



Equal opportunities for learning

UK Government Home Access Programme narrows the digital divide by giving children and families home access to technology



Rt. Hon. Lord Knight of Weymouth
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The Rt. Hon. Lord Knight of Weymouth spearheaded the conception and delivery of the Home Access Programme, a pioneering UK Government initiative to provide home Internet access for low-income families with learners. Successful completion of this project was one of the proudest moments in Lord Knight's career, since it aimed to provide all students with an equal opportunity to succeed in their learning.

The thinking behind it

"Increasingly, research has shown that home Internet access makes significant gains in education and bridging the digital divide," explains Lord Knight. "Children who are able to access the World Wide Web from home are more likely to do better in subjects like math and may also get better exam results."

More recent evidence shows that children with technology at home could improve performance in one General Certificate of Secondary Education (GCSE) subject by up to two grades, which means pupils who would have gotten a D could now get a B.¹ And it's not just in the classroom where it matters. Children who lack computer access are more likely to leave school at 16 and possibly may not reach their desired occupation or earning potential as a result.²

"If a student gains five A* to C grade GCSEs, they can earn as much as 17 percent more than workers with no qualifications – or an extra GBP 150,000 over a lifetime's work," explains Lord Knight. "The Office of National Statistics has shown that if children have a computer at home, which they use for school-work, they are more likely to gain over five GCSEs and one A-Level, and improve grades attained."

"Bearing in mind this evidence, it was clear to us that we had to do something to provide all pupils with equal opportunity to learn and succeed, both at school and beyond," says Lord Knight. "We had already taken huge steps forward to increase technology use within schools, such as encouraging use of interactive whiteboards, so extending this ethos to the home was the next logical step."

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At a Glance

Project

- Bring home Internet access to around 200,000 children from disadvantaged families.

Accomplishments

- Government, private, and voluntary sectors worked together to devise a unique retail model.
- Secured a GBP 300 million (USD 480 million) investment from the UK Treasury.
- Completed pilots with two local authorities, reaching 93 percent of eligible families.
- Benefitted 267,244 families nationwide.

Lessons learned

- Work with government, private and voluntary representatives, whose expertise and creative thinking will help you achieve your goals.
- Don't underestimate the amount of work it takes to keep all parties at the table through long and difficult discussions.
- Think outside the box. You don't have to follow a certain delivery model just because that's the way it's always been done.
- Empower the consumer to give them something to be proud of, avoiding the stigma of government-funded schemes.
- Put forward a watertight business case, backed up with research and proof of benefits
- Refine your initiative through a pilot before taking it nationwide.

"We announced our plans at BETT 2007,³ highlighting our ambitions of bringing home computers and Internet access to around 200,000 children from the most disadvantaged families and Becta⁴ was put in charge of delivery. We knew what we wanted in theory, but we were not yet 100 percent sure how it was going to work in practice," recalls Lord Knight. "The challenge was to work out how we were going to deliver such an ambitious project and, more importantly, how we were going to persuade the Treasury to fund it."

A taskforce for home access

Lord Knight's first step was to set up a home access taskforce to look at how government, the IT industry, and representatives from education could work together to ensure all children have access to the Internet outside of school. This followed on from an initial study the previous year by Intel, Dell, and RM, which concluded that universal Internet access could be made possible through partnership between government, private, and voluntary sectors.

The taskforce included hardware manufacturers like Intel, Acer, Samsung, Stone Computers, and NS Optimum; software suppliers like Microsoft; retailer Comet; connectivity suppliers like O2, T-Mobile and Three; integrators and distributors like XMA, Micro P, Misco, and Centerprise; and specialists in Internet security like CEOP⁵; together with tech-savvy head teachers and government representatives.

"Having Intel on the task force was essential," explains Lord Knight. "As an organization, Intel is experienced in market segment development, whereas some of the other, smaller businesses on the task force were not. The Intel representatives were a huge support, working hard to keep some of the less experienced organizations at the table throughout lengthy and difficult negotiations."

In total, it took Lord Knight and his taskforce 18 months to build and reach agreement on a viable model for home Internet access delivery. "The result was a unique model that had not been used previously or since," says Lord Knight.

When it came to securing funding, explains Lord Knight, evidence, together with a clear benefits plan, was key. "By putting forward watertight evidence about the educational impact of home Internet access and also highlighting numerous additional benefits such as improvements to household budgets through managing finances and bills online, we were able to convince the Treasury to invest."

In September 2008, Prime Minister Gordon Brown announced a commitment of GBP 300 million to support the Home Access Programme. Specifically, the initiative was to target three types of families, those who:

- Had home broadband access but did not use the technology for their children's benefit
- Could afford access but did not think technology had educational value
- Could not afford home access or needed support in obtaining it

A pioneering retail model

Lord Knight said: "For me, the most important consideration was to provide the families with a computer that they could be proud of and reduce the stigma associated with owning something obviously government funded. For example, in the 1980s, there was only one type of spectacles available to children on the National Health Service, so it was immediately obvious to everyone who came from a low-income family. It was this sort of thing that we wanted to avoid."

He continues: "We wanted to give parents a choice and we wanted to empower them, rather than dictate to them. For these reasons we arrived on a retail delivery model. Low-income families, where children received free

The retail business model was unique in its approach, proving that traditional methods are not always the best

school meals, were able to apply for a single-use Barclaycard* loaded with GBP 530 worth of credit. This enabled parents, together with their children, to choose their own device from a select number of retailers. Included in this was a free 12-month subscription to the Internet.

“There are also additional benefits to this sort of retail model,” explains Lord Knight. “With traditional government procurements, there’s seepage of money from the overall investments to pay for government bureaucracy and administration. The retail model minimizes this. Also, if there’s a fault with the computer or Internet access, families go back to the suppliers to fix the problem rather than the government, helping to save public money, time, and reputation.”

Testing it out

Lord Knight and his team decided to trial the Home Access Programme with two local authorities, Oldham and Suffolk, enabling them to test and refine the scheme before its national rollout. The year-long pilots started in February 2009, reaching an estimated 93 percent of eligible families.

“The pilot succeeded in uncovering important lessons, which enabled us to improve the effectiveness and value for money of the national rollout, including targeting of grants and ensuring schools and teachers were well informed about the programme,” says Lord Knight.

“Also, there were positive early indications of the educational benefit of the programme. Beneficiary children spent an average of 5.8 hours per week using the computer for learning, an hour a week more than children who had existing access. There were also positive early indications of wider benefits. For example, 81 percent of parents reported that home access helped their own confidence in using technology.”

Taking it nationwide

Becta announced the rollout of the Home Access Programme across England at BETT 2010 and it rapidly succeeded achieving its target number of beneficiaries. Including the pilot phase, the total number of households benefiting from the programme was 267,244 – approximately 4.5 percent of England’s six million households with dependent children.

“Among the group that didn’t previously have home Internet access, the initiative brought it forward by about 2.8 years on average. For every one direct beneficiary household, research agency SQW⁶ estimates that a further 0.36 households will have purchased home access for the first time, at least partly as a result of hearing about the programme,” explains Lord Knight. “The overall net effect has been to accelerate home Internet access in a total of 163,000 households by a total of about 456,000 years.”

Achieving its aim

“SQW’s report also showed that the Home Access Programme succeeded in its goal of improving learning. On average, students were using their computers for 10.1 hours a week, of which

Key Technologies

- Samsung and Acer laptops powered by Intel® Architecture.
- Pre-loaded with software from Microsoft
- 12-month’s free broadband Internet connectivity from either O2, T-Mobile, or Three
- Security software from a range of suppliers
- Single-use credit card from Barclaycard* loaded with GBP 530 worth of credit
- Keyboards and assistive technology products from Keytools for children with special needs

4.7 hours were on learning-related activities. The children were in strong agreement that having the Home Access Programme computer made learning more interesting for them, let them use a computer more often to let them learn, and helped them do better at school.”

Lord Knight continues: “There were also positive signs that the programme had contributed to improved information and communications technology (ICT) skills and confidence for learners, with children indicating that their computer skills had gotten a lot better thanks to home Internet access. Teachers also cited improvements in ICT skills and confidence among pupils.

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“Thanks to the programme, students improved their ICT skills and gained confidence. Teachers in some schools observed that pupils were taking a more active role in their learning, by doing additional research at home, or using external Internet resources to support revision.”

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“Pupils valued the flexibility a home computer provides, in allowing them to do their homework or online research at home, rather than having to come into school early or stay late after school. Teachers in some schools observed that pupils were taking a more active role in their learning by doing additional research at home or using external Internet resources to support revision.”

Furthermore, there was also evidence to suggest that parents’ attitudes towards technology had improved. The vast majority (89 percent) of parents interviewed by SQW agreed that the Home Access Programme computer was something the whole family could use and most (57 percent) agreed that they, themselves, were more interested in using the Internet than they were before they got the Home Access Programme computer. This appears to have contributed to a high proportion of families continuing to pay for broadband access: only nine percent of households whose free Internet period had finished no longer had broadband connectivity.

On reflection

“The retail model worked really well in addressing a highly dispersed target group and feedback from the beneficiary families was good,” explains Lord Knight. “Making schools more responsive to consumers rather than to the government ensures they are better able to meet individuals’ needs.

“The Home Access Programme was truly pioneering in its approach and sends out a message that government-funded schemes do not have to be delivered in the traditional way. There’s been enormous interest in this scheme from around the world, so we may indeed see something similar in the near future. Working together with industry stakeholders like Intel was invaluable and with hindsight perhaps we could have delivered other schemes, such as the Building Schools for the Future programme⁷, more cost-effectively if we’d followed a similar retail model.”

Lord Knight continues: “That said, anybody working on a similar project in the future

should not underestimate the challenges of delivering such a complex initiative involving many different stakeholders and third parties. Negotiations were long and detailed to the point where it appeared we may have hit a brick wall in several instances. It takes huge drive and tenacity to move forward a project like this, while keeping all parties engaged and, in my case, also dealing with officials.

“What’s more, technology has moved on significantly in the last two or three years. Anyone hoping to achieve a similar goal today would need to consider a whole raft of new devices, including smartphones and tablets, and also other technology trends such as the cloud. The principles, however, remain the same.”

“Finally,” concludes Lord Knight, “government alone could not have delivered a successful project like this. Working together with representatives from industry brings additional knowledge and experience and a fresh perspective. Shared problems equate to shared solutions and gains.”

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¹ Institute for Fiscal Studies, 2009

² Sabates 2008

³ BETT is a trade show focusing on technology in education and is held annually in London.

⁴ Becta, formally known as the British Educational Communications and Technology Agency, was a non-departmental body funded by the Department for Children, Schools and Families. It was abolished in the post-election spending review in May 2010.

⁵ CEOP is the Child Exploitation and Online Protection Centre, a cross agency and cross business department of the Serious Organised Crime Agency tasked with bringing online sex offenders to the UK courts.

⁶ Home Access evaluation – final report by SQW in partnership with IPSOS Mori and London Knowledge Lab

⁷ Building Schools for the Future (BSF) is the name of the previous UK Government’s investment programme in secondary school buildings in England.

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