this anyway because it's the most comprehensive course. And that's the kind of how we as a EAP teachers focus ourselves but, yeah, to my mind it's still a language course, and it's still required by the universities to in, in place of a CELT test so that, yeah, we can't. We can't go too far off the track, so to speak.

Paul Robertson

So then do you think that some, as a programme, do you think that the whole programme addresses kind of all these areas or that sometimes some areas kind of get dropped into EAP or do you feel like EAP sometimes areas things which aren't addressed in a programme formally end up getting dropped into EAP?

WEFC Curriculum designer

Yes, I think as as the EAP teachers, we definitely see ourselves, as you know, having to prepare students for other programmes as well because the lecturers and the instructors are not, either teachers in that regard or it's yeah, it doesn't really enter the heads, so generally there were most qualified more for this sort of stuff. So we do get a lot of, oh, you can do that in a AES. Ohh. You can do that in English. You can do that in the EAP class. And I think that's definitely a symptom. That's not unique, just to us, erm, or or this entity that we work with.

Paul Robertson

No. OK, cool. And do you think the there are any areas digital competence that the AES course might develop more or should develop more?

WEFC Curriculum designer

I think the area of collaboration I think is something that really I think we've seen and we we've at locally tried to address this with the Project B is that students in in **a Western European** university particular are expect to write, erm, collectively and produce work as a group, I think that's something that really would benefit, however, I don't know to what extent it's done in in UK universities and I don't think the focus is as heavily focus skewed to group work as it is in **our local context** but from a local point of view, I think that is something that really would benefit.

But it is again addressed in other modules within this programme here that we deliver. So again, to what extent should AES be a catch all for all the skills, there is an argument for that as well. But I do think getting students who maybe have different writing styles or writing levels. How do you write and produce something together? I think that is something that would be very interesting to explore further and useful for the students to do.

Paul Robertson

Then there's there's the overlap there between the language and the digital competence as well.

WEFC Curriculum designer

Yeah, they're most likely to do it via digital tools. So then again, it's a case of, OK, what were for AES the language focus is there, but then the digital competencies could be in the in there as well or addressed in another module as well.

Paul Robertson

Interesting. And do you think that reflecting on the DigComp framework will affect the way you design or deliver the AES course or similar courses in the future?

WEFC Curriculum designer

I think it's a very good framework to refer to in the case of what are we not doing? Because very often we can focus on one particular aspect while ignoring others, such as the safety aspect. Or you know the problem solving, so to speak, and and I think it's good to have there to yeah, to match what we're doing with that to, insure we're comprehensive, erm, but indeed as well, there's numerous other frameworks that we also have to match to. So, how many frameworks can we construct around a programme? And that's always a bit of give and take. But I do think it is something that can be indeed useful to remind ourselves. This is the world the students are are facing and and we do not have expertise in all these areas, but it's good to consider them.

Paul Robertson

And yeah, thank you very much. Are there any other areas? Would you like any to make any further comments or suggestions related to digital competencies?

WEFC Curriculum designer

Look competencies, not necessarily, I think, one area that is maybe absent here is, you know, dealing with issues of collusion and buying essays online, or the chat GPT. So to what extent digital tools help students act in a not particularly. What's the word I'm looking for?

Paul Robertson

So kind of, ethical side, almost. Yeah.

WEFC Curriculum designer

Yeah. Ethical aspect. Yeah. Yeah. So what should you not be doing with that? I mean, you could argue it would be in it's it's there as your copywriting licenses, potentially, where would you say that is? Yeah. Yeah.

Paul Robertson

I I think there's possibly a few areas where it drops into so copyright and licenses engaging in citizenship through digital technologies to a degree I think you know, being a good digital citizen is also about using technology responsibly, but maybe it's not something which is clear, that that pops out.

WEFC Curriculum designer

Yeah, I mean, it's one of the things that we we struggle with the students is that they are able, especially when we had exams and in that first year with Covid, there was vast amounts of in an extraordinary increase in issues surrounding academic impropriety.

The, and that was enabled using online tools. So where that fits and I think is something that's quite interesting and whether that's a competency no, but knowing not what you know what you should not be doing. I think maybe it needs to be more explicit because this is a very rosy picture of ohh all the things people can do well, people can also do things that they can collaborate and collude.

In that area. So is it. Yeah, the responsible use of digital tools?

Paul Robertson

Umm.

WEFC Curriculum designer

Maybe something like that, you know?

Paul Robertson

Yeah, I think it's kind of little bits there.

WEFC Curriculum designer

Yeah, yeah, yeah, yeah. Yeah. Yeah, that's a nice one.

Paul Robertson

But there may be little bits there, but it's not, it's not maybe front loaded in terms of, OK, it's kind of a little part of something. So OK, the managing digital identity, how to adopt information and communication practices, building a positive online identity. So that's not so much that. But ethical questions related to AI systems, it's again, it's not really.

WEFC Curriculum designer

I feel like this has been, yeah. So I had to what extent is a framework focusing on the digital environment needs to be updated regularly. I think that's something that then you know is that something they're considering and because the digital tools, we know change, dramatic fashion and the most recent controversy is indeed AI.

Paul Robertson

Yeah. Actually, if we look at the like, if you, if you look at the whole thing in detail this it was updated last year and they specifically updated it to reflect AI and remote working. So actually there is kind of an awareness there.

WEFC Curriculum designer

OK. Good, alright.

Paul Robertson

But I think what it's really interesting that you pointed out kind of OK, well maybe it's not fronted enough that by having this kind of area of citizenship, I think that's maybe where they think the ethics and responsibility falls in. But maybe that doesn't make it very clear. Yeah.

WEFC Curriculum designer

Yeah, responsible use of digital tools and that sort of stuff. Maybe. Yeah, yeah, yeah. But that was the only other thing I was thinking from our experience, I think.

Paul Robertson

That's really interesting, though.

WEFC Curriculum designer

Yeah.

Paul Robertson

Because yeah, I think that also is like it's related to what we do. But I did something which maybe it has fallen through the crack a little bit despite it being super important.

WEFC Curriculum designer

And academia in particular. Yeah, it's a, it's a huge issue and, yeah, I think that's something that. We do anyway, again, in other aspects of the course, and it's linked to the idea of referencing and stuff, but yeah, well we address it explicitly, but I think that this type of framework acknowledging anything is important.

Paul Robertson

Yeah.

WEFC Curriculum designer

But it's not all rosy. And all the great things digital tools can do. So I think that's something new.

Paul Robertson

They really cool. Excellent. Any other final thoughts?

WEFC Curriculum designer

Nope, that's me. Good. I think I've very.

Paul Robertson

Right. So thank you so much for taking part. Was really interesting conversation. Next steps will be I'll look at the transcript and edit it to make sure it actually reflects what we actually said because AI transcripts never 100% perfect and then I'll send you that and you can check and make sure that I've not put words into your mouth.

And then also, I'll also include like a participant debrief form, which just it just gives you a bit more information and some like sources if you wanna go and read up about this. And then after I've conducted the study and written everything up after a couple months, I'll share a summary of research with all the participants and all the potential participants as well just why not?

WEFC Curriculum designer

OK.

Paul Robertson

Ah. Yeah. Great. I'll stop recording now.

WEFC Teacher 1 (T1)

Paul Robertson

Thank you very much for volunteering to take part in an interview with me about your perceptions of digital competencies for English Medium International Foundation year students. Uh. Before we start, I would like to confirm your responses to statements from the consent form that I emailed you before the interview. A copy of the form is on the screen. Can you please say agree or disagree to each of the following four statements from the form? I confirmed that I have read and understood the participant information sheet dated February 7th, 2023 for the above study. I have had the opportunity to consider the information, ask questions and have had any questions answered satisfactorily.

WEFC teacher 1

Agree.

Paul Robertson

Thank you. I understand that my participation is voluntary and I'm free to withdraw at any time without giving any reason without my rights being affected. In addition, should I not wish to answer any particular question or questions, I am free to decline.

WEFC teacher 1

Agree.

Paul Robertson

I understand that under Data Protection Act I can ask at any time for access to the information I provide, and I can also request the destruction of that information if I wish.

WEFC teacher 1

Agree.

Paul Robertson

I agree to take part in the above study.

WEFC teacher 1

I also agree.

Paul Robertson

Thank you very much.

WEFC teacher 1

No problem.

Paul Robertson

Yeah, thank you. We'll move on to discuss your perceptions of digital competencies. So firstly, what does the term digital competency mean to you?

WEFC teacher 1

I'm not sure how specific I should, but yeah, basically just being able to, just do normal activities that are required by I guess society and education work with whatever technologies you need. Umm yeah, being able to do that general skills, but also specific to different people and being aware of it I guess also which yeah was important.

Paul Robertson

Yeah, very much so. And do you think our students have an accurate assessment of their own digital competence?

WEFC teacher 1

I would say no. I think they are. They think they're better than they actually are. Yeah. So they might be really familiar with phones, but not so much with computer, and other more relevant to or less social, uh, aspects.

Paul Robertson

Yeah, really interesting. And what have been your experiences so far with students use of technology for educational purposes?

WEFC teacher 1

So there's different levels I think. So some students really are a very good at it and I think they have experienced or yeah more experience with it. But others are really lost. So a lot of basic stuff, just like restarting a computer to them it's you have to make it explicit, right? I'm so, yeah, I think for educational purposes though, very important, they're not so used to it. Yeah.

Paul Robertson

OK, really interesting. So I'd like us to move on to talk a little bit about the ditch comp framework and discuss your thoughts and perceptions. Looking at each area and turn. And did you have a chance to have a look at the DigComp Framework?

WEFC teacher 1

Yes. Yeah, yeah, yeah.

Paul Robertson

Did you have any questions about it or any confusions or anything?

WEFC teacher 1

I mean, not really. I think it's quite clear. Yeah, just some of it was not necessarily digital, I think...

Paul Robertson

Hmm.

WEFC teacher 1

...but also, yeah, I mean, it also applies to life, but it's good. Again, that's what I mean about being aware, right? So some of it were not aware that it's actually....

Paul Robertson

Yeah.

WEFC teacher 1

...competence or yeah, skill.

Paul Robertson

Interesting. So which bits did you think? Oh, that's not particularly digital. Or is it that it's digital and non digital or?

WEFC teacher 1

Uh, let me see if I have it opened. Or for example the well, the digital content creation, the one about programming. I mean, yeah, of course that the skill, but I'm not sure the skill that we all need.

Paul Robertson

Yeah.

WEFC teacher 1

But yeah, in terms of, uh, the social one where we talked about society, but I'm not sure.

Paul Robertson

Ah, was it was it like citizenship or netiquette or.

WEFC teacher 1

Yeah, something like that, yeah.

Paul Robertson

OK. Interesting. Yeah. No, I don't think it's supposed to be, everyone should do everything. But I think it's, it's it's a framework for the EU...

WEFC teacher 1

Exactly.

Paul Robertson

...and you, you know, the EU loves that frameworks. And so then thinking about the area of information and data literacy, how, how relevant do you think that overall area is for our students' studies?

WEFC teacher 1

Erm, definitely really important, especially for higher education purposes. Yeah, they need to know what they're looking at and if it's relevant or not, and how can you they use that to support their studies. Yeah.

Paul Robertson

OK. And how competent do you think our students are in this area and and why?

WEFC teacher 1

Again, different levels, so I think students that are used to doing research, uh, they are a bit better, though they are still learning, right? But yeah, better. And they have a good understanding, but some others not so good. But I think that might also be due to language, right? Might also be a barrier in the sense that if they don't understand maybe more complex language, then they can't assess those, so yeah, yeah.

Paul Robertson

I've definitely those are definitely a big connection there and to what extent do you feel the academic English Skills course has been designed to address this area?

WEFC teacher 1

I think this area particularly is really addressed. Yeah. Just I mean we have them do research and evaluate their sources, but also the information in the sources. So I think definitely very relevant, yeah.

Paul Robertson

And do you think any particular activities from AES really developed this skill or this area?

WEFC teacher 1

I mean, in general, anything that's writing or get an essay or just also presentations or course work one, looking for sources, evaluating them being so picky right? And yeah, just trying to look for information about the authors and the sources they're using and the data they're using. I think definitely that one. Very much so, yeah.

Paul Robertson

Excellent. And then thinking about the individual competencies that make up this area, so browsing, searching and filtering, filtering data information and digital content, evaluating them and managing data and information and digital content, do you think any of those competencies are particularly relevant for our students or particularly not relevant and and the why?

WEFC teacher 1

I mean, I guess all of them, but at this point for their the level they're at, I would say browsing and evaluating, I mean managing of course. But I think that the extra step for them to really understand what they can do with it. But yeah, I would say the three of them, but if I yeah, especially the two above, yeah.

Paul Robertson

Yeah. So maybe managing not so much at this particular level.

WEFC teacher 1

Yeah.

Paul Robertson

And do you think they are particularly competent or particularly not competent in any of these areas? And why?

WEFC teacher 1

Again, it depends on the level. I think browsing they're becoming becoming better, better because they know that our expectations, but then especially the language level or the degree they can evaluate or apply critical analysis then evaluating and especially management, yeah it's or much lower. Uh, yeah.

Paul Robertson

Sounds like you're saying as well that it's also related to their other competencies...

WEFC teacher 1

I would say so, yeah.

Paul Robertson

...like their other learning related competencies as well as language but critical thinking. OK, interesting. Cool. And then thinking about the area of communication and collaboration and how it, how relevant do you think this area is for us students studies and why?

WEFC teacher 1

I mean, yeah, it's really relevant especially in today's, so not just for the students or studies, but also in today's society. And so it's important that they know how to do it. If they choose not to, then for because they can, they have the option, that's fine. But yeah, I think it's really important that they really understand how to do it. And yeah, what are the codes and so on in that case, yeah.

Paul Robertson

And do you think our students are particularly competent in this area or particularly not competent in this area? Why?

WEFC teacher 1

I would say more not competent than than competent, especially in the online context, right? So face to face. Some of them are really good at communicating, but when it comes to doing things online, it still takes them some time and some of them have no clue really. Yeah.

Paul Robertson

Interesting and to what extent do you feel the academic English Skills course has been designed to address this area?

WEFC teacher 1

I mean we, I think we've tried to use some of it in class, but it's also it's a learning process so I don't think it's the aim of our course to teach that. So yes, you're trying to use it and having your students using it is great, but I wouldn't lose too much time. So yes, we do try to do it, but does with limits. Yes.

Paul Robertson

Yeah. OK. And do you think any particular activities have helped students with this?

WEFC teacher 1

I mean in class, we're always using our, yeah the laptops, so even just using Padlet I think is a great tool to interact, like having them interact...

Paul Robertson

Umm.

WEFC teacher 1

...With comments and so on, or when they vote, erm, but also yeah, when designing or doing research together, putting it together in an outline with shared documents, that's great. And I mean they, learning how to use it so you see that they use it faster or more often. But yeah, I think that's sort of it because sometimes it just takes too much time. Yeah.

Paul Robertson

Yeah. No, I think that's a really important thing about these kind of things and where, where, where in the curriculum do they fit?

WEFC teacher 1

Yeah.

Paul Robertson

And thinking about the individual competencies, so interacting through digital technologies, sharing information and content through digital technologies, engaging in citizenship through digital technologies, collaborating through digital technologies, netiquette and managing digital identity. And do you think any of those competencies are particularly relevant for our students, or not, and why?

WEFC teacher 1

I mean, relevant, all. For them as students, maybe not all of them, so managing digital identity, I'd say it's not so relevant in the studies field, at least at this point, but yeah, for example netiquette and when I was, uh doing, yeah, reading this, I thought. That's really interesting because sometimes when they send an e-mail right to us, it's, yeah, they're not really writing the e-mail they should be writing. So they I think their style is or they are much more aware of their, what style they should be writing in with essays, but not so much in emails for example. So I think that's social aspect, uh, in how to behave within the yeah digital world. It's lacking a little bit, and, but yeah, I think of course very important are the first 2. Uh. And then yeah, and the 4th, I guess and 5th. Less important, engaging in the citizenship and managing digital identity at this point anyway.

Paul Robertson

OK. And so you said netiquette, why I said, not competent really in the e-mail area. For any of the other digital, the other competencies, are they particularly competent or not competent?

WEFC teacher 1

I mean they can interact with digital technologies. Yes, some more than others. Erm, so I don't, I don't think they they explore maybe the the capabilities of other tools. So that would also be interesting for them to do. But again it's a learning process. So they'll get there. Umm, sharing information and content. I mean, they can be somewhat competent, but still they don't try to explore new ways.

Paul Robertson

Umm.

WEFC teacher 1

So I think that's important for them to to really just try engaging, engaging in *** in ***, yeah. Sorry, but yeah. No, I don't think they're very competent in that cos it just sort of feels like another world. Collaborating through digital technologies, I get, I think this one they're a bit more competent because they've been practicing this the most. Netiquette, somewhat not competent. And managing digital identity, I mean, I'm not sure about this one. I wouldn't be able to say, but if I had to guess somewhat not competent because they don't understand the relevance or yeah.

Paul Robertson

But yeah, I think that's one we don't directly see. Umm, yeah, yeah. We don't go look at their Facebook so yeah.

WEFC teacher 1

No, exactly.

Paul Robertson

OK. Interesting. And then thinking about the digital content creation area, how relevant do you think this area is for our students studies?

WEFC teacher 1

So, te, te, te.

Paul Robertson

So that's developing digital content, integrating and re elaborating copyright and licenses and programming.

WEFC teacher 1

So I think it's not at this level, I do. I would say it's not that relevant. The copyright and licenses, yes, in the sense of using other people's work, but everything else at this point, at least for our subject AES, I wouldn't say it's too relevant.

Paul Robertson

And how competent do you think that students are in this area?

WEFC teacher 1

I'm not sure, because we haven't seen, but probably not very competent at, they might be very competent in digital content creation if it's related to Instagram, I'm not sure, but I would I doubt that it's better or good in, I don't know LinkedIn or any sort of that, other, more professional aspects?

Paul Robertson

So, the kind of the social side and informal side, so you think probably quite competent?

WEFC teacher 1

Yes.

Paul Robertson

But the academic professional side not so much.

WEFC teacher 1

Umm.

Paul Robertson

OK. And to what extent do you feel the AES course has been designed to address this area?

WEFC teacher 1

Not much, but I also don't see their need I guess.

Paul Robertson

Yeah, yeah, interesting. And then thinking about the individual competencies.

Uh, do you think any particular or, I think you've said copyright and licenses is particularly relevant

WEFC teacher 1

Yes.

Paul Robertson

Any of the other ones particularly relevant or particularly not relevant for our students?

WEFC teacher 1

I mean relevant also I guess integrating and re elaborating digital content, in case they want to use it for their own work. But yeah, I would say less relevant for developing digital contents and programming is also not super relevant for us. I know some students do study programming, but yeah.

Paul Robertson

And do you think they're particularly competent or not competent in any of these competencies?

WEFC teacher 1

Umm I, I would say probably more towards not competent in all of them, but I guess now having done a few months with us, more competent in integrating and re-elaborating digital content and copyright and licenses. Yeah.

Paul Robertson

OK, cool. Interesting. And then final area, thinking about the area of safety, how relevant do you think this area is for our students studies?

WEFC teacher 1

It's very relevant. Uh, and I don't think they are aware of it.

Paul Robertson

What? Why do you think it's very relevant.

WEFC teacher 1

Well, because, yeah, we put so much information out there and we're not even aware of it. Right. And especially, I mean me myself, I already just ignore all the. Yeah, I've read it, but not really so.

Yeah, it's important to at least be aware of what can happen if you just don't read it, and I think they might not be very aware of it. Yeah.

Paul Robertson

Umm, so when you say you don't read, if you talking about like you're the cookies and the licensing and all that kind of thing, yeah.

WEFC teacher 1

Yeah, privacy and.

Paul Robertson

Yeah, privacy statements and what's happening with your data.

WEFC teacher 1

Yes.

Paul Robertson

Yeah. And then you said they're not very aware of it. Do you think they're very competent in this area or not? And why?

WEFC teacher 1

I would say no, but yeah, just because that would be my guess, right if us or a lot of adults don't care, then I or not that we don't care, but just it seems like too much and also the language they are using to define all the terms are always kind of tricky or wordy. So you just don't read it. So yeah.

Paul Robertson

Yeah. So the language presents a particular barrier.

WEFC teacher 1

So yeah, I would say so, yeah.

Paul Robertson

Yeah. Really interesting. And to what extent do you feel the Academic English Skills course has been designed to address this area?

WEFC teacher 1

Very little.

Paul Robertson

Yeah.

WEFC teacher 1

But yeah, uh, but because again, it's a, so it's not that relevant. So of course we will tell them carefully with fishy websites. But yeah, that's also to the in their hands. And also what worst case scenario they go to a weird website. They just get information that's not reliable. But that's it, right. Yeah.

Paul Robertson

Interesting, and then thinking about the competencies that make up this area. So protecting devices personal, protecting personal data and privacy, protecting health and well-being, and protecting the environment. Do you think any of the competencies are particularly relevant for us students, so particularly not relevant and why?

WEFC teacher 1

Umm. I mean, I think in general they're not so relevant for our students

Paul Robertson

Yeah.

WEFC teacher 1

Then as students then as human beings is something else. But as students at this level. I guess not so relevant. Yeah.

Paul Robertson

And do you think they're particularly competent or particularly not competent in any of these competencies? Why?

WEFC teacher 1

Probably particularly not competent.

Paul Robertson

Yeah, just not competent in all of them. Or just in general.

WEFC teacher 1

I mean, I guess protecting their devices. Maybe a bit more competent with because yeah, your phone, your computer. Usually you need a password to log in, so I guess there's some competency there, but still, I'm sure. They have uh documents or whatnot on their computers without passwords or something, so I'm not sure, so maybe a bit more competent in those things because so protecting devices and personal data. Because yeah, there's some sort of password in there, but not that. I wouldn't say that they're not very aware of, so maybe somewhat competent.

And protecting the environment, what is it talk, does it mean the environment out there or?

Paul Robertson

So, the way I interpret this it's to do with stuff like when you're finished with your laptop or your phone, well, do you just throw that somewhere where it goes to landfill, or does that get recycled? Are you aware of how much energy your computer uses, and like the internet servers and all that sort of stuff. How your technology use impacts the environment.

WEFC teacher 1

Umm.

Paul Robertson

And obviously at our level it's it's more personal, but like if you're working in a company, you know you have 500 computers, what you do with them, if it's a bigger impact I think.

WEFC teacher 1

Yeah. Umm yeah, I guess. I'm not sure. I honestly that will I guess would be not very competent because they're not or they may not be aware of what to do with their waste. But yeah, just I guess. Yeah.

Paul Robertson

So that that's kind of my interpretation. I yeah. OK. So now is the last area.

WEFC teacher 1

Yes.

Paul Robertson

Sorry I said it was the last area. Problem solving. So I thinking about the area of problem solving. How relevant do you think this is for our student studies?

WEFC teacher 1

Ah no, that one is particularly relevant, I would say, yeah.

Paul Robertson

And why?

WEFC teacher 1

I mean, because that's what the skills that you need nowadays and you need to be really good at or quick at problem solving and not just that, but really not getting stuck right? So if, yeah, you just need to be able to solve issues in a way or another. So, yeah.

Paul Robertson

How competent do you think our students are in this area?

WEFC teacher 1

Ah, again, differences between some students, other students. I think their background especially. I'm so not also, I mean language proficiency as well, but I think that has to do a lot with their background, so if they're they've had previous education which encourage them to be a bit more independent and definitely those are quite competent and others really are not so much and, yeah. Yeah, I guess it depends, yeah.

Paul Robertson

OK, no interesting. Yeah. And to what extent do you feel the AES course has been designed to address this area?

WEFC teacher 1

I mean, I think that's also is just a skill that you learn. So I don't think we explicitly, you know, tackle that in a way, but it's more as we go through different assignments and lessons you just come across issues and then we can help them develop this competency. But, yeah, I wouldn't say it's been designed for the for that to address that.

Paul Robertson

Interesting and thinking about the specific competency, so solving technical problems, identifying needs and technical logical responses creatively using digital technologies and identifying technological digital competence gaps.

Do you think any of those competencies are particularly relevant for our students or not? And and why?

WEFC teacher 1

Umm. I think they're all really important, actually, for for them as students, but also as human beings of our society. But yeah, all of them. Yeah.

Paul Robertson

Why?

WEFC teacher 1

Umm. Well, because again, those are skills that it seems that we're gonna be needing more of as time goes by, so. So yeah, COVID has made it even more obvious. So no, a lot of people don't even work from home every day of the week, so just this kind of things, I think definitely those are important and even for example, the identifying digital competence gaps, I think that one is also relevant. Uh, if it means what I think it would mean. So yeah, just understanding your own, but also other peoples, yeah, gaps, right. Yeah, yeah.

Paul Robertson

Yeah, actually that's really important. I, I've been framing it as thinking about yourself, but yeah, absolutely, thinking about, OK, this person doesn't know how to do this thing. So what do I need to do to support them as super important? Yeah, actually. Really good thing to think about that.

WEFC teacher 1

Yeah.

Paul Robertson

Umm do you think our students are particularly competent or particularly not competent in any of these areas?

WEFC teacher 1

Umm so I think, I'm not sure, I would say. I mean, yeah, I guess not competent, but that sounds very harsh. I think they just need to work on it.

Paul Robertson

Yeah, or not so competent.

WEFC teacher 1

Yes, not so competent and yeah, so solving technical problems, some of them better than others. But often I find myself having to tell them. Have you tried restarting your computer? And usually that solves the issue. So yeah, there is that.

And identifying needs and technological responses. So this one would be.

Paul Robertson

Yeah.

WEFC teacher 1

Sorry I have to this definition there. Yeah, I mean, I guess this one not so much, they don't really understand or they are not aware of the tools they have with the computer, right? Like even shortcuts or this kind of things do. They don't really know. So yeah, I think not so competent in that one. And using digital technologies creatively same. I think they kind of go together. They don't really explore what they can do. But I guess it's a process and identifying digital competence. As coming back to the first question, I think they are not really aware of how incomp..., not so competent they are.

Paul Robertson

Oh yeah, no. And if you're not aware how, how do you then fix that? Yeah, OK, interesting.

WEFC teacher 1

Exactly.

Paul Robertson

And yeah, before it I showed you DigComp, were you familiar with any of the digital competency or digital literacy frameworks?

WEFC teacher 1

No, not explicitly, no. So I know there is different. Yeah, aspects, but not really.

Paul Robertson

And have digital competencies and thinking about this as that influenced your decisions in the design and implementation of the AES course or lessons?

WEFC teacher 1

I mean definitely, but also as mentioned it takes so so much time also to for us to find the tools sometimes or to use to yeah plan the activity that sometimes it can take us too much time and that's part of the digital competence to develop for ourselves. So yeah I so I try to, and maybe one of the decisions could be to just not use certain tools because of time for example.

Paul Robertson

Yeah, absolutely. Yeah, I know there's no correct choices really. Are there any areas of digital competency you think the AES course might develop more?

WEFC teacher 1

Erm. Let me look at them again. Yeah. I mean, I think the first one information and data literacy, we already do a good job and that's the one. Yeah, to focus more, umm, communication and collaboration. Maybe we could focus a little bit more on.

Paul Robertson

Yeah.

WEFC teacher 1

But also again, I think it's just a process learning process. So I don't know. I think it's fine as it is, but we could do a little bit more I content creation that one could actually be nice for AES. So trying to use the Internet in a way or computer is a bit more instead of just basic presentations or essays ER, safety, I think it's fine like as it is and problem solving, I think it's also a lot of their individual work. So I think it's also OK like this.

Paul Robertson

Maybe not saying we actively have to teach something that they just will learn through doing.

WEFC teacher 1

Exactly, they'll just learned.

Paul Robertson

Yeah. And I I do think it would be nice to have some more interesting fun things in like the digital content, like making the little video or something, but.

WEFC teacher 1

Yeah, but it is time, yeah.

Paul Robertson

No, no, it's definitely time. And do you think that reflecting on the, did you comp framework will affect the way that you design or deliver a the AES course or similar courses in the future?

WEFC teacher 1

I mean, I think so because it's good to be aware also of the different competencies and sub fields within them. So what's important, what's relevant and for them, but also for myself also, yeah. Yeah.

Paul Robertson

And that is there any other comments or suggestions you would like to make related to digital competencies?

WEFC teacher 1

No, I think it's OK. It's a lot.

Paul Robertson

Yeah, it is a lot.

Paul Robertson

And just like one, final actually question, I think. Yeah, do you think? Yeah. Do you think that the, an IFY programme, an International Foundation programme is a an appropriate place for students to address digital competencies?

WEFC teacher 1

I mean yes, because there's a huge gap for a lot of them between, yeah, where they come from and where they are meant to be after the International Foundation year. So I think it's a good place and for them it's a great opportunity because we do give them this more individual attention and and also yeah, their classmates are smaller classes also allow for classmates to help each other. So yes. I yeah, it's uh is the there's a huge gap between some students and others and that's concerning. In a way.

Paul Robertson

Yeah. No, that's very understandable.

WEFC teacher 1

Yeah.

Paul Robertson

Umm and do you think there's anything in particular that you've noticed about this gap between certain students like what you mentioned a little bit about the autonomous work beforehand? Is there anything else which are you go those students tend to be more digitally competent and those students tend to be less digitally competent?

WEFC teacher 1

I think especially IB students. I mean, I don't know much about their programme, but those are really good but cause a lot of what they've learned already applies to AES, especially so they're really. Yeah, competent in a lot of those areas because I think they do encourage them to be independent as opposed to maybe other, but I'm not so familiar with what other kinds of education, and I don't want to generalize, but yeah, others maybe are, ah, yeah, less aware of it. Maybe they haven't used computer so much, or maybe in their countries could not use or don't didn't have access to specific tools. But that's just a guess.

Paul Robertson

Interesting that was very interesting. Thank you very much.

WEFC teacher 1

Thank you.

Paul Robertson

I'm the next steps will be, I'll check the transcript and make sure it's accurate and then send it for you to check that you agree with that. Ohh, and I'll also send you a participant debrief form which just gives you a little bit more information. And then a few months down the line. Once I finished my research and everything, I'll send like a summary of what I found and share that with you.

WEFC teacher 1

Looking forward.

Paul Robertson

Thank you so much once again and you have very final thoughts. Anything else?

WEFC teacher 1

No problem. And thank you for your. Yeah. No, I again. It's nice to be aware of this and it's really, I think it's quite useful too. Yeah, just break it down and looks quite simple like this also. In a way.

WEFC Teacher 2 (T2)

Paul Robertson

Thank you for volunteering to do an interview with me about your perceptions of digital competencies for English Medium international foundation year students. Before we start, I would like to confirm your responses to the statements from the consent form that I emailed you before the interview. A copy of the form is on the table in front of you. Please can you say “agree” or “disagree” after each of the following four statements from the form?

I confirm that I have read and understood the participant information sheet dated February 7th, 2023 for the above study. I have had the opportunity to consider the information, ask questions, and have had any questions answered satisfactorily.

WEFC teacher 2

I agree.

Paul Robertson

I understand that my participation is voluntary and that I am free to withdraw at any time without giving any reason, without my rights being affected. In addition, should I not wish to answer any particular question or questions, I am free to decline.

WEFC teacher 2

I agree.

Paul Robertson

I understand that, under the Data Protection Act, I can at any time ask for access to the information I provide and I can also request the destruction of that information if I wish.

WEFC teacher 2

Oh, yes, I agree.

Paul Robertson

I agree to take part in the above study.

WEFC teacher 2

I agree.

Paul Robertson

Thank you very much. We'll now move on to talk about your perceptions of digital competencies. Starting off, what does the term digital competencies mean to you?

WEFC teacher 2

Right. Okay. So this you know, I was thinking about this night and I think just the name changed so much, digital competency, and I guess they were trying to find something to cover everything.

I was thinking if I wrote it, that definition, I thought to be probably able to operate an educational setting so at school and or, you know, say school just a general education, at work.

Paul Robertson

Yeah.

WEFC teacher 2

But also overall now in society, I think that perhaps 20 years ago that wasn't always the case.

Paul Robertson

Yeah.

WEFC teacher 2

Now there is. But I thought the word competence that's interesting here. So in terms of where do you stop? And then people say you are competent now. So I think that depends on, you know, the level. What level does one have to be using to be using the digital technologies and what kind of digital technologies to be considered competent.

I think I don't think there's necessarily any one answer for you. It depends on where you are. So we can talk about what, later on, a student needs. So but that's what I was just trying to do to be able to literally operate and continue our day to day lives, for students as well and be using all digital technologies.

Paul Robertson

Yeah.

WEFC teacher 2

And then know you can put a lot of things on that were.

Paul Robertson

Absolutely, yeah. Very interesting. Do you think that our students have an accurate assessment of their own digital competence?

WEFC teacher 2

Not always, but it's fine because I mean. To be honest, students, I just look at the students that we have this not this year, but generally, the foundation levels. I think that's what I was thinking. Some learners, I think, have the high level of digital competency outside school life

Paul Robertson

Yes.

WEFC teacher 2

Erm, to be, you know, from buying something online, booking things, tickets online to using social media.

Paul Robertson

Hmm, yeah.

WEFC teacher 2

So that's sort of the social expat aspect of it, I think sometimes needs to do maybe assessing their abilities inaccurately, and , erm, then, um, well, I noticed that they tend to be less competent in a way in simple digital tasks, such as just simple, simple file management or email management than perhaps some of the more complex, such as editing a video

Paul Robertson

Yes.

WEFC teacher 2

You know, they are, actually, I see them editing a video, when you show them a new application, but you know, things like making a poster, Genially, etc. They pick up the basics of something new very quickly. But but something like like I said, taking care of their of laptops and, you know, sorting files and being able to find things like this when necessary and this.

I think the simpler tasks in a way that I'm not generalising, but that's what I noticed.

Paul Robertson

Yeah, very interesting. And so what have been your experience so far with students use of technology for educational purposes?

WEFC teacher 2

Erm, I think it it's it's a continuous the development it's very difficult to say this is has been my, this is the my experience.

Paul Robertson

No no no change

WEFC teacher 2

Just sort of changing, I guess the good and the bad.

Paul Robertson

Hmm.

WEFC teacher 2

I think every time we notice something bad, we try and find ways to turn that bad into to good, you know, things like finding information online and then, you know, how to use that and how not to sort of, you know, cheat, etc.

I think what I notice is that, student needs to be trained on how to use the digital technologies for educational purposes, properly.

But on top of that, the teachers need to be trained as well as, the educators need to be trained as well. I mean, you know, I suppose of that generation, you know. I had, you know, digital technology in my life.

But, you know, back in university, which I finished in the nineties, mid-nineties, I did have computer assisted learning and it was a module at university, it was new, and I had that even back in high

school and I finished high school in the nineties and I had that, digital learn. But, it was coming. It was very, you know, just a little and still it was just so abstract, you know, that we still had to write some of assignments by hand. But then also, I think, maybe my 2nd or 3rd university, we switched to typing.

Paul Robertson

Yeah.

WEFC teacher 2

So, you know, I kind of went through that and every year we had something new.

Paul Robertson

Yes.

WEFC teacher 2

You know, the Smartboards and then smartboards got better, you know, and that we have the **VLE** and then etc., so, sort of new things and you know, you learn a little bit and then something else is thrown at you, I think so, both needs to be educated to be hopefully use it for educational purposes.

But also I think that. What we're teaching them the curriculum is to follow that as well. I just sometimes think that, you know, it's all good, we have all the virtual learning environments. We have things online, maybe, I mean to be honest, Covid changed everything as well.

So we have all that, but it's almost like, all that work. The curriculum that we have, or the syllabuses, you know, we write the programmes but not necessarily take everything else into consideration.

Sometimes I think it's just that there are two or three different paths, which I think need to find a way to merge them properly so that it's its part of it. Nothing, nothing, nothing on the side. I don't know if you understand.

Paul Robertson

I'm trying to figure it out. So when you say this. So you're saying the curriculum doesn't cover kind of the technology tools that are ***?

WEFC teacher 2

I don't think it's its there, to be to use it perhaps, or you can do it this way as well. Look, you're doing something in the class, but also if you go on to the **VLE**, there is this as well. And I noticed that at the students, especially at the lower levels, they don't necessarily go do that extra thing.

Perhaps that's put on the you know, that's using digital technologies.

Paul Robertson

Yeah.

WEFC teacher 2

So maybe we need to look at the assessment, then we need to look at the delivery of programmes, the writing of the programmes in a way that it's, it's part of it. You know how some of the technology we use in real life now, that's the only way to do it. There is no other way of doing it, so it sort of needs to be like that. I know where we have this all blended learning.

Paul Robertson

But there should be some sort of explicit focus in terms of both the learning outcomes, but also in terms of the assessment of digital competencies.

WEFC teacher 2

Exactly. And then there's also the you know, you have the new teacher training programmes and also the teachers who didn't necessarily go through that kind of education are given the support, because sometimes I feel that you have all this extra work because you're doing the work and then at the same time you're being asked, oh, can you also learn all these sort of the new digital applications there, too?

And, you know, there's so many of them. So I think that's a yeah.

Paul Robertson

That's really, really fascinating, actually. So I'd like us to think about the DigComp framework and talk about each area and think all your thoughts and perceptions.

So firstly, you've had to look at the DigComp framework?

WEFC teacher 2

I did, yes.

Paul Robertson

Did you understand it? Did it seem clear?

WEFC teacher 2

Yeah. Yeah. I mean, yeah, I went through. Yeah, yeah.

Paul Robertson

Well, if there's any bits where we're not, we can, we can talk about them. So erm, thinking about, of that area of information and data literacy, how relevant do you think this area is for our students, and why?

WEFC teacher 2

Yeah, I mean, this one is extremely relevant and yeah, because this is all in a way all they do. I have the competencies here as well. I think because some of these words, they just, you read them even as a teacher. And this just sounds abstract, but does that sort of thing.

But yeah, I mean, looking at it, browsing, researching, filtering data, information, digital content, this is this is what they have to do throughout the, their studies and you know, and now it starts much earlier.

It depends on the school they, high school that you go to. But, evaluating that information, digital content, all that, doing it, managing data there, all sorts of other things going on as well because in order to do that, it's all this sort of critical thinking, making decisions that's going on with these as well. So, yeah, extremely difficult. Eh, sorry, extremely important sort of thing.

Paul Robertson

And how competent do you feel our students are in this area?

WEFC teacher 2

I was thinking, I mean, some are some are good. Some are very good. Some are not so good. But I was just looking at it, especially with those who come from IB type of backgrounds...

Paul Robertson

Yes.

WEFC teacher 2

...or it doesn't have to be IB, the type of high schools that deliver, different types of curriculum, so less sort of, still exam focused, but, you know, sort of embraced a new type of assessment, lots of group works and writing longer essays, etc. so that sort of thing.

I just said IB because IB does that.

Paul Robertson

Yes.

WEFC teacher 2

You know, having to produce longer papers. And so I thought they have, you can see that they have a bit of a foundation. They're not all good, but they have a bit of foundation to have an understanding of it.

And I was thinking. The ones who are not perhaps not very good at, what I noticed that it's not that they don't have the ability, they do have the ability and the capacity to use a properly, or that they don't understand that. Why do I have to? Because I think they do.

The understanding that it's there as well. But what I notice is that they don't always allow enough time. I mean, at this point, I'm just going to make it very simple, but at this level, foundation level research takes a long time. I mean, research takes a long time at Masters level. But, you know, you're a bit more kind of, you know, experienced there it takes a long time. And I don't think students really I think dedicate enough time.

Paul Robertson

Yeah.

WEFC teacher 2

To do, for the research and the time that their research deserves. Yes. So. So I'm talking all of them information and data literacy, actually locating, browsing and then making a decision.

And then you got to that point and now you found the thing that you want to use the paper, but then what do you do with that? Because I noticed that some of them, they just put it right next to a blank A4 and trying to take things from there, there and then and then sort of putting it on the A4. But you know, they're not there, that they can't do that kind of writing.

So I think there is that they don't necessarily dedicate enough time and and I think most of them, I notice that they just use the technology to finish the task.

Paul Robertson

Okay.

WEFC teacher 2

They just they complete, the task that needs to be completed and submitted to the *** there because there's a grade attached to it.

Paul Robertson

Yeah.

WEFC teacher 2

But whether or not they follow the process in order to get better at it, in order to get faster at it, not all of them do.

Paul Robertson

Ok, so, so they're maybe completing the assessments, but not in necessarily the way we would expect them is not in the way of what we would expect them to develop the skills and that.

WEFC teacher 2

Yes. And then that that sort of more complex skills that we want them to develop. It's not necessarily, you know they finish the question, it's just not there and then they end up learning it the hard way.

Paul Robertson

Yes.

WEFC teacher 2

And they're the ones who are not perhaps very academic or then they would they will find it impossible in a way, and then then not be able to cope with the type of research that they have to do and information they have to *** at the university level.

Paul Robertson

And then how much do you think, to what extent do you think the AES course is being designed to address this area?

WEFC teacher 2

I think it I think it tries. It tries to do its best. Erm, but I think what I've seen at a lower levels like we have, at foundation levels and freshman, first year, I'm more, I think I support a different type of assessment that will that will encourage students even without them feeling that oh I'm being encouraged as a result of covertly encouraging students to, to do that information and that data literacy properly, you know those types, and I think we will notice and some of the institutions are doing this, maybe if it's a small institution it's easier to do that, at big institutions, it might be difficult.

But the I think assessments, perhaps need to change a little bit. I mean, I don't know, for example, I will do more timed writing rather than take home type of essays.

Paul Robertson

Yeah

WEFC teacher 2

At least more at foundation of I will give the bigger weighting to that and still ask them to do the research. But they, you know, they properly do the research and bring the research to the exam.

Paul Robertson

Yeah.

WEFC teacher 2

Because then we can actually, you know, those simple paraphrasing. I mean we say simple, but that's where it all starts. *** paraphrasing, finding the right information and then using, er, you know, using citations, etc., they have it and then they have the writing right there and then because they can focus on it, that's one way of doing it. There're different types of system.

I think we all need to think about it as the the digital competencies or the digital applications get more and more complicated. There's more artificial intelligence. I think there's here you go, there's a topic, write 5000 words, not an assessment anymore, write one, 1000 words, just can't, I don't think that achieves anything.

Paul Robertson

No, so assessment methods are outdated and assessment methods don't force the development and testing of it. Okay.

WEFC teacher 2

I think, AES, perhaps that perhaps fails there.

Paul Robertson

Yeah

WEFC teacher 2

Otherwise, when you look at the programme, I think it tries to covers the digital competencies framework and all that. I mean...

Paul Robertson

Yeah

WEFC teacher 2

...at this level. Yeah. And but in the end you can cover it, but whether or not you actually they follow the process.

Paul Robertson

No. So do you think any of the assessments or elements of like the coursework of AES do address that information and data literacy?

WEFC teacher 2

Well, yes. I mean, you know, did the one the CW1 plus the you know, the annotated bibliography, is supposed to do that, but what I noticed is that they again, students do that, but then you notice you look at what they produce and CW1 and then look at the final paper.

There's a big gap. It's almost like two different assignments. I mean, I'm not saying they're all that, we had very good students, you know, who again comes with a bit more educational background and different attitude towards, you know, learning as well.

You know, they connect those two.

Paul Robertson

Yeah.

WEFC teacher 2

But otherwise it's just becomes this two separate assignments and and CW1, oh, I wrote. You know, I found five sources and I wrote something about them.

And also, I think it's quite of course, you need some sort of a template or framework...

Paul Robertson

Yes.

WEFC teacher 2

...In order to standardize, and marking, you got to do all that as well. But I think we did more thinking and go into that to see that they're not repeating that. Actually, when they look at the source, they actually ask the right questions and critically analyse. And I think...

Paul Robertson

Yeah.

WEFC teacher 2

...so the assignment is that it could be done in a different way.

Paul Robertson

Yeah.

WEFC teacher 2

But yeah, I mean, you know, that actually is a very important assignment, CW1

Paul Robertson

So in theory it kind of does to address this issue, but in practice it doesn't effectively. Okay, that's really interesting, actually. Okay. Ok, well, thinking about the individual competencies of browsing, evaluating and managing data, do you think any of those competencies are particularly relevant for our students or not?

WEFC teacher 2

Yeah, I thought one and two, so browsing research and filtering data, information and digital content. You know, they start we get them to start doing the straight ahead, you know, right from the beginning.

Erm, and, and even before you get to sort of AES, even just looking at the website and for other, for outside class, sort of information to do with the programme what they're going to, etc. But yes, I think that's very important.

And of course, evaluating data, information and digital content and evaluating data. I think, you know, they finished a year and still we can't really say that they're 100%, yes they can do, you know, evaluate data. So I think that's those two at the foundation level, very important.

Erm, and, erm, managing data information. And they just I mean, just depends on what it is. Managing data can be something very complex.

Paul Robertson

Yeah.

WEFC teacher 2

You know, you know, you might be working for a big company or they're managing your data, but managing data could be just managing your own sources, or files.

Paul Robertson

Yeah, absolutely.

WEFC teacher 2

So or keeping, you know, just as simple as that which starts from that and these are transferable skills. So I thought in terms of the actual programme, one and two.

Paul Robertson

Yeah, okay, cool. And then maybe a little bit more basic level of managing data rather than that more advanced. So interesting. So you're kind of differentiating the kind of proficiency level which is more relevant for this.

WEFC teacher 2

I mean, you know, like I said, managing data is just creating the right folders. And and I just noticed this for RAE, I was you know, I generally get students in the beginning of the year to I mean, for AES as well to create folder subfolders and start putting in the right places. And but as I walk around in the class, I still see students, lots of things on their on their desktop and things that've not been named files, they're not named properly.

So then that's just then when you ask them to browse for things, look for things, er, say, oh, I can find, so what they do is they just do a re, search in their laptop, which is great because then they have their skill actually, but do they need to use that?

So just sort of I think managing data, I looked at it at that level for us,

Paul Robertson

That's really interesting. And then thinking about their level of competencies, do you think any of them that competent or particularly not competent in any of those areas?

WEFC teacher 2

Yeah, I think this whole managing data information. Also it's hard to get through to them because they think they can do it.

Paul Robertson

Yeah.

WEFC teacher 2

And when you talk about these very simple things, it's almost like they resist.

Paul Robertson

Yeah.

WEFC teacher 2

And then when you ask them, oh, it's on the, on the **VLE**, go find it, they see that as either a punishment this like, oh no, I just, you know, why can't you just tell me sort of things?

I don't know. I think I do see students, you know, do quite well, you know, browsing and searching and filtering data.

They some of them are very good but to do like you use the thing I think databases.

Paul Robertson

Yeah.

WEFC teacher 2

Yeah. I think maybe I don't know, they they probably I mean, we all learn as well. So perhaps I remember the library delivered a little workshop and I was doing my degree of my master's degree how to actually locate things. And it's, you know, it's quite difficult. You can waste a lot of time.

So I think things like that, perhaps they're not that good at just initial finding information, I think they're okay. They they try and they try and find things.

I mean, I'll talk about that later on. But I think the one of the thing, what did I write it here. Ah I said so they can do basic research suitable for foundation level.

But I, I still have doubts about the type of questions, the type of assessments that we use which requires understanding of articles written by experts.

Paul Robertson

Yes.

WEFC teacher 2

Or those with more subject knowledge. Because you need to be able to. So, you know, filter that knowledge and understand what is good, what is not.

Paul Robertson

Yes.

WEFC teacher 2

So, I think I have some doubts and I voiced these doubts before. But I think there is a but otherwise I think initially basic research. You know, they leave. They can do it. They and they.

Paul Robertson

And why do you think they can do that?

WEFC teacher 2

What do you mean?

Paul Robertson

Well, what. What? How they develop that ability. Why? Why do they have that ability?

WEFC teacher 2

You mean.

Paul Robertson

Well to find information and that kind of thing.

WEFC teacher 2

I think once translated, I mean, initially when we show them, okay. Know, introduce them to sort of simple sort of Google Scholar or even some of the academic databases, especially the ones that we have. You know, they they grew up with that with digital competence. I mean, they don't really know a world that these things didn't exist.

So they have to do everything simple, even just buying tickets, etc. They have to find things online. So they have that kind of background anyway. So it's not that difficult for them to switch those literally the motor skills into looking for perhaps more complex information, you know, for their studies. I think they can do that, but. I still see them to go for Google, for example, and that type in.

Just, you know, looking at the keywords that they use, they say, say, I use this keywords in my assignment. Some of them, I think maybe just they just and some of them think, how can this keyword go to that article?

So they don't necessarily have that. And also still, they go to Google and that they type something and they look at the first three things that pop up and then and then then they have to go through, Oh, is this something that I can rely on or not? I mean, they should start with just a minute, that this is not what I started out on.

So that's what I was trying to say.

Paul Robertson

And then moving on to think about communication and collaboration. How, how relevant do you think this area is for student studies?

WEFC teacher 2

Yeah, I mean, it's it's relevant. I mean, they do this probably more often than the previous one. You know, for educational purposes, for to socialize. And it depending on what kind of school they came from, what kind of this was, depending on the education systems and the countries they come from.

You know, they already have this type of thing communicating using digital competencies back in high school.

Paul Robertson

Yeah.

WEFC teacher 2

So so it is it is important communication and collaboration.

Paul Robertson

Interesting, erm and how competent do you think students are in this area overall?

WEFC teacher 2

I think they're very fluent. That's what I was trying to they're also I don't know whether I can use that word fluent, like that for this. So they know how to do these things fast, but not always very competently.

Paul Robertson

Yeah.

WEFC teacher 2

So I you know, that's what I was I was thinking, you know, I don't know whether I can use that. For example, I was looking at also **VLE**, just to see what because you know, there are in, the **VLE**, there have sections where students collaborate, you know, during class, outside class, etc., and sending messages and and making themselves themselves clear to convey a message.

But not just the language, but using it for communication. So you can see I noticed some of the similar names, the same names, you know, and not all the time. So that's what I was just trying to say, whether or not this is competence, again, it's debatable, maybe, you know. For some students, unless it's a must, it's attached to an a grade, they don't necessarily go and do that thing extra.

But I would say, you know, in terms of, you know, using digital technology for communication, collaboration, they know they know how to do it.

Paul Robertson

Okay, cool. And then thinking about, is the AES course how, how, to what extent do you feel the AES course has been designed to address this area?

WEFC teacher 2

Well, again, it's it's designed that we have the AES programme. I'm not teaching this year, so I don't know the details. But, you know, I think **VLE** is encourage collaborative learning. You know they have to do things whether or not we're using completely that that's another question. Erm, I think perhaps you know. All right. Is all the learning in a way happened there, but do you see what I mean? They, they use that in a way in the class as well. Maybe there could be more collaboration.

Paul Robertson

Yes.

WEFC teacher 2

But, you know, I don't I don't want to put it down like, you know, with things like the use of Padlet a lot.

Paul Robertson

Yes.

WEFC teacher 2

Which I think now students got the hang of it. You know, they they write things, they upload things. They they some of my students, for example, even though it wasn't a it was it was optional, keeping a Padlet for for each of their assignments. I notice that some of them instead of keeping they're keeping your files, you know, as word files, as .pdf files etc. on their laptop they use a Padlet

Paul Roberson

Oh really?

WEFC teacher 2

And I think that's quite nice because I said you can you can decide but you should keep all your evidence just in case, that's it, you're going to resit, so you need some of your files. So some of them kept a Padlet, which I thought, that's quite nice. You know, a few years ago, I wouldn't have done it. So I thought, you know, that's that's that's quite nice. So and I thought the students seemed to be enjoying that.

Paul Roberson

Yeah.

WEFC teacher 2

And, you know, anything that sort of encourages just a little bit of competition, I noticed that they, you know, they're willing to to collaborate and use it.

And again, I had students in the past who use Asana for group projects successfully.

Paul Roberson

Oh really?

WEFC teacher 2

They did it themselves. I mean, you know, two groups. And again, it's the level of students as well.

Paul Roberson

Yeah.

WEFC teacher 2

But they were very good. Mostly, they switched to, with the group project, you know, putting together an Instagram account and they write each other or WhatsApp.

But you know, I have groups like that as well. Right from the beginning they use that a project management software.

Paul Roberson

Interesting.

WEFC teacher 2

And so I thought that was, that was very nice. Yeah.

Paul Roberson

So sometimes it's not necessary that the course is always designed explicitly to address this, but sometimes that by putting a task there students then go and develop these skills and do stuff independently in order to solve the problem.

WEFC teacher 2

In order to solve the problems, and I don't I suppose it has to be part of it's almost like at this level you either do that or not..

Paul Robertson

Yes.

WEFC teacher 2

When you give them as an option. Only some, or a few, you know, sort of take and accept it and the other's like, oh, this is something extra.

Paul Robertson

Yeah. And what do you say that those ones who take it and accept it are, will be the ones who are already relatively competent

WEFC teacher 2

They're, they're a little bit yeah, further, and they're open to improve their skills.

Paul Robertson

So they've got kind of a more open attitude, a more open mindset towards it. So it's not necessarily the skills, but they develop an attitude.

WEFC teacher 2

They've developed an attitude as well. And I mean. I know we're saying we can't hold their hands, etc., which I, I can see. I think maybe for us AES we're, you know, then the foundation level. You have to find a balance there.

Paul Robertson

Yeah.

WEFC teacher 2

Yes. Don't spoon feed them. Okay. They need to develop them. But at the same time, then we need to create the classes or the programme in a way that that encourages them to do that.

Paul Robertson

Yeah.

WEFC teacher 2

And almost sort of makes it sort of compulsory that they some of the things we have to otherwise, you know, they maybe complete the task again, but they didn't necessarily how can I say suffer because to get to that higher level of thinking, to be able to do that.

Paul Robertson

Yes. They didn't put enough hard work, they kind of completed on the surface, but not the depth.

WEFC teacher 2

Not the depth.

Paul Robertson

That's really interesting

WEFC teacher 2

And then following through a long project, for example. It's quite hard, you know, for everyone, but also for harder for our students.

Paul Robertson

Ok, interesting. And then thinking about the individual competencies. So interacting through digital technologies, sharing information content, engaging in citizenship, collaborating, and netiquette and managing Digital Identity, do you think any of these competencies are particularly relevant or not relevant for our students? And why do you think they're relevant?

WEFC teacher 2

Almost like everything relevant. Maybe not the citizenship thing, but I think I said one, two, four, five, they're really relevant. So interacting with digital technologies, sharing information content with digital technologies because they do this know and for collaborating through digital technologies and etiquette.

Paul Robertson

Yeah

WEFC teacher 2

That's very important. It's, it's, it's not taken necessarily seriously, not by all students, but it is important. Managing digital identity. I thought that this is more important in general, not necessarily in educational context, but, you know, outside.

And that is important as well because, you know, that's that's the part of the university life as well.

Paul Robertson

Yes.

WEFC teacher 2

Your social. your personal presence there, your social life. So I think that that will become very important later on.

Paul Robertson

Interesting.

WEFC teacher 2

Digital identity, you know. And and some of the things, for example, I noticed that the students talk about some of the platforms they use.

For example, I've heard of them, but I never use them. So I find myself like, should I go open an account and have a look at it, how this works, because that's also changing as well.

But yeah, I thought one, two, four, five, you know, they have to, you know, it's all part of the *** and you know, you can't.

I suppose you can't, we used to say things like, Oh, I'm not good with technologies. Just, you know, like people saying I'm not good at maths, but you know, you can't say that anymore. You know, and also I don't think it means anything. And I think people who even say those things don't realise, actually they do use technology.

Paul Robertson

Yeah. So they maybe don't have an awareness of where they are using it and what they are good at.

WEFC teacher 2

*** *** to the competence level. I mean, you know, my 76 year old mum uses technology...

Paul Robertson

Oh, yeah yeah yeah.

WEFC teacher 2

...she has certain things, she has tablets and she does her things using tablets. So those are very important. It's just part of it. And they, you know, all schools, you know, it starts right from the from the beginning.

Paul Robertson

So then do you think they're particularly competent or not competent in any of these areas, and why?

WEFC teacher 2

I mean, like I said, the interactions through digital technologies, they are competent, Whether they are doing it in the in a in them in a proper way to to aid in their studies. I think that's something they're going to they are developing and continue to develop.

And netiquette, I noticed that some of the students this year when I actually *** you know, this whole can how to use a, you know, the sort of using a certain register how to write, what to write, etc.

Paul Robertson

Yeah

WEFC teacher 2

Erm, some of them, I noticed they start to take notice, I notice a change in their emails, but also they when we do, for example, work, group work for a working class, the language they use is really, you know.

And, you know, sort of, you know, we put something and people they just need to write a little bit of feedback.

It is sort of there. But again, it's it's really on the sort of, for them, the background.

You know, I think that's the sort of the the age as well.

Paul Robertson

Yeah

WEFC teacher 2

And so I would say that one perhaps needs still needs to be part of it.

Paul Robertson

Yeah.

WEFC teacher 2

Because it's not just about register, but you know, they need to be able to operate in an international environment where I mean, I don't want to use the word culture carelessly, but and, you know, you want you want something, you want to get something done and you need to be able to to learn how to ask for that, what to do.

Paul Robertson

Um hum, yes.

WEFC teacher 2

So and I'm talking about simple, simple things.

Paul Robertson

Er, yeah yeah yeah.

WEFC teacher 2

So, you know, I think that could be still the part of, you know, our education as well because, yes AES and everything is very much academic.

Paul Robertson

Yes.

WEFC teacher 2

But there is a practical side of that as well, being basically operate and survive the university environment as an international student. So in that sense, I think the etiquette is important. Could be we could have more of this.

Paul Robertson

So, more kind of the pragmatic side.

WEFC teacher 2

Pragmatic, like, you know, almost like applied a bit of it.

Paul Robertson

Ah, no definitely yeah. Really interesting actually. Cool. Well thinking about the next area, digital content creation, how relevant do you think this area is for our students studies?

WEFC teacher 2

It's, it's when I compared to the previous one. I thought maybe a bit less than the others, but it's going to be very important once they get to university. I mean, this is another thing.

When I started seeing this whole sort of content creator, content creator, I always thought in my head, is this something different.

You know, sometimes the the they use the different, you know, semantics change, oh, this is what it means sort of thing, but.

Paul Robertson

Yeah.

WEFC teacher 2

I mean, we even here, we ask them to create content digitally. So that we can look at it there as well.

But again, I think before in as opposed to this whole kind of the the earlier one, the information, I think I will put that one first.

Paul Robertson

Yeah.

WEFC teacher 2

Because first of all, in order to create the content, they need to understand, and find the content, the right content and then then it comes to the content creation, but it is still important so we should still address and then again even just using Padlet, that's content creation a little bit little bit it needs to be part of it. But I think it will be a very important at university I think.

Paul Robertson

Ok, cool. And how competent do you think our students are in this area?

WEFC teacher 2

Um, let me see. What did I say? They are okay. They don't always understand, you know, this sort of copyright taking a photo.

Some are *** and some are ***. Some of them use videos. And I'm thinking, okay, where did you get the videos? And even just asking the question. I think that, sometimes we don't know as educators, you know, we need to go search for the information and they don't necessarily do that.

Paul Robertson

So when you say asking the question, which question are you thinking there?

WEFC teacher 2

Like whether or not I can just take this video from this site and put it in my assignments without attributing to anybody and the photos.

And so it's I mean, I just kind of look at that, but so they don't always understand it. But what I will say is that in terms of, for example, you know, to create content how something works. They pick up very quickly.

Paul Robertson

So the technical aspect that they pick up, but then the kind of cognitive complex or ethical issues or standards.

WEFC teacher 2

But of course, that's your need to improve the the other skills, you know, this whole kind of what to put in the content that I think that's.

Paul Robertson

So, then the critical thinking.

WEFC teacher 2

The critical thinking and what I can use, what I can't use. So otherwise the technology that those skills they're there.

Paul Robertson

Ok, really interesting. And to what extent do you think AES has been designed to address this area?

WEFC teacher 2

Erm, again, so I think a bit better, but the assignments, I don't know that any of that assessment in AES, I don't think they changed since I started. So it can encourage more creative assignments.

You know, we can we can write the assignments in a more creative way.

Paul Robertson

Yeah.

WEFC teacher 2

I mean, we do ask them produce presentations. So that's that's quite nice.

Paul Robertson

Yeah.

WEFC teacher 2

But, this does not necessarily encouraged. You know, when I look at the subpoints for digital content, EU framework doesn't necessarily include that.

And so I think, yes, assessment, you know, you need to you need to look at the assessments, need to catch up the type of assessments that we use, need to catch on with the digital.

Paul Robertson

Yes,

WEFC teacher 2

The speed of the digital, you know, literacy. So, um, so yeah, it could be, could all be done in a different way. And even like, for example, I remember we changed one of our presentation assignment into, they had to create a video and upload.

Paul Robertson

Yeah.

WEFC teacher 2

And, and yeah. So they sort of, so, you know, they, they just kind of had to do that rather than standing in front of the class. And then we had, I think we, we asked them to do like a TED Talk kind of, kind of presentation and upload it.

Paul Robertson

And when you when you say we

WEFC teacher 2

Sorry, I'm talking, back in the UK when I was working with again foundation levels.

Paul Robertson

Yeah yeah yeah.

WEFC teacher 2

For their speaking presentation we had we we we we in that we ended up changing it, it used to be just presentation we use three things so we have a debate for example, they had to do a debate and then one of them is this they had to create a video and upload it and then they had to create, put subtitles, etc. So they all have to do that.

So what I mean, I'm not saying that's the right way to do it. I'm just saying that, you know, we need to we need to give them the opportunity to them to be able to do that.

Unless we create the assignments accordingly, it's not going to happen because they're going to try a complete assignment first because that's attached to a grade than this other thing. Oh yeah. When I have 5 minutes, maybe I'll just go and do this to improve my digital literacy in this area.

Paul Robertson

Okay, great. Okay. You know, really interesting. Really, really interesting, actually. Do you think that any of these particular competencies are developing digital content integration, re-elaborating, copyright and licenses and programming? Do you think any of those are particularly relevant for our students or not?

WEFC teacher 2

I said, I suppose it is not programming at the moment. I mean, I know some of them take programming classes, but, you know, I don't I don't know enough.

Again, it is important developing digital content because we do ask them do create presentations and and then also integrating and re-elaborating digital content.

Again, they do presentations, but it's not always it's become something, instead of holding a piece of paper and reading from that, they just read from the PowerPoint.

And that's not necessarily. Ok, I created the content. But, you know, it's not necessarily, you know, this whole re-elaborating the content. So why what's the difference having a piece of paper or a PowerPoint?

I think that's important as well. And also, I think all of these it it contributes towards developing critical, critical thinking. Criticality.

So, yeah, I mean, copyright and licenses, I think eventually they'll learn at the moment, I think yeah yeah. If we can get them to understand the, you know, the creating a reference list, a bibliography, citing properly using this actively and understanding that I think copyright and licenses of this you know I think will come covers a lot of things.

Paul Robertson

And then do you think that particularly competent or particularly not competent in any of these areas,

WEFC teacher 2

Some are very good at, for example, things like creating charts. They have to create some charts for me for for RAE. And I just of them, they just figured out they created it. And then I noticed that there were a *** of them teaching the others.

So I think again. They pick it up very quickly. Sometimes I noticed that they leave it there at the basic level.

Paul Robertson

Okay, they don't necessarily push themselves.

WEFC teacher 2

Of course, I don't really know what they did with them at the, you know, the econ class. But perhaps there there are things that they they need to do now. I mean, it's interesting, this kid who can't well,

can't really type fast because we were talking about touch typing is so good at, he taught himself, literally in one hour, how to create charts using Excel.

Paul Robertson

Wow.

WEFC teacher 2

He just watched YouTube videos like, Oh, I can do this. So it's basically he just did it. I mean, that's more complex, like I said. But I ask him to write a little paragraph. He says, Oh, I don't I don't really know how to type properly. So I go like this and it takes me ages. So you see what's happening.

And so now I was just saying, well, I know at university, you know, you have to sort everything for him takes longer when he tries to finish an assignment.

So you're thinking the basic thing is missing, but yet he has the capacity. He just, you know.

Paul Robertson

So, that's fascinating. Some students are very advanced in certain areas, but then other areas are very, very remedial

WEFC teacher 2

Like it might be because they never had to do that back in high school. But then some kids, you know, roleplaying games, computer games, all sorts of things, they already have.

Paul Robertson

Yes.

WEFC teacher 2

Complex, erm, you know, abilities.

Paul Robertson

OK, that's really fascinating. Ok, cool, excellent. And then thinking a little bit about the safety, how relevant do you think this area is for our students' studies?

WEFC teacher 2

I think, erm, extremely, in general extremely. Though, I think, like I said, it's just at the moment it's more not necessarily during the foundation but it's more important outside class and it will be more important at university as well.

Paul Robertson

Yeah.

WEFC teacher 2

But I don't know, the safety might be also to do with the actual, you know, you know, computer, safe and you know, understanding, you know, it's just kind of, you know, the virus and things like that. So there is that as well. So I think those are the, you know, that sort of I suppose later.

Paul Robertson

Yeah.

WEFC teacher 2

But what I noticed is that it is very good, you know, when you have a car, if you know just a little bit about your car, it helps.

Paul Robertson

Yes.

WEFC teacher 2

I think same thing with the computer. You have a backup if you just understand the computers, how, not this information, but the thing, hardware works. And if if anything goes wrong, maybe, you know, just a little bit.

Paul Robertson

Yes. Yeah.

WEFC teacher 2

I think that helps. And I think that's important. And that could still be part of the maybe I don't know, maybe not the syllabus, but part of the course.

Paul Robertson

The programme.

WEFC teacher 2

The programme, again, could be taught to them *** you know, the **VLE**

Paul Robertson

Yeah, that's very interesting. And then how competent do you think our students are in the area of safety?

WEFC teacher 2

I mean, in terms of keeping their information safe, etc., they are competent, but they don't necessarily follow their own advice. You ask them, how to be safe, oh, they write it pages and pages. Oh, you can do is you can do that.

And then you ask them like, Oh, yeah, I don't I don't always do it. I don't always use the privacy settings for this. I don't always use ***, and so that's another thing. But I think that also comes with age still.

The consequences can be more detrimental in this era than it was before.

Paul Robertson

Oh, definitely.

WEFC teacher 2

So I think they need to be, they need to be aware of that because because the kids were talking about it at the high school Photoshop and making each other upset.

Paul Robertson

That's interesting.

WEFC teacher 2

So, you know, things like that happened which, you know, that didn't happen, but.

Paul Robertson

Oh, no, no, no.

WEFC teacher 2

So and so I think. Yes, understanding that, you know, it's it is difficult. It's very difficult. And it can be very difficult. It could make their lives very difficult. So, erm, yeah.

Paul Robertson

OK, really interesting. And then to what extent do you think the AES course has been designed to address those areas?

WEFC teacher 2

I know I was thinking about it, so I suppose I remember not much. I don't think necessarily we directly teach them how to do this. I know certain things we try and cover in the tutorials.

But again, tutorials is just what do you cover in that one hour? It's not necessarily, it becomes something, do this, do that. And so it's not not much.

Paul Robertson

Okay. And then thinking on the individual competencies of protecting devices, personal data and privacy, health and wellbeing, environment, do you think any of the competencies are particularly relevant for our students or not?

WEFC teacher 2

Protecting personal data privacy. That is important, even just simple things. You know, somebody can actually steal your assignment. And then you're going to be in trouble. How are you going to prove that? Erm, at the moment when you talk about things like that, students says, oh no, no, no, that's such as fringe thing. You know, they just could.

I think, protecting health and wellbeing. I see that sort of happening in class as well. And also, you know, they all like I said, they use their laptop as well for other things as far as like socialize, play games, etc., etc.

And at the moment they're not there because also they're young, but they they recover from things very quickly. So that's why you.

Paul Robertson

Yeah, yeah, yeah.

WEFC teacher 2

But that's important to understanding that you know you still, you should be in charge of that, that things shouldn't be the laptop or your, you know, the digital life, etc. shouldn't be, shouldn't be the boss in a way. He shouldn't be running, you know, it should be the other way around.

I think you learn that, you know, as you progress.

Paul Robertson

So when you said, oh, you see kind of the issues of health and well-being in the classroom, I wondered what exactly you meant.

WEFC teacher 2

Oh, I wasn't thinking about in the classroom, actually. I was more thinking about sorry, outside the classroom because it's like too much.

Paul Robertson

Right, yes, that makes sense. Sorry, I thought you meant in the classroom.

WEFC teacher 2

Oh no, I was just, yes.

Paul Robertson

Okay. And do you think they are particularly competent or not competent in any of these areas?

WEFC teacher 2

Um, I think they, they have an understanding and some of them are very competent. They don't always do what they're supposed to do. I notice that it also comes down to the the individual characters.

You know, some of the kids I noticed that they don't necessarily want to put themselves out there, that they tend to be more reserved.

Paul Robertson

Yeah.

WEFC teacher 2

So, you know, I think when you look at it, I asked them, for example, about their, you know, social media life and then, you know, where are they? If they have in the blogs, etc. And some of them are more careful. Some of them, you know, they come from more, I don't know, different types of backgrounds. And then they the character as well, they said, no, I only use this.

But some of them, they just everything is just out there. So then, you know, you, then you start talking about, well, who can see this, you know, etc. But I think in general. They have an understanding, but they don't always do what they're supposed to do.

But to be honest, I don't think we can expect a very high level of competence at this age, you know, so that that's the thing. I think they need to in a way. They need to maybe. Er, you know, they need to be allowed to make mistakes, learn from their mistakes. That's probably the best way.

Paul Robertson

Okay. Well, this kind of segues into the problem solving a little bit. How relevant do you think this area is for our students studies?

WEFC teacher 2

I said this part, extremely important problem solving in a this covers a lot of things. Everything. Everything. All the steps that you're going to do from finding information to working together or, you know, solving a problem, literally, you know, hardware and software, I think is very, very important.

Paul Robertson

Okay. And how how competent do you think our students are in this area?

WEFC teacher 2

Erm ***, you know, some kids I can see very independent. And when I actually find out some of these kids, they did their high schooling, for example, away from the parents and, and then if you are able to survive that, you come out of the other side perhaps having learned some of the things.

Others that's not so much so. And I noticed that perhaps they like for example, when they work in group work and then they need to solve problems. I noticed that, okay, If you if if they're in a in a safe group, with their friends ok they come to an understanding.

But we were discussing it. That's not necessarily a problem solving. And then when they're in actually in a very difficult environment, working and having to work with people perhaps they don't understand, they don't get along, etc., that becomes more difficult because that's real problem solving.

And I notice some of them it's just easier again, to ask the question directly to the teacher and expect the teacher to solve the problem.

Paul Robertson

So for some, lacking the autonomy.

WEFC teacher 2

Autonomy. Yeah. I mean, it's funny because in a lot of way the very autonomous, but when it comes to this, again, it could be a number of reasons because they weren't trained. We are not necessarily forcing them. Sometimes I find myself it's just easier to tell them where it is, then ask them to find information.

And then also you look at the student, and you think, okay, you know, if I don't give him this information, or her, this information they're never going to go look for it. And then that's just going to follow that they're not going to do the assignment like that. Okay, let me just give this much out. I don't think that's always the right thing.

So, yes, autonomy, there is a bit of a lack of autonomy in problem solving.

Paul Robertson

Ok, so really interesting. And do you think the AES course has been designed to address this area at all?

WEFC teacher 2

Probably weak in this area. I mean, sometimes we say, you know, like if it's just a simple thing, they they uploaded something and it went wrong. And, you know, some of them try and solve the problem. I mean, you know, it's just simple things. You know, the half of the table's missing.

And then when you talk to the students, it's just like, oh, you just need a download, it's like, well, no, but that's that, that was that wasn't the instructions.

And I think, I don't know, it's more creative things could be done here that actually, you know, even in an assignment can be an actual problem that needs solving. Do you see what I mean.

Paul Robertson

Yeah, yeah, yeah.

WEFC teacher 2

So yeah, I don't I don't think so. I mean indirectly it's there.

Paul Robertson

Ok, cool, really interesting. And erm, then thinking about the individual areas of solving technical problems, identifying needs and technical responses, creatively using digital technologies and identifying competency gaps. Do you think any of those are particularly relevant for us students? Or not, and why?

WEFC teacher 2

I was looking at it and it's just *** competencies that make up solving ***. So like identifying needs and technological response, as I said, then creatively using digital technologies like that especially that's ah, but I think things like this, in my experience gets you, although in these days A is quite easy to get but it's gets you that A or A plus...

Paul Robertson

Yeah, yeah, yeah.

WEFC teacher 2

...and everything. Something not just completing but using the digital technology as, to, in a way that that makes your work stand out and...

Paul Robertson

Be a bit different, go a bit beyond.

WEFC teacher 2

A bit different, go beyond. I think, so that's, I think, is important. Making the digital technology is, you know, using it. I don't know, a bit making it your friends in a way, something not you're constantly fighting with.

Also, what I noticed the last one identifying digital competency gaps. They don't always, erm, identify it. Because what they have at the moment, what they can do in a way is enough and they can go through university with that.

Paul Robertson

Yes, definitely. Yes.

WEFC teacher 2

But, you know, it's, whereas if they not just noticed, yes, I can do all of these, but I just there's this there's this thing that I can't do. If I can do that, then I can connect that to it in a more difficult, sort of more complex skills.

I don't necessarily do that. So I that's what I noticed.

Paul Robertson

Okay. So then you've said kind of that they're not so competent. with identifying it, digital competence gaps.

WEFC teacher 2

Now, I don't think so.

Paul Robertson

Yeah. The, the other ones. Do you think they're particularly competent or not?

WEFC teacher 2

It's *** It's got problems. I noticed that they they sort of, you know, eventually they figure it out. So just to give you an example. So my students needs to create some sort of a chart. And I told them it needs to be either a bar chart or a pie chart and explain how it should look like, etc.

So some of them didn't know how to do it and they, they had some technical problems, I think some of them figured out, whereas I'd say almost maybe, I don't know, maybe a third of them, they gave up and they created a table and then they're asking me, is a table okay?

I said, look, you know, no. But then you need to then accept at this point that from that area you're not going to score high because clearly says it's checking your digital literacy skills, whether or not you were able to go find the information, create this.

But, erm, more or less, they they sort of they ask each other. They figure out not maybe at a very complex level. I saw those students as well. But those are also the kids also good at programming.

Paul Robertson

Yes.

WEFC teacher 2

And they have this extra, you know, they sort of ***. But yeah, they do figure out their, you know, technical problems. But, yes, anything to do with sort of, you know, creatively, the using digital techn***.

Not all of them, I'd say minority and identify digital competency gaps. I don't even know whether we give them time to think about that. You know, so, you know, maybe we should give them something that they've never done before and that they are given time.

And then they have to actually clearly develop that skill and then show it to us using examples. That could be an assessment. I don't think they have time to do that.

Paul Robertson

Right. Okay. So we're now through the framework and so kind of on to those final little bits. Were you familiar with any digital competencies, or digital literacy framework

WEFC teacher 2

I knew this a little EU digital competency framework, erm things changed a lot in the last two, you know, 20, 25 years.

Paul Robertson

Yeah.

WEFC teacher 2

And, erm, so yeah, I mean, the only other thing that I also went through when I, I don't think it's maybe not completely the same but I completed a course designing an online, planning your course design online, creating an online course at TU Delft. So they have their own for example framework and they use that they they call it TU Delft model and then they have this eight steps and and then they, their entire, erm, so they have a big sort of online learning department and they constantly create programmes and not just undergraduate level, erm postgraduate level, but also just open learning. You can just take a course. And so that that's the other one that I'm sort of familiar with.

And then, you know, we kind of when I went through that course, you had to think about when you're designing the assignments and the programme just to follow their framework and that you're hitting *** area.

So that's just, I'm just familiar a little bit you know, when you look at it actually, that sort of is, sort of in there as well, it's the language.

Paul Robertson

Yes, yeah, you know, this is the thing with all these frameworks. OK this is a really interesting and maybe just to wrap up one or two questions because we've maybe not got much time are there any areas of digital competence. I think we actually covered that, you've said which areas you think that...

WEFC teacher 2

Yeah, to use it creatively, deal with problems, different types of assignments. I would say that's the main.

Paul Robertson

Yeah. And do you think thinking about digital competencies has influenced your decision making about teaching or designing courses or.

WEFC teacher 2

Um, I suppose, yes. I mean, I'm not necessarily in, you know, in the sort of designing and building AES course, but, you know, I do my, you know, during the meetings, I would give my advice that certain things needs to change.

Paul Robertson

Yeah.

WEFC teacher 2

Okay. So I would have, you know, if I were actually were in charge of that, I try and do it in class. If they, you know, any of my classes, if we're doing something, I try and use the digital technology in a meaningful way. It doesn't always work. It's, you know, sometimes it or sometimes doesn't work in a meaningful way and think about how this would work.

Paul Robertson

And finally, do you have any other comments or suggestions or ideas related to digital competencies?

WEFC teacher 2

I don't know. No, but I think I've said a lot of things. But if I remember, anything I come up with, I'll, I'll send it. Send them to you.

Paul Robertson

That's great. Yeah. Appreciate it very much. Great to talk. Well next steps will be, I'll to sort out the tape script and then send it to you so you can check it out and make sure it's accurate. And then I'll also send you a debrief document just to give you kind of a little information about the project. And later on, like when I'm finished, I'll give you a summary such as. But thank you once again.

WEFC teacher 2

Good luck.

Paul Robertson

Thank you very much.

Business Student (BS)

Paul Robertson

I would just like to say thank you for volunteering to do an interview with me about your perceptions of digital competencies for English Medium International Foundation year students. Before we start, I would like to confirm your responses to statements from the consent form that I emailed you and gave you before the interview. And yeah, please can you say, and I'll just kind of show you, the share the screen and can you please just say agree or disagree to each of the following statements. So the first statement I confirmed that I've read and understood the participant information sheet dated February 7th for 2023 for the above study. I've had the opportunity to consider the information, ask questions and have had any questions, answered satisfactorily, do you agree or disagree?

Business student

I agree.

Paul Robertson

OK. Thank you. And I understand that my participation is voluntary and I'm free to withdraw at any time without giving any reason, without my rights being affected. In addition, should I not wish to answer any particular question or questions, I am free to decline.

Business student

I agree.

Paul Robertson

Excellent. Thank you. And I understand that under the Data Protection Act, I can at anytime ask for access to the information I provide. And I can also request the destruction of that information if I wish.

Business student

I agree.

Paul Robertson

And I agree to take part in the above study.

Business student

I, of course, I agree.

Paul Robertson

Great, thank you very much. I'll, I'll just leave the questions up here in case there's certain things we might need to refer to. So yeah, thank you very much. We'll move on to discussion, discuss your perceptions of digital competencies. So firstly, can I just ask what is the area of your future degree?

Business student

It is the business. I will go. It's a business, it will be International business administration.

Paul Robertson

And great. And what does the term digital competencies mean to you?

Business student

So I for me, I think it is, something, uh it is something related to the technology that you need to accomplish and then you need to use this so that it can be more efficient in your study or maybe in your workplace or things like that.

Paul Robertson

OK, great. Yes. And for you, what has been your experience so far with the use of technology for educational purposes?

Business student

Honestly, I'm not really good with technology things, so I have to learn from the Internet a lot, like if I want to change my word document to PDF, I have to search in Google that how to change word to PDF or and I follow the step and sometime my version is not the latest one. So I couldn't change it. So like I know, but after that I learned how to do some kinds of stuff and if I keep repeating how to do this repeating stuff. I remember later on and I know how to use this, that I have to submit for the exam and I know how to submit that now.

Paul Robertson

OK, cool. So how would you say you've learned about digital competencies or developed your digital competencies? Has it been like in school or is it yourself informally?

Business student

I think it is informally, if the school give us a project and if I want to do some animations or something like that, I have to learn by myself so it is mostly outside of the school. I spent extra time to develop it myself.

Paul Robertson

OK, great. And yeah, thinking about the digital competencies, I'd like us to think a little bit more closely about the DigComp framework and discuss your thoughts and perceptions about each area. And did you have a chance to have a look at the DigComp framework?

Business student

Ah, no, sorry.

Paul Robertson

No, that's OK. So I'll just give you a little explanation that basically it's the EU framework for digital competency and it's got five big areas and each of these areas has different competencies in it. And so I'd like to find out about each of those big areas. Are they relevant? Are they important for you? And for each of the competencies are any particularly important for you. So the one of the areas is information and data literacy. And so the competencies that includes are browsing and searching and filtering data, information and digital content, evaluating data, information and digital content and managing data, information and digital content. So thinking about that broad area of information and data literacy, how relevant do you think that is for your studies and why?

Business student

I think it will be really relevant because we now we are have projects of writing and researching about the getting the secondary resources and, and so I have to say, it is the one of the important skills so that I I don't need to search, like spend hours searching for the things that I need to I need to scan and I just filled out the year I want. So it's really it will be really helpful if you know that.

Paul Robertson

And how confident do you feel about this area and why?

Business student

I would say, 3.5 out of five. I'm confident about that. The rest is about the Excel. If someone gave me the Excel sheet and they want me to filter out the things I couldn't. I'm not really good at that. If it is about the Internet, search engines and things I can do that. But there are some other part that I still can't do that.

Paul Robertson

Yeah. And can I just double check? So you said if someone gives me the, were you saying the info or the?

Business student

Ah info on the Excel sheet.

Paul Robertson

On the Excel sheet, uh. Excel sheets, right?

Business student

Excel sheets, yeah, exactly. So well, I I can't do that.

Paul Robertson

No, no, that's OK. No, just, I I didn't quite hear correctly. OK, good. And to what extent do you feel like academic English Skills course has addressed this area?

Business student

I think for the first term it is like for the reading part it is like 80% of it is about like searching the information, searching the research paper and figure out things. So like for the term ones reading part is 80%. For the term 2, this time it is about the speaking part, we have to speak and do the research. So what for the *** part because like we can refer to the term ones again and we now know a little bit more about how to do things, so it's been less time, but like the content is still, like, like 70%.

Paul Robertson

OK. And did any particular activities help you develop this area?

Paul Robertson

So like.

Business student

Ah, yeah, like doing the preparation text, and then we learn how to figure out informations and check in the credibility. So like like the currency things and then it help you figure out things really, really fast. So like you check it, and then you get it.

Paul Robertson

So, like coursework one...

Business student

Yeah.

Paul Robertson

...and that, yeah. OK. Interesting. And then thinking about these individual competencies, so browsing, searching, filtering, evaluating data and managing data and information and digital content, do you think any of those competencies are particularly relevant for you or particularly not relevant for you and why?

Business student

I think browsings and searching is relevance. Evaluating is also relevant, but managing data, we don't have to manage the data that much right? We just search it, we just use it. So, like we don't manage the data and we don't keep them after the after it's like *** and when I delete all of my data. Uh, so that I don't have, I don't control any data right now, so.

Paul Robertson

OK. Interesting.

Business student

We don't use it.

Paul Robertson

And and do you feel particularly confident or particularly unconfident about any of those areas?

Business student

Uh, I'm confident about browsings, but not about the managing data because I accidentally delete mine and then I have to rewrite it for the RAE.

Paul Robertson

Yeah.

Business student

Uh. So like, it's like accident.

Paul Robertson

Yeah, you're not the first student of that has happened to. Yeah, quite a lot of students. OK, cool. Now, thinking about the area of communication and collaboration. So this means there's five competent, or 6 competencies here. So interacting through digital technologies, sharing information and content through digital technologies, engaging in citizenship, uh, through digital technologies collaborating through digital technologies, netiquette and managing digital identity.

Paul Robertson

So yeah, there's a firstly, any of those competencies is there anything where you're like, oh, I'm not quite sure what that means or I don't really understand that.

Business student

Uh, yeah. Engaging in citizenship through digital technology, what does that mean?

Paul Robertson

So that might be for example, maybe you have heard about a political movement through like social media or TikTok or Instagram or something like that. And maybe you make, like a, you make a video, helping promote a protest or you get involved in organizing a political working with the political party or something like that. So it's it's being a digital citizen, yeah.

Business student

What is it about Natick, netiquette.

Paul Robertson

So Netiquette is about like how you behave online. And it's not just like it's how you like, for example, typing in a way which is acceptable. So for example, if you typed in all capital letters, that would be like, whoa, you're shouting at me. But, and like if you typed an e-mail and put everything into the subject line and nothing in the e-mail, I'd be like well yeah. So netiquette is about like, like etiquette, behaving nicely online.

Business student

OK. What is managing digital identity?

Paul Robertson

So managing digital identity is, so your digital identity is your identity on the Internet. So, for example, LinkedIn, your profile or Facebook or like digital identity that you project into the world. So for example, if you posted a lot of photos of yourself at a party and you're completely, you know, and then employer found those, then it wouldn't be a very good thing for your digital identity. But if you have your digital identity shows that, hey, look, I've done this research and I've got this website published.

Business student

Yeah.

Paul Robertson

It's a good digital identity. Yeah. So it's like the identity that you have online.

Business student

Yeah.

Paul Robertson

So that thinking about this whole area, how relevant do you think this area is for your studies and why?

Business student

I think only 50% of that is relevant to my study, like interacting through digital technology. We need to do that because like COVID happens and we can do the face to face communications and it is really important how you communicate through that.

Uh, and also sharing information through the technology that it is really easy right now. You just need to click one and then I you can share with everyone, and engaging the citizenship it is depends on the past and that choice. So like you can choose not to participate in anything online and you can do the real life things that can change thing and like collaborating. Yeah. There is also important like it is like the sharing information collaborating.

And netiquette, it is a bit of a, it depends, it also depends on the personality, for personally, for me I don't type that much. I give that, I regard like messaging things and things like that, sharing information. So I just put the information in there and I put the show messages to everyone. So that is really hurtful for someone, like my friends tell me that I'm too cold and they're gonna cry if I, and then, like later, they got used to it because like.

And managing digital identity, it is also the personal if it is like the professional platform you use like LinkedIn so like you can show like your personal, you can decide not to show your personal things and how your professionally work. But like your personal life it should be like two different things.

So, like, 50% is relevant.

Paul Robertson

OK, so they're they're separate from working from study and personal life, OK and how how confident do you feel about this area overall?

Business student

I'm not that confident in this area, it will like I'm not good at communicating and I'm not good at projecting my idea, and fighting for my view because I don't, I feel like I choose rather not fight, and I don't wanna make enemy a lot. So like I just choose where the no flight and let them choose. And I go with the flow. But I I should fight for my opinions sometime too.

Paul Robertson

Interesting. And so is there any of these particular competencies that you feel particularly confident about or particularly not so confident about?

Business student

Ohh, sharing information like I'm really confident about that I can share informations and data through the digital technology. And I can interact through digital technology too. But I'm not good at like collaborating and netiquette.

Paul Robertson

And and why is it that you don't feel good at collaborating and netiquette? I mean, I think you understood. You explained about Netiquette, but why? Why collaborating?

Business student

Oh, but for collaborating, I totally. I am not good at that like sometimes, I feel a little bit bad because I this is not the part that I wanna do and I didn't communicate enough. So that's why I got the part that I don't wanna do and it is sometimes a bit hard. And collaborating people work differently. And sometimes some people start working at 1:00 AM in the morning, and then they do it before the deadline. So it is a bit hard to calibrate through just digital. We should talk.

Paul Robertson

Yeah, that's completely. It's not at all. And to what extent do you feel that academic English Skills course has addressed to this area?

Business student

Oh, a lot like here. But it is about collaborations and you are just constantly communicate with your classmate and discussions about the idea. And also did we did the.

Paul Robertson

Yeah.

Business student

Well, collaborative writings in the term two, we have to do with a group and then we write about the essay. So I think we're we're practising and then we still have got rooms to improve.

Paul Robertson

So that project B collaborative writing project. OK, cool. And yeah, so that's that's answered that next question about did any particular activity to help you.

OK, good, cool. And then moving on to the next area, digital content creation, so that means developing digital content, integrating and re-elaborating digital content, copyright and licenses and programming. I'm so firstly, again, are there any of those competencies that you're not quite sure what it means or you're you would like me to explain or to bit?

Business student

Uh, what is *** integratings and re-elaborating?

Paul Robertson

So if you for example find something online and you want to use it in your work in some way shape or form, so that could be for example you could be like, OK you want to use a song and put it onto a video, and well OK, or you have a meme and you change the text and it's so it's taking existing media or things which already exist online and then putting it into your own work in some way shape or form.

Yeah. So, overall, how confident do you feel? Ohh sorry overall, how relevant do you feel this area is for your studies and why?

Business student

For my study, it is business, so it is not that relevant for me. Uh, But I'm going to for the business. It is not relevant, but I'm going to the marketing thing. So like if I'm going to work with the digital things, it will be a little bit relevant for me. Um, yeah.

Paul Robertson

OK, so maybe not so much your immediate studies, but later on.

Business student

Yeah, later on.

Paul Robertson

OK. And how confident do you feel about this area?

Business student

Umm, I'm not that confident about that, er, because I I don't know about the making digital content. I I know I can take the photo and I can make the short video out of it, but I don't know how to do it. Like for the academics and also copyright and license. I don't know much about the copyright things and license.

But I know that we can't steal other people like, things digitally, digitally and also programming. I have learned a little bit of programming but I'm not using, right now.

Paul Robertson

OK. So you don't feel a little programming, but you don't feel very confident?

Business student

Yeah, I have learnt pythons and I know how to write a website, but I don't use it. Yeah.

Paul Robertson

Yeah. OK. So you don't use it, so you you, you're not confident, OK? And to what extent do you feel the academic English Skills course has addressed this area?

Business student

Umm I ***. Is. I don't think we addressed much about it, but I for the copyright uh is about plager... If it is like plagiarisms like the concept, we cover a little bit about the plagiarism, but we don't talk much about the digital content creation. No.

Paul Robertson

Yeah. No. So it's it's not exactly covered, but this idea of plagiarism is related to copyright. OK, cool. And yeah, I think overall you said the area is not particularly relevant at the moment, but it might be in the future. These four competencies. Do you think any of these particular competencies are particularly relevant for you or particularly not so relevant for you?

Business student

I think developing digital content might be relevant for me if I'm gonna gonna do like the I like, if I'm gonna work in the marketing field, I just wanna create like the poster or anything, I can do that, and integrating its and yeah, I need to know about that too. Copyright and licensing that is also very relevant for my future.

And programming I don't. I don't think that much, but I programming is also a good to learn how to solve the problems, uh, like, critically if, like. But it is not relevant.

Paul Robertson

Yeah, OK, no, great, perfect. Great.

Business student

Can I charge my laptop ?

Paul Robertson

Yes, sorry. Yes, of course.

Business student

Ohh it is running. Yep. Ready.

Paul Robertson

Right. So now let's think a little bit about safety. So safety, the four competencies there are protecting devices. Uh, protecting personal data and privacy, protecting health and well-being and protecting the environment. So again, are there any of those competencies that you're not quite sure what it means?

Business student

What is protecting devices, it's like computer or like the?

Paul Robertson

So your computer, your mobile phone. So for example, you know, making sure you have a strong password, making sure like you have like virus software, this kind of thing.

Business student

Uh. Protecting the environment?

Paul Robertson

So for example, you know the environment, our use of technology impacts the environment in a lot of ways. So for example, when you have finished using a mobile phone and or a computer, do you then just go in throw it just in the bin or do you take it somewhere for recycling, or for example, when you're using like computer, do you turn it off at the end of the day, so it doesn't use more power than it has to. And then like you know more power means more energy, means more pollution. This kind of thing. So yeah, it's a, it's a bit of a odd one to think about, but yeah, our use of technology, how that impacts the environment.

Business student

Protecting health and well-being is like you're not using a lot of, you're not spending a lot of screen times and just ***.

Paul Robertson

So that's one aspect. It's got other aspects as well. So for example, I mean even the way you sit when you're using a computer, you know that if you all the time like, you know, if you're constantly using your hands then you might get injuries. So there's a lot of ways, but yeah, the the screen time is really important one, yeah.

Business student

OK.

Paul Robertson

OK, great. So overall, how relevant do you think this area of safety is for your studies and why?

Business student

I think it is not the relevant to the study that is relevant for yourself, like you have to protect your data and take care of yourself and leave it like it is not that relevant to the academic English.

Paul Robertson

And how confident do you feel about this area overall and why?

Business student

I am 70 percent, 5% confidence about that and the 25% is health and wellbeing. I spend, my, a lot of time with like a lot of screen times and also I prefer handwriting notes. So I use my iPad to write things down. So it is like my posture is not always right.

Paul Robertson

Yeah.

Business student

Yeah. And then I have got back pain from sometimes. Yeah.

Paul Robertson

Yeah. Again, I don't think you're the only one. So, when when you say, uh, 75% is uh, are you saying like protecting devices, protecting personal data and protecting the environment? You're you're confident about all of those.

Business student

Yeah.

Paul Robertson

But health and well-being, you're not so confident, OK.

Business student

No.

Paul Robertson

And to what extent do you think the academic English Skills course have addressed to this area?

Business student

Umm. I don't think we've learned about that in the class, erm, yeah, but in the tutorial class we talk about, I don't know which class it is, like we talk about the data and privacy like don't show off yourself too much on the social media and give the don't give too much information from them like we talked a little bit about that. And yeah, and that's.

Paul Robertson

Yeah, I think that was the tutorial when we talked about that, yeah. Interesting. And uh yeah. So and when we talked about it in tutorial, that would be the activity then thinking about these four competencies, we've already talked about confidence in each one. Do you feel any of the competencies are particularly relevant for you or not?

Business student

I think it will be relevant for me is like protecting devices, personal data and privacy. Uh, like protecting the environments and yeah, I I I don't really care that much about the environment. So to be honest and I care a little bit about my health and I, so like the first two is really relevant for me if I'm going to the university, I have to protect like my work. If someone steal my work I will get into the trouble. So like I have to protect my device and my data and privacy.

Paul Robertson

Ok cool, and so you explained why you weren't very confident with health and well-being. But Umm, why do you feel confident with protecting devices protecting data? And yeah, protecting environment.

Business student

Oh, protecting devices. I just check, uh, which which websites are tracking my informations and I like they have got the cookie and I sometimes delete the cookie because I don't feel like safe or if I go into the website they don't feel like safe. I delete the record and things and for protecting personal data and privacy I don't share that much about the things to other and also I have got the strong password even I couldn't remember. So sometimes, like the ***, only the God knows like. And I have got a strong privacy for this and yeah, protecting the environment. I don't. I just give away. Like if I don't using the device I just gave away to other people so that the lifespans of the device can be still longer instead of buying a new one. So I give them.

Paul Robertson

Interesting and so how, how did you learn how to do all of those things?

Business student

I think it is from, it is from. The answer is I I think it is from the Internet, like someone talk about all their the privacy got leaked and then what what happened? How does it happen? What can I do not to happen this to me or like someone started talking like their password like stole by the websites, like the phishing link or something like oh I knew that if someone could send me a phishing link I won't open it or I will give that any password and type it down and also something gut feeling like you get a suspicious when you get into the website and, you have to trust.

Paul Robertson

And then so you say, someone said that are you saying like is that someone like a friend or a peer or a family member or is that someone on the Internet has said this thing and then you're like ohh, how how do I prevent?

Business student

Yes, someone on the Internet, so I used the reddit. It's old fashioned, so old, and someone said Ohh they got into like they have got a story about everything. So I I read them and then that happened that can happen.

Paul Robertson

You say Reddit is old fashioned, but I use Reddit and I I you know it's I I remember like 10 years ago when I first was told about Reddit. So yeah, it is old fashioned, but you know, I.

Business student

Because no one use Reddit, like my peer doesn't use, they don't use Reddit at all. And then then when I talk about the Reddit, they are like what it's like they know about that, but they don't use it.

Paul Robertson

I wonder how, how did you find out about Reddit?

Business student

Oh, it's like four or five years ago. I was like, searching things. And then I I saw like ohh they have got a lot of information here. So I need to get into this. And the Quora, Quora ...

Paul Robertson

Yeah, I know Quora

Business student

...and also like they give you like the like the gives you like really specific answer for that. And I was searching for the math problems and I found that and I got into the Reddit.

Paul Robertson

Yeah, interesting. There's points where I'm like, I don't know how to do this. I'll just type in my question into the Internet and then put Reddit. And then it often comes up.

Business student

Yeah. And then like, they have got really, really specific things like answer.

Paul Robertson

Yeah, it's really good. Excellent. OK, cool. Interesting to hear that. That's cool. So thinking about the next area, which is problem solving, which is something that you mentioned before, the the DigComp framework thinks about it in terms of solving technical problems, identifying needs and technological responses, and creatively using digital technologies and identifying digital competence gaps. So are there any of those competencies that you you see, that you're not sure about, you would like me to explain a little?

Business student

Uh, what is identifying needs and technological responses?

Paul Robertson

So, for example, uh working out OK, well, I I need to do something and what you can use to respond to technologically. So for example, you were saying about, OK, you need to take notes, but you

prefer handwritten notes. And so you identified. OK, well, I can use my iPad and then I can handwrite there. So yeah, it's about being able to see. OK, well, I need to do something, and it's gonna use technology. And then what do I do to do that?

Business student

But, digital competence gap?

Paul Robertson

So, OK, well, OK, maybe you're aware that, OK, you think? OK, I I, I I don't want to be subject to a phishing e-mail, but I don't know how to do that. I need to go and find out about that or you're not sure about how to protect your data so you you go and find out. Well, so it's it's seeing where you have a gap in your knowledge gap in your digital competence.

Umm so, overall this area of problem solving. How relevant do you think it is for your studies?

Business student

Uh, I think is is quite relevant for study because we have to do the presentation thing. So if you don't know how to make the presentation you need to you need the solving, you need to know how to solve the technical problems. If like you can't log into your Microsoft account. So you can create the PowerPoint, you can use like the Google Slides or other things cover and everything like you can use other stuff as well. So have to you need to have this technique of problem solving skills and then identifying this. Yeah, it is also important. You are expecting to do this and then if you don't know how to do that, you have to like what do I need to do that.

And, creatively using digital technology, it is also important like, I would say and you see like it is like this, solving the problem creatively, I don't know how to use like the creative as an artist is like solving the problem creatively.

And I and also identify the digital competency gap. It is also useful if we have to, like constantly to everything, technology, writing, submitting the draft documents and presentations, PowerPoints and collaborating with others. And yeah, so it's important.

Paul Robertson

Interesting. Erm. Yeah. No, I I think creatively using digital technologies that it's not talking about making art. I think it's, it's about OK well, using technology and interesting way or like maybe something that someone else hadn't thought about or you or like you you can do this. But yeah, I think we've got that.

Erm, overall how? How confident do you feel in this area of problem solving and why?

Business student

Ah, 80% because like even if I don't know how the how to solve the problem, I can search in the Google and then I will get the answer already I I wish I'm sure that I would find out a way to solve it anyway or YouTube, anywhere.

And I so after I solved the problems I know which area I need to work on and I can so I can also solve the creative using technology because I see pattern easily. I can see like what is the pattern and I can do that and identifying ***. I can also do that. So I'm quite confident about this.

Paul Robertson

Interesting and do you, to what extent do you feel the academic English Skills course has addressed this area?

Business student

It doesn't address directly, but like we have to work implicitly on that, That we have to work on by ourself to submit the work. So it's like it also helps us to give us a force to do that. Yeah.

Paul Robertson

OK, so it doesn't do it directly, but through doing the work you do, you solve problems indirectly. OK, cool. And did any particular activities help you develop this area?

Business student

Ohh Yep, it is about the presentations. Because I I I don't normally use the PowerPoints and we I don't have to do that presentations back in my own country, we don't normally do that even if you're doing presentation it's just like helping and not about the presenting anything. So I started learning that here and I can use the Canva, it's way better and I can use the Microsoft and also I can use a Google slide. Like it's what?

Paul Robertson

Great. Thank you. So that's that's the framework, that's all the issues we've talked about overall, do you think has the AES course helped you to develop your digital competencies?

Business student

Yeah, it it have a lot. Yeah, I learn a lot from that. Yeah, I learned a lot from AES and also from the YouTube and Google because I have to search for how I don't even know how to, like, know the word counts in the word file so like I can now, I can, I can use that. I control shift and then number and C and so it will show you the word count of how many words you are doing.

Paul Robertson

OK. Right. And so. Yeah, I think my final question, would you like to make any further comments or suggestions related to the topic of digital competencies?

Business student

Oh, it is. Yeah, I don't have any. But, it's an interesting topic. I didn't think about safety as being related to digital competency. But I don't have anything else.

Paul Robertson

Great, thank you so much for agreeing to take part.

Economics Student (ES)

Paul Robertson

Thank you for volunteering to do an interview with me about your perceptions of digital competencies for English Medium international foundation year students. Before we start, I would like to confirm your responses to the statements from the consent form that I emailed you before the interview. A copy of the form is displayed on screen now. Please can you say “agree” or “disagree” after each of the following four statements from the form?

I confirm that I have read and understood the participant information sheet dated February 7, 2023 for the above study. I have had the opportunity to consider the information, ask questions, and have had any questions answered satisfactorily. Do you agree?

Economics student

Yeah, I agree

Paul Robertson

I understand that my participation is voluntary and that I am free to withdraw at any time without giving any reason, without my rights being affected. In addition, should I not wish to answer any particular question or questions, I am free to decline. Do you agree, or disagree?

Economics student

Yeah, I agree

Paul Robertson

I understand that under the Data Protection Act, I can at any time ask for the access for the information I provide, and I can also request the destruction of that information if I wish. Do you agree or disagree? You have to say yes. I can see you nodding, but the audio can't.

Economics student

Yeah, I understand that. I agree, yes.

Paul Robertson

And finally, I agree to take part in the above study. Do you agree or disagree?

Economics student

I agree.

Paul Robertson

Excellent. Thank you very much. So now we'll move on to discuss your perceptions of digital competency. So just to start off with what is the area of your future degree? What are you studying next year?

Economics student

My area is economics.

Paul Robertson

Yeah, OK. Interesting. And what does the term digital competencies mean to you?

Economics student

Well, uh, I would say that its sort of a mix of knowledge and skills in the technological area, and maybe that you might use these skills for learning purposes or for working.

Paul Robertson

Ok, and so what has your experience been, so far, with the use of technology for educational purposes?

Economics student

Hm well in my experience, I've been using it for uh, basically in my life because I'm still young so I've been using it *** for learning purposes like academic, during my school, and now that I'm in **Western European Country** I've been using it.

Paul Robertson

Ok, do you feel that you are able to effectively use technology to learn?

Economics student

Yeah, I think that I'm able to use technology in an efficient way, er, because with all the years of experience, er, I've gained a lot of knowledge and I'm really confident in using it.

Paul Robertson

OK. So you're very confident with using tech, excellent.

Economics student

Mm-hmm.

Paul Robertson

And have you encountered any difficulties in using technology to learn?

Economics student

Hmm, well, yes, but it's not a like a big issues, honestly. It's just that so, usually, for example, I usually use the Microsoft softwares.

Paul Robertson

Umm.

Economics student

And for example, right now I'm using an Apple device

Paul Robertson

Yeah.

Economics student

For because my friend lend to me and I'm used to the other software. But I can also do it in this one, it's just that it's for being more comfortable, you know.

Paul Robertson

Oh yeah, definitely. Excellent, thank you, so, I'd like us to look a bit at the DigComp Framework and discuss your thoughts and perceptions about each area in turn. I'm just going to project the questions so that we have them up there. So, thinking about the area of "Information and data literacy", that's browsing and searching and filtering data, information and digital content, evaluating, and also managing data. Thinking about that whole area, how relevant do you think that whole area is for your studies, and why?

Economics student

And OK about information and data literacy, right?

Paul Robertson

Yeah.

Economics student

Yeah. Well, I think it is relevant for my area of study because I'm pretty sure that I will have to use something some related to this doing my degree. And then honestly, I am not a really familiar 100% because I haven't gone through it like they haven't taught me a lot of this. But I do know some of this and I know that it's probably going to be useful for my future in the university.

Paul Robertson

And how confident do you feel about this area and why?

Economics student

Well, as I mentioned before, I would say that I'm pretty confident on this, because I I'm considering a really good with my skills at the technological area and and I think I can do, I can perform a good job in the information and data literacy.

Paul Robertson

OK. Yes, and so to what extent do you feel the Academic English Skills (AES) course has addressed this area of information and data literacy?

Economics student

Ok, erm. Well, about this, I would say that the we have been learning a a lot how to develop and how to manage this kind of information and data specifically to, for searching in, in and more for academic purpose, that for working. Erm, I think that AES have been helping us to understand more about the use of this area.

Paul Robertson

Ok, cool, and did any particular activities help you develop this area?

Economics student

Yeah, I would say that, uh, doing the assessments, the graded assessments that we have to do for AES, if I had to choose one, I would probably pick the coursework one because we have to go through a lot of information and to choose academic information. So it's kind of part of the process.

Paul Robertson

OK, cool. And then, thinking about the individual competencies, so browsing, searching and filtering data, evaluating data, and managing data. do you think that any of those competencies are particularly relevant for you, or not relevant for you and why?

Economics student

Yeah. Well, I think they are all relevant for me. Erm, basically because I will have to in my study area, I will have to develop essays and not just essays for like English, just for every, can be any assignment erm and by using these methods of course it will be easier for me.

Paul Robertson

Ok, cool, and how confident do you, do you feel particularly confident about any of these areas or not particularly confident?

Economics student

Yeah, I I am feeling more confident. I wouldn't say I 100% because I'm still, I'm still learning new things every day I learn new things, but I, I do think that I'm, I do really good job finding sources.

Paul Robertson

Umm.

Economics student

And evaluating the information, the managing the data out of this that comes from the Internet. So, I would say that it's more like a 5050 for me, honestly.

Paul Robertson

OK, cool. So kind of all three areas you feel quite confident?

Economics student

Yeah.

Paul Robertson

OK. And then thinking about the area of communication and collaboration, so interacting through digital technologies, sharing information and content, engaging in citizenship, collaborating netiquette and managing digital identity. Thinking about that whole area. How relevant do you think that area is for your studies and why?

Economics student

Sorry, is this the point 6 or 7?

Paul Robertson

Yes, point 6,

Economics student

OK, sure.

Paul Robertson

The communication and collaboration. So, thinking about that whole area.

Economics student

Mm-hmm.

Economics student

Uh. I also think that this area is relevant for my studies because in economics, we are asked for having a good skills with almost everything and communication is essential for for **Western European** society especial because they demand a lot of teamwork. So you have to have a good skills communication.

Erm, I also I would say that I feel confident in this area because even if I do not like the other people, I try to be professional and just to have a good communication with them and to in order to do a better job, you know.

Erm, I also think that Academic English Skills have a help us in this specific area. If even different assessments and work during our lessons, and specifically if I had to pick one, I would say the project B because it was a group project. So we have to work together through the Internet using data, evaluating sources. And yeah, I would pick that definitely.

Paul Robertson

OK, interesting. Cool. And so, yeah, if you answered all the points of our question 6. So then thinking about Question 7 and about those individual competencies, do you think any one of those competencies or any of those competencies are particularly relevant or particularly not relevant for you?

Economics student

OK and I would choose a the point one, two and four.

Paul Robertson

Hmm.

Economics student

Hmm, yes. I think those points are more familiar to me.

Paul Robertson

Yeah

Economics student

Because I am honestly not 100% sure about the other ones. But, I do feel more confident with the ones that I mentioned, because it's things that I've already been doing for a bit and I think I can do a decent job there.

Paul Robertson

OK. So you feel confident with those?

Economics student

Yeah.

Paul Robertson

Um. Do you feel that they're relevant for your studies?

Economics student

OK. Yeah. Relevant I think yes, I do think they are relevant for my studies because a, nowadays in our society we're demand to have a lot of skills, technological skills and interacting through digital technologies, it would be something fundamental if I would like to apply for any job, any, any work, they will ask for having skills in this, from that area you know. So yeah, I think that they are relevant for me.

Paul Robertson

Definitely. And so just to clarify, you thought point 3, point 5, point 3 engaging in citizenship, point 5 netiquette and managing digital identity, you weren't quite sure what they meant, is that correct?

Economics student

Yeah, something like that. Umm-hu.

Paul Robertson

OK, so engaging in citizenship through digital technologies is like taking part in society, so maybe it's like getting involved in politics. Or maybe it's like retweeting some, like something to do with, like, hashtag Me 2 or something like that. Netiquette is like, OK, well, how you communicate politely. So for example, if you have like all capital letters, it sounds like someone's shouting at you or if you send an e-mail to a teacher to be like, dear teacher, you have to help me right now is 4 o'clock in the morning and I'm very stressed, so you need to help me right now. That's not good netiquette. And managing digital identity is the idea that, like the the identity that you put into cyberspace, so, like your Facebook profile, your, your or maybe Instagram or your TikTok or LinkedIn is maybe more professional. So like making sure you project a good identity in, erm, in the Internet does that kind of make sense of those areas a bit more.

Economics student

Yeah, it does make sense. And now that you mention, I will pick one more that is netic netiquette.

Paul Robertson

Yeah, netiquette, yes.

Economics student

Yeah, because, uh, you know, you have to. Well, in my research in my area of my study area, sorry. I have to be like a prepare and know how to develop appropriate writing, you know, not use any. If I making some mistake I need to fix them. So I would say that that er area would help me in my in my studies.

Paul Robertson

Yeah, OK. Definitely great. And then thinking about the digital content creation area.

Economics student

Umm.

Paul Robertson

How relevant do you feel that is? How confident do you feel and to what extent do you feel that AES has addressed this as part of the course?

Economics student

Digital content creation, could you give me an example of this for example?

Paul Robertson

So the four competencies are developing digital content. So that could be, you know, making a video, but it could also be creating a PowerPoint or it could be creating a document. Integrating and re-elaborating digital content is like like remixing from YouTube. Or maybe you take a meme and you put it into your PowerPoint or like you take existing digital content and you alter it or you change it. Copyright and licenses is like, okay, do you know if it's okay to use a picture or not? Or is it okay for you to use a certain piece of software in a certain way and programming is, you know, like HTML and CSS and all that kind of coding, computer coding. So that's kind of what's meant by digital content creation.

Economics student

OK, I understand. Uh, yeah, uh, I think. Well, I think in my opinion, I think it is important, but I don't feel that it's 100% relevant for my studies.

Umm, because well, it depends also on the like on each person's specialty.

Paul Robertson

Yeah.

Economics student

But for, I don't think I don't really don't feel that is that relevant for economics because they we used to focus in other stuff. It's not like for example would be like marketing, I would say for them it would be a really important one.

And, but well, for in point B, I'll think that is a I feel confident in this area because I basically, I enjoy doing this kind of content creation.

Paul Robertson

Yeah.

Economics student

I do spend a lot of time making videos or PowerPoint presentations every kind of digital creation. I really enjoy doing it. Umm. I don't feel that a AES has a address this area so good till this moment. I mean we have been doing some presentations.

Paul Robertson

Yeah.

Economics student

We are making one. Uh, but it's not like the other ones where we were more focusing on those during the time. So yeah, in my opinion, I think that it hasn't been a lot of this area for AES. And yeah, I would say that. Yeah.

Paul Robertson

OK, so a little bit with the presentations, but apart from that, not really that much, not ***.

Economics student

Yeah.

Paul Robertson

OK, great. And then number 9, thinking about those individual digital competencies, do you feel any of those are particularly relevant for you or particularly not relevant?

Economics student

OK. Umm. Hmm. OK I will. I think I think that I for me will be like a number 1. And number 4. Yeah.

Paul Robertson

Umm OK why?

Economics student

Yes. I would say this because, uh, well, digital developing digital content, I'd say that it's not that relevant for my studies.

Paul Robertson

Umm.

Economics student

The degree, the career, maybe, but it is for, I mean for general.

Paul Robertson

Yeah.

Economics student

But in my case I do like it, so I would definitely do it in to like to specialize more in this area as well. And like well during my career. Umm and I also choose programming because I think in you it is useful, especially on in our times right now.

Paul Robertson

Yeah.

Economics student

Well, everything is digital. We need a lot of technology. Basically, we cannot live without it. So having good programming skills will definitely help me to make my life easier during, during like my for my future, sorry. When I'm searching for jobs opportunities.

Paul Robertson

Definitely.

Economics student

Yeah, I do feel confident about the first point. But I'm still not confident about programming. I think that I am still have to learn more about it, but I I really would pick it if I had the opportunity.

Paul Robertson

OK, so to maybe something you're aware of, but you you're aware that is kind of quite a lot of programming to learn.

Economics student

Yes it is.

Paul Robertson

Yeah, yeah. OK. Interesting. Cool. And then moving on to think about safety.

Economics student

Mm-hmm.

Paul Robertson

Uh, so that's kind of thinking about protecting digital devices, protecting personal data and privacy, your health and well-being, and also protecting the environment. So that's the whole area of safety. So question 10, how relevant do you think it is? How confident are you with it? And yeah, has AES helped address it?

Economics student

And about the area of safety, OK. Well, and I think it is relevant for my studies because, well, it is important for for us to learn how to keep data safe.

Paul Robertson

Hmm.

Economics student

This this not just about safety user but like so in the context of digital.

Paul Robertson

Yeah. Yeah.

Economics student

And I do think that it's important to keep you, I don't know, like your personal information, like everything else has to be has to be a safe. I don't feel like confident in this area. Like I I do take a lot

of measures to prevent and to take care of my safety, like for my personal data, my passwords, my emails, my photos of ID. I don't know. I do take a lot of precautions,

Paul Robertson

Yeah.

Economics student

But I'm still not sure about it because there's always a way to get through it, in the internet, you know. Mhm.

Paul Robertson

Yeah, yeah.

Economics student

Umm. I don't think we have seen this area too much in academic English skills, honestly.

Paul Robertson

No, no, that's fair. Um, and then thinking about, so you've talked about kind of protecting devices. You've talked about personal data and privacy.

Economics student

Sure

Paul Robertson

So do you've you've said you feel, yeah, that you do them, but you're not 100% confident

Economics student

Yeah.

Paul Robertson

So do you think that those two are definitely relevant for you the top to protecting devices and personal data?

Economics student

And yeah, I will definitely pick them and I will pick the the from the one the 2nd and the Third Point as well.

Paul Robertson

OK, so why is protecting health and well-being relevant for you, do you think?

Economics student

It well because the health, like you can have also like a health information in their device like I don't know like in your emails from the doctor or some messages from your parents and in the Internet you can find everything and some people would like to use this information against you even like I don't know just to make like cyberbullying, or just to steal those data and to say, okay, you need this medicine, send me money. So I do think that is also that is important to keep data from this a safe.

And also because sometimes like when people get the information stole, they they start feeling really worried and bad and that affect their mental , mental health. Yeah. And I think that there is a connection between those points.

Paul Robertson

Yeah, yeah, definitely. I think was a lot of the competencies that there's connections in lots of different places, OK, cool. And do you feel confident with protecting your health?

Economics student

Yeah, I feel, I don't. I mean, I feel confident. Just a small confidence on it, honestly, I take a lot of precautions basically, but I you you never know Internet, there are always someone who's better and who can outsmart you doing this. I can take any precautions I do, like to change my passwords as I'm like every six months

Paul Robertson

Oh wow.

Economics student

And I write them somewhere safe. But yeah, if someone like, if you got to your devices stole, there's always someone who can do something for unlock them.

Paul Robertson

Yeah, that's very interesting. You write them somewhere, like, I do the same thing. But when I was a child, you you were, you were told never write your passwords down.

Economics student

Yeah, I know.

Paul Robertson

And now I have to take because I've got so many of them.

Economics student

Yeah, I have a lot of them.

Paul Robertson

Yeah. Interesting. Yeah, yeah, I know how many passwords. It's, it's interesting. Yeah. Before, like before, the Internet, I had no passwords apart from my bank password. And now I have so many.

Economics student

Yeah, same.

Paul Robertson

And then thinking about problem solving, solving the whole area of problem solving. Yeah. How how this is question 12, how relevant. How confident do you feel and yet to what extent do you feel that this is being addressed by academic English skills?

Economics student

OK. Er. Problem solving. I think it is a not quite important it's. I mean it's a really the relevant for us at least for me in my area, my study area. Erm, why I would say why? Because I mean I would say because the we need to know how to be ready and how to solve every kind of problems like not just in academic also we like in life and yeah, like in the Internet we may have a lot of issues, but we have to be able to solve them. And that's a skill that is going to be demanded by the university. And for future jobs as well.

I feel confident doing this because sometimes I do have some troubles. Er, but I at the end I always fixed them and go go through them.

Erm, I do think that AES have helped us in this case because we have been asked for doing some task and assessments with groups and individual and for some people sometimes we can struggle in some parts.

Paul Robertson

Yeah.

Economics student

And that's where you have to get this skill, the problem solving, and with the you are you develop this skill with the pass of time you know. So I do think that the academic English has addressed this area and if I have to pick an any activity, I would again choose the coursework activity the the first course work and now the second one that we are still doing it.

Paul Robertson

Yeah. OK. Really interesting. Cool. Excellent. That's a very clear answer. And then thinking about 13, that individual areas, so solving technical problems, identifying needs and technical logical responses creatively using digital technologies and identifying digital technology gaps. Do you feel that any of those are particularly relevant for you and why or why not?

Economics student

Could you explain the fourth point?

Paul Robertson

Third, or fourth?

Economics student

Fourth, please.

Paul Robertson

So identifying the digital competence gap would be something like, um, maybe you are aware that you are not quite able to do something, so maybe you're aware that. OK, I need to create a, a a table or I need to create a, a graph in Excel, but I'm not quite sure how to do that.

Economics student

OK.

Paul Robertson

Or maybe you identify that. OK, I don't know how I if if, have you ever tried to send the file which was more than 10 megabytes by e-mail?

Economics student

OK, I get it. I well I have to take. I would choose the first one, the second one and the third one I would definitely pick those. I would say that this are relevant for me. Because we do need to be ready. Uh, we need not. We need to in my area of study, I need to have this skills because I'm going to be asked for for use them, you know. But I sorry, I do think I'm confident. I feel confident, sorry, in solving technological technical problems, sorry, because the I have been through a lot of it. From in my case my mom doing current time – Covid. She had a lot of problems with this. She had to work through her office in the apartment and I had to help her a lot. And so every kind of problem I was there was helping her and there was nothing that I couldn't do. And even if I couldn't, I suggest sometimes go to the Internet, search for the problem, spend some time. A few a couple of hours searching for it, and then I was able to fix it.

Paul Robertson

That's very nice. It's also quite interesting that you're helping others as well. That's kind of getting to higher levels of digital competency, definitely. Excellent. Cool. And so overall, has the AES course helped you develop your digital competencies?

Economics student

Ooh, ok. Yeah. Yeah, I think it it has because most of us, Well, most of us, we already know how to use this digital competence, but I realized that we still have some people like some classmates, that they are not 100% familiar with this. So they are still developing some skills.

I wouldn't say me in my case because I think that because I'm doing it for a while and I really a good at it. Erm, but I think we have been developing these skills during the course thanks to academic English skills. Like, for example, the first point, we have sometimes problems with the Internet or with the files like becoming the from one file to another, or when it's time to upload the file. So you have to, to transform it. So yeah, with the many things happening, I would say that the AES have helped us to develop this skill.

Paul Robertson

And just to clarify, when you say transform it, do you mean like save a doc file into a PDF or something like that?

Economics student

Yeah, it sounds simple, like, but for example, a, it takes some minutes, not how some people can do it. Just they just gave up and send it to the teacher like a transform photo to PDF and put everything together.

Paul Robertson

Yeah.

Economics student

And sometimes it has to be less than a lot, I don't know, like 1000 MI or has to be a specific amount of memory, you know.

Paul Robertson

Yes, yeah, you know, definitely. Yeah. It's really interesting. And so it sounds like you feel pretty confident with your digital competencies. And I'm just wondering how, how do you feel you've most developed those? Do you think it's mostly being from school or do you think it's mostly being from stuff you've done by yourself? And I don't just mean just now, but also like before?

Economics student

OK. Mm-hmm. Well, I think it is for me, I think it is for myself, honestly, on school they didn't teach you how to do a lot of these. They just went through like how to do presentations. We also have classes like, er, where we just have to be standing to computer and working on word. But the real problems I learned by myself on my computer. I search YouTube videos, tutorials, a lot of them, and basically yeah, that because I also enjoy doing it. So when you like something is coming easier for you, right?

Paul Robertson

Yeah, very much so, great. And then final question, would you like to make any further comments or suggestions related to the topic of digital competencies?

Economics student

Umm. Any comments or questions? Digital competencies. Erm, no, I think that's that's all for me hat I, no.

Paul Robertson

And maybe one more question, do you think there's any areas that you would like the AES course to look at more develop more?

Economics student

Oh yeah, sure. Erm, I would like to see more about the safety area because I know this important already, like mention why I do think that is huge, hugely important, but I would love to see that in AES, honestly.

Paul Robertson

OK, great. Excellent. Thank you very much. That's very clear. Excellent. Thank you very much, and that's the end of the interview. I'll stop recording now.

Social Sciences Student (SSS)

Paul Robertson

Thank you for volunteering to do an interview with me about your perceptions of digital competencies for English medium International Student Foundation year students. And before we start, I would like to confirm your responses to statements from the consent form that I emailed you before the interview. I'm gonna share a copy of the consent form, just on the screen, so that we can see it and then after each statement, if you could just say agree or disagree. So the first statement I confirmed that I've read and understood the participant information sheet, dated February 7th, 2023 for the above study, I have had the opportunity to consider the information, ask questions, and have had any questions answered satisfactorily. Do you agree with that statement?

Social Sciences Student

Yes, agree.

Paul Robertson

Yes, great. And I understand that my participation is voluntary and that I'm free to withdraw at any time without giving any reason, without my rights being affected and in addition, should I not wish to answer any particular question or questions, I'm free to decline. Do you agree?

Social Sciences Student

Agree.

Paul Robertson

Excellent. Thank you. And I understand that under the Data Protection Act, I can at any time ask for the information, access to the information I provide and I can also request the destruction of that information. Do you agree?

Social Sciences Student

Agree.

Paul Robertson

Excellent. And finally, I I agree to take part in the above study. Do you do you agree?

Social Sciences Student

Yes, agree.

Paul Robertson

Yes. OK. Thank you very much. So yeah, I mean it's just an ethical thing to kind of have to go through with that interviews just to make sure everything's cleared. So, yeah, thank you. I'd like us to now move on to discuss your perceptions of digital competencies. So firstly, can I just check what's the area of your future degree? Is it?

Social Sciences Student

Sociology. Is that what you're asking?

Paul Robertson

Yeah. Yeah. Sociology. Yeah

Social Sciences Student

OK.

Paul Robertson

Cool. And for you, what does the term digital competencies mean?

Social Sciences Student

Understanding how to find my way around technology or digital spaces.

Paul Robertson

OK. And what has been your experience so far with using technology for educational purposes?

Social Sciences Student

I think it's been mostly straightforward so far.

Paul Robertson

OK. So do you feel confident that you're able to use technology to learn?

Social Sciences Student

Yes, I would say so.

Paul Robertson

OK, cool. And then thinking a little bit about specific digital competencies, I don't know if you had a chance to have a look at the Digi Comp framework, but I'd like us to look at each of the areas and discuss your thoughts and perceptions. Did you have a chance to have a look at the framework?

Social Sciences Student

No, I don't think so.

Paul Robertson

OK, that's OK. Well, in that case, I'll display the questions and then that maybe will help us make sure we know what we're talking about. So the framework has five areas of kind of digital competence and each area has different competencies as part of it. And the first area is about information and data literacy and that focuses on the ideas of browsing and searching and filtering data, information and digital content. Evaluating data, information and digital content, and also managing data, information and digital content. Umm, so thinking about your studies. How relevant do you think that area is for your studies and why?

Social Sciences Student

I think it is relevant because in sociology and in social sciences in general, there is a big emphasis on research and reading academic articles and things like that. So learning how to navigate the appropriate search engines is very important.

Paul Robertson

And how confident do you feel in this area and why?

Social Sciences Student

Umm. I'm not sure how confident I feel I think up to this point I'm happy with, umm, like how I can navigate it but it could be improved. I think I've only really started researching in the last few months.

Paul Robertson

OK, so it's something new for you and you're still finding your way. You're still learning.

Social Sciences Student

Yes.

Paul Robertson

OK. And to what extent do you feel the academic English skills course the AES course has addressed this area?

Social Sciences Student

I think it's helped me very much. It's, it's made me consider different things that I never really considered before like analysing proprietary I guess is that the word

Paul Robertson

Umm yeah.

Social Sciences Student

Yeah. yeah, or academic conventions. Umm, yeah.

Paul Robertson

OK, so it's giving you kind of different things to help you evaluate sources, OK. And did any particular activities or work in AES help you develop that skill?

Social Sciences Student

I think coursework one helped me a lot because we had to analyse and describe how we found the sources and discuss different aspects that made it academically appropriate or not.

Paul Robertson

OK, cool. Nice. So then thinking about the specific areas, so browsing and searching and filtering data and information, evaluating data and managing data. Do you think any of those particular competencies or are particularly relevant for you or not?

Social Sciences Student

I think they're all pretty relevant to me.

Paul Robertson

And do you feel particularly confident or unconfident about any of those competencies?

Social Sciences Student

I think I'm most confident with and searching for data, maybe in evaluating data and information I'm not as confident.

Paul Robertson

OK. And why? Why do you feel particularly confident with browsing and searching for data?

Social Sciences Student

I think because with, especially with the Internet, it's become much more accessible. We I can find a wide variety of sources and information.

Paul Robertson

And is it kind of something that was familiar to you before your studies, but not maybe not so academic?

Social Sciences Student

Yeah.

Paul Robertson

Yeah. OK. Nice. OK. And then thinking about the area of communication and collaboration, so this is about interacting through digital technologies, sharing information and content through digital technologies, engaging in citizenship, collaborating through digital technologies, netiquette and also managing your digital identity. How, how relevant do you think that overall area is for your studies and why?

Social Sciences Student

It is very relevant because there's a lot of expectation to do group work and group projects and especially over platforms like Google or like shared Google Docs or something where you have to work with somebody else and you might not necessarily be face to face, it would just be collaboration strictly online.

Paul Robertson

OK, so we have lots more kind of asynchronous online collaboration now and how how confident do you feel in this area and why?

Social Sciences Student

I do feel pretty confident, I think, because I've had a lot of experiences communicating with people online, even if that may not be in an academic setting, I feel confident in my ability to, to communicate and to share my idea ideas clearly.

Paul Robertson

OK. So kind of the the stuff from your outside academic stuff, the social stuff, the the practice of communicating like that has helped you do it in the academic setting as well.

Social Sciences Student

Yes.

Paul Robertson

Yeah, OK, cool. And do you think the AES course has directly addressed this area?

Social Sciences Student

Yes, but I don't think it was an area that I necessarily needed to improve to begin with.

Paul Robertson

OK. And did any particular areas of or activities in AES help you develop this area?

Social Sciences Student

So yes, the our project B assignment where we had to work in a team, we did the project.

Paul Robertson

Yeah.

Social Sciences Student

The majority of the time it was we were working remotely and collaborating only online. So I think that did help.

Paul Robertson

OK, that's good to hear. So then thinking about these individual competencies interacting through digital technologies, sharing information and content, citizenship, collaborating netiquette and managing digital identity, do you think any of those competencies are particularly relevant or not relevant for you?

Social Sciences Student

I think most of them are relevant. I'm not sure that engaging in citizenship. I don't really know what that means, but I don't know if that is relevant to me.

Paul Robertson

No. Well, I I think engaging in citizenship, it can mean a variety of things, but I think it kind of means a lot to do with, like, getting involved in kind of the political side a little bit, but also let me get the definition to participate in society through the use of public and private digital services. So to seek opportunities for self empowerment, for participatory citizenship through appropriate digital technologies. So yeah, basically using technology to participate in society as a citizen.

Social Sciences Student

So I will I I suppose that would be pretty relevant for me considering I'm studying sociology.

Paul Robertson

Yeah.

Social Sciences Student

Yeah, but yeah, I'm not quite sure how exactly what that means, so...

Paul Robertson

I think that's maybe something which is interesting in itself, yeah. Do you, do you feel, erm particularly confident in any of these areas?

Social Sciences Student

Yeah, I would say so.

Paul Robertson

Ohh, just all of them or any particular area where you're like, oh, I'm really good at this. Or just in general.

Social Sciences Student

I don't think there is one that stands out, but maybe with engaging in citizenship there has been a lot of, erm, online activism via social media that I have engaged with over the years, and maybe that has improved my ability to engage in that way.

Paul Robertson

That's very interesting. Yeah. Ohh, it's really interesting. And do you think there's any of those areas where you feel not so confident or you're not quite sure now how to do it?

Social Sciences Student

No, I don't think so.

Paul Robertson

OK, cool. And then moving on to think a little bit about digital content creation. How, how relevant do you think this overall area is? So that's developing digital content, integrating and re elaborating digital content. So for example, if there's a a meme or something, then reusing it or changing the text or something or like remixing on YouTube or something like that and copyright and licenses and programming. How relevant do you think this area is for your studies?

Social Sciences Student

Uh.

Paul Robertson

Why?

Social Sciences Student

Umm. I think it could be relevant, maybe in working on projects or presentations or things of that sort.

Paul Robertson

And do you feel confident in this area or not so confident?

Social Sciences Student

Yeah, I would say I do feel pretty confident.

Paul Robertson

And why is that?

Social Sciences Student

Umm. I, on a personal level, I do enjoy digital content creation and many various forms like videos or pictures, even text. Uh, yeah, I think that, yeah.

Paul Robertson

So it's something that you do for fun and enjoyment as well.

Social Sciences Student

Yes.

Paul Robertson

OK, interesting. And do you think the AES course has helped address this issue, this area?

Social Sciences Student

No, not not particularly.

Paul Robertson

No. OK. Erm, so then that the next question is not so relevant. And then thinking of these 4 competencies. Developing digital content, integrating in re-elaborating digital content, copyright and licenses and programming. Are any of those particularly relevant or particularly not relevant for you?

Social Sciences Student

Umm. Yeah, I think they would all be pretty relevant, but I have a a, an interest in programming. Specifically, I don't know if that would be relevant academically, but just on a personal level, it is an interest of mine.

Paul Robertson

OK. And do you think that maybe you might be able to use the programming in academics some way?

Social Sciences Student

I'm sure I would, yeah.

Paul Robertson

OK. Really interesting. So then do you feel particularly confident about these areas or not so confident?

Social Sciences Student

I'm not so confident with the programming or copyright and licenses.

Paul Robertson

Yeah.

Social Sciences Student

It's hard to get around those things sometimes I, I'm not sure that I really understand what goes into licensing content or.

Paul Robertson

Yeah. No, that, that makes sense. I think unless you've, you've learned a lot about it.

Social Sciences Student

Yeah.

Paul Robertson

Yeah, and I think it's definitely difficult to know what what is involved there. OK. Umm. And then thinking about safety. So when it's talking about safety, it's talking about protecting devices, protecting personal data and privacy, protecting your health and well-being, and also protecting the environment. Do you think that that area is particularly relevant for your studies or not?

Social Sciences Student

Umm. Could you explain what you mean by safety?

Paul Robertson

So a protecting your devices. So for example if you get an e-mail and it's like ohh click here open this link. Ohh well, maybe you don't open that link cos maybe that contains a virus, and protecting personal data and privacy. While OK you you you've downloaded a new app but that app is sending all of your data to Google and is like following you everywhere you go or protecting your health and well-being so ohh I'm I'm scrolling through TikTok it's 2:00 o'clock in the morning. I'm not going to sleep. I need to see another tick tock. Or, protecting the environment. Yeah, you know? OK, I've I've used my old phone. I throw it away in the bin and then it goes to landfill and it pollutes the environment and that kind of thing. So yeah, I mean safety there. I think it it does a lot of different areas.

Social Sciences Student

Umm.

Paul Robertson

Yeah, but do you think that's relevant, for your studies?

Social Sciences Student

Umm. Maybe safety in terms of protecting my information and my data that would be relevant to my studies.

Paul Robertson

Yeah. Why?

Social Sciences Student

Umm, making sure that nobody has access to the work that I've done, or they might use it for malicious reasons, so making sure that I'm safe in that way. And also I find that I can be quite gullible. Sometimes I would get a spam e-mail asking me to put in my bank details and you know I could fall for something like that.

Paul Robertson

I mean, they can be very convincing.

Social Sciences Student

Yeah.

Paul Robertson

Yeah. No, definitely. It was ones where they kind of look like ohh this is from the UK Government or this is from the government or this is from the post office.

Social Sciences Student

Yeah.

Paul Robertson

And yeah, they're quite clever. Yeah. So you said, maybe you sometimes feel a bit gullible with that, but in in over, overall, how confident do you feel about safety in this area?

Social Sciences Student

I am quite weary when it comes to digital safety and making sure that my information is private and everything I I'm not very confident in that area.

Paul Robertson

But it it's something you're aware of...

Social Sciences Student

Yeah.

Paul Robertson

...but maybe you don't feel confident about it, but maybe you, you know you're trying.

Social Sciences Student

Yeah.

Paul Robertson

OK. And yeah, do you think AES addresses this area at all?

Social Sciences Student

Not that I can recall or not anything that is particularly resonated with me.

Paul Robertson

OK. And do you think any of those areas, any of those competencies, protecting devices, protecting personal data and privacy, protecting health and wellbeing, protecting the environment, do you think any of those competencies are particularly relevant for you or not?

Social Sciences Student

Umm yeah, I would say that protecting my personal data is of course very relevant, but also protecting health and well-being, I find that, not to generalize, but I think most people in my age group can be very easily sucked into their devices, especially their phones, and having constant access to these things can be kind of detrimental to our mental health especially.

Paul Robertson

Yeah, OK. Yeah, interesting. I think that resonates with a lot of stuff. I mean, there's also me, I resonates with people of your generation, definitely. And do you feel particularly confident about any of those or particularly not confident about any of those individual competencies?

Social Sciences Student

I think the two that I just mentioned, I would say that I am a little unconfident. I do try and I do try to keep tabs on all these things, but I I sometimes forget.

Paul Robertson

OK. So do you think maybe you're aware of those two issues about protecting your data, protecting your health, but maybe you're not so confident about it, but then maybe you don't, maybe know so much about protecting your devices or protecting the environment?

Social Sciences Student

Yeah, I would.

Paul Robertson

Yeah. OK, no worries. Yeah, cool. And then the last area of the framework is about problem solving. So that's about solving technical problems, identifying needs and technological responses. So I need to do this thing. I need to send a big file by e-mail. How, how do I do that creatively using digital technologies and identifying competence gaps? So or I don't know how to do this thing? How am I going to address that area. How relevant do you think that area is going to be for your studies and why?

Social Sciences Student

Yeah, I think it will be very relevant in especially solving technical problems and identifying the needs because I think a lot of the work that I will do in university will be largely based digitally...

Paul Robertson

Yes.

Social Sciences Student

...and on computers. And I think er, up till now, I haven't really had much, umm. Or I'm not very good with technology. To put it simply.

Paul Robertson

OK, so that's quite interesting that you say you're not very good at technology, but you also said that you create a lot of content, a lot of digital content.

Social Sciences Student

I think what I mean is, erm more, like dealing with the physical technology, like if I had to repair something or identify a software problem, I probably would not be able to do that.

Paul Robertson

OK. So you're you're able to use the technology, but with when something goes wrong, you can't fix it yourself or identify how to fix it yourself.

Social Sciences Student

Yeah.

Paul Robertson

OK, alright. OK, that makes sense, did, so then you feel you don't feel particularly confident in any of these areas?

Social Sciences Student

No, not particularly.

Paul Robertson

No. OK. And do you think the AES course is help you develop this area at all?

Social Sciences Student

I think just because I've had to use digital platforms a lot more, I've had more, I don't know. I've had more of a chance to become familiar with them and maybe identify problems when there are, but overall. I don't think so.

Paul Robertson

OK, so not know specific activities but just the fact that you've had to be using these platforms a lot...

Social Sciences Student

Yeah.

Paul Robertson

...means that you've got more used to that. OK, no that's really interesting.

Social Sciences Student

Yes.

Paul Robertson

OK. And do you feel creatively using digital technologies, do you feel like confident in that area?

Social Sciences Student

Uh, yeah.

Paul Robertson

OK, cool. OK. And then overall, has the AES course helped you to develop your digital competencies? Would you say?

Social Sciences Student

Yeah, I would say so.

Paul Robertson

Yeah, OK and how?

Social Sciences Student

Umm, like I mentioned before, especially with a finding a relevant academic sources and browsing through the articles and things like that, I think it's helped me with that specifically.

Paul Robertson

And then do you think before you started WEFC, do you think you are aware of what digital competencies you would need to study?

Social Sciences Student

No, I I mean I knew that I would need to develop my digital competency, but I didn't know specifically in which areas I would need to.

Paul Robertson

OK. And have you encountered any barriers or difficulties or challenges when using technology to learn?

Social Sciences Student

Not any that I can think of. Or are you asking about a specific experience or a general?

Paul Robertson

No, just in general, it's anything where you think, OK, this is there's been a barrier to me using technology to learn or being a challenge or a difficulty.

Social Sciences Student

Umm, no, there's nothing that comes to mind.

Paul Robertson

Great. And then final question, would you like to make any further comments or suggestions related to digital competencies?

Social Sciences Student

No, no. No.

Paul Robertson

No. OK. Well, thank you very much for your time and for sharing your thoughts on the topic. I'll, I'll stop recording now.

Appendix VII: WEFC Draft AES Scheme of Work (Term 1 and Term 2)

Legend – Descriptive Coding according to areas of the DigComp Framework

1. Information and data literacy
2. Communication and collaboration
3. Digital content creation
4. Safety
5. Problem solving

Week	Objectives
1	<p>Introduction to AES</p> <p>Objectives:</p> <ul style="list-style-type: none"> - to become familiar with the content and expectations of the course - to become familiar with the assessment, marking criteria (equivalency), and where to find information - to develop self-awareness as a learner - to introduce the AWL - to develop ways to record and learn vocabulary
	<p>Introduction to Academic Writing: Principals of academic writing</p> <p>Objectives:</p> <ul style="list-style-type: none"> - to identify the principals underlying academic writing - to introduce the main features of Academic Style in writing - to introduce academic writing context and genres - to evaluate writing for Academic Style
	<p>Introduction to Academic Reading:</p> <p>Objectives:</p> <ul style="list-style-type: none"> - to identify text types in university - to identify the key criteria that distinguish academic texts

	<ul style="list-style-type: none"> - to match reading strategies with purpose - to practise different reading strategies such as skimming and scanning - to identify and practice SQ3R note making strategies
2	<p>Introduction to Academic Listening: Academic Listening skills and note-taking</p> <p>Objectives:</p> <ul style="list-style-type: none"> - to understand what types of listening skills are required at university - to compare the features and function of lectures in different cultures - to practise note-taking skills for purpose - to listen to a lecture and take purposeful notes
	<p>Introduction to Academic Speaking: Different context and expectations</p> <p>Objectives:</p> <ul style="list-style-type: none"> - to introduce the different communicative contexts and expectations with the <i>Western European</i> university system - to introduce the purpose and expectations of university seminars - to evaluate and identify features of a good/bad seminar discussion - to practise functional language for discussions: turn taking - to introduce Project A and the aims/purposes of task-based learning
	Language Development
3	<p>Writing: Unpacking essay titles</p> <p>Objectives:</p> <ul style="list-style-type: none"> - to review writing genres and question types in university - to practice analysing and deconstructing essay questions - to use brainstorming techniques in academic essay planning - to review existing notes to identify relevant information
	<p>Reading: Finding Academic Sources</p> <p>Objectives:</p> <ul style="list-style-type: none"> - to introduce the challenges of finding reliable information - to identify different types of sources and where to find them - to review reliable search engines and other resources available to <i>WEFC</i> students
	<p>Reading: Academic Articles</p> <p>Objectives:</p>

	<ul style="list-style-type: none"> - to introduce the challenges of finding reliable information - to identify and practice strategies to gain an overview of journal articles - to locate main ideas and supporting ideas within long texts - to summarise main points within texts
4	<p>Writing: Academic Comparison Essays</p> <p>Objectives:</p> <ul style="list-style-type: none"> - to review basic compare/contrast structures - to identify to basic outline structure for academic essays - to introduce thesis statements and practice writing a basic thesis - to complete a basic academic essay outline structure <p>Listening: Academic Comparisons</p> <p>Objectives:</p> <ul style="list-style-type: none"> - to review listening strategies in the academic environment - to listen for gist and main ideas in an academic lecture - to identify supporting details in an academic lecture <p>Language Development – Speaking presenting information to support a position</p>
5	<p>Writing: Planning an essay and using coherent paragraphs</p> <ul style="list-style-type: none"> - to introduce the use of thesis statements and topic sentences - to introduce the notion of student voice in academic work - to introduce topic sentences and the PEEL structure - to produce a basic outline for a research-based essay <p>Writing: Introduction to paraphrasing</p> <p>Objectives:</p> <ul style="list-style-type: none"> - to introduce students to the theory and practice behind citation and bibliographies - to introduce Harvard referencing style - to introduce and practise 3 forms of in-text citation: summary, quotation, paraphrase - to practice paraphrasing short sentences <p>Writing Workshop – complete and submit essay</p>
6	Reading Week

7	<p>Introduction to the ERE (CW1, CW2 and CW3) and personal portfolio</p> <p>Objectives:</p> <ul style="list-style-type: none"> - to introduce the ERE project and essay titles - to introduce the concept of Critical Reading - to analyse and unpack research essay questions - to identify evaluative and descriptive instructions - to gain an overview of the ERE Portfolio and associated tasks - to develop a timeline for personal deadlines and consult with wider programme <p>Reading: evaluating sources and academic writing</p> <p>Objectives:</p> <ul style="list-style-type: none"> - to practice evaluating different sources - to identify authority, currency, objectivity, reliability and academic conventions - to practice identifying academically appropriate texts - to introduce Project B and brainstorm possible topics <p>Writing: Academic Style Workshop – Project A Review</p> <p>Objectives:</p> <ul style="list-style-type: none"> - to summarise key features of Academic Style - to review and evaluate learner writing for Academic Style - to review and evaluate referencing, citation and bibliography
8	<p>Reading: Authority and Currency as criteria</p> <p>Objectives:</p> <ul style="list-style-type: none"> - to engage in critical thinking about authorship and credibility - to review how currency of a source and ideas impacts a source - to practice identify gist and main points from an academic text - write some notes for 8.2 - space for discussion on CW1 questions <p>Writing: Developing and supporting your position</p> <p>Objectives:</p> <ul style="list-style-type: none"> - to review sources and notes to identify relevant information - to develop a position and use evidence to support in speaking - to engage in a seminar and present a supported viewpoint

	<ul style="list-style-type: none"> - to review citation and using sources to support a position
	Language Development – Speaking – using examples practice – responding to an opinion
9	<p>Reading: Identifying authorial stance</p> <p>Objectives:</p> <ul style="list-style-type: none"> - to identify the main argument of an academic source [USING THE CW1 TEMPLATE] - to report on a source and argue for academic suitability - to peer evaluate sources and identify academic appropriacy - to map out the next stages of Project B <p>Academic Style: Avoiding misconduct</p> <p>Objectives:</p> <ul style="list-style-type: none"> - to review terminology around academic misconduct - to review purpose of citation and referencing - to practice paraphrasing and attributing information in speaking - to identify the importance of summary writing - to summarise a text for specific vs global purposes
	AES Exams – exam proctoring platform and the Listening exam
10	<p>AES Exams – Reading Exam</p> <p>Speaking: Final seminar practice linked to reading/essay question</p>
	<p>AES Exams – Writing Exam</p> <p>9.6 – Direct Quotations</p>
	<p>CW1 Final – Workshop – for all/mandatory for weaker</p> <p>Example and workthrough</p>
	Submit CW1 Draft
11	Seminar A – End of Week 11 (Thursday)
12	No AES Assessment

Week	Objectives
1	<p>Project B: Working as a Team</p> <p>Objectives:</p> <ul style="list-style-type: none"> - to review individual notes from Project B - to review and evaluate note-taking strategies - to provide constructive criticism to your peers in written and spoken form - to identify team working strategies in writing assignments <p>Cause and effect essays</p> <p>Objectives:</p> <ul style="list-style-type: none"> - to gain an overview of cause and effect essays structures - to review and practice writing Thesis statements - to review and practice writing topic sentences - to review paragraph structure and practice PEEL structures <p>Listening cause and effect</p> <ul style="list-style-type: none"> - to predict the content of lectures using preparation strategies - to develop strategies for identifying the gist of lectures - to practise listening for supporting details in a lecture - to identify signalling language in a lecture
2	<p>Course Work 1 – 1-2-1s</p> <p>Language Development: Review of resources on AES Platform; identify self-study timeline</p>
3	<p>Writing: Synthesis and writing strategies</p> <p>Objectives:</p> <ul style="list-style-type: none"> - to review purpose and aim of synthesis in academic writing - to practice different reporting structures to vary language - to practice using a synthesis framework - to practice writing synthesised sentences for Project B <p>Reading: Adding concessions to outlines</p> <p>Objectives:</p> <ul style="list-style-type: none"> - to review source evaluation criteria for the CW1 - to practice evaluating academic sources - to identify purpose of concession within academic discourse - to identify and use concession in Project B outlines

	-
	Language Development: review synthesis basics – paraphrasing, referencing, reporting verbs, linking phrases
4	Writing: Introductions and Thesis Statements Objectives: <ul style="list-style-type: none"> - to identify the key features of introductions in extended essays - to review and refine thesis statements and essay argumentation - to write and provide peer feedback on Project B introductions
	Workshop: Course Work 1 <ul style="list-style-type: none"> - to review on CW1 Meeting Action points - to review key requirements of CW1 assignment and sample - to practice specific elements of the CW1 assignment
	Language Development; More CW1 work on LD screen
5	Presentations: purpose, focus and structure Objectives: <ul style="list-style-type: none"> - to review existing knowledge on presentation style - to identify the different sections within an academic presentation - to identify and analyse different presentation foci and structures - to evaluate a sample presentation outline
	Writing: Coherence and cohesion within and between paragraphs Objectives: <ul style="list-style-type: none"> - to review topic sentences and paragraphs for coherence - to write complete paragraphs using the PEEL structure - to review and use cohesive devices within paragraphs - to explore and practise ways to link paragraphs
	Project B Writing Workshop – complete and submit essay
6	Reading Week
7	Writing: Introducing data and statistical evidence to academic writing Objectives: <ul style="list-style-type: none"> - to review use of evidence in academic work - to identify structures in reporting evidence

	<ul style="list-style-type: none"> - to practice incorporating statistical and numerical evidence in writing - to identify areas of further research
	Speaking: Presenting tables and data Objectives: <ul style="list-style-type: none"> - to use different types of visual data effectively in presentations - to identify the language used to refer to visual data - to participate effectively in Q&A sessions, asking and answering critical questions. - to practise logical presentation of visual data
	Language Development Objectives: <ul style="list-style-type: none"> - Mock presentation preparation
8	Speaking: Presentations – designing and delivering slides Objectives: <ul style="list-style-type: none"> - to review tools available for designing visuals in presentations - to identify key features of coherent visuals in presentations - to identify features of stress and intonation when presenting - to practice using features of stress and intonation in presentations
	Speaking: Mock CW2 Presentations
	Language Development: Mock contd. more time and feedback for weaker sts
9	Speaking: Using your Voice effectively in presentations Objectives: <ul style="list-style-type: none"> - to review feedback on CW2 and identify Action Points - to identify how and when to reflect within presentations - to identify and practice strategies to vary voice and intonation
	AES Exams: Listening and Seminar Practice Objectives: <ul style="list-style-type: none"> - to practice a timed Listening exams - to troubleshoot issues with the AES Exam question types - to review feedback from Seminar A and action taken during the term - to practice Seminar B and provide peer feedback on learner aims
	AES Exams – <i>exam proctoring platform</i> and the Reading Exam – Mock C
10	CW2 Presentations – Group 1
	CW2 Presentations – Group 2

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	Language Development: Timed Exam Writing -Mock C
11	Seminar B – End of Week 11 (Thursday)
12	AES Exams – First Round

Appendix VIII: NVivo 12 codebook

Dig Comp

Nodes

Name	Description	Files	References
Barriers to competence	Theme collecting barriers and issues that prevent students becoming competent.	8	116
Digital divide	Students from certain geographical and educational backgrounds lack experience and competence	4	15
Lack of equipment and access	Students from certain backgrounds lacking the necessary equipment and access to technology	3	4
Limited experience resulting in very low level of DC	Students who have limited experience with technology can have a very low level of DC	4	11
External factors	Sub-theme collecting external barriers to student competence	4	23
Background - cultural	Cultural background of students may shape certain competencies	2	5
Ease of use prevents students developing DC	The intuitive design of some technology prevents some students from developing competency	2	5

Name	Description	Files	References
Language barrier	Language can be a barrier for some students to develop competence	1	4
Reliant on a phone	The impact of the mobile phone in limiting and narrowing students Digital competencies	4	9
Internal barriers	Sub-theme expressing internal barriers to student competency, including issues such as giving up, going through the motions and not dedicating enough time.	8	68
Age and maturity impacting competence levels	Both staff and students connecting certain competencies to maturity and age of students	4	14
Competent, but not doing	Students have an awareness, but aren't necessarily doing what they need to do	1	3
Lack of awareness	Students lack awareness about some digital issues.	5	12
Lack of student effort	Students are perhaps capable, but give up or don't complete the work	2	9
Leave it at a basic level	Students sometimes do not go beyond basic levels	3	5
Reluctant to be independent	Students are sometimes reluctant to be independent.	2	12
Student lack of confidence	Students expressing a lack of confidence with technology	2	4
Student over-confidence	Staff expressing the idea that students are over-confident	4	9

Name	Description	Files	References
Struggling with simpler tasks	Some students struggle with basics and simpler tasks particularly file management	3	10
Formal learning about DC	Theme around the ways in which students formally learn DC within educational settings	8	95
Educational past addressing DC	Students' past education has helped them develop DC	5	17
Other subjects	Some competencies are covered in other subjects	1	7
Past education did not prepare them for DC	Students' educational past has an impact on their levels of DC	7	12
Pastoral side	Aspects of DC which have been addressed by the pastoral side of the programme	5	7
Student learning of DC on the AES course	Sub-theme about the ways in which students learn about DC on the AES course	8	52
Developing competencies through assessments	Students and staff noting that some assessments require competencies to complete and help develop competence. Coursework assessments are the focus, and they're noted to help develop 1. info and data literacy and 5. problem solving (indirectly), To some extent 3.1 digital content creation and 3.3 copyright are mentioned	7	22
Group project work helping to develop competencies	Students and staff noting the group project work helped develop competencies, in particular 2. collaboration, but 1. information literacy and 5. problem solving are also mentioned.	5	9

Name	Description	Files	References
Learning about academic misconduct	Students learn about plagiarism and referencing in AEs, which staff and students associated with the area of copyright and licences	7	7
Problem solving is indirectly addressed by AES	Problem solving is not directly addressed by AES but students still develop them indirectly	8	11
Texts related to DC topics	Some DC related topics such as health and wellbeing and the environment are discussed in texts in the AES course.	2	3
Important and relevant for students	Theme collecting codes that indicate competencies that are relevant for students	8	131
Access, understand, evaluate and use information	It is important for students to be able to access, understand, evaluate and use information at university	8	19
Basic competencies required for study	Students need baseline competencies to study at university	1	3
Communicate effectively and appropriately	Digital communication and collaboration are important for studies	8	19
Connected to non-digital higher order skills	Sub-theme collecting codes related to non-digital higher order skills	5	12
Critical thinking	The connection between critical thinking and digital competence	5	8
Independent	Students need to develop the ability to do things independently	2	4

Name	Description	Files	References
Need to create digital content at university	Students need to create digital content at university	4	6
Relevant - especially for international students	Issues that are particularly relevant for international students	3	5
Relevant for life	Digital competencies which are considered to be relevant for life in general	6	11
Relevant for working	Competencies that are considered to be relevant to work In particular 1, 2 and 5 are mentioned as generally applicable. 3 is seen as dependent on the particular career.	5	16
Safety at university	Sub-theme related to safety issues relevant for university life	8	28
Avoiding committing academic misconduct	The importance of students learning to avoid committing academic misconduct	6	14
Health and well-being	The need for students to protect their health and wellbeing at university	4	4
Protecting university work	The need to protect work at university	7	10
Solving problems at university	Solving technical problems is important at university	7	12
Informal learning about DC	Theme around the ways in which students acquire DC informally, outside of educational settings	8	93
Attitude	Sub-theme around students attitudes towards technology	4	15

Name	Description	Files	References
Enjoyment	Students enjoy aspects of technology use and therefore have developed a competence in it	2	5
Positive attitude	More competent students have developed a positive attitude	1	2
Student awareness of the need to improve	Students showing awareness that they still have room to improve, even if they already possess a degree of competence	3	8
Digital native	Comments related to the idea of the digital native	7	24
Experienced with the use of technology	Comments relating to how students are experienced with technology	7	15
Pick up basics quickly	Comments indicating that students pick up the basics of new technology quickly	1	2
Unknowing competence	Students are competent in some areas, but are not aware of them. Technology maybe does it for them, or they have developed competency without realising it	5	7
Informal and social aspects	Sub-theme around student social and informal use of technology	5	34
Creating transferrable skills	Students have developed certain competence because they are familiar with informal and social aspects of technology use	5	19
Narrow competence	Students tend to be competent with informal/social aspects, but it's a very narrow competence that doesn't transfer to academic/professional side	4	15

Name	Description	Files	References
Self-directed learning DigComp	Students learning digital competence through their own activities	6	20
Learn by doing or practice	Students have developed DC through doing or practicing	4	9
Learning from the internet	Students learn a lot about DC from the internet	4	9
Peer teaching	Students learning from peers	1	2
Issues around incorporating DC into curricula	Theme around potential challenges/issues surrounding the inclusion of DC in curricula.	5	96
AES is primarily a language and academic skills course	The AES course focuses primarily on language and academic skills and so any DC developed so be related to that	2	13
Assessment	Issues around assessment	4	20
Assessments could be updated	Assessments could be updated to include more creative assessments, or more directly include DC	3	14
Diagnostic assessment of DC is necessary	Diagnostic assessment of DC at the start of a course would enable effective interventions	2	3
High stakes assessment	High stakes assessment using technologies can evoke strong emotional reactions from students	2	3
Benefits of technology use for learning	There are a variety of benefits that the use of technology bring to learning	2	9
Bridging formal and informal	It is possible to bridge formal and informal learning of DC	4	6

Name	Description	Files	References
Collaboration could be more formally covered	Collaboration could be more formally covered in the AES course	5	8
Competence levels vary depending on the individual	Competence levels vary depending on the individuals. This codes doesn't necessarily fit with just positive or negative.	5	15
Limiting factors	Sub-theme collecting factors which limit or impact the inclusion of DC within the curriculum	5	25
Cultural issues	Certain topics or areas might be problematic to cover because of cultural issues	1	5
It can take a long time to use tech in the classroom sometimes	It takes time in class to use tech	1	3
Lack of freedom	Curriculum designers don't have total freedom in creating courses	1	4
Skewing our approaches	Focusing on those students with very low levels can skew our approaches to provision	1	3
Teachers need training	Teachers need training on technology in order to create effective learning environments	3	5
Too little time to cover everything	There's too little time to cover everything that could possibly be covered in a course	2	5
Relevance depends on the context	Theme indicating that certain competencies' relevance depends on the situation	8	32

Name	Description	Files	References
Depends on the country	Certain competencies are more relevant for certain countries	2	2
Depends on the field	Certain competencies and issues that might be more relevant to some fields than others	8	20
Depends on the university	Certain competencies may depend on the university that the student will find themselves in	1	2
Not at this level	Certain competencies are not as relevant at foundation level	2	3
Relevance depends on the individual	Certain competencies are more relevant for certain individuals	3	5