Worshipful Company of Educators Master's Seminars 2015

Members' Initiatives

Gresham College

An audience of some 30 members of the Company head three very different and contrasting presentations about educational developments in which the speakers played leadership roles.

The first presentation was by **Kevin Munday** who is the managing director of **'Think Forward'** (www.think-forward.org.uk) which provides an extensive support programme for young people in the transition from school to work. Kevin explained that the project was based in Tower Hamlets where there was a disjunction between the local labour market and the needs of school leavers. He explained that the intervention arose as a way of tackling this problem and reminded the audience that 40% of young people left school without having the basic qualification of five good GCSE passes. 25% of young people did not have contact with employers while they were at school and they went on to become NEETs (not employed, in education or training). The estimated cost of each NEET cohort was £35 million, a considerable cost to individual sand to the nation.

'Think Forward' uses coaches based in schools who work with students who have been identified as possible NEETs and they set targets for them. The coaches are professional and well-paid (at the level of Advanced Skills Teachers) professionals who support students from 14 through to 19. They link the young people with the world of work.

The initiative's initial target was East London because the NEET rate was higher than the UK average. The key challenge was connecting young people with employers and 'Think Forward' supports 1100 student. The aim was to encourage young people into further or higher education or into employment.

The project's target audience of young people most likely to be at risk of becoming NEETs had some common characteristics: they had a chaotic personal situation; they had limited interpersonal skills; and they were unprepared for the future. The project uses all available data and this means that young people who might otherwise be overlooked can be identified, for example young women. The project works closely with staff in schools, for example SEND managers. School staff recognise the coaches because they are professionally qualified and have status in the schools.

The coaches supports students through a five-stage process:

1. Participants are identified (psychometric tests are used)
2. The participant's needs are identified and understood
3. An action plan is drawn up
4. The plan is carried out and reviewed
5. Success is sustained

The coaching process take a slightly different focus in each of the five years of the school to work progression programme. The success rate of 'Think Forward' is good: 95% of young people who are

supported either move into further or higher education or are in employment. The development of 'soft' skills is important so that individual students have self-belief, are motivated for employment and have the skills for employment. These skills have been identified by employers as vital for both the young people and the employers.

In the discussion that followed Kevin told the audience that 'Think Forward' was half-funded by the Department for Work & Pensions and half by corporate supporters and this represented a significant saving to the public purse. Schools reported that having another professional worker in the schools was a great advantage in identifying and addressing the issues that faced young people.

The project works closely with the Tower Hamlets Education-Business Partnership which is very effective. This is not so across the country where the effectiveness of such partnerships is very variable. Kevin stressed that 'Think Forward' does not duplicate provision that is already in place but often it works even better with the active support of 'Think Together'.

A member of the audience wondered whether there would be any benefits to young people who became involved in the criminal justice system. Kevin commented that in any Youth Court orders it was important that there was an educational element. Unfortunately, Youth Offending Teams (YOTs) were not always familiar with local opportunities that were available. Sometimes an educational element was not seen as being important within orders. In response to another question, he agreed that University Technical Colleges could provide well for the students with whom the project worked.

Finally, Kevin explained that the coaches involved in 'Thinking Forward' were recruited from professional backgrounds, especially further education teachers as they placed great value on pastoral support of students and also those from a Youth Justice or guidance backgrounds. Successful coaches needed experience of working with vulnerable students and some experience of working in or with schools. All the project's coaches undertook the 'Thinking Forward' coaching skills programme.

The second speaker was **John Leighfield CBE** who described '**The reality of opening a UTC: WMG Academy for Young Engineers'.** John is Upper Warden of the Company of Educators and has a distinguished record in the motor and IT industries.

John outlined the background to the development of the WMG Academy for Young Engineers (www.wmgacademy.org.uk). Currently there was high youth unemployment but a shortage of skills amongst young people. Ever since he had been Secretary of State for Education Lord Baker had had a particular interest in provision for young people in the secondary sector and the needs of industry and commerce in a rapidly changing world and he had come up with the concept of the University Technical College (UTC). The Institute for Engineering and Technology (IET) had published a report which identified the skills that were needed by school leavers as they moved into employment.

The aim of Warwick UTC was to deliver innovatory business-led and business-like opportunities for engineering and digital technologies for young people aged 14-18 in Coventry and Warwick.

The UTC was governed by local businesses and the University of Warwick. It has a wide catchment area and had opened in 2014 with an initial intake of 333 students and an ultimate capacity of 640. It was non-selective and its normal working day was 08.30 – 16.30. The UTC was situated on a purpose-built campus adjacent to the University of Warwick. Local employers were actively involved in the UTC as governors and had been closely involved in the design of the curriculum. Employers

are involved in setting students technical projects which are based on real-life problems and situations.

It was important to go into such a project with one's eyes wide open. It was important to remember that a UTC is a school, not an adjunct of a company. Conceiving the UTC and bringing it into reality was not for the faint-hearted. The group driving the concept consisted of a group of industrial and commercial companies, particularly engineering, together with the local authorities of Coventry, Solihull and Warwickshire. It was interesting to note that there had been initial opposition from Coventry local authority but it is now very strongly committed to the UTC.

John went on to describe how the initial idea had been developed by the group of partners and the lengthy discussions that had taken place with the Department for Education. The introduction of the concept to the local community had to be handled very carefully so that the UTC was not seen as a rival to existing schools and provision but was complementary.

There had been hurdles to overcome, of course. Local politics was an important consideration, especially where there appeared to be surplus secondary school places in the area. Negotiations were held with agencies such as Ofsted, the DfE and the Education Funding Agency were not always straightforward!

Examples were given of students who were working at the UTC in conjunction with local employers, for example Jaguar Land Rover. Some of the other employers who are committed to the Academy include National Grid, Bosch, Tata Motors and Dassault Systemes.

John turned to the lessons learned from setting up the WMG Academy for Young Engineers. For the UTC to succeed there had to be a real, active partnership between the industrial and commercial companies, the university, the local authorities and the local community. That partnership could only be effective if there were sustained commitment by all the partners. It was vital that there was clarity of vision and objectives to sustain the concept from conception to realisation. Direct and effective communication was also critical to the UTC's success. The quality of all the people who worked for the UTC, particularly the head and senior leaders, was all-important. Dealing with the institutional process and working with various agencies, such as DfE, Ofsted and the EFA, required sustained effort. The whole process from beginning to end demanded sheer hard work from everyone. This all culminated in the fulfilment of the idea when the academy opened and admitted its first students.

John concluded, rather wryly perhaps, that he was now committed to a new UTC in Solihull.

In responding to questions, John reiterated that the process of setting up a UTC was not for the faint-hearted. He was asked about the gender mix amongst the students and he pointed out that 30% of the students are female and the principal is a woman who provides a very good role model.

A member of the audience asked about the wisdom of students making choices at 14 about the type of career they wish to pursue. The questioner felt that some were ready to make that choice about their future while others were not. John suggested that, as in most aspects of education, simple generalisations are not sustainable. Some young people do know by the age of 14 what general career direction they want to take; others do not. He suggested that it is a good thing to provide different forms of provision to meet the needs of all students at various stages in their educational journey. For some, the UTC was the appropriate destination; for others it was not. A questioner asked why the concentration on engineering; why not have, for instance, in Stratford-on-Avon for

example, a school concentrating on the performing arts. John said indeed 'why not?' He agreed that not all UTCs should (or, indeed, are) be confined to industrial and commercial fields.

The WMG Academy had been established to meet particular local needs. In the West Midlands there was a huge demand by employers which could not be met because of the skills shortage. There was also a cultural yearning for engineering occupations in the region. The UTC was also planning to integrate more closely with local schools and it already has close links with the adjoining Westwood Academy with which it shares catering and sports facilities.

The third and final presentation of the evening was entitled **'Life and Learning at Queen Anne's School'.** By way of explanation, Roy Blackwell, Director of United Westminster Schools, explained that Queen Anne's School, Caversham (www.qas.org.uk)was a part of the Westminster Grey Coat Hospital Foundation which consisted of a number of state and independent schools. St Anne's is an independent girls' school catering for 450 girls aged 11-18. He then introduced **Julia Harrington,** the Headmistress of Queen Anne's.

Mrs Harrington explained that the school had been exploring the way in which developments in neuroscience could improve learning and make a difference in classrooms. She had developed the insights from neuroscience to form 'Brain Can Do' (part of the school's 'Life and Learning Programme) in conjunction with the Westminster Grey Coat Hospital Foundation and the University of Reading. The programme is aimed mainly at Year 10 – 13 students but also involves teachers, parents and experts from technology, business and academia. It has a statement of belief:

> *We believe that learning is far more than just gathering information. Our brains can do amazing things if you know how to use them. There are no limits to learning, no need to curb curiosity and no ceiling to success.*

The starting point for the programme had been looking at the sort of world today's students would be entering. They are already immersed in technology and schools need to prepare students for jobs that do not exist as yet. It was already known that over a working lifetime, people are likely to have to change careers and occupations many times.

The brain is always fine-tuning itself and the work done using fMRI scanners had added enormously to our knowledge of how the brain functioned. As had already been noted that evening, the development of 'soft skills' was very important for success in the workplace and elsewhere. There were possibilities that the brain could be retrained but we know that if neural pathways are not used they will disappear. Research had shown that there were sensitive periods for the 'pruning' of these pathways. Differences in brain development come into play at the time of adolescence. We now know that developmental changes in the brain can occur up to the age of 27 and were not limited to young childhood. Teenagers have a difficult time and their brains are rewiring all the time.

In terms of learning, thinking is hard, slow and unreliable. It takes energy but people enjoyed mental tasks when it produces learning. This is important for education: we are naturally curious. However, the demands of league tables do not help this process. In any event, teachers need to consider how to make learning positive and pleasurable. As Ian Gilbert has commented, teachers who don't know how the brain work are like mechanics who don't know how a car works.

At Queen Anne's School staff have applied insights from neuroscience in the classroom. For example, students have been helped to consider how the brain processes information and retains it in the memory. It is empowering for students to understand how their brain operates. For

example, forming material for learning into 'chunks' will allow more material to be covered than just single traces. Teaching and learning is about making connections. If the amygdala is triggered, learning can be embedded in the long term memory more effectively.

There are also important implications for the 'social brain' functions and Queen Anne's makes use of peer teaching and mentoring and other activities to promote this. It is known that active musical engagement can positively affect learning in other areas and helps with memory. The school is continuing to work with Reading and Oxford Universities and Goldsmiths' College to develop this important contribution to the future of learning.

In the ensuing discussion, Mrs Harrington stressed that the programme was based on neuroscience and psychological insights and could contribute to mental health. A member of the audience asked what evidence there was that the programme worked. The speaker said that evaluation would be based on a range of factors, including examination results, student insights and further research. Currently research had been undertaken involving over 200 students and this would now also be taken out to a wider group.

Dr Martin Gaskell, Lower Warden of the Company, reflected that the three very interesting presentations had shown that partnerships were very important. We no longer had a single, one-size-fits-all education system. There was variety at all levels and everyone could benefit from this. Science and technology are moving ahead very fast and education needs to take account of the insights that are now readily available. Unless this is recognised there will continue to be a serious skills gap. Dr Gaskell thanked the speakers for a stimulating and enjoyable evening and looked forward to learning of the various projects' future development.

Monday 23 February 2015