



# Cyber Super

## Big Ideas Impact Report

April 2025



UK Research  
and Innovation

# Introduction

Cyber Super aimed to empower 3000 young people, aged 7-14 years old from grant-aided schools across Northern Ireland to discover cyber security, a sector open to all.

Designed and delivered by social impact agency Big Ideas, Cyber Super was funded by the Department for Science, Innovation, and Technology [DSIT] as part of the Cyber Local competition.

A series of interactive digital workshops with diverse industry role models introduced young people to the opportunities available to all in the cyber security sector and developed key workplace skills. To support the programme's purpose to drive diversity, equity and inclusion, resources were allocated to deliver five face-to-face workshops in Special Schools in Northern Ireland supporting young people with Special Educational Needs and Disabilities (SEND) to explore cyber security careers.

Cyber Super was delivered in partnership with Queen's University Belfast Academic Centre of Excellence in Cyber Security Education. The project took place over three months (January - March 2025) and Big Ideas worked closely with Jessica Harper, Regional Cyber Lead - Northern Ireland, DSIT.



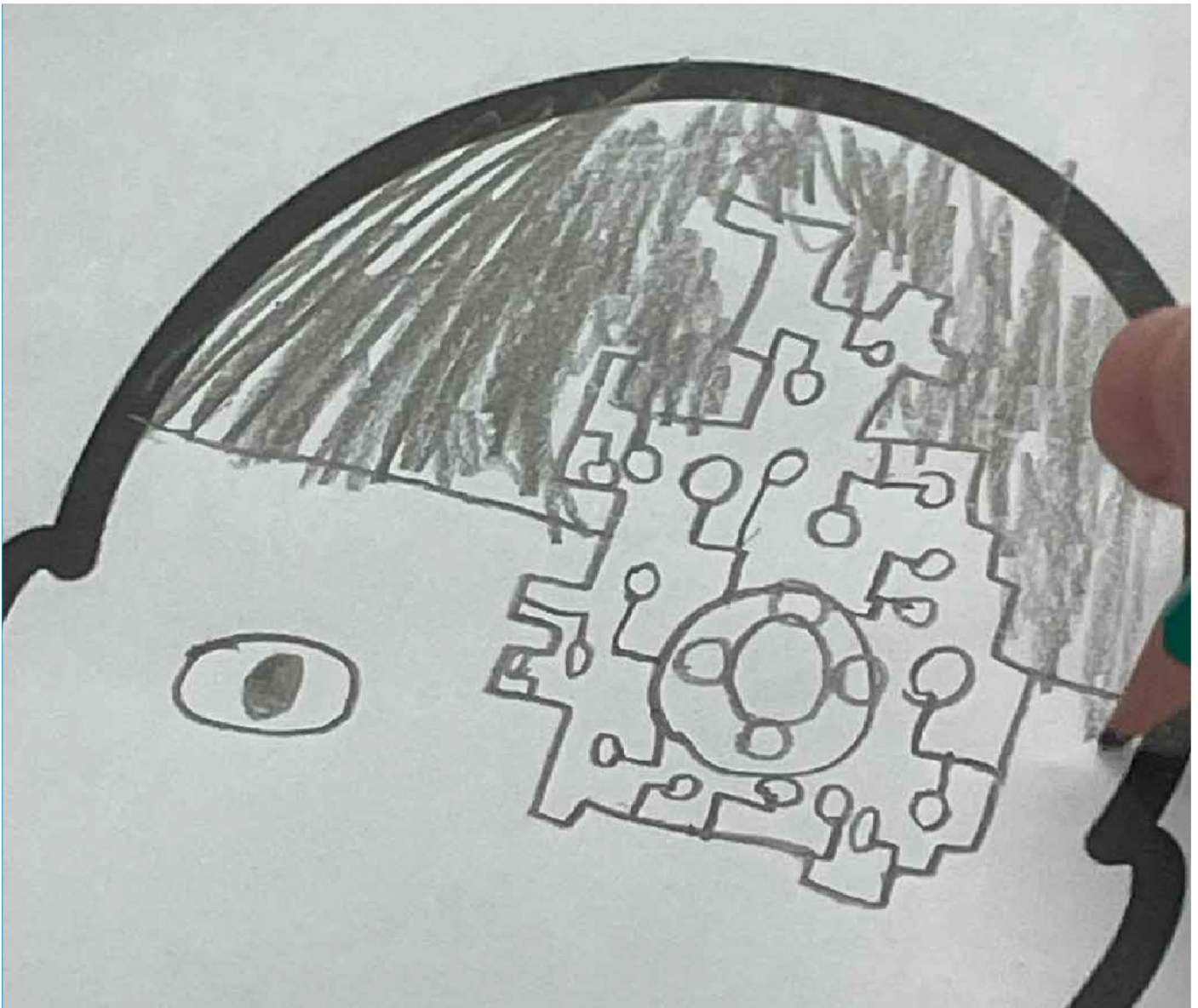
Recruitment poster designed by a student and submitted to Cyber Super schools competition



# Programme Aims

The aims of Cyber Super were:

- to raise awareness and excitement among children and young people of the opportunities open to them in cyber security careers and the skills needed to pursue them;
- to change perceptions of children and young people about who can work in cyber security and show them a sector open to all;
- to motivate and empower young people to find out more about cyber security careers and career pathways;
- to introduce new teachers to existing CyberFirst resources and opportunities; and
- to support the thriving cyber security ecosystem in Northern Ireland by connecting industry, academia and schools together through delivery of the programme.



# Programme Highlights

Just over **12,000 young people** aged 7-14 years old took part in Cyber Super.

Country-wide participation was achieved with **221 schools** from 11 Local Government Districts.

86 young people with Special Education Needs and Disabilities were trained as cyber recruits with **5 Special Schools** receiving in-person workshops.

57 students had **hands-on cyber security experience** at Queen's University Belfast Centre of Excellence in Cyber Security.

100% of young people **learned something new** about cyber security careers.

75% of young people **changed their perceptions** of who can work in cyber security as a result of taking part.

**388 new teachers** were signposted to CyberFirst NI resources and opportunities.

**Confidence among teachers** to reference cyber security careers in their classrooms increased - only 7% of teachers felt confident prior to the programme compared to 69% after.





# Programme Delivery Overview

## Collaboration with partners

A key aim with the Cyber Super programme was to collaborate across the cyber security ecosystem within Northern Ireland. DSIT Regional Cyber Lead - Northern Ireland, Jessica Harper, was instrumental in brokering these relationships. The programme was delivered with support from the following partners:

**Dr Sandra Scott-Hayward**, Director, Queen's University Belfast Academic Centre of Excellence in Cyber Security Education - provided a prize winning trip for two classes.

**Eamonn Brankin**, CyberFirst NI Regional Lead, and Sara Lyons CyberFirst Project Manager at Belfast Met - supported with speaker outreach, school engagement strategy and teacher signposting, as well as delivering a session to winning schools at Queen's University.

**Mark Mcconnell** and **Eamon McAteer** from the Education Authority Northern Ireland C2k network - supported with school engagement.

**Joanne English**, Cluster Manager, NI Cyber - supported with speaker and industry insight and outreach.

**Dawn Jamison**, NI Cyber Security Centre - support to integrate Cyber Super into CyberNI Week.

Successful collaboration between industry, academia and schools was at the heart of the Cyber Super programme and was realised during the delivery of the programme.



From left to right, Sandra Scott-Hayward (Queen's University), Vicky Hatchett (Big Ideas) Sara Lyons (CyberFirst NI) and Eamonn Brankin (CyberFirst NI)

## Schools engagement

The project was designed to be inclusive, offering participation to all grant-aided schools in Northern Ireland. The digital workshops were offered to all primary and post primary schools across the country, with different content for each distinct cohort. A simple digital pathway was created and shared with partners. Big Ideas met with NISCA (Northern Ireland Schools & Colleges Careers Association), the Department of Education Northern Ireland and the C2k network to share information with schools. The digital events were also listed on the CyberNI Week activity page via the Northern Ireland Cyber Security Centre [NICSC].

The offer proved popular among teachers and we often saw peer referral where teachers would recommend to other teachers in their schools. In total, 12,096 young people (age 7 -14 years old), 388 classes from 221 schools were registered for one of four digital workshops.

## Industry engagement

The NI Cyber Cluster supported with speaker outreach to secure industry role models for the digital events programme. Four industry professionals took part in the programme representing a range of roles within the industry. All speakers led young people through live scenario challenges as part of the workshops getting them to think like cyber security professionals.

With huge thanks to our four fantastic industry guests:

- **Stephen Chappandama**, Security Analyst, GP Strategies and Technology Manager, Foundervine
- **Rose Templeton**, Cyber security consultant, Vertical Structure
- **Steve Benton**, Vice President of Threat Research, Anomali
- **Shadi Razak**, CEO and Chief Technology Office, Angoka

“These engagements are vital for the future of our industry and allows younger generations to properly understand what a career in cyber security looks like.” **Rose Templeton**

## Digital workshops

During CyberNI Week, Big Ideas hosted four interactive 50-minute digital workshops offering students an engaging opportunity to develop future-ready skills including problem-solving, creativity, and teamwork and to meet real life cyber security experts. A range of creative tools were used such as Word Clouds, quizzes and live Q&As with cyber security experts.

During the workshops young people took part in live challenges based on cyber security scenarios that got them thinking like cyber professionals in their classrooms. They learned about the different types of roles in the industry and the skills needed in each.

The engagement of the young people during these sessions was fantastic as evidenced by the chat box and their questions to speakers. The activities provided students with a hands-on, engaging understanding of cyber security, its real-world relevance, and the importance of proactive digital protection.

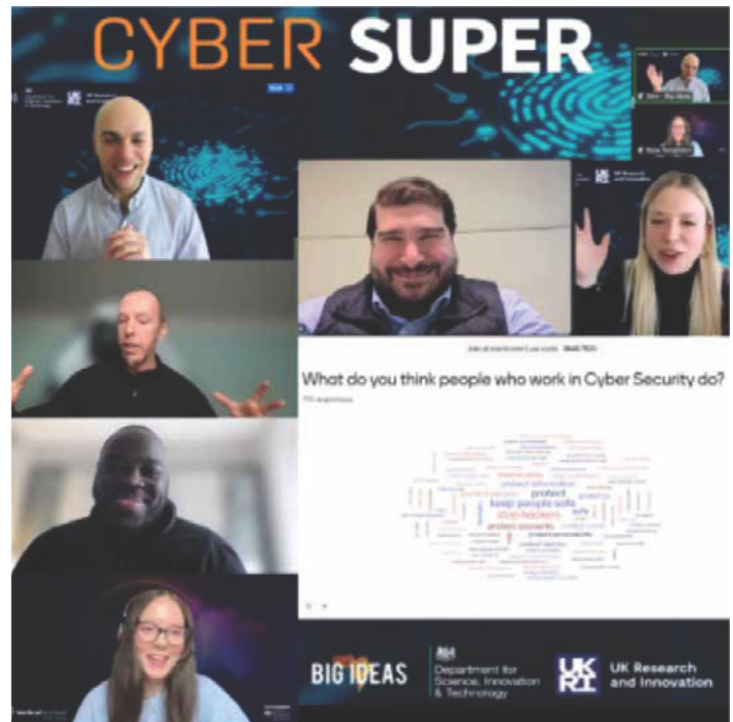
“The pupils loved hearing about what a cyber security job entails” **Teacher feedback**

“The students eyes were opened to both the technical and non-technical roles available in the cyber security industry and it seems to have fostered a serious interest in their study of ICT at school”

**Teacher feedback**

“At the event I was so impressed by the interest, enthusiasm and engagement from the range of school pupils and how they got to grips with understanding real cyber threats and dealing with a ‘live incident’” **Steve Benton**

Our Cyber Super industry guests in action during digital workshops



## SEND in-person workshops

To show cyber security as a sector where everyone is welcome, resources were prioritised to deliver 5 in-person workshops in Special schools (SEND sector) in and around Belfast. These were: Clarawood School, Belfast; Longstone Special School, Belfast; Rossmar Special School; Limavady; Mitchell House School, Belfast; and Sperrinview Special School, Dungannon.

In total 86 students took part, aged between 7 and 18 years old, with needs ranging from mild to severe learning difficulties, complex needs, ADHD and ASD. Big Ideas designed a flexible workshop structure that had adaptations for each activity in-built so that facilitators could respond in the moment to the young people's needs. Four challenge stations were set up around the room, each linked to a type of cyber security role and with a skills challenge for the young people to complete. Each time they visited a station they received a sticker on their training card - with the aim of completing the four challenges to be certified as a cyber security recruit of the future.

“Pupils liked that they were able to complete the activities and a few said they would like a career in the field, which they would not have before.”

**Teacher feedback**

Training card used in SEND schools (left), workshop in action at Longstone School (right)

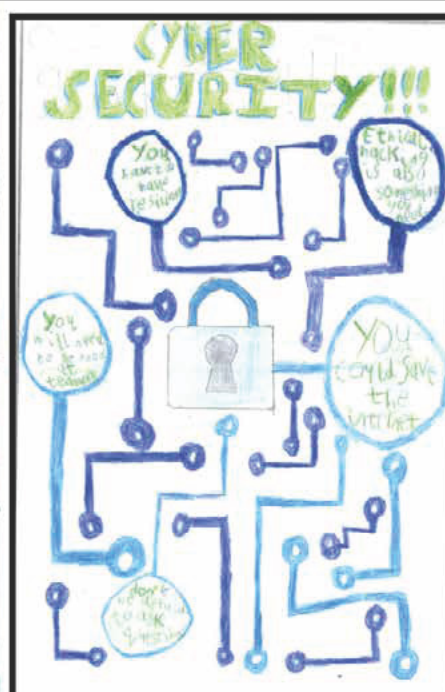




## Follow up Challenge Resource for at-home use

To offer an opportunity to young people to embed their learning and to raise awareness among their parents and carers of the opportunities open to them in cyber security, Big Ideas produced a PDF Challenge Resource for schools which had participated in the digital workshops.

The pack included a letter to parents and carers about the programme to stimulate discussion at home about cyber security careers and a home security audit for them to complete with their child to become Cyber Security Home Heroes. Finally, a creative challenge that asked young people to design a poster that encourages other young people to think about jobs in cyber security. 750 students participated in the competition, reflecting the level of engagement with the challenge resources at home, alongside their families.



Recruitment posters submitted as part of at-home challenge

## Prize winning trip

A class from McClintock Primary School in Omagh and from Edmund Rice College in Belfast won an all expenses paid class trip to Queen's University Belfast, Academic Centre of Excellence in Cyber Security Education on 24th and 25th March. The trip offered classes an opportunity to explore cyber security careers and take part in engaging activities. Dr Sandra Scott-Hayward and her team delivered a fantastic bespoke itinerary for the winning classes and Eamonn Brankin and Sara Lyons introduced the young people to CyberFirst through fun activities. During the trip gave students were able to try out hands-on cyber security challenges, such as radio encryption and VR training, while seeing for themselves what a Higher Education pathway in IT, computing and cyber security might look like.



“Think I would like a job doing cyber security. I want to keep secret things safe and work on encryption. That would be a cool job for me.” **Girl, age 10, McClintock Primary Omagh**



Students from Edmund Rice College with Doctor Scott-Hayward (left), McClintock Primary student wearing VR headset (left)

“I’ve never thought about working with computers before. It’s a lot more interesting than I thought!.” **Girl, age 10, McClintock Primary**

“There is no way I was considering doing any kind of IT job after leaving school. I love art, you see. But today has made me think a bit differently. Maybe I should consider something with computers. There will be lots of jobs available by the sounds of it.” **Girl, age 13, Edmund Rice College**

“This trip had such an impact on my class, on many different levels. First, it was an excellent opportunity for them to experience a day in the life of a university student. Many of our students come from a background where parents do not have a third level education.

“The pupils were so enthused about using the different technologies and the hands-on experience that this provided. You provided them with an excellent insight into the importance of digital cyber security and how this is within their reach in NI, if it were something they’d want to explore in the future.

“Emily, P7, told me that it was great to see so many female staff at the university and how this is the career she wants to go into. Thank you for the wonderful experience. They will remember this trip!”

**Impact statement from Sarah Thompson, teacher, McClintock Primary**

## Bringing new audiences to CyberFirst

Cyber Super acted as a conduit to bring new teachers to CyberFirst resources and opportunities. Working with the CyberFirst NI team, Big Ideas signposted teachers throughout the programme to CyberFirst. Big Ideas data collection shows that both primary and post primary teachers are keen to find out more about CyberFirst having never interacted with the programme previously. This is an important legacy of the programme.





# Programme Outcomes

## Raised awareness about cyber security careers

**12,100 young people** from 221 schools across Northern Ireland took part in the digital workshops offered as part of Cyber Super.

**86 young people** with SEND trained as cyber recruits as part of 5 in-person workshops.

Following the workshop **100% of the teachers** reported that their students have learned something new about cyber security careers.

**750 young people** participated in the at-home challenge raising awareness among parents and carers about the opportunities available to young people in Northern Ireland's cyber security sector.

**57 young people** from two winning schools participated in hands-on cyber security experience at Queen's University Belfast Centre of Excellence in Cyber Security.

## Changing perceptions of young people about cyber security careers

**12,100 young people** had the opportunity to meet someone who works in cyber security in their schools for the first time.

**Two out of the four** industry participants were from global majority backgrounds and one was a woman.

Over three quarters of **teachers (77%)** reported that the digital workshops changed their students' perceptions of IT careers and who can work in cyber security.

"The event was designed to make sure that our young people could see these career opportunities and dispel the myth that a cyber career is only for geeks, nerds and those with maths and science." **Steve Benton, Cyber Super industry guest**

**5 out of 5 teachers** in SEND settings agreed or strongly agreed that the in-person workshops had changed their students' perceptions of who can work in IT careers.

## Teacher confidence

When signing up for Cyber Super, **only 7% of teachers** said they felt confident or very confident discussing cyber security jobs with their students.

Following the event, **69% of teachers** said they felt confident or very confident when asked the same question.

This increase in confidence is a key long term outcome of the programme as future cohorts of students now have the potential to benefit from teachers referencing cyber security jobs and career pathways in their classrooms for years to come.

## New audiences to CyberFirst

Signposting to CyberFirst resources and opportunities was integrated throughout programme delivery.

**388 new teachers** were introduced to CyberFirst resources via digital signposting. In addition to this, 100% of teachers participating in Cyber Super said they would like to use CyberFirst resources within their classroom. This indicates a high level of motivation among teachers to access CyberFirst in the future.

## Legacy of connections across cyber security ecosystem

Cyber Super was a genuine collaboration between industry, academia, government and schools which has left a legacy of connections:

- 4 industry professionals took part
- 2 academic institutions contributed to the programme's success (Queen's University and Belfast Met)
- Support from Education Department C2k network to reach schools
- 388 teachers signposted to CyberFirst NI.



# Conclusion

Cyber Super delivered its purpose in a short period of time to raise awareness among young people across Northern Ireland about the opportunities available to them through cyber security careers. Crucially, feedback from teachers also demonstrated that the programme changed their students' perceptions of who can work in cyber security.

Demonstrating that cyber security is a sector open to all was vital in delivering the programme's purpose around diversity, equity and inclusion. Allocating resources to in-person provision in SEND settings allowed neurodiverse young people, young people with social emotional and behaviour needs and participants with severe and complex needs to explore careers in cyber security raising confidence and aspiration along the way.

Delivering the programme during CyberNI Week allowed Cyber Super to align with existing activity across the sector and support the strategic aims of the NI Cyber.

Cyber Super brought new teachers to the existing resources and opportunities offered by CyberFirst NI, and increased teacher confidence to reference cyber security jobs and career pathways in their classrooms. This will benefit future cohorts of young people across the country, leaving a legacy of increased engagement in schools.

Big Ideas would like to thank everyone who supported the programme and its delivery in particular Doctor Sandra Scott-Hayward at Queen's University, Eamonn Brankin and Sara Lyons from CyberFirst NI, and Jessica Harper from DSIT.

Find out more [www.big-ideas.org](http://www.big-ideas.org)