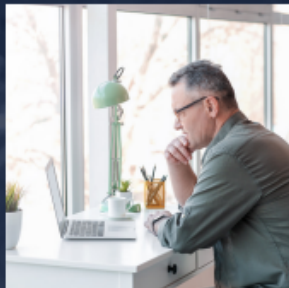


DRAFT

West Yorkshire Digital Skills Plan



Contents

- . Cover
- . Forewords (Mayor, Deputy Mayor/E&S Chair, LDSP Co-Chairs)
- . West Yorkshire offers a high-end experience for Tech and Digital
- . Digital enables all of West Yorkshire's sectors
- . Introduction
- . Executive Summary
- . What is the Digital Skills Plan?
- . What are Digital Skills?
- . The Vision
- . One-pager
- . Social Digital Inclusion: Challenge, Case Studies and Quotes, Impact, Action Plan
- . Workforce for the Future: Challenge, Case Studies and Quotes, Impact, Action Plan
- . SME and Third Sector Growth: Challenge, Case Studies and Quotes, Impact, Action Plan
- . Simplifying the Digital Offer: Challenge, Case Studies and Entry Points, Impact, Action Plan
- What's next?
- . Contact us
- . Sources

Foreword from The Mayor

PHOTO OF TB

Equipping the people of West Yorkshire with the right set of digital skills is one of my key priorities as Mayor. Only through addressing digital skills can we successfully build an inclusive and prosperous West Yorkshire.

Our new plan for digital skills contributes to two of the pledges I made when I became Mayor: prioritising skills and training to ensure everyone in West Yorkshire has the skills they need to secure work; and supporting local businesses and championing our regional economy. It also has benefits for my other pledges as only with effective digital know-how will we tackle the problems relating the climate and environment and make our transport system fit for the future.

We have the opportunity to be one of the leading UK regions that is equipping our people with the right and proper digital skills. We want to create more stories like Person A's, who used 100% Digital to stay out of prison and flee domestic violence. We want more stories like those who took part in Digital Skills Bootcamps who were hired by Dedalus. And we want more stories about prize-winning businesses who upskill their workforce and become more digitally-enabled. And it will be easier to get there if we secure further devolution of digital skills - following the success of our devolved Adult Education Budget and the Digital Entitlement.

Foreword from The Mayor

We will double down on our efforts to provide everyone in West Yorkshire with digital skills. Since the beginning of the pandemic, digital skills have never been more important. To help us to create a more inclusive society, all of our residents need these skills. Whether they are at work, home, or school, being able to use digital skills allows everyone – including those who may be otherwise discriminated by age, gender, language, socioeconomic status, disability, educational needs, or isolation - access to fun, education, and jobs.

There has never been a more important time for us to focus on growing digital skills - to support everybody, from the residents who want to use digital to connect with their families, to the businesses looking to grow in our region, to the people looking for opportunities to work in our thriving tech sector.

Our Local Digital Skills Partnership will convene our public, private and community voices in the digital skills arena and will aim to provide:

- opportunities for everybody to be able to engage in the modern digital society
- digital skills for the workforce of the future
- support for digital transformation and basic adoption across businesses and our Third Sector
- cohesive and structured digital skills provision

This Digital Skills Plan is our footprint for delivery and will support the implementation of the pledges which I was elected upon. I can't wait to continue this journey and lead our region's digital skills evolution.

Councillor James Lewis, Chair of the Employment and Skills Committee

PHOTO OF CLLR
LEWIS

Our long-term prosperity depends on having people with the right skills to get back into work and be ready for new opportunities.

West Yorkshire has the fastest growing digital economy, outstripping the national pace of growth. This makes the development of digital skills a key focus to ensure we support the growth of this sector.

We will utilise the strengths of our partners to drive delivery through the excellent Higher Education Institutions, Further Education Providers and Independent Sector.

Our new strategies to support all sectors will be key to developing a skilled workforce and enhanced productivity by ensuring that we have the right skills for employers need. We will reduce the number of low paid roles, raise the levels of qualifications across the region, support employer and the Third Sector to hire, and retain a diverse and inclusive workforce.

We recently launched our new Employment and Skills Framework, which was designed to promote skilled people, good jobs and strong businesses across West Yorkshire and Digital Skills are a vital and cross-cutting theme throughout our Employment and Skills aspirations.

Foreword from the Co-Chairs

Mandy Ridyard,
Finance Director of Produmax and
Chair of Space Hub Yorkshire



The Digital Skills Plan must equip business leaders with the tools they need to transform their businesses into more productive, agile and prosperous organisations. This will allow businesses to attract the best and brightest talent, retain and retrain existing people, provide more diverse and inclusive workspaces, and allow businesses to be more flexible and interactive with their customers.

SMEs who struggle to access digital skills or have low digital engagement will be a focus, because encouraging them to transform their digital capabilities and upskill their staff will provide greater opportunities for these businesses to grow. I believe that providing support for employees to develop their digital skills will accelerate growth opportunities and future-proof businesses, paying dividends and increasing productivity for years to come.

Providing the future workforce with skills required for the workplace is key, not only for the development of learners, but for the economic output of the region as a whole. We must continue to strive to ensure all students have the digital skills they need to actively participate in modern society, and to progress to high-skilled employment outcomes. A key aspect of this is continuing to inspire students to engage with STEM learning. This, naturally, includes a strong focus on inclusive provision and a diverse pool of learners.

More generally, we must make sure students are provided with holistic career provision, which focusses on giving students an awareness of the numerous opportunities for employment within our region. Additionally, students must be given a greater awareness of how digital skills will shape the jobs of the future. It's key that, within this, we engage with our vibrant SME community as the backbone of our regional economy, ensuring SME voices are prominent throughout skills provision.

Bill Jones, Deputy CEO of Luminate
Education Group and Executive
Principal of Leeds City College

West Yorkshire offers a high-end experience for Tech and Digital.

Our digital industry is the fastest growing in the UK, and we contain the UK's number one location for tech scaleups outside of London.

To add: Images of WY's Digital assets.

Digital enables all of West Yorkshire's sectors, including our innovative and high-growth sectors.

To add: Images representing our growth sectors and use of digital within.

Introduction

The growth of digital skills is key to supporting West Yorkshire's thriving digital sector and will also be pivotal in delivering greater digital transformation across other key sectors, such as Manufacturing, Engineering, Green, and Health. We have limitless digital assets and opportunities in West Yorkshire, from our booming innovation and start-up arena, our global reach through our digital private sector companies, and even further, through our work with Space Hub Yorkshire.

The Local Digital Skills Partnership is a strong partnership of advocates and leaders from business, education, local communities and the third sector who have an alignment of shared vision and goals. As a collective, **we are motivated by the prospect of a digitally-skilled society that will enable residents, businesses and communities in West Yorkshire to engage in social, economic, and global opportunities.**

The region faces challenges presented through areas of deprivation, low-levels of qualifications and low percentage of SMEs that are digitally capable. West Yorkshire has more than its fair share of deprived neighbourhoods, a high skills deficit and too few SMEs are digitally capable. This Digital Skills plan addresses how the partners in the Local Digital Skills Partnership will deliver interventions to change this.

We have **opportunities that we must build on to transform lives through digital technology.**

- the strengths of the empowered voice of the Local Digital Skills Partnership
- the strong digital skills focus across the region, supported by Mayor Tracy Brabin
- the thriving digital environment, which is attracting start-ups and large tech companies
- and leverage the benefits of devolution to grow digital skills to support the growth of the region to increase our numbers of skilled people, good jobs and strong businesses.

Executive Summary

Purpose of the report:

Digital technologies have intrinsically changed how residents, businesses, communities and governments work, learn, entertain and interact. The covid-19 pandemic lockdowns have intensified the value of our abilities to use digital technologies. Digital skills are an enabler for our social and economic growth, for our quality of life, and for efficiency of our businesses.

West Yorkshire has a fast growing digital sector, and a wealth of partnerships and digital assets, convened by one of the UK's 8 Local Digital Skills Partnerships, to deploy the Digital Skills Plan and enable all in West Yorkshire to experience the benefits of engaging with digital technology.

In alignment with the Digital Framework and the Employment and Skills Framework, the Digital Skills Plan sets out to improve four key, inextricable areas that aim to raise the digital skills profile of West Yorkshire - to boost productivity and enable inclusive growth - by prioritising access to skills and training to ensure everyone in West Yorkshire has the skills they need to secure work.

The challenges we face:

Some in West Yorkshire are excluded from participating digitally, for a myriad of reasons, including, but not limited to: poverty and the lack of access to hardware, software, or an internet connection; lack of English language or confidence to learn; disability, neurodiversity or learning difficulties, etc.

Data demonstrates that jobs in digital roles are well-paid and in-demand by employers, but there are significant skills shortages in the marketplace to fill the vacancies in digital roles, and a significantly low number of female participants.

As well as workforce shortages, SMEs and third sector organisations fall behind the private sector in uptake of digital upskilling.

The digital learning space is complex, with many offers with varying eligibility criteria and timeframes. Mapping provision is a long-term, ongoing task - this plan uses a case study methodology to exemplify initiatives for this reason.

Executive Summary

Our four workstreams have identified priority actions and a list of further actions, which will leverage West Yorkshire's assets to alleviate the digital skills challenges we face.

No individual will be left behind as all of our residents will be supported to engage in an increasingly digital society through accessible and inclusive provision of digital skills training. We commit to support the capacity building of community organisations, such as rolling out 100% Digital West Yorkshire across the region to deliver digital inclusion. We will do this by coordinating the regional digital inclusion network through a hub and spoke model of advisors.

We want our **SMEs & Third Sector to invest in digital skills for their workforce** to transform their businesses. To do this, we will promote relevant sector-specific programmes of digital skills provision to SMEs and the Third Sector, especially to underrepresented groups and we commit to providing opportunities for existing workers to retrain by signposting businesses and individuals to existing upskilling provision.

We will start to **reduce the skills shortages and gaps** in roles within the digital sector and in roles that require digital skills. We aim to increase employer engagement with its future workforce, through increased activity in the following areas: curriculum development, interactions with younger employees, careers fairs, careers talks and work experience, real-world digital challenges that align digital careers with young people's interests, work experience, T-Levels, internships, bootcamps and apprenticeships. We will contextualise the different curriculum areas for teachers by creating a toolkit for different subject areas on the future career opportunities within digital.

All of our **residents will understand how to access digital careers guidance and digital skills training** for any stage of life or work. We will create learning and career pathways to enable individuals to self-identify their digital learning needs and access provision, and we will develop a simplified and inclusive signposting toolkit of digital skills support available for practitioners.

What is the Digital Skills Plan?

The Digital Skills Plan will need to set out the priorities and actions needed to support skills growth and digital engagement in West Yorkshire. The plan has been developed in partnership with business, education, the third sector and local government organisations.

The Digital Skills Plan set out to align with the following principles:


1. **Be bold and ambitious** outlining the actions required to deliver the plan's vision.
2. **Be strategic and practical** in content and design so that it is accessible to key audiences of business, education and individuals.
3. **Be time bound**, with a review after 3 years (with annual updates on progress)
4. **Set out the shared ambitions and priorities** for the region for digital skills.
5. **Provide a blueprint** for stakeholders and partners to integrate their own priorities and delivery and be responsive to emerging needs in the region.
6. **Describe the actions** that can be taken by the Combined Authority and others to deliver the shared ambition and priorities.
7. **Align** with the key Strategic Economic Framework, Digital Framework, Employment & Skills Framework and the Economic Recovery Plan.
8. **Reflect the geographies** of the Combined Authority and ensure that collaborative partnership work continues across the region, complementing existing activity.

What are Digital Skills?

'Digital Skills' is a term that can mean different things in different contexts - which can make talking about them confusing.

To ensure alignment with national government strategy, the West Yorkshire Digital Skills Plan uses the terminology from the [Essential Digital Skills Framework \(EDS Framework\)](#):

- The 'Essential Digital Skills Framework' is the current baseline for digital skills that UK citizens need for work and everyday life.
- The Framework was established in 2018 through a consultation led by the Tech Partnership, Lloyds Bank and the Department for Education, involving over 350 cross-sector organisations.
- It updates the 2015 Basic Skills Framework by adding distinct skills statements for life and work, to demonstrate progression and enable measurement.
- Progress against the Framework is measured annually by the 'Essential Digital Skills Survey', which tracks year-on-year changes in digital skills, run by Lloyds Bank with Ipsos MORI.



The Digital Skills Plan is a vision of region-wide **transformation of lives and livelihoods** through digital skills

The Essential Digital Skills Framework is divided into the following four categories:

Digitally Excluded

Cannot do any of the *Seven Foundation Tasks* independently

Foundation Level Digital Skills

Can perform all *Seven Foundation Tasks* independently

Essential Digital Skills for Life

Can independently perform at least one task within each *Life skill area*

Essential Digital Skills for Work

Can independently perform at least one task within each *Work skill area*

Seven Foundation Tasks

- Use the different menu settings on a device to make it easier to use
- Find and open different applications/programmes on a device
- Update and change a password when prompted to do so
- Turn on a device and log in to any accounts/profiles
- Open an Internet browser to access websites
- Utilise the available controls on a device
- Connect a device to a Wi-Fi network

Life Skills

- Understand the importance of communicating securely
- Set up an email account communicate with others digitally using email and other messaging apps
- Use word processing applications to create documents
- Share documents with others by attaching them to an email
- Communicate with friends and family using video tools
- Post messages, photographs, videos or blogs on social media platforms

Work Skills

- Understand and conform with my organisation's IT and social media policies
- Comply with my organisation's security protocols when accessing my email or working remotely
- Communicate in an appropriate way for my organisation by using email, online and collaborative digital tools
- Use digital collaboration tools to meet with, share and collaborate with colleagues
- Use professional online networks and communities

The Digital Skills Plan also recognises two additional categories of digital skills

'Essential Digital Skills for Work' recognises a basic, generalist digital capability relevant all work places. However, upskilling beyond the basics can help progress careers, support career changes, fill skills gaps across a variety of sectors, and support the growth of the Digital Sector in West Yorkshire.

Digital Skills for the Digital Sector

The Digital Skills Plan will also reference the digital skills needed to ensure a supply of talent to meet the demands of the region's thriving digital sector, which is now the largest outside London.

e.g. Programming, Web & App Development; Data Science, Analytics, Visualisation, SQL, JavaScript, Cloud Computing; UI/UX Design, etc.

Digital upskilling or re-skilling for any sector

The Digital Skills Plan will also recognise the need to enable people who have already achieved 'essential digital skills for work' to upskill further, or re-skill to support career progression and/or change in any sector.

e.g. Using new digital technologies within business, digital marketing, content creation for social media, website optimisation

Digital Skills Plan: Vision



Creating an
inclusive society &
a thriving economy
through the growth of
digital skills for all

Our ambitions are:

Social Digital Inclusion

To support the growth of digital skills needed for social inclusion, addressing the ongoing challenge of accessibility and connectivity.

Workforce for the Future

To support greater alignment between business and education to enable growth in digital skills and promotion of digital careers to deliver the workforce for the future, ready for the 'jobs of the future'.

SME & Third Sector Digital Growth

To support SMEs & Third Sector increase productivity through the growth of digital skills in their workforce, improving the resilience and sustainability of organisations.

Simplifying the Digital Offer

To demystify the regional provision of digital skills by understanding current provision and future needs, and ensuring provision is easy to access for all residents.



Social
Digital
Inclusion



Workforce
for the
Future



SME & 3rd
Sector



Simplifying



The close association between digital exclusion and other dimensions of inequality underpins an urgent social and economic need to act.



Digital professionals are among the occupations with the highest prevalence of skills shortage vacancies.



41% of the workforce lack essential digital skills. A quarter of businesses lack the knowledge and experience needed to make their businesses more digital.



Those without digital skills are unclear on what training they need, and where and how to access appropriate learning.



Build the capacity of community organisations, such as rolling out 100% Digital West Yorkshire across the region. Empower the regional digital inclusion network.

Engage digital employers in a range of activities to inspire and educate students. Teachers across all subject areas develop an understanding of the career opportunities within digital.

Promote relevant digital skills programmes to SMEs and the Third Sector. Showcase opportunities for existing workers to retrain by signposting businesses and individuals to existing upskilling provision.

Empower individuals to self-identify their digital learning needs and access provision. Develop a simplified signposting toolkit/platform of digital skills support available.



No individual is left behind as all are supported to engage in an increasingly digital society through accessible and inclusive provision of digital skills training.



The skills shortages and gaps are reduced in roles within the digital sector and in roles that require digital skills.



SMEs & Third Sector value and invest in digital skills for their workforce to transform their businesses.



All residents understand how to access digital careers guidance and digital skills training for any stage of life or work.



In line with the **Levelling Up** agenda, all West Yorkshire residents will benefit from the **financial and social benefits** of using digital technologies to enhance their **quality of life** within their communities. Residents **will improve their employment prospects** and **strengthen the recruitment pool** for West Yorkshire businesses.



**Social
Digital
Inclusion**



The Challenge

The Social Digital Inclusion vision will cultivate strong pipelines of residents to engage with the further 3 workstreams. The close association between digital exclusion and other dimensions of inequality underpins an **urgent social and economic need to act that aligns with Levelling Up**. Delivering the right interventions to support those who are digitally excluded will have wider benefits on elements such as health, regeneration and education, thus requiring a collaborative, community-based approach and a resilient third sector.

Building trust and relationships with adult learners - across ages - is vital where learners face considerable social and economic disadvantage, and multiple barriers to learning.

As of 2021, **4% of people in Yorkshire and Humber remain offline**, despite the fact that West Yorkshire's full fibre and gigabit coverage are both above the national average.

23% of adult residents of Yorkshire and Humber don't have Essential Digital Skills for Life 7% of these are digitally excluded, meaning they cannot complete a single 'foundation' digital task such as turning on a device, using a mouse/keyboard, interacting with the home screen on a device, connecting to Wi-Fi, browsing the internet.

Only 59% of people in employment have Essential Digital Skills for Work 9% of these do not have Foundation level skills, which include: using the email address book in their organisation to 'cc' in colleagues; working remotely using a virtual private network (VPN); use document formats such as PDFs; use video-conferencing products. This data is Yorkshire and Humber-wide. An estimated 460,000 of people in employment without Essential Digital Skills for Work live in West Yorkshire.

Nationally, the biggest barrier to digital inclusion is **lack of motivation**, with 42% of people who are offline stating that 'Not interested, I see no need'. 37% of those offline state that they **don't have the right equipment**, and 36% say that it's **too expensive** to be online. 1.3 million non-users across the UK are worried about privacy and security.

As well as social and ethical reasons to add benefit to the community, there is a strong economic case to be made for digital inclusion. It has been estimated that **if everyone in the UK was able to go online would add another £63 billion to the economy.**

Social Digital Inclusion – How we are already tackling the challenge

To access those who are digitally excluded, offline and online place-based support and community networks are integral. Tablet lending (CN), Digital Champions Network, digital support across West Yorkshire's libraries and community networks that reach out to those most in need, supported by national charities such as Good Things Foundation.

CASE STUDY

100% Digital Leeds: Widely recognised as one of the leading digital inclusion programmes in the country, 100% Digital Leeds brings together the third sector, health and care and council colleagues to design and deliver sustainable digital inclusion interventions that are embedded into existing services. Leeds was set up on the premise that the people most likely to be digitally excluded are those who have other challenges that make it more difficult for them to engage, such as disability, learning difficulties, poverty, homelessness, addiction, language barriers, long-term health conditions, social isolation, memory problems or other factors.

“Person A has been in and out of prison for the majority of her adult life for numerous thefts from shops and was a sex worker prior to her most recent sentence. She is also fleeing domestic violence from another rough sleeper with whom she was previously in an abusive relationship. They were on a joint claim for Universal Credit which left Person A dependant on her partner and unable to break away from the abusive relationship. Having a smartphone has allowed Person A to make their own separate Universal Credit claim and the couple have now separated. Person A has a history of not attending probation meetings and getting recalled to prison as a result. Having a smartphone with connectivity has allowed her to stay in active contact with the Probation team and break that cycle.”

100% Digital recipient, via Leeds Housing Options

Social Digital Inclusion – How we are already tackling the challenge

CASE STUDY

Libraries: There are 119 libraries in West Yorkshire, open 3667 hours per week, with 600+ members of staff and volunteers, and almost 6 million visitors per year. The People's Network is the provision of free public access computers throughout the library networks and has had a massive impact for those who would not otherwise be able to get online, such as those who do not have skills/education, for whom the cost of equipment and network connections is preventative, or where cultural/language are barriers.

An example of a local scheme is #Digital121 - First Steps with Digital programme

A programme of First Steps with Digital was held at Seacroft Community Hub and Library in January 2022. The sessions are designed to: support digitally excluded learners to attain Foundation Level digital skills and reach towards Life Essential Digital Skills level; promote use of Leeds Libraries online services and wider #Digital121 support sessions.

Kurt is currently homeless, and uses the library computers to look for housing and to check his Universal Credit page. He's only got a basic phone at the moment, so he also enjoys using the library computers for entertainment and especially to listen to music.

Kurt said, 'It means everything to be honest, because there's no other outlet at the moment for free internet usage.'

Social Digital Inclusion – How we are already tackling the challenge cont.

CASE STUDY

Kirklees Digital hubs. The Hubs provide free Wi-Fi and a space to access technology in a safe and covid-secure environment, as well as a range of free learning courses for anyone aged 19 or over, to suit people of all levels from beginners, to those with more advance skills. Residents can also get online at home with help from a free device or data loan scheme for up to three months. It is envisaged that residents using the loan service will go on to further improve their digital skills and access other learning.

“David was unemployed and the family were short of money and did not have access to a laptop although they had internet access at home. David has some literacy boundaries and need support to complete his CV and get some printed copies to hand out locally. David has always worked and had been made redundant just before Christmas and had been out of work for 9 months when he approached the community centre.

The Digital Hub has allowed a local resident who was made redundant to get an updated CV completed with support from staff. In addition, to print off paper copies to hand out to local employers and to apply for jobs online with some initial IT support and training. He feels more included now he can actively job search without any help.

He has secured long term employment which in turn allows the family to be more financially resilient at a time when we anticipate a ‘cost of living’ crisis just around the corner, with utilities and petrol for example having gone up by 50% within twelve months.

David feels more confident moving forward and will now be looking at what other employment opportunities are available locally to get a better job. He as also learnt new IT skills which make him more independent when applying for jobs online

Kirklees Digital Hub recipient, via Chickenley Community Centre

Social Digital Inclusion – Impact

No individual is left behind in an increasingly digital society through accessible and inclusive provision of digital skills training. All in society have access to gain the skills required in an increasingly digital-first world to help manage their finances, navigate the health system, apply for jobs, access housing and benefits, and enjoy leisure activities and mental wellbeing.

Social Digital Inclusion – How will we achieve this?

Priority Actions

- **Build the capacity of community organisations, such as rolling out 100% Digital West Yorkshire across the region.**
- **Empower the regional digital inclusion network through a hub and spoke model of advisors.**

All Actions

- Scale up the programmes that are delivering positive impact in communities, focusing on those that:
 - Deliver digital skills and digital access to the digitally excluded in local settings.
 - Deliver community-based interventions that increase confidence and motivation to start engaging with digital (such as cyber security training) as secondary learning.
 - Scale up access to a sustainable programme of tablet and device lending and donations.
 - Help disadvantaged communities out of data poverty through broadband or bespoke data packages.
 - Offer people-based, on the ground, digital support to engage those who are digitally excluded or do not/cannot access services elsewhere (English-language, non-internet users) – this includes embedding digital support alongside other services.
 - Signpost the next digital skills opportunity, such as digital entitlement through the Adult Education Budget.
- Work with employers, large and small, to support the digital inclusion agenda through Social Value and Corporate Social Responsibility initiatives.
- Support Third Sector organisations to access funding and advice for digital offers that complement their primary services and connect them with other locally delivered Employment and Skills interventions.
- Build on the success of the devolved Adult Education Budget by expanding the Digital Entitlement and lobby for further devolution of digital skills.

Workforce for the Future



Workforce for
the Future

The Challenge

Over 80% of all jobs currently require the minimum of basic digital skills

Digital professionals are among the occupations with the highest prevalence of skills shortages vacancies. The number of people in digital roles is growing and the evidence shows that employers often cannot hire employees with the required skillset. Microsoft Office and Microsoft Excel are seen as some of the most in-demand skills at the present time for employers. **Digital skills such as Social Media, CRM and Engineering Design are now required across a wide range of disciplines, permeating across the workforce.** From April 2021 to March 2022, in west Yorkshire, Software Developer and ICT Support Specialist roles are the most in-demand digital occupations.

There is growing demand for specialist digital roles in the labour market. Online job postings for digital jobs was 50% higher in March 2022 than pre-pandemic. Employment in digital roles grew 6x faster than overall employment between 2011 and 2021 and more than 40,000 people are employed in specialist digital roles in West Yorkshire, which are skills-intensive and therefore well-paid (median salary of £40,800) roles such as software developers, web developers, telecoms engineers.

Yet, fewer than 10% of pupils take a Computing qualification in West Yorkshire. Around 60% of schools offer Computer Science GCSEs, covering 80% of pupils but entries for computing-related qualifications at Key Stage 4 are low.

15% of young people in the UK who have smartphones have no access to laptop or desktops. Echoing the behaviour of the parents, children from a high socioeconomic status family use the internet more often and on a wider range of devices. **There is clear alignment between what the parents say they want for their children and what their children aspire to themselves.**

Girls are far less likely than boys to study Digital-related courses, but apprenticeships are more diverse Technology-related jobs are more appealing to younger children, young men and those with higher income levels

Compared to girls in West Yorkshire, boys in West Yorkshire are:

- 2x as likely to study Maths at A-Level
- 5x as likely to study Physics at A-Level
- 12x as likely to study Computing at A-Level

Positively, there is an upward trend in Computer Science qualifiers from West Yorkshire's Higher Education Institutions. Computer Science has the highest retention rate of any subject in terms of graduates taking jobs in West Yorkshire 15 months after completing their subjects. These highly-trained graduates stay within the region to work in our well-paid digital sector. But only 15% of qualifiers from Computer Science from West Yorkshire institutions are female.

With 80 percent of the 2030 workforce already in the workforce today, reskilling the existing workforce will be a major challenge between now and 2030.

Workforce for the Future – How we are already tackling the challenge

Large amounts of public and private provision is targeted at education institutions, to encourage, inspire and enable students to learn digital skills and consider careers that rely on digital skills. This includes the 'Teen Tech' initiative, IBM SkillsBuild, Futuregoals' platform and virtual work experience, the West Yorkshire Innovation Festival, the EY and STEM Learning app, Digital Skills Bootcamps, IBM P-TECH model, Digital T-Level provision, Higher Technical Qualifications.

There is also some provision that works with businesses to encourage them to offer employment opportunities to those students/residents who have taken part in digital learning.

Case Study

During covid lockdowns, Future Goals produced an engaging series of videos, animations and challenges designed to replace the usual face-to-face work experience offer. Students were given challenges from West Yorkshire employers to:

- make students aware of the key skills needed for each sector, including Digital
- explain desired qualifications for each role
- showcase some of the lesser known career opportunities available.

Case Study

Multiple courses at Wakefield College include Digital Skills for Life and Work, Digital User Skills in Microsoft Word & Excel, IT User Skills in Microsoft Office, T-Levels.

Workforce for the Future – How we are already tackling the challenge

Case Study

Digital Skills Bootcamps: Free, flexible courses for up to 16 weeks. Almost 2000 West Yorkshire residents have applied to take part in these courses, using devolved funding, which were endorsed by local employers (demand significantly outstripped capacity).

I had experience with JavaScript but I didn't have experience with all of the skills on the bootcamp. I learnt all the fundamentals that I needed to be able to use at industry level. They found me a company, Dedalus, and from there I was able to secure an interview. It's probably one of the best opportunities I've ever had in my life, especially with it being a transition from my current role.

- Former Coder's Guild Bootcamp graduate (2021), now Associate Service Delivery Coordinator at Dedalus Group

The modules of the bootcamp were very relevant for what we do. They were all about how WordPress themes work, how you would go about adding plugins and we certainly see that the apprentices come in extremely knowledgeable of what they're going to be doing as opposed to coming in a bit cold footed.

- Leeds-based, micro-business who benefitted from the Software Testing Digital Skills Bootcamp delivered by The Coder's Guild

Workforce for the Future – Impact

The skills shortages and gaps are reduced in roles within the digital sector and in roles that require digital skills. Businesses are able to access local recruits with the skills they need and residents can enter prosperous and progressive careers in West Yorkshire.

Workforce for the Future – How will we achieve this?

All Actions

- Increase take-up of STEM learning, digital literacy and GCSE Computer Science, especially for girls and BAME who are under-represented beyond GCSE level learning through academic and technical routes by:
 - Developing greater work experience opportunities for digital skills roles, and digital roles in all sectors, especially for girls.
 - Encouraging the participation in coding clubs, digital badges and extra curricular activities that promote the take-up of digital skills, especially to underrepresented groups (with additional support requirements for underrepresented groups).
 - Supporting schools to fulfil their statutory duties to ensure pupils are aware of technical and academic routes to further learning, including digital apprenticeships, and to embed a digital strategy in all schools, e.g. initiatives such as the EY Stem Learning app.
- Promote, through engaging content, the opportunities that digital skills can lead to (including in non-digital sectors) to students and their parents through locally rooted careers inspiration such as www.futuregoals.co.uk, IBM Skills Build and the West Yorkshire Innovation Festival.
- Leverage the expertise of private provision (e.g. banks) and tailor free provision for West Yorkshire residents and businesses that is accessible and relevant to people's lives.
- Promote clear pathways for adult digital skills provision and funding routes, such as Skills Connect bootcamps, so that adults can upskill or reskill to advance their career (either for the digital or non-digital sector), especially targeting the over-50s to stay in work.

Priority Actions

- **Engage digital employers in curriculum development, interactions with younger employees, careers fairs, careers talks and work experience, real-world digital challenges that align digital careers with young people's interests, work experience, T-Levels, internships, bootcamps and apprenticeships.**
- **Teachers across all subject areas develop an understanding of the career opportunities within digital, e.g. English teachers to understand routes into Digital Marketing.**

SME and Third Sector Growth



SME & Third
Sector Digital
Growth

The Challenge

41% of the workforce in Yorkshire and Humber lack Essential Digital Skills for the workplace.

Yorkshire and Humber is the region with the lowest levels of high digital capability in England. Only 77% of SMEs within Y&H have high digital capability. The 23% of SMEs with low digital capability are less likely to: have Essential Digital Skills among their staff; offer their own website; use email to communicate with customers; use social media to interact with customers and suppliers; use government services; use Internet Banking; use online accounting software.

2020 data showed that almost a third of mid-sized organisations in Leeds City Region needed to improve their basic IT skills to meet business needs.

In Yorkshire and the Humber, **one quarter of businesses state that they don't have the knowledge and experience needed to make their business more digital.**

38% of business leaders are not confident to lead their organisation in a digital world

35% of businesses don't know or aren't sure where to access information about making their business more digital.

71% of businesses in West Yorkshire do not seek independent advice, either because they did not know where to go or they did not think they needed it. Of the 29% who do seek advice, 39% go to their accountant, 22% go to a bank, 16% go to their Local Authority, and 16% go to other businesses/peers.

In the Voluntary Community and Social Enterprise sector, it is estimated that there are **~12,000** registered and unregistered **organisations and groups** in West Yorkshire, which employs **29,700 full-time equivalent people**. The total economic added value is calculated to be between £3.1bn and £4bn.

SME and Third Sector Growth – How we are already tackling the challenge

Much private provision is aimed at businesses (and particularly SMEs) to support their upskilling needs. This includes Amazon Small Business Accelerator, Digital Boost, Clockwork City, Digital Enterprise, ICS Digital Transformation, Help to Grow: Digital, Made Smarter, Google Garage. There is limited digital skills brokerage support for businesses.

Case Study:

Skills for Growth is a free scheme that helps businesses to navigate the complex skills landscape. More than 600 businesses have been supported to access local talent and/or skills courses since Sep' 2020.

Skills for Growth has been tremendously helpful in supporting our business growth. They introduced us to Leeds Beckett University who supported us to recruit a Marketing Assistant to target customers for our digital sales assistant products across the nation and beyond. As a result, we were nominated and won the prestigious Hermes Creative International Platinum Award in May 2021. – Director of a small, Digital business in Wakefield

Case Study:

Lloyds Bank Academy Business Hub: Free online on-demand learning and webinars on digital skills, to help businesses learn new skills and use technology to improve productivity, increase turnover and understand customers. Lloyds' annual national aim is to help 185,000 business become more productive and resilient.

Case Study:

Workforce Development Service. Bradford Council's Workforce Development Unit offers a range of development opportunities designed to develop the skills, competence and confidence of the workforce. These courses include a wide ICT offering aimed at the development needs of colleagues across the Council, but are also available to partner organisations and businesses external to the Council.

SME and Third Sector Growth – Impact

SMEs & Third Sector value and invest in digital skills for their workforce to transform their businesses and build economic resilience and growth, and offer employment opportunities for WY residents.

SME and Third Sector Growth – How will we achieve this?

Priority Actions

- **Promote relevant digital skills programmes to SMEs and the Third Sector**, including through our networks of diverse digital professionals.
- **Showcase opportunities for existing workers to retrain by signposting businesses and individuals to existing upskilling provision.**

All Actions

- Influence leaders in SMEs and Third Sector organisations to embed digital skills and transformation as a key element of their business strategy, driving greater employment levels, great efficiency, productivity and growth, via business support and professional networks.
- Raise SME and Third Sector organisations' awareness of Essential Digital Skills for Workplace interventions for employees, by working with services that offer skills diagnostics/support for employers.
- Support a regional programme for digital transformation which could include peer-to-peer, cross-sector support for SMEs, including micros and voluntary and community organisations, focused on underrepresented groups.
- Coordinate and promote schemes, including digital capital grants/funding, that support businesses to access digital skills and digital transformation and an inclusive workforce
- Support small employers (and larger companies within the supply chains) who are indigenous or investing in the region to attract diverse talent and skills to thrive in West Yorkshire to strengthen the skills offer.
- Explore opportunities for subsidised digital training targeted at key sectors, to support priority actions.

Simplifying the Digital Offer



Simplifying the
Digital Offer

The Challenge

The digital learning space is complex and fast-moving. There are many offers of courses with varying eligibility criteria, timeframes, costs, modes of study, support levels, and qualification levels.

There is not a single portal that includes all provision from online only providers, state funded colleges and training organisations, universities, large employers in a range of sectors like finance, IT, business and engineering.

To demonstrate the saturation of the digital learning space, one UK-based digital learning provider increased their number of courses from 255 to 1,377 between 2015 and 2021.

Mapping provision is a long-term, ongoing task because new initiatives are added weekly. This plan uses a case study, light mapping methodology to demonstrate current digital initiatives in West Yorkshire for this reason.

Those without digital skills are unclear on what training they need, and where and how to access appropriate learning.

Yet, 2 in 3 of those without digital skills would like to improve their skills if they knew what skills were needed and where they are available. And **64% of people say they would undertake digital skills training if they knew it would aid them with career progression.**

Yet, more than a quarter (26%) of the working age population in West Yorkshire are qualified below Level 2 or hold no qualifications in 2019, compared with 21% nationally. There has been a significant fall in the take-up of digital Further Education courses by adults (25+) and community learning participants since 2018.

Self-taught methods of learning to use online services and develop digital skills are the most used, nationally. Self taught methods are also perceived as the easiest way to develop digital skills. However, those with Low or Very Low engagement with Digital would be more likely to turn to their family and friends alongside self-taught/online method to learn new digital skills.

Much of our data on digital skills needs covers all of Yorkshire and the Humber, rather than granular West Yorkshire statistics.

This is the geography used by many of the secondary evidence sources, e.g. the Department for Culture, Media and Sports and Lloyd's Bank.

Simplifying the Digital Offer – How we are already tackling the challenge

Current provision:

Within West Yorkshire, there are multiple national and regional, private and public platforms, partnerships and provision that aim to help residents to understand and access digital training.

Case Study

The devolved Adult Education Budget funds any adult over the age of 19. The AEB delivery partnership in WY offers a range of digital courses: from community based non-accredited digital access programmes, to courses for ICT practitioners. Through the Digital Entitlement, the Essential Digital Skills qualification will be fully funded for all individuals aged 19 or older and assessed at below level 1.

Case Study

Calderdale Council signposts regional/national schemes that have a role in Calderdale e.g. Barclays Digital Wings, FutureLearn, Google Digital Garage

Case Study

Leeds' Digital Pathways and Destinations Steering Group. The digital workforce in Leeds is not representative of the demographic in the city. This steering group consisting of representatives from educational institutions, businesses and local authorities works to improve progression and the pathways available for young people into digital-related careers (Reports to Leeds Learning Alliance).

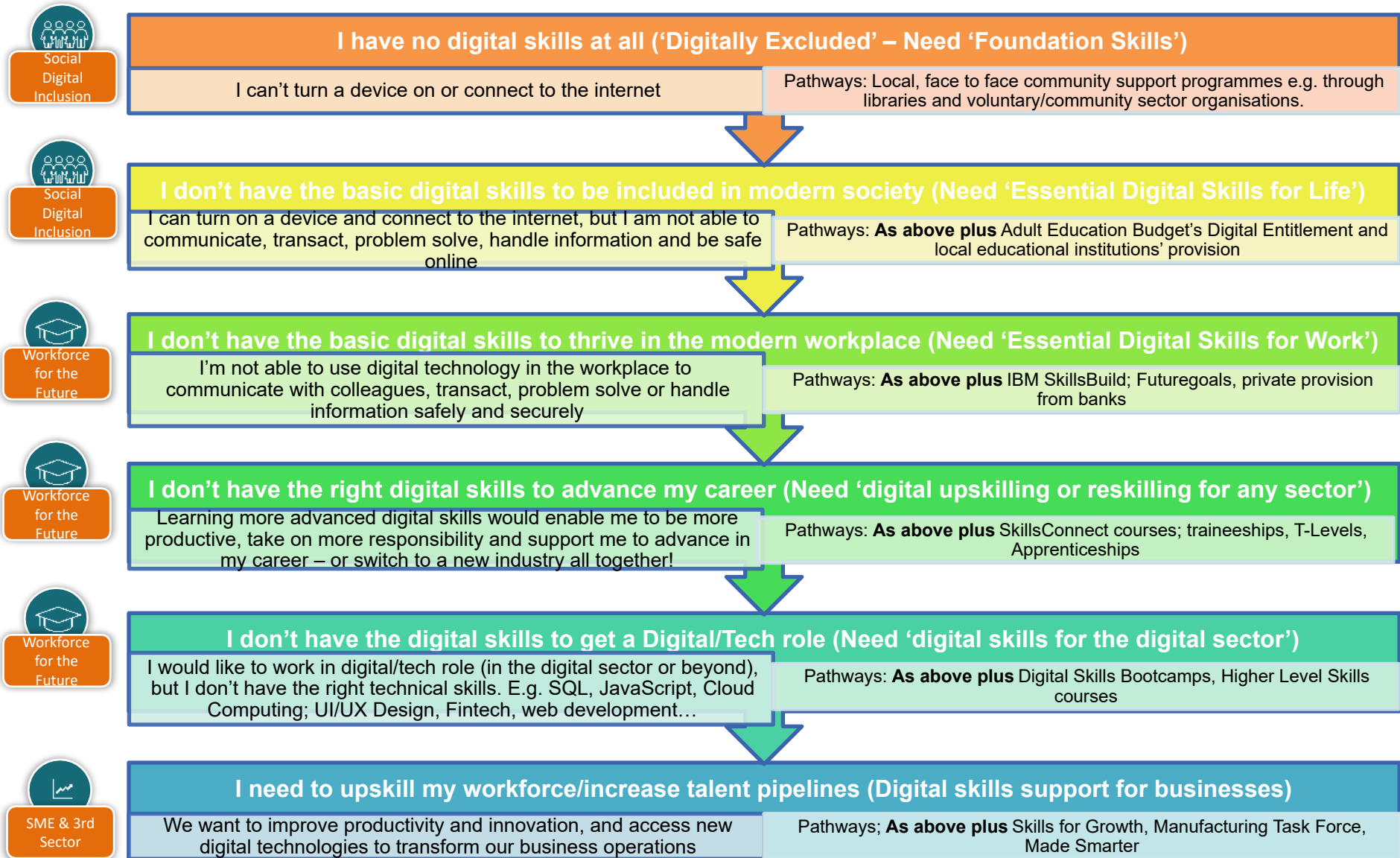
Case Study

Barclays Digital Wings: An online learning tool designed to help users become more tech savvy and keep up-to-date on recent digital trends. It's accessible from anywhere, by anyone, from any device.

Case Study

IBM SkillsBuild for Students and Educators exposes secondary school students (13-18) to the emerging career fields and skills needed for success in the future workforce. A starting point for career exploration, the platform offers free access to product agnostic courses both technical and professional.

Simplifying the Digital Offer – Entry points



Simplifying the Digital Offer – Impact

Residents understand how to access digital careers guidance and digital skills training for any stage of life or work. All residents access this provision and develop their digital skills, for life and work.

Simplifying the Digital Offer – How will we achieve this?

Priority Actions

- **Empower individuals to self-identify their digital learning needs and access provision.**
- **Develop a simplified signposting toolkit/platform of digital skills support available for practitioners,** which can be adapted for face-to-face interactions and in plain English, for individuals. (To encompass all levels from schools, colleges and universities, adult skills and employers.)

All Actions

- Continue the convening, coordinating and influencing role of the Local Digital Skills Partnership of national, regional and local programmes, for local delivery.
- Monitor and measure progress of Essential Digital Skills at West Yorkshire level.
- Undertake an audit of digital skills activity across the region and nationally, including Higher Level Skills for the tech sector. Ringfence a development fund for High Level Skills.
- Work with partners to ensure that digital interventions are meaningfully embedded into the design of all Employment and Skills programmes.
- Listen to the voice of businesses via ongoing engagement to examine the supply, demand and take-up of Higher Level Skills in this area and ensure that all provision is meeting the needs of businesses.
- Business West Yorkshire to provide brokerage of all digital skills and transformation programmes.

What's next?

Firstly, we are working closely with our Local Authority partners to **prioritise and design programmes** based on this plan. This will be critical to delivering the outcomes needed from each workstream.

We are exploring how we can **continue the legacy of the Local Digital Partnership** by broadening the scope as we refresh the wider Digital Framework. The framework ensures digital technologies for all businesses, a strong digital culture, the best, tech for good, world-class digital infrastructure and, of course, digital skills for all.

We must make sure that the actions in this plan will have a measurable impact. At the first annual review of the Digital Skills plan, we will be able to start **monitoring** progress. In the Simplifying the Offer section, we will be able to start **monitoring** progress. We have created a baseline of data for West Yorkshire.

Continual training and development in the digital sector will be crucial for us to ensure that those entering the digital sector have skills in line with the needs of the market. In the digital sector, we will undertake an analysis of the gaps in **Higher Level** skills and opportunities and exploring methods of filling the gaps.

DRAFT

What's next?

All of the actions from each section of the plan will be reviewed comprehensively, ensuring that the work of each workstream has a knock-on effect on other workstreams, with Simplifying the Offer looping back to Social Digital Inclusion, to ensure that there is **a cohesive pathway**:

- From non-accredited Essential Digital Skills for Life for those who lack fundamental skills,
- To employer-endorsed, accredited or Essential Digital Skills for Work for those who want to upskill or reskill,
- To technical digital courses which teach digital skills for specific roles.

Finally, we will continue to **lobby for further devolution** to better connect the careers and skills in the sector and to ensure longevity of our programmes. Further devolution of the skills system would allow us to eliminate short-term programmes, instead allowing us to react more quickly to the needs for skills in our high-growth areas which have immediate skills needs in the digital sector. We, in West Yorkshire, want to be empowered to commission and deliver locally, for the best opportunities and outcomes for our residents.

DRAFT

Contact us

Sources

- *Assessing the UK's Regional Digital Ecosystems*, Department for Digital, Culture, Media & Sport <https://assets.publishing.service.gov.uk/government/uploads/system/uploads/attachment_data/file/1020407/Digital_Regional_Ecosystems_report_v9.1.pdf> (2021)
- *Digital and Tech Sector*, Invest Leeds City Region <<https://www.investleedscityregion.com/media/7707/digital-and-tech-sector.pdf>> (2021)
- *Digital Nation UK 2021*, Good Things Foundation <<https://www.goodthingsfoundation.org/insights/building-a-digital-nation/>> (2021)
- *Labour Market Report 2021*, West Yorkshire Combined Authority, <[wyca-labour-market-report-2021-final.pdf](https://www.wyca-labour-market-report-2021-final.pdf)> (2021)
- *Leeds City Region Business Survey 2021*, BMG Research and Leeds City Region Local Enterprise Partnership, <<https://www.the-lep.com/media/6556/bmg-leeds-city-region-business-survey-2021-final.pdf>> (2021)
- *Leeds City Region Business Survey*, West Yorkshire Combined Authority, <<https://www.westyorks-ca.gov.uk/media/5533/lcr-business-survey-2020.pdf>> (2020)
- Lucy Wilson, *How Leeds is Nurturing its Startup and Scaleup Companies*, Beauhurst <<https://www.beauhurst.com/blog/leeds-nurturing-startup-scaleup-companies/>> (2021)
- *No Longer Optional: Employer Demand for Digital Skills*, Burning Glass Technologies and the Department for Digital, Culture, Media and Sport, <https://assets.publishing.service.gov.uk/government/uploads/system/uploads/attachment_data/file/807830/No_Longer_Optional_Employer_Demand_for_Digital_Skills.pdf> (2019)
- Peter Glover, *Digital Strategy*, West Yorkshire Combined Authority [internal document] (2022).
- Tracy Brabin, *Mayoral Pledges* <<https://www.westyorks-ca.gov.uk/a-mayoral-combined-authority/mayoral-pledges/>> (2021)
- *UK Business Index*, Lloyds Bank, <<https://www.lloydsbank.com/assets/resource-centre/pdf/businessdigitalindexreport.pdf>> (2022)
- *UK Consumer Digital Index 2020*, Lloyds Bank, <https://www.lloydsbank.com/assets/media/pdfs/banking_with_us/whats-happening/211109-lloyds-consumer-digital-index-2020-eds.pdf> (2020)
- *UK Consumer Digital Index 2021*, Lloyds Bank, <https://www.lloydsbank.com/assets/media/pdfs/banking_with_us/whats-happening/210513-lloyds-consumer-digital-index-2021-report.pdf> (2021)
- *UK Skills Mismatch 2030*, Industrial Strategy Council <<https://industrialstrategycouncil.org/uk-skills-mismatch-2030-research-paper>> (2019)
- *West Yorkshire Economic Assessment*, West Yorkshire Combined Authority, <<https://www.westyorks-ca.gov.uk/media/5642/west-yorkshire-economic-assessment-feb-20-updated.pdf>> (2020)