

# **University of Huddersfield Repository**

Smith, Kelly and Clegg, Philip

Experiencing Business Start-Up Through an Enterprise Placement Year

# **Original Citation**

Smith, Kelly and Clegg, Philip (2017) Experiencing Business Start-Up Through an Enterprise Placement Year. In: Entrepreneurship Education: New Perspectives on Entrepreneurship Education. Contemporary Issues in Entrepreneurship Research (7). Emerald, London, UK, pp. 307-334. ISBN 978-1787142817

This version is available at http://eprints.hud.ac.uk/id/eprint/30924/

The University Repository is a digital collection of the research output of the University, available on Open Access. Copyright and Moral Rights for the items on this site are retained by the individual author and/or other copyright owners. Users may access full items free of charge; copies of full text items generally can be reproduced, displayed or performed and given to third parties in any format or medium for personal research or study, educational or not-for-profit purposes without prior permission or charge, provided:

- The authors, title and full bibliographic details is credited in any copy;
- A hyperlink and/or URL is included for the original metadata page; and
- The content is not changed in any way.

For more information, including our policy and submission procedure, please contact the Repository Team at: E.mailbox@hud.ac.uk.

http://eprints.hud.ac.uk/

# Experiencing Business Start-Up Through An Enterprise Placement Year

#### Abstract

Self-employment placements can provide an opportunity to experience the reallife world of the entrepreneur within an educational context but their implementation is rare. Here we describe a full sandwich-year placement scheme at the University of Huddersfield – the Enterprise Placement Year (EPY). Details of the EPY are provided including academic requirements, application procedures, and the learning opportunities provided. There are a growing number of EPY alumni continuing the development of their business idea or starting up a new business in their final year or after graduation and three examples are provided. In addition to increasing numbers of sustaining businesses, there is evidence of improved academic success with a greater than average percentage of 'good degrees' obtained. Regular changes to the delivery of the programme have been made as a result of ongoing evaluation. These are reported here with recommendations for other Universities considering offering such a programme and suggestions for future research.

# Introduction

Graduate entrepreneurs are recognised as vital to innovation and economic growth (BIS, 2010; BERR 2008; NCGE, 2008; European Commission, 2012, 2008, 2006) with universities playing a vital role in encouraging and providing opportunities for enterprise to flourish (see also Gibb 2005). In addition to encouraging business start-up in areas with growth and high-growth potential, policy makers have encouraged the development of an enterprise culture within higher education, stating that it is important to develop a 'can do' confidence, a creative questioning, and a willingness to take risks (Balls and Healey, 2004; Young, 2014). It can provide readiness for a rapidly changing economy, and to enable individuals to manage workplace uncertainty and flexible working patterns and careers (Hannon 2006; Matlay 2005).

Although there is evidence that the success of a venture is related to educational attainment, entrepreneurial intent has been shown to decrease at the highest levels of education (Weaver, Dickson, and Solomon, 2006; Dubit, 2009). This may be offset with engagement in entrepreneurial learning at university, however, which has been shown to influence entrepreneurial intent (Souitaris, Zerbinati, and Al-Laham, 2007; Greene and Saridakis, 2007), self-reported skill in identifying new business-related opportunities (Summit Consulting, 2009), and actual business start-up (Blackford, Sabora, and Whitehill, 2009), although Souitaris et al. (2007) note that the conversion of intent to start-up may be delayed until some years after graduation. Summarising the findings of the Graduate Entrepreneurship Monitor annual survey over six years, Tan and Ng (2006) stated that education and training is one of the most significant factors influencing the entrepreneurial sector, and noted a high correlation between entrepreneurship education and an individual's confidence to participate in high-potential growth entrepreneurial ventures.

A review of the impact of curriculum-based enterprise and entrepreneurship education in UK Higher Education Institutions (HEIs), concluded that participating students acquire relevant business related knowledge, skills and competences, and are more likely to change their attitudes (such as risk taking) and intentions (such as around being self-employed or being entrepreneurial) (BIS, 2013). This suggests that we should aim to provide more opportunities for our students to actively experience and learn about enterprise and entrepreneurship if we wish to increase the number of graduate entrepreneurs emerging from UK universities. A report by (NCGE, 2008) strongly recommends that UK students - particularly those in non-business disciplines - need more opportunities to participate in entrepreneurship education. The report calls for learning opportunities where students can experiment, discover news ways of thinking, meet successful entrepreneurs, build commercial awareness, and develop venture creation skills. This chapter will provide a practical example of how students can be engaged and supported by an educational opportunity, designed for students to explore entrepreneurship through early stage self-employment or business start-up within a dedicated placement year. Entrepreneurship here uses the UK's QAA (2012) guidelines for enterprise and entrepreneurship education in Higher Educations' definition whereby "*entrepreneurship* is defined as the application of enterprise skills specifically to creating and growing organisations in order to identify and build on opportunities" (p8).

Although much of the learning opportunities described have developed through reflection on practice by the educators involved, it has built on, or can be seen to support, the recommendations of researchers and policy makers described below.

#### **Experiential Entrepreneurship Education**

Several researchers and commentators argue that enterprise and entrepreneurship education must include opportunities for 'learning by doing' - for the student to actively participate and control their learning (e.g. Anderson et al, 2014; QAA, 2012; Martinez et al., 2010, NCGE, 2008; Pittaway and Cope, 2007; Tan and Ng, 2006; Gibb 2005, 2002).

Learning by doing is not uncommon in entrepreneurship education, however doing – or action - on its own does not necessarily result in learning (Hägg and Kurczewska, 2016). One reason for this is that it is hard to extract action from a complex learning process; another is a result of a misunderstanding between action and experience with the latter requiring interpretation, analysis and reflection. Hägg and Kurczewska (2016) suggest that entrepreneurial action provides the contents of experience. Reflection converts the experiences undertaken into learning and ensures its quality (see also Neck and Green, 2011; Raffo, Lovatt, Banks, and O'Connor, 2000; and Rae, 2009), however, students – who do not yet have a pool of entrepreneurial experience to draw on - need a more systematic process of reflecting-on-action to develop knowledge. Reflection is a skill that needs to be exercised and developed, however, when describing SPEED students' experience of action learning, Rae (2009) stated that "activist [student] entrepreneurs acting on their own are less likely to practice reflection unprompted" (p295). Entrepreneurship education therefore should stimulate students to act in an entrepreneurial way, encourage the collection of meaningful experiences, and develop the ability to reflect on them in relation to conceptual knowledge (Hägg and Kurczewska, 2016).

In Kolb's (1984) experiential learning model, four elements are required: 1) concrete experience, 2) reflective observation, 3) abstract conceptualization and 4) active experimentation. Action, experience, and reflection are again important aspects. When applied to entrepreneurship education, Woodier et al. (2009) suggest that experiential learning provides the most powerful learning situation, developing self-efficacy, helping an individual act on their intentions and influencing the pursuit of a new business venture.

Souitaris et al. (2007) explored the impact of two entrepreneurship programmes within computing and engineering in Grenoble and London, encompassing four elements of learning opportunities: 1) a 'taught' component; 2) a 'business-planning' component; 3) an 'interaction with practice' component, (e.g. talks from practitioners and networking events); and 4) a 'university support' component (e.g. market-research resources, space for meetings, a pool of technology with commercial potential and seed funding). They found that such entrepreneurship programmes can be a source of 'trigger-events' which inspire students, arouse emotions and change mind sets.

Inspiration, as highlighted above, is an particularly important aspect, raising entrepreneurial attitudes and intentions (Souitaris et al., 2007) and increasing business success (Martinez et al., 2010). Martinez et al., (2010) further state that without inspiration to start a business, the knowledge and skills that might have been acquired through entrepreneurship education will not be put to use. The effect of emotion has also been studied by Lackéus (2014) who found several linkages between emotional events and the development of entrepreneurial competencies elicited

through an action-based entrepreneurship education program where students created real-life ventures.

New ways of teaching 'for entrepreneurship', particularly those offering interdisciplinary content, are challenging for educators and institutions, requiring a shift away from traditional education practices and from a bureaucratic control culture (Martinez et al., 2010; Rae, 2009). However, where this can be done, it appears to be appreciated. Raffo et al. (2000) studied 50 micro and small enterprises in the cultural industries (fashion, the night-time economy, and new media industries associated with information and communication technologies). They found that entrepreneurs valued courses which - although may not have explicitly taught entrepreneurship - provided room to develop particular interests and skills. Innovative educational approaches were particularly mentioned as positive. Of particular note here, is that Raffo et al. (2000)'s participant businesses tended to have emerged from hobbies or interests outside formal education that they were given space to explore as part of their higher education experience. This has resonance with the EPY business ideas that will be presented below.

# Student Placements in Higher Education

Although not traditionally associated with self-employment, one of the most powerful ways of experiencing the realities of business and enterprise within a formal educational structure is through student placement in the workplace (Guile and Okumoto, 2008; McConnell et al., 2009). Students are generally thought to benefit from work placements in two main ways: first, through the development of generic employability skills; and secondly, by giving a 'head start' to graduates with placement experience at the outset of their careers (Wilton, 2012). Interestingly, Wilton (2012) suggests that the 'value-adding' element of a work placement might not be so much to do with the development of employability skills per se, but rather with the specific development of self-confidence alongside the building of a tacit understanding of the working environment and its demands.

Placements provide opportunities for participants to transfer the general principles they have learnt through education into the knowledge, skill, and judgements characteristic of vocational practice. According to Kettis, Ring, Gustavsson, and Wallman (2013), work experience opportunities help students to build substantive relationships and apply what they are learning, their overall view of their learning experience becomes more positive, their identification with their intended profession strengthens, and academic performance and graduate employment rates improve. However, as discussed above in relation to entrepreneurship education, reflection is key to high-quality placement experiences and outcomes.

Normally, work placements aim to provide opportunities for novices to participate in wellestablished procedures and protocols associated with a specific field; they are unlikely to be related to the formulation or incubation of new products or services however (Guile and Okumoto, 2008) and may not therefore meet the needs of potential graduate entrepreneurs. Walter and Dohse (2009) recommend that entrepreneurial students are encouraged to undertake internships at start-ups or established firms with a strong culture of intrapreneurship in order to increase their perceived behavioural control, but another model of placement may also be considered as presented here.

An alternative to the traditional student placement has been reported through an initiative called Student Placements in Entrepreneurship Education (SPEED), a self-employment placement initiative across 12 HEIs in the UK, led by the University of Wolverhampton (Corlett at al., 2009; Rae, 2009; Woodier, 2009). Several forms of 'placement' are provided through SPEED, depending on each institution's context. Forms include purely extra-curricular, part-time alongside taught modules, through a full sandwich year, or through non-programme related modules after graduation. Conclusions from the SPEED project were that entrepreneurial learning is valuable irrespective of the nature of academic study or immediate individual aspirations, gaining early business awareness is of great benefit progressing beyond higher education for those with entrepreneurial potential, and that students learn far more from doing and from interaction with real

entrepreneurs than from studying the necessary processes (Clements and Moore 2009; cited by Rae 2009).

Although the current literature on SPEED provides a useful introduction to the overall benefits and challenges of self-employment placements, details of each individual institution's instantiations of SPEED in terms of student/graduate, curricular/extra-curricular, alongside other modules/dedicated placement study, PT/FT, etc. are not always clear. This makes comparisons between the different models available difficult to make. There are few, if any, descriptions of self-employment placements in the literature other than SPEED which again makes it difficult to draw out best practice and lessons learned when planning a self-employment placement opportunity.

This chapter will describe in detail the University of Huddersfield's Enterprise Placement Year (EPY) - a dedicated full year's (48 week) sandwich placement opportunity where students explore self-employment between their second and final years of study. The EPY has received sustained institutional support for over ten years, and has been developed and honed over this time. We will describe the changes made over time as a response to ongoing evaluation processes; provide examples of outcomes from four EPY student businesses; and give an overview of the academic and business-related outcomes of the four most recent EPY cohorts that have progressed to degree graduation.

# Methodology

A descriptive practice-orientated case study (Dul and Tak, 2008) is presented here to contribute to the knowledge base of enterprise and entrepreneurship education practitioners, particularly with respect to experiential learning through business start-up for undergraduate-level students.

A wide range of materials were consulted to inform the case study. These included historical meeting notes, application forms, marketing collateral, and information sheets. Narrative input from the current Enterprise Team (including the authors) and staff in participating academic Schools was collected to confirm the description of activities and the timeline of changes in delivery practice. Proformas capturing initial student expectations and their end of year evaluations were again used to confirm why and when changes to delivery were made. Student records were accessed with permission from the University to provide an indication of academic performance, and Enterprise Team (see below) internal records were used to track business outcomes.

Four examples of student outcomes are included in the case study. The examples were selected to provide a variety of business ideas and performance traction since their EPY was completed. All exemplars – now graduates – are still known to the Enterprise Team. The examples were written drawing on publically available information through websites and social media platforms with additional information provided by the graduates where necessary. Permission for inclusion was obtained from the featured graduates.

# The Enterprise Placement Year at the University of Huddersfield

The EPY is offered as an alternative to a conventional work-based placement, giving applicants the opportunity to explore their own entrepreneurial ideas rather than working within employment. It is open to students wishing to explore setting up their own business, self-employment, or freelance opportunities.

The EPY has been running in various forms for around 10 years. The first version was founded by Professor John Thompson and based in the University of Huddersfield's Business School. It was then converted into an 'Alternative Placement Year' and delivered by a central unit, then called the Business Mine. The name of the scheme was changed to the Enterprise Placement Year in 2009/2010, to make its purpose more explicit to students and placement officers based in academic Schools.

The EPY is now managed and delivered by the Enterprise Team<sup>1</sup>, the University of Huddersfield's start-up support unit which offers a number of self-employment schemes and programmes to current students and recent graduates of up to five years<sup>2</sup>. The Enterprise Team have been based in the Duke of York Young Entrepreneur Centre (DOYYEC) in the University's 3M Buckley Innovation Centre since April 2012.

# Academic Requirements

The EPY in its current form is a sandwich year opportunity with participants registered onto an optional module worth 120 credits, with a full-time commitment of 10 months from August 1st to 31st May the following year.

The academic aspects of the module, including summative assessment and progression, are managed by the participants' home School. The Enterprise Team delivers learning activities and provides mentoring support. It inputs into the assessment process by feeding back to the School on participants' attendance and attitude, and provides formative assessment of each participant's business plan, financial information, and pitching of their idea and performance. Successful completion of the module is not contingent on the success of the business idea. Each School has a different set of learning outcomes and assessment criteria for their placement year modules but common assessment methods include submission of a business plan, pitching of the business idea to a panel, and submission of a reflective journal. Other additional assessment methods may include a written report, evidence of work undertaken and contracts received, or appraisals by School-based placement tutors.

# Application Process

All students expressing an interest, either directly or by recommendation to the Enterprise Team by their academic Schools were accepted onto the scheme prior to the 2009/2010 intake. At this point, a more rigorous application procedure was put into place and the number of participants nominally capped to 20 per year. This was to ensure that applicants understood that the EPY is not an easy option and requires full commitment at the earliest stage, and to take on participants who were at a stage of their business idea more likely to generate income within the EPY year. Numbers were also capped to ensure that each participant would receive the quality and quantity of support required to give their business idea the best opportunity of success. A competitive application process, rather than a first-come-first-served intake procedure was introduced to position the EPY as a prize to be valued rather than a fallback option for those unsuccessful with conventional placements.

The 2009/2010 revised application form asked for details of the business idea and its stage of development. At this time, the decision on which students to accept was made by each School with input from the Enterprise Team. Applicants were strongly encouraged to discuss their application and idea with the School's placement officer and the Enterprise Team in advance of the deadline. Information attached to the application form included details of the School, Enterprise Team, and student's responsibilities, and provided key dates for induction and assessment.

Additionally at this time, applicants wishing to set up their business at a distance from Huddersfield were required to negotiate alternative methods of support, for example, through Business Link workshops and regular email or telephone contact with Enterprise Team advisors. As Business Link is no longer in existence and external start-up support is patchy, a distance option is no longer offered.

In 2012/2013, the application process was further refined and included an interview for all applicants who made it through an initial short-listing process. The interview stage is conducted by

<sup>&</sup>lt;sup>1</sup> See <u>http://www.hud.ac.uk/enterprise/</u> for further information on the full suite of Enterprise Team support

<sup>&</sup>lt;sup>2</sup> Note that some restrictions may apply for International students on a Tier 4 Student visa which excludes visa holders from self-employment and business ownership. International students on this type of visa are not eligible to apply for the EPY due to its business start-up emphasis.

the Enterprise Team and acts as a final check that the applicant is making the correct decision for their needs and their placement year option. It is important to note that no judgement about the individual's ability to be 'an Entrepreneur' is made here. Instead, the focus is on reassuring both the panel and the student that the candidate is fully aware of the challenges ahead, and that they have considered how they will manage financially during the year. It is also important that they demonstrate a full understanding of the scheme and the expectations of the assessment process. At the time of writing, the students pay the University of Huddersfield standard Placement Module fee and are eligible to receive a 50% student loan during EPY. The Enterprise Team has found that since introducing the interview element to the application process, there has been a reduction in the number of students failing to complete their EPY.

A further revision made in 2012/213 was to limit the number of students per business idea to two partners. This decision was made as, increasingly, the Enterprise Team were having to resolve 'domestic' issues rather than 'business' issues as the students who were previously 'good friends' faced the reality of a business relationship and the inevitable disagreements this brought. With multiple partners associated with a single idea, this began to become unmanageable should disagreements lead to a breakdown in their partnership and added to the risk of drop-out from the scheme.

# Induction Day and Welcome Week

An induction day was introduced in 2009/2010. It was held early in the EPY to familiarise the participants with the structure of the scheme, and to start to prepare them for their business journey. Participants were given tasks to complete in advance of the induction to help them reflect on their strengths and weaknesses, and to describe the basic characteristics of their business idea. These themes are expanded on during the induction day itself and throughout the EPY year.

Over the years since this element was introduced, the content and nature of the support offered during the induction day has been refined and expanded to the extent that this year (2016/17) we will run a Welcome Week for the first time. The mornings will be used to cover important information relating to the structure and expectations of the programme and the afternoons will see the introduction of additional activities to stimulate creative thinking and problem solving with an external business setting an Enterprise Challenge for the cohort. All activity will be based in the DOYYEC to familiarise the cohort with each other and the resources although there will be an external visit to a local established business.

# Learning Activities

The main learning activities provided through the current format of the EPY are:

- Compulsory attendance of the 'Enterprise Team Event Series': a 16 event programme covering a range of topics from business planning and business finance, through to intellectual property, networking skills and social media for business use.
- Group Mentoring Meetings: a series of 6 meetings across the EPY year which facilitate peer mentoring and the development of business pitches.
- Initial one-to-one meetings at the start of the EPY, and a further one-to-one 'January Review' with Enterprise Team Business Advisors.
- Optional self-referral for one-to-one advice sessions with an Enterprise Team Business Advisor.

# The Event Series

The Enterprise Team delivers a series of enterprise skills workshops, available to all interested students, graduates, and staff of the University. Sessions in 2015/16 included information on topics such as market research, financial and business planning, presentation skills, and how to network. Presentations from, and the opportunity for the audience to ask questions of, recent Enterprise Team alumni provided within two Question Time Events. Finally, the series ends with 'Ask the

Expert' where attendees can book multiple 15 minute one-to-one slots with a range of experts including accountants, bank representatives, web developers, marketing, social media, or IP experts. Several of these experts are the Enterprise Team alumni businesses, returning to offer support and advice to the next generation of enterprising students.

#### **Group Mentoring Sessions**

Group mentoring sessions are held at regular intervals throughout the EPY. Participants are formally encouraged to share their experiences, concerns and successes with their peers in order to evolve their business ideas and to develop networks and support structures. Cross pollination of ideas or joint projects are particularly encouraged as collaboration between participants from different disciplines has the potential to strengthen teamwork skills, foster innovative thinking and risk taking, and develop a success orientation (Shinnar et al, 2009; Rae, 2009).

#### Individual Advice Sessions

One to one mentoring sessions are available upon request. Participants can discuss particular aspects of their business, or seek advice on grant application or plans to enter a business competition. The Enterprise Team Business Advisors (four part-time advisors in 2015/16) are recruited for their contrasting specialist skills to provide the most comprehensive range of business advice knowledge. Specialist knowledge areas within the team currently includes: business finance, marketing, branding, IP and social enterprise.

# Informal Learning

In addition to each individual Enterprise Team Business Advisor's external connections and networks, the Enterprise Team has established a strong and growing 'Friends of the Enterprise Team' network. These include alumni of the service who wish to 'give back' following their positive experiences when they were clients. The network also includes colleagues from the University's Staff Development and Careers units, and external local businesses who have existing links with the university, or actively seek to positively contribute to the University of Huddersfield student experience, perhaps as part of corporate social responsibility activity.

More recently, a Sector Specific Mentor Scheme (SSMS) has been developed. The SSMS is in its infancy, but was created to bring further added value to clients showing particular potential in developing into a sustainable business. Whilst the Enterprise Team can handle most start-up enquiries, the small team cannot have specific knowledge of all potential business ideas originating from all academic Schools. The SSMS offers a simple but clear user agreement to protect the Mentor, the Mentee and the University. The ethos of the scheme is for the Mentor to bring expert knowledge to the fledgling business from their experience in business within the same sector, whilst maintaining a state of impartiality and respect for the client. The agreement therefore discourages any type of investment as the Enterprise Team want to ensure it observes its duty of care in introducing the mentor and mentee. In additional to the more formal learning activities above, EPY students are encouraged to build informal learning networks. Students are provided with free hot-desk office space in the DOYYEC where they can interact with each other and other Enterprise Team supported student and graduate businesses. As Walter and Dohse (2009) suggest, personal networks can provide effective sources of entrepreneurial knowledge and socialization (see also Raffo et al., 2000).

Despite providing free space and stressing the benefits that colocation and direct access to inhouse business advisors can give to nascent businesses, it was found that students did not take advantage of the offer. Observations by the Enterprise Team and feedback from the students themselves suggested they took longer to identify or solve a business problem as a result. A change in the scheme was therefore made in 2014/2015, whereby EPY students were expected to be present in the DOYYEC for at least 21 hours a week although they could negotiate time out of the DOYYEC for client work or to make physical products off site for example. The 21 hour commitment was calculated with reference to a typical full time employed placement of 37 hours, and then subtracting 16 hours for potential part time employment. Students undertaking EPY are permitted to engage in part time employed work to subsidise their living expenses, as many will not trade early enough or to a sufficient level in order to maintain their student expenditure.

The Enterprise Team noted that whilst the EPY gave a comprehensive enterprise learning experience for those keen to explore self-employment, there would be some elements of a traditional placement year experience that may be lacking (Smith, Greetham and Hoggard, 2010). Examples of these are to experience 'the world of work' and a 'large scale' business. With this in mind, whenever possible, the Enterprise Team facilitates a visit as part of the year to a local, large-scale business. This gives the opportunity for the cohort to compare the issues they face as a micro-business, to those faced by larger scale operations.

#### Reflection

An important aspect of the EPY is the ability to reflect on both the positive and negative experiences over the 10 months period and to learn from the process. To facilitate this, each student is required to submit a monthly report, highlighting key areas of the preceding month's experiences. A template is provided to aid this reflection and includes space to comment on elements such as, personal attributes and skills developed, challenges and obstacles tackled, and goals and key action points to achieve in the month ahead.

The monthly reports serve two key purposes. Firstly, the reports are read by the Business Advisors and give an insight into any specific problematic areas that are emerging and may require an early intervention to assist with appropriate resolution options. Secondly, they provide the basis for the Reflective Journal, which is part of the final submission documents required by most Schools in April and considered a vital part of the learning process. Having a record of each month's activities, successes, challenges and key interactions, helps the student to assemble a full reflective journal by providing a point of reference for the whole year. (See the section on Experiential Entrepreneurship Education above for a discussion on reflection for entrepreneurial learning).

# Financial support

A major difference between SPEED and the EPY is that SPEED provides financial support with a £4,500 provided to all placement students (Rae, 2009); no financial support is automatically provided to EPY students although they are encouraged to apply for micro-finance grants available to all University of Huddersfield students and graduates.

Participants are able to apply for half of their student loan whilst on the EPY if they meet appropriate criteria. There are no bursaries available from the University or similar organizations to support EPY participants so there are no financial incentives to take part. Participants therefore place themselves under greater financial pressure than many of their sandwich placement peers who generally get paid for their year in industry. Initially, no tuition fees were payable for EPY although these were introduced to all students undertaking a placement year option from 2012/2013.

The intention is that participants will generate income from their business idea as soon as they can in the placement year, however, several will need to take on a part time job. To ensure that the majority of the student's time and effort is directed towards their EPY, the Enterprise Team cap part time employment at a maximum of 16 hours per week. The EPY scheme provides students with free public liability insurance cover for their businesses over the placement year as part of the University's policy, providing the business activity is not deemed high risk.

The Enterprise Team administers small Proof of Concept Awards (up to £500 per business idea) funded by a combination of HEIF (Higher Education Innovation Fund) and Santander, as the University of Huddersfield became a Santander University in 2014. EPY participants can apply for these awards, but they compete against non-EPY students and graduate businesses and are not guaranteed funds.

# Latest Innovations

In 2012/13, discussions began with the School of Computing and Engineering to devise a Sector Specific variant of the EPY for computer games companies. Over recent years the Enterprise Team had supported an increasing number of start-up games companies on the EPY, but there were two main issues which made EPY potentially the wrong model for them. First, computer games companies tend to have multiple partners/directors (three or more) covering the various roles required to produce a prototype game and, as previously outlined, this often caused more 'domestic' issues than 'business' issues with conflict between the multiple partners. Secondly, it was increasingly recognised that these fledgling companies would benefit from additional sector specific mentoring from an established computer games industry expert, in addition to the generic business support provided by the Enterprise Team (the need for industry-specific mentors is also recommended by Raffo et al., 2000).

With this in mind, in 2014/15 a pilot Sector Specific EPY (SS EPY) was launched with 9 students over 3 start-up companies. The Enterprise Team managed and delivered the programme with the scheme was funded by the School of Computing and Engineering. The funding covered a management and delivery fee for the Enterprise Team based on 'per business' sliding scale and the School sourced and funded a sector specific mentor. The School also committed to provide additional welfare support to address potentially negative team dynamics. The pilot year was deemed a success although, as it was a pilot, there was little marketing activity for the SS EPY that year. The lack of marketing resulted in a lower uptake of the programme for the year 2015/16 with only 1 company with 3 students taking up this option. The SS EPY was actively promoted and marketed during 2015/16 and a full review of the programme has been conducted. The year 2016/17 will see 13 individuals enrol on the SS EPY over 4 companies.

One area for continued monitoring is the potential impact that a successful SS EPY experience has on the student's decision to return to their final year of study to complete their degree. The personal measure of 'success' is different for all participants of an EPY but from a business perspective, success for an SS EPY team might attract investment from a computer game publisher during the year. Such investment is usually based on the initial game prototype or 'vertical slice' of the game they wish to publish; investment secures the ability to complete the game and bring it to market.

We have already had some instances of this being achieved by newly formed computer games development companies on the SS EPY. This resulted in the students electing to defer their final year of study in order to complete the game with the support of the investment they obtained. To date, all those who opted for such a deferral subsequently returned to complete their undergraduate degree. However, if the trend to deferral continues or increases, it may lead to the School of Computing and Engineering considering the introduction of an opportunity for SS EPY students to complete their final year on a part time basis to further encourage degree completion.

# **Example Enterprise Placement Year Businesses**

Three example businesses that emerged out of the EPY are presented below. Two businesses – Panda's Kitchen and Wedding Dress Expert – started in 2013/2014 with the founders graduating in 2015. They have continued trading for one year after graduation at the time of writing. A third business - Natalie Williamson Design – was developed during the 2014/2015 EPY with the founder graduating this year. The examples selected here are of businesses that have sustained beyond the EPY year and are likely to continue and hopefully grow. Other examples could have been chosen from a wide range of sectors including fashion design, textile craft products, computer games, cloud computing solutions, services and products for those affected by cancer and disability, and even queen bee breeding.

In addition to founding a sustainable business, potential success outcomes for EPY students may include gaining graduate employment in their chosen sector. A fourth example is provided where an EPY student's start-up experience was considered a factor in them gaining graduate-level employment.

#### Example 1: Stephen Bond of Panda's Kitchen EPY 2013-2014 https://www.facebook.com/thepandaskitchen/

Stephen joined the University of Huddersfield in 2011, studying for a degree in Advertising Design. He originally joined the EPY in 2013/2014 as part of a partnership looking to produce an online comic, but his priorities changed during the year and Stephen forged out on his own, taking forward an interest he had had since the age of 18 and producing artisan liqueurs as Panda's Kitchen. During the EPY, Stephen obtained the licences necessary for the production of his liqueurs. He designed, blended, bottled and sold his liqueurs at craft and food fairs. Stephen continued the development of Panda's Kitchen during his final year, running a successful KickStarter campaign to fit out a retail unit in Huddersfield's Byram Arcade, and opening his 'liqueur emporium' soon after his graduation in 2015. Stephen continues to trade from the Byram Arcade direct to the public, but has expanded to wholesale supply and designing bespoke cocktail menus for bars and clubs based on his liqueur selection. Stephen was a Duke of York Young Entrepreneur Award recipient in 2016, and the national winner of the Carnegie UK Trust's Test Town 2016 competition, receiving £10,000 to take his business forward.

Example 2: Emily Watts of Wedding Dress Expert Ltd. EPY 2013-2014 http://www.weddingdressexpert.co.uk/

Emily started at the University of Huddersfield in 2011 studying for a BA in Fashion Design with Marketing and Production. During her first few years of study, she also continued working part-time as a Bridal Assistant in an independent bridal shop. Emily used this experience during her EPY in 2013/2014, where she created and launched WeddingDressExpert.co.uk - an online platform providing advice for brides-to-be on buying their perfect wedding dress, showcasing the work of dress designers, and providing links to stockists. WeddingDressExpert.co.uk is now used by most bridal wear design companies selling in the UK, and includes dresses from over 100 bridal dress designers from across the world. During her placement year, Emily met with Chief Designers and executives from the largest global, European and national bridal wear design companies through to niche boutique designers. Emily also developed and delivered a digital marketing strategy, creating all copy and content for her website and social media platforms. She implemented integrated online advertising campaigns, targeting bridal wear designers, bridal wear retailers and brides through social networking sites, emails, online advertising and online communities. Her work resulted in over 100,000 unique page visits in the first year alone and over 10,000 Facebook likes. Emily continued her business during her final year of study, graduating with a good degree in July 2015. WeddingDressExpert.co.uk now has visitors from over 150 countries and Emily continues to lead the business whilst working full time as a Marketing and Promotions Assistant in the University of Huddersfield's Business School.

Example 3: Natalie Williamson of Natalie Williamson Design EPY 2014-2015 http://www.nataliewilliamsondesign.com/

Natalie worked in the fashion industry before enrolling to study at the University of Huddersfield in 2012. In 2014 she and a group of fellow designers attended Surtex in New York - a global business-to-business event for sourcing original art & design. Natalie subsequently set up her own design business and successfully applied for the EPY 2014/2015. During her EPY year, she attended events including trade shows, sold items featuring her designs at craft fairs, and traded online. Natalie also made a return visit to Surtex in 2015. A proof-of-concept grant enabled her to produce a stock of material to test different routes to market and to showcase her work to potential clients. Natalie continued her business during her final year before graduating with a good honours degree in 2016. She attended Surtex 2016 as part of the Dot & Flow - a design collective she founded and manages. Her website shows examples of her surface pattern designs for licence or for sale, and links to her online shop for items including greetings cards, gift wrap, and notebooks.

# Example 4: Stephen Bradshaw, Graphic Designer EPY 2013-2014

Stephen set up a graphic design agency - Bradshaw Thomas - with a business partner during the two student's Enterprise Placement Year in 2013-2014. They undertook a range of paid projects, including working for the University of Huddersfield's Student Union, CASE (a social enterprise consultancy unit) and U-Lott (a company providing universities and student unions a platform to host their own risk free lottery, in order to increase engagement on campus and raise funds for good causes).

Bradshaw Thomas traded for over a year and continued into the two students' final year of study. It dissolved in March 2015, shortly before Stephen completed his final year assessments and subsequently graduated with a good degree. Although Bradshaw Thomas did not reach its second birthday, Stephen reported that he was able to use his experience of the EPY and of running his own business at a job interview, helping him secure a graduate-level position in a graphic design company.

Whilst still trading, Bradshaw Thomas stated:

"The support and mentoring of the Enterprise Team was also integral to our success. The Business Advisors are great. If you've got any problems, it's easy to sit down with them and discuss what's up, where to go next and look at what ideas you've got they're there to help. ... When we look back at what we thought was achievable, we've completely surpassed that and done more than we thought we could do."

# **Monitoring and Evaluation**

As can be seen from the description of the offer above, the EPY scheme is constantly evolving. Changes are suggested, discussed, and implemented as appropriate based on Enterprise Team observations, feedback from participants during the placement, and an end of year feedback and evaluation questionnaire completed on the day of the final pitch assessment.

Informal and formal evaluation is considered vital to ensure that the EPY meets the needs of students as fledgling businesses and professionals, whilst meeting necessary academic requirements and best practice in enterprise and entrepreneurship education. Previous formal evaluation has included a small-scale survey of graduates from three graduate EPY cohorts from 2006 to 2009 (reported by Smith et al, 2010) where students reported that the EPY was a positive experience, although not an easy one. It generally met or exceeded student expectations and gave them the opportunity to learn new skills relevant to a future career in business. Although the number of respondents was small, the information gathered was useful and lead to several of the changes described above.

# Participation in the EPY

The numbers of students per cohort has remained relatively similar over time with around 16-20 students participating each year (60 students were registered from 2006-2009 as noted by Smith et al., 2010). Table 1 provides a breakdown of participants by Academic School for the four most recent years that have would have graduated from the University (note that 2014-2015 EPY participants would normally have graduated in 2015-2016 etc.). There are seven academic Schools at the University of Huddersfield, four of which have had students participate in the EPY during this time period.

The Schools that have not participated in the EPY are: Education and Professional Development, Human and Health Sciences, and Applied Sciences. This is not to say that those Schools do not produce students and graduates who may at some point explore self-employment as part of their career portfolio, just that they have not had students specifically on the EPY Programme. This may be partially explained by the need for students in these particular Schools requiring specific professional practise experience as part of their overall degree. For example, students in the School of Education and Professional Development undertaking teacher training may be required to attend placements within schools. Alternatively, students within the School of Human and Health Science, studying subjects such as podiatry, may need to take placements in their particular professional specialities.

The majority of students each year are recruited from Art, Design and Architecture with an increasing number of students from Computing and Engineering following the creation of the SS EPY. Although Business School students do participate in the EPY, their numbers are smaller than might be expected (e.g. Young, 2014, who proposes that Business Schools should be the centre for entrepreneurship education in HEIs).

Academic School	2011-12	2012-13	2013-14	2014-15	Total
Art, Design & Architecture	13	11	11	14	49
Computing & Engineering	3	4	1	12*	20
The Business School	1	2	4	2	9
Music, Humanities and Media	-	-	-	1	1
Total	17	17	16	29	79

Table 1: Students completing the EPY by cohort year and Academic School

\*Includes 9 students in Computing and Engineering undertaking the SS EPY for the games industry

The gender split of students applying for and being accepted onto the EPY varies slightly with each cohort, but was roughly equal for the general EPY scheme over the four years from 2011 to 2015. There have been more males than females on the SS EPY, but this is reflective of the predominantly male make-up of the degrees from which the SS EPY draws from. The mix of gender engagement with business start-up here appears to differ from that of the general UK population where approximately two times more males are involved with early stage entrepreneurship than females in 2015 (Hart, Bonner and Levie, 2015).

# Academic performance

Drop-out from the EPY scheme has been rare since interviews were introduced as noted above. Only one person withdrew mid-year over the four year time period above. More common is for a student to apply to the EPY and to accept a place on the scheme, but to subsequently withdraw before the start date due to an alternative paid placement offer or to continue directly into their final year. There have been some cases of an EPY student securing a short term, employment based placement opportunity within the same sector as their EPY business during the course of the year. Whenever possible, the Enterprise Team has encouraged this, as it brings added value to their business proposition and increases the range of skills developed throughout the year.

The majority of participants pass the academic assessment of their EPY experience, although it is possible to fail and some participants have done so. This is primarily due to lack of active engagement with the scheme. Although the numbers are small, some of those who do fail report this as a 'wake-up call', inspiring them to seek other opportunities, study harder, and take more responsibility for their learning in their final year.

As reported above, student placements have been seen to lead to improved academic outcomes (Kettis et al., 2013). This has been seen in the graduation results of the graduating EPY cohorts followed over the past three years in particular where good honours degree rates (the percentage of first or upper second degree grades) has consistently been over 80% and over 90% in the best year (as a comparator, according to the Complete University Guide, the University of Huddersfield awarded 65.1% of good degrees in 2015/2016 when the majority of the 2014/2015 EPY cohort graduated<sup>3</sup>). Interestingly, the percentage of good degrees was lower than the University average

<sup>&</sup>lt;sup>3</sup> http://www.thecompleteuniversityguide.co.uk/huddersfield

for the 2011-2012 cohort. The step change increase in academic performance coincides with the introduction of interviews, the restriction of teams to no more than two partners for the general EPY scheme, the introduction of placement fees, and the move to the DOYYEC space.

The very high rates of good degrees from the most recent three graduating years gives us confidence in the quality of the current EPY scheme and its benefit to participating students.

# Continued support and actual business start-up

Smith et al. (2010)'s survey found that none of the EPY students from 2006-2009 had returned to the Enterprise Team (also known during this time as the Business Mine) for further business startup support on graduation. Although the EPY was seen as a positive educational experience with benefits beyond actual business start-up, the lack of start-up on graduation was considered a point of discussion. Why were students or graduates not continuing with their business ideas? Was this something that the Enterprise Team could, or should look to, affect?

Table 2 shows the number of graduates who participated in the EPY scheme from 2011 to 2015 who returned to the Enterprise Team for support, and/or who are known to be running a business (with the same or a different idea) at the time of writing. The number of businesses known to be continuing was obtained from contact with the Enterprise Team or from publically available information through social media, websites, or company registration sites. Note that the Enterprise Team currently supports eligible graduates of the University of Huddersfield up to five years from graduation so the numbers engaging with the Enterprise Team, particularly those in the latter cohorts, may increase as graduates return following a period of employment (see Souitaris et al., 2007). The number of businesses started out of, or as a result of skills obtained during the EPY may also similarly increase, but may also be offset by business closures or changes in business direction.

EPY YearReturned for Enterprise Team SupportCurrent Business Owner2011-2012Count22% of cohort11.811.82012-2013Count75% of cohort41.229.42013-2014Count53% of cohort31.318.82014-2015Count89% of cohort27.631.0				
% of cohort 11.8 11.8   2012-2013 Count 7 5   % of cohort 41.2 29.4   2013-2014 Count 5 3   % of cohort 31.3 18.8   2014-2015 Count 8 9	EPY Year			Current Business Owner
2012-2013 Count 7 5   % of cohort 41.2 29.4   2013-2014 Count 5 3   % of cohort 31.3 18.8   2014-2015 Count 8 9	2011-2012	Count	2	2
% of cohort 41.2 29.4   2013-2014 Count 5 3   % of cohort 31.3 18.8   2014-2015 Count 8 9		% of cohort	11.8	11.8
2013-2014 Count 5 3   % of cohort 31.3 18.8   2014-2015 Count 8 9	2012-2013	Count	7	5
% of cohort 31.3 18.8   2014-2015 Count 8 9		% of cohort	41.2	29.4
2014-2015 Count 8 9	2013-2014	Count	5	3
		% of cohort	31.3	18.8
% of cohort 27.6 31.0	2014-2015	Count	8	9
		% of cohort	27.6	31.0

Table 2: EPY Participants returning for additional Enterprise Team support post placement, and also known to be running a business at the time of writing.

There has again been a step change in the outcomes of the EPY since the Smith et al. (2010) survey with final year students and graduates being seen to both continue their engagement with the Enterprise Team for business start-up support. No EYP graduates had returned for support prior to 2010; 22 students out of the 79 completing an EPY during the period reported here (27.8%) returned and signed up for further support and advice from the Enterprise Team general offer. 19 out of the 79 (24.1%) are known to be a current business owner, having started-up a business during or after their EPY year. Although the numbers here are small, the percentages reported in Table 2 for current business ownership are above those reported in a survey of the general UK population in 2015 (Hart et al., 2015). This found 4.0% of the adult population in the UK were actively trying to start a business as nascent entrepreneurs, and 3.1% of the working age adult population were owner-managers of a business that was 3 to 42 months old.

# **Conclusions and Recommendations**

The EPY is not an easy option, requiring substantial input and commitment from students. In return, students can expect a high-quality learning experience with both timetabled and on-demand support from a dedicated team of business advisors and 'friends' of the initiative. Academic and welfare support are available from the home academic school, placement officers and tutors.

The EPY, particularly in the most recent three years reported here, has been a beneficial educational experience. The impact of engagement on academic outcomes is demonstrated by the very high percentage of good degrees in the most recent three graduating years. Actual business start-up sustaining beyond graduation, is increasingly evident with a higher percentage of early stage entrepreneurial activity than was seen in the general UK population in 2015 (Hart et al, 2015). Where students choose not to continue, or not continue immediately, with business ownership, their experiences can assist in obtaining graduate level employment.

Martinez et al., (2010) raises questions on whether entrepreneurial education and training opportunities should be selective or encourage broad participation. They state that selection can weed out inexperienced entrepreneurs or those with an infeasible opportunity, but point out that uncertainty is highest in the early stages and screening may result in missed opportunities. If accepted onto a training or education programme, capable entrepreneurs may be supported into shaping poor-guality ideas into viable ones and others may become more capable through knowledge and skills acquisition. Although the EPY reported here 'screens' applicants, the process primarily explores commitment and understanding of the scheme; broad participation is otherwise encouraged and no value judgement is made about the type of idea or its growth potential. Applicants are also not judged against 'entrepreneurial' characteristics. We would recommend this approach: anecdotally, our experience has shown that some of our most successful EPY students and graduates are those with initially low business confidence but strong commitment to their proposed product or service. More research is required however (echoing the call by Martinez et al., 2010) to explore issues around selection. We would also suggest that further research is needed to explore our observation that larger teams can adversely affect entrepreneurial learning contrary to suggestions by other researchers (e.g. Lackéus et al, 2014).

In line with much of the general and entrepreneurship education literature reported above (e.g. Hägg and Kurczewska, 2016; Neck and Green, 2011; Rae, 2009), structured reflection is built into the EPY experience and is strongly recommended. Although our EPY students have initially found the process difficult and awkward, most, if not all, have come to understand its worth by the end of year assessment. From an educator perspective, written and verbal reflections can help highlight common points of concern or misunderstanding and inform group discussions. It can also raise individual issues that may require an urgent one-to-one intervention or early offer of assistance.

Ongoing evaluation is, and will continue to be, vital to ensure quality and respond to student and institutional needs. We consider the current form of the EPY to be a good exemplar for the entrepreneurship education opportunity. It has evolved noticeably over time based on the variety of observations and evaluations described above. The current EPY has become more rigorous and structured over time and aims to fill gaps identified through ongoing evaluation of feedback, such as the need to think beyond the sole-trader experience through links with alumni entrepreneurs and large entrepreneurial businesses. Although scaffolding and a supportive framework is provided available by the EPY delivery team, it is important to note that the emphasis is still very much on students taking control of their fledgling business and being responsible for asking for support above the standard offer.

The EPY has been sustained for over a decade, particularly benefitting from senior management support and funding sources such as HEIF and the global Santander University initiative although the future of HEIF nationally is uncertain. It is part of a wider suite of activity lead by the University of Huddersfield's Enterprise Team which offers business start-up support to all eligible students and graduates up to five years from graduation. Some of the EPY success may therefore be due to the wider entrepreneurial culture of the University (see Lilischkis, 2015, for further information).

Although we consider elements of the EPY as presented above can be replicated by others, it raises an interesting question for future research – to what extent is the success of such programmes institution specific and/or dependent on a strategic entrepreneurial culture?

In summary, we have presented an example of an intensive experiential learning opportunity, delivered through a sandwich year placement format. Its development and current format is presented in detail as a model of good practice with elements that can be replicated or used to inform the offers of other higher education institutions.

#### References

Anderson, S., Culkin, N., Penaluna, P., and Smith, K. (2014), *An Education System fit for an Entrepreneur: Fifth Report by the All-Party Parliamentary Group for Micro Businesses. All-Party Parliamentary Group for Micro Businesses*, London, UK.

Balls, E. and Healey, J. (2004). Section 1: Towards a Full-Employment Britain – Educating the Next Generation of Entrepreneurs. In Balls, E., Healey, J. and Koester, C. (Eds) *Starting them Young: Creating a Culture of Enterprise for All.* The Smith Institute: London, UK.

BERR (2008) *Enterprise: Unlocking the UK's Talent*. http://www.berr.gov.uk/files/file44992.pdf . Accessed July 2010.

BIS (2010) A Strategy for Sustainable Growth.

http://interactive.bis.gov.uk/comment/growth/files/2010/07/8782-BIS-Sustainable-Growth\_WEB.pdf. Accessed July 2010.

Blackford, B.J., Sebora, T.C., and Whitehill, T., (2009). The Effects of Collegiate Entrepreneurship Education on Post-Graduation Startup of New Ventures: A First Look. *International Review of Entrepreneurship*, 7, 225-250.

Clements, B. and Moore, S., (2009). SPEED Final Report by the LEAD Institution. Wolverhampton, UK: Institute for Innovation and Enterprise, The University of Wolverhampton. Wolverhampton, UK. Cited by Rae (2009).

Corlett, D., Munro, J., and Cook, R. (2009). *The SPEED Programme – Enquiry Based Learning as an Extreme Sport.* ISBE Conference November 2009; Liverpool, UK.

Dubit (2009). *Capturing the Enterprise Potential of Young People Across the Yorkshire and Humber Regions.* Report to Business Link.

http://www.enterprisingyorkshire.co.uk/documents/uploads/Capturing%20the%20Enterprise%20Po tential%20of%20Young%20People.pdf. Accessed July 2016.

Dul, J., and Hak, T. (2008). *Case Study Methodology in Business Research*. Routledge, London, UK.

European Commission (2012), Entrepreneurship 2020 Action Plan: Reigniting the entrepreneurial spirit in Europe, European Commission, Brussels.

European Commission (2008). *Entrepreneurship in Higher Education, Especially in Non-Business Studies: Report of the Expert Group*. http://www.emuni.si/Files/knjiznica/78\_EC-Entrepreneurship-in-Higher-Education-2008.pdf. Accessed July 2010.

European Commission (2006). *Implementing the Community Lisbon Programme: Fostering Entrepreneurial Mindsets Through Education and Learning*. http://eur-lex.europa.eu/LexUriServ/LexUriServ.do?uri=COM:2006:0033:FIN:en:PDF . Accessed September 2009.

Gibb A., (2002). In Pursuit of New 'Enterprise' and 'Entrepreneurship' Paradigms for Learning: Creative Destruction, New Values, New Ways of Doing Things, and New Combinations of Knowledge. *International Journal of Management Review*. 4, 233-269. Gibb, A. (2005). *Towards the Entrepreneurial University: Entrepreneurship Education as a Lever for Change*. National Council for Graduate Entrepreneurship Policy Paper #003.

Greene, F.J., and Saridakis, G., (2007). *Understanding the Factors Influencing Graduate Entrepreneurship*. National Council of Graduate Entrepreneurship, Research Report 001/2007.

Guile, D., and Okumoto, K. (2008). Developing Vocational Practice in the Jewellery Sector Through the Incubation of a New 'Project-Object'. *International Journal of Educational Research*, 47, 252-260.

Hägg, G. and Kurczewska, A. (2016). Connecting the dots: A discussion on key concepts in contemporary entrepreneurship education. *Education* + *Training*. 58(7/8) 700-714.

Hart, M., Bonner, K., and Levie, J. (2015). *Global Entrepreneurship Monitor: United Kingdom 2015 Monitoring Report*. <u>http://www.aston.ac.uk/EasySiteWeb/GatewayLink.aspx?alId=278923</u>. Accessed August 2016.

Hannon, P. (2006). Teaching Pigeons to Dance: Sense and Meaning in Entrepreneurship Education. *Education* + *Training*. Special Issue on Entrepreneurship Education edited by Matlay H. 48(5), 296-308.

Kettis, A., Ring, L., Gustavsson, M., and Wallman, A. (2013). Placements: an underused vehicle for quality enhancement in higher education? *Quality in Higher Education*, 19(1), 28-40.

Kolb, D.A. (1984). *Experiential Learning: Experience as the Source of Learning and Development*. Prentice-Hall, Englewood Cliffs, USA.

Lackéus, M. (2014). An emotion based approach to assessing entrepreneurial education. *The International Journal of Management Education*. 12(3), 374-396.

Lilischkis, S. (2015). University of Huddersfield, United Kingdom: Entrepreneurship education across all Schools and how to teach the teachers. *Supporting the entrepreneurial potential of higher education: Case Study No 5.* 

http://sephe.eu/fileadmin/sephe/documents/huddersfield\_united-kingdom.pdf. Accessed August 2016.

Martínez, A.C., Levie, J., Kelley, D.J., Sæmundsson, R.J., and Schøtt, T. (2010). *Global Entrepreneurship Monitor Special Report: A Global Perspective on Entrepreneurship Education and Training*.

Matlay, H. (2005). Entrepreneurship Education in UK Business Schools: Conceptual, contextual and policy considerations. *Journal of Small Business and Enterprise Development*, 12(4) 627-643.

McConnell, C., Robertson, A., and Harper, D. (2009). *Placement Learning in the Creative Industries: Engagement Students with Micro-Businesses.* ISBE Conference November 2009; Liverpool, UK.

NCGE (2008). *Developing Entrepreneurial Graduates: Putting Entrepreneurship at the Centre of Higher Education.* A joint report by CIHE, NCGE, and NESTA. Birmingham, UK.

Neck, H.M. and Greene, P.G. (2011). Entrepreneurship education: known worlds and new frontiers. *Journal of Small Business Management*, 49(1), 55-70.

Pittaway, L. and Cope, J. (2007), Simulating entrepreneurial learning integrating experiential and collaborative approaches to learning. *Management Learning*, 38(2), 211-233.

Raffo, C., Lovatt, A., Banks, M, and O'Connor, J., (2000). Teaching and learning entrepreneurship for micro and small businesses in the cultural industries sector. *Education* + *Training*, 42(6), 356–365.

Shinnar, R., Pruett, M., & Toney, B. (2009). Entrepreneurship Education: Attitudes Across Campus. *Journal of Education for Business*, 84(3), 151-159.

Smith, K., Greetham, P., and Hoggard M. (2010). *Experiencing Business Start-Up Through An Enterprise Placement Year*. ISBE Conference November 2010; London, UK.

Souitaris, V., Zerbinati, S., and Al-Laham, A. (2007). Do Entrepreneurship Programmes Raise Entrepreneurial Intention of Science and Engineering Students? The Effect of Learning, Inspiration and Resources. *Journal of Business Venturing*. 22, 566–591.

Summit Consulting. (2009). *Toward Effective Education of Innovative Entrepreneurs in Small Business: Initial Results from a Survey of College Students and Graduates*. Small Business Administration Office of Advocacy. Washington, DC, USA.

Tan, S.S., and Ng, C.K.F. (2006). A problem-based learning approach to entrepreneurship education. *Education* + *Training*, 48(6), 416 – 428.

QAA (2012), *Enterprise and entrepreneurship education: Guidance for UK higher education providers.* The Quality Assurance Agency for Higher Education, Gloucester.

Rae, D., (2009). Connecting entrepreneurial and action learning in student-initiated new business ventures: the case of SPEED. *Action Learning: Research & Practice*, 6(3), 289-303.

Walter, S., and Dohse. D. (2009). *The Interplay Between Entrepreneurship Education and Regional Knowledge Potential in Forming Entrepreneurial Intentions*. Kiel, Germany: Kiel Institute for the World Economy, no. 1549.

Weaver, M., Dickson, P., & Solomon, G., (2006). Entrepreneurship and Education: What is Known and Not Known about the Links Between Education and Entrepreneurial Activity. In *The Small Business Economy for Data Year 2005: A Report to the President*. United States Government Printing Office; Washington, US.

Wilton, N. (2012). The impact of work placements on skills development and career outcomes for business and management graduates. *Studies in Higher Education*. 37(5), 603-620.

Woodier, N., Moon, R., and Gee, S., (2009). *SPEED-ing to success: A review of our SPEED graduates*. ISBE Conference November 2009; Liverpool, UK.

Young, D. (2014). *Enterprise For All: The Relevance of Enterprise in Education*. Lord Young, June 2014, The Third Part of the Report on Enterprise and Small Firms; London, UK.