Introduction:
The problematic transition for 14-17 year olds in secondary education through to tertiary education requires both social and academic support (Chambers et. al., 2002, Cohen et. al., 2012). Building bridges of understanding with this age group requires clear linkages from their academic discipline to their future working careers by conveying employability as a key skill. Embedding this linkage would be through the use of a free Small Online Course (SOC) creating a sense of belonging (Cohen et.al., 2012) for the prospective student before they apply to university. The following case study will investigate this journey in a non-traditional academic discipline of Fashion and Materials at the UoM.

The motivation of the initiation of this project came from a need for knowledge of the discipline area following an internal re-brand of UG programmes within the School of Materials due to the University portfolio review. There was a need to develop a deeper awareness developing an awareness for a higher education and academic approach to the subject and to “pass on a spark of inspiration,” to all students including (WP) allowing access and transition to university (Manchester 2020 Strategic Plan). Experiences gained during previous years and internal studies also suggest a need for the greater management of students expectations and a move towards better student integration considering engagement and empowerment (Holmegaard, Madsen & Ulriksen, 2013).

Aim of the research:
Currently the 14-17 year old age group is engaged at school in a ‘narrative’ to learning where as university follows a more independent, analytical approach (Marland, 2003). Fostering this change is problematic. There is also a requirement to understand the need for a relationship between the students and the culture of the programme they enter whilst increasing a sense of identity related to this (Ulriksen Madsen & Holmegaard, 2010). However the key to all of these are that successful transition requires both social and academic support (Chambers et. al., (2002); Cohen et. al., (2012)). From this background the aim of the project was established:

- to develop a short on-line course (SOC) for pre enrolment students to assist in their decision making of choosing their course in Higher education.

In addition to this aim there are several key themes that required deeper exploration in order to information appropriate depth and knowledge to the project including:

- understanding the target audience (14-17 year olds) and their behaviours on-line
- developing ‘snackable’ content in an appropriate language
- evaluation of the success of the SOC and its positioning as part of the students transition into higher education

The proceeding methodology will outline how the aim and themes were developed.

Methodology
A mixed method approach was adopted for this project split into collecting both quantitative and qualitative data. To initiate the project initial market (desk) research was carried out to provide an outline to the characteristics demonstrated by our target sample of users of the SOC (14-17 year olds). The results from this background research assisted in setting the scene for the project and facilitate the storyboard development and planning of the SOC.
The foresight of these results provided suggested pathways to explore and focussed efforts on the SOC construction. After this stage of the research and planning of the future activities, a pilot SOC was created to gain feedback through user testing. The results from this user testing allowed for the evolution of the final SOC.

A sample of 116 user tests was elicited from our target sample. The sample presented a broad range of responses and specific events were targeted as to gain a true reflection of users at their various stages of preparing for transition into higher education. The questionnaire used for the user tests can be found in Appendix A. The following events were specifically targeted to gain a cross section of these key transition stages.

- **Prospective UCAS applicants on Visit/Interview Days (17-18yrs)**
  This group of students have already chosen fashion specific courses as part of their transition into university. The results from this sample group were important in determining if the content of the SOC is at an appropriate level and seen as good for confirming if the course is right for them. Measurement of this can be found by looking at UF and CF admission figures and enrolment of this sample group onto our fashion courses at UoM. This target sample is already considering application to fashion courses at university.

- **'Discovery Day' (16yrs)**
  The characteristics presented by this target sample at their stage of transition are at the research and choice stage. The Discovery Day allows potential applicants to sample a day in the life of a student studying at UoM with seminars and activities conveyed on each of the Fashion courses. This target sample would be potentially considering studying a fashion course at university.

- **'Step into the Future' (14-15 yrs)**
  Mainly geared at WP students, this event presented an opportunity to interact with a target sample at the start of their journey. This target sample as a group are unlikely to know which course to study or if university is part of their thoughts. Results from this sample help to distinguish if the SOC is positioned properly.

As all these target samples spend time surfing between sites, the design of the user testing only allowed for a maximum of five minutes to be spent by each user on the pilot site to gain their initial impressions of what they were viewing and the relevance to them in relation to their stage of the transition.

**Results:**

**Initial findings:**
The initial results from the desk research conducted externally found that there were four main categories which classified this target sample including what they want (Needs), what they do (Behaviours), what they think (Attitudes) and what will move them (Motivate). A summary of this can be found in figure 1.

**Figure 1: 14-17 year old considering university profile**

![Figure 1](image)
These initial results helped the researchers to gain an understanding of what is necessary and applicable to this target sample when managing the transition into university. One of the key findings suggested that in a digital narrative you only have three seconds to hook this target sample before they move on to the next website or webApp. The results also provided an outline as to the pedagogic support and reasoning already outlined in the literature. In particular there needs to be clear linkages from their academic discipline to their future working careers as supported by Briggs, et. al., (2012). It was important that being able to ‘demystify’ university education (Vinson et al. 2010) and therefore creating a sense of belonging for the prospective student before they apply to university was essential (Cohen et. al. 2012). The storyboard and planning that followed these initial results then allowed for the creation of a pilot site for testing the SOC with the target sample as presented in Figure 2.

With the initial results indicating that ‘snackable’ content be created for this quick finger-clicking generation, the pilot SOC provided a platform that was easy to follow with an inspirational film to keep the target sample hooked and to move on through the site.

**Figure 2: The pilot SOC**

The highlights of the user testing provided some insights not only with regards to the content currently on the pilot but also for future developments too. A summary of the results found that the school /tutor are very influential in assisting the students in making their decision on entering higher education and the courses too. The implication of this suggests that a strategy for outreach activities is essential in the recruitment of students but also brand awareness not only to the prospective student but also their tutors too.

**Analyses:**
The average planning age for considering a move into higher education is 15.75 years of age and the suggested age for the SOC to target prospective students is 16.16 years of age. Although the SOC is deemed to be more beneficial after the student has commenced their transition journey this supports the earlier notion that the school/tutor initiates the process. Successful management of targeting the target sample with the SOC is imperative. Successfully targeting this group of prospective students will aid in the success linked with recruitment but also essential that this is in a digital language.

Following the research this confirmed the sources of information that were identified when searching for the right course, the target sample ranked the following:

1. University Website (95)
2. UCAS (76)
3. University Prospectus (59)
Again this implies that the brand and the digital narrative plays a significant role in the decision making and therefore any future SOCs should display the brand of the university that it is associated with.

With reference to how they found out about courses at the UoM the results were:

1. UCAS (63)
2. University Website (54)
3. School/Tutor (45)

Again the digital narrative is the only vehicle here that the University can control and influence.

A large proportion of the users tests were agree/strongly agree with SOC elements more details are listed below in Table 1. The mean is displayed based on a scale of 1-5 from 1=Strongly Agree to 5= Strongly Disagree.

<table>
<thead>
<tr>
<th>Table 1: SOC Statements</th>
<th>Mean</th>
<th>%Strongly Agree/Agree</th>
</tr>
</thead>
<tbody>
<tr>
<td>I could navigate my way through the WebApp course easily</td>
<td>1.51</td>
<td>92.5</td>
</tr>
<tr>
<td>I could find my way through the information easily</td>
<td>1.56</td>
<td>93.2</td>
</tr>
<tr>
<td>The WebApp has changed my perception of the fashion industry</td>
<td>2.74</td>
<td>35.0</td>
</tr>
<tr>
<td>The opening clip set the WebApp into context</td>
<td>1.86</td>
<td>86.3</td>
</tr>
<tr>
<td>I have a clearer understanding of the fashion industry and the variety it offers</td>
<td>2.11</td>
<td>72.7</td>
</tr>
<tr>
<td>I have a clearer understanding of what is involved within the academic university system</td>
<td>2.01</td>
<td>80.3</td>
</tr>
<tr>
<td>I understand what might be expected when entering higher education</td>
<td>1.92</td>
<td>80.3</td>
</tr>
<tr>
<td>The WebApp has given me a good understanding overall</td>
<td>1.78</td>
<td>88.0</td>
</tr>
<tr>
<td>The WebApp has helped with my decision-making / planning</td>
<td>2.41</td>
<td>51.3</td>
</tr>
<tr>
<td>The WebApp would have made it easier for me to decide on which course to apply to if I had seen it at the start of my journey</td>
<td>1.99</td>
<td>75.2</td>
</tr>
</tbody>
</table>

From the user testing it was highlighted (in the red and amber sections) that more of an industry focus was required for the SOC for this particular target sample to truly see how the transition pays off after graduation. There were also suggested improvements from the free text comments of the questionnaire focussing on the following, which aimed to address the red and amber areas above:

1. More career insights job variety & salaries
2. Alumni destinations
3. Day in the life of existing students
4. Examples of University type projects/work
5. A-Level subjects commonly chosen

In support of qualitative data above a principle components factor analysis was conducted to seek the relationships between the SOC statements (as presented in table one) to distinguish if there are any components that fit with one another. A KMO and Bartlett’s test was completed to test the significance of the data and this is presented in Table 2. From this you can see that the Chi-Square is at good level and p<0.05. The KMO score of 0.763 places the data between the meritorious and middling categories suggesting that the data is of an adequate level and that an anti-image correlation matrix is not required.

<table>
<thead>
<tr>
<th>Table 2: Kaiser-Meyer-Olkin and Bartlett’s Test</th>
</tr>
</thead>
<tbody>
<tr>
<td>Kaiser-Meyer-Olkin Measure of Sampling Adequacy.</td>
</tr>
<tr>
<td>Bartlett’s Test of Sphericity</td>
</tr>
<tr>
<td>Approx. Chi-Square df</td>
</tr>
<tr>
<td>Sig.</td>
</tr>
</tbody>
</table>
The resulting principal component analysis revealed that there are three components associated with this data as presented by the total variance explained and scree plot in Appendix B. Appendix C presents the Component Matrix. From this matrix it is clear to see the variables that have a primary relationship (green) to each component and secondary relationship (yellow).

These results suggest that when designing a SOC the following key attributes should be considered as presented in Figure 3. The methodology applied and the results analysed have followed a robust process collating data from all key identified transition stages. The data has been evaluated to present the needs and requirements of this group whilst establishing a generic academic framework as seen in figure 3.

**Figure 3: SOC Framework**

![SOC Framework Diagram](image)

**Conclusion:**
The outcomes of this project aligns itself with Manchester 2020 Goal Two’s key strategy of providing prospective students with a, “motivating environment that encourages curiosity driven enquiry and a critical approach to learning”, (Manchester 2020 Strategic Plan), whilst closely fitting into the CHERIL centre’s board aim of Strategic Advice and Educational Research to “promote inquiry into practice in HE teaching, through an evidence-based approach exploring particular issues and creative responses, evaluating the impact of interventions” (CHERIL Centre Aims 2015).

The project aligns itself with these two key university objective as it has created a tangible output which is already being used successfully within the School to support outreach activities and admission activities to the target audience with positive feedback. It has enabled a basic framework to be developed in order to support dissemination of the SOC for others to apply when considering an overall design of a SOC. From the results the following improvements were considered and planned into the final construction of the SOC, which include:

- Academic Theory Pods (Academic Content)
- Career Maps (Employability)
- Interactive Tasks (Academic Content)
- ‘Fashion Snap’ for personal engagement (Personalised Learning)
- Quiz with SoA Certificate (Achievement)

Following this SOC construction and content for the specific audience target it is perceived, from the primary research carried out, that this webApp/Digital resource is innovative in its construction and content. Feedback from the careers teachers and the audience highlight this and requesting access to detailed information that can support and guide through educational transition.
The vision of this project therefore is to act as a guide for students pre-entry into the university to support early knowledge of the transition to university. It then aims to help develop those transition skills in order to understand requirements for independent learning and the progression in the university system. The SOC is therefore something that has potential to be rolled out across the university.

**Dissemination:**
The outcomes from this research and development will be disseminated throughout the university to highlight the importance the transition journey and the importance of establishing a bridge into the HE sector. Initially this will commence through the Science and Engineering Faculty and then across the rest of the university. The project will be presented internally within the school to show best practice approaches which can be rolled forward during our School Annual Review. It will be disseminated in the faculty via the teaching and learning structures and working closely with e-learning both of which will then be taken forward across the rest of the university faculties.

CHERIL will be a vehicle for dissemination at their annual conference and at pre-submission of bids to provide academics with a sample project for inspiration. Further afield it is the authors ambition to disseminate through publication to highlight the pedagogic developments made and conferences such as British Education Research association (BERA) and Society for research into Higher Education (SRHE) along with discipline specific Textile Institute World Conference (TI). Following this and the feedback received, publication in credible pedagogic conference will be sought. Currently the project team are developing abstracts for both a subject specific conference/journal paper along with a pedagogic conference/journal paper. An abstract titled TRANSITION INTO UNIVERSITY – THE FASHION SOC has been accepted for oral presentation at the 90th Textile Institute World Conference in Poznan, Poland 25th – 28th April 2016.

**Project Sustainability:**
The project has been developed in partnership with both the Faculty of Engineering and Physical Sciences’ e-learning team and marketing team, which has ensured the project, has been aligned with working processes and structures in both teams. The webApp has been created using the University required ‘T4’ digital data management system therefore allows for continual updates maintaining its long-term sustainability and functionality.

**Further Research:**
As a trigger of pedagogic change from this project ‘Transition into University’, there is an opportunity to further research and develop the SOC transition resource to help support transition, bridging the gap between the two sectors, as referenced by Briggs et. al. (2012); (Chambers et. al. (2002) and Cohen et.al. (2012)). Mapping this project against the research carried out by these academics the project embeds itself and highlights a practice approach in pedagogic development.

Moving this transition project forward ‘demystifying’ university education (Vinson et al. 2010) the project could start to progress into a more longitudinal approach providing an opportunity to monitor student engagement with autonomous and self-directed learning. It is seen as important to support the development of self-reliance in order to progress successfully through their transition into higher education. Increased self-reliance needs to be one of the aims of a successful transition from school to higher education. Bingham and O’Hara (2007) cited in Beaumont et al (2014), confirm the difficulty that students experience in becoming autonomous learners and the importance of exploration into effective approaches to ‘scaffold the development of self-regulated learning skills’.

The follow on project will aim to develop ‘bolt-on’ activities within the SOC, which presents concepts and interactive tasks directly supporting the content aligned with the University first year, first semester units. These bolt-ons will support students by creating a bridge that they can self-navigate through and enhance their Self-regulated learning (SRL).
Reflection:
The project budget was adhered to well and was as predicted. When the budget was broken down some areas of the budget changed and was reallocated across areas to allow for more technical developments and industry filming. A detailed spreadsheet was continuously maintained throughout the project to ensure the budget was managed and kept in check as the developments were being made. Due to the innovative nature of the project, the team managed to gain additional in-kind support from interested parties in order to support the SOC’s development in line with the project expectations.

Should the project be run again the team would have appointed a project officer to help with the development of content and contacting industry. Running the project during teaching semesters was sometimes difficult to balance and this did cause slippage in the timeline planned. The project also became more extensive than initially thought due to the results of the findings and the links to academic pedagogy. However the team worked together well supporting each other to enable completion even though the final deadline slipped slightly we have managed to secure a developmental project to take the SOC further bridging the gap and embedding ‘the scaffold approach’ into the SOC, further evidencing the innovative nature of the SOC.

Summary:
Overall this project has been a successful and innovative output producing pedagogic developments at School, Faculty, University and Sector level, which will be disseminated through peer, reviewed journal papers.

References:


McMillian (2014) ‘They have different information about what is going on’: emotion in the transition to university. Higher Education Research and Development May 2014

Appendix A – User testing questionnaire

Fashion Small On-line Course Questionnaire

Please answer these Questions before looking at the WebAPP

1- What made you start your journey into the Fashion industry?

………………………………………………………………………………………………………………………………………

………………………………………………………………………………………………………………………………………

2 – At what age did you start planning your journey to University?

☐ less than 14

☐ 14

☐ 15

☐ 16

☐ 17

☐ 18

3 – At the age you have stated in the last question what influenced you to apply to University?

………………………………………………………………………………………………………………………………………

………………………………………………………………………………………………………………………………………

4 - How did you find out about the courses at the University of Manchester?

Please tick all that apply

☐ School/tutor advice

☐ UCAS

☐ From the university itself

☐ Word of Mouth

☐ University/college fair

☐ Google

☐ University Website

☐ University prospectus

☐ University Open Day

☐ Other (please state) ............................................................

5 - What sources of information did you look at to help you make your decision before applying to University?

Please tick all that apply

☐ University Prospectus’

☐ Printed material from the University

☐ University Websites

☐ Apps

☐ UCAS

☐ Other websites (Please state)

………………………………………………………………………………………………………………………………………

6 - Did you plan your ‘A’ Level/post 16 subjects specifically to go into the Fashion Industry?

☐ Yes

☐ No

☐ Unsure

7 - What resources / information could have helped you start your planning for University better?

………………………………………………………………………………………………………………………………………
Please answer these questions after you have viewed the WebAPP

8 - Please answer using the grid below to whether you either:

Strongly Agree,  Agree,  Neutral,  Disagree,  Strongly disagree,

with the following statements:

<table>
<thead>
<tr>
<th>Statement</th>
<th>Strongly Agree</th>
<th>Agree</th>
<th>Neutral</th>
<th>Disagree</th>
<th>Strongly Disagree</th>
</tr>
</thead>
<tbody>
<tr>
<td>I could navigate my way through the WebApp course easily</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>I could find my way through the information easily</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>The WebApp has changed my perception of the fashion industry</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>The opening clip set the WebApp into context</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>I have a clearer understanding of the fashion industry and the variety it offers</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>I have a clearer understanding of what is involved within the academic university system</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>I understand what might be expected when entering higher education</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>The WebApp has given me a good understanding overall</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>The WebApp has helped with my decision-making / planning</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>The WebApp would have made it easier for me to decide on which course to apply to if I had seen it at the start of my journey</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
</tbody>
</table>

9 - What else would you like to see on the WebApp that could help you with your future planning when commencing your journey into the fashion industry?

................................................................................................................................................................................................................................................................................................................
................................................................................................................................................................................................................................................................................................................

10 – At what age do you feel the WebApp will be most useful for prospective applicants?

☐ less than 14  ☐ 14
☐ 15  ☐ 16
☐ 17  ☐ 18

By signing this form I agree that the University of Manchester may use my responses for future publication and research.

Signed

Date
Appendix B – Factor Analysis Total variances explained and Scree Plot

### Total Variance Explained

<table>
<thead>
<tr>
<th>Component</th>
<th>Initial Eigenvalues</th>
<th>Extraction Sums of Squared Loadings</th>
<th>Rotation Sums of Squared Loadings</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>Total</td>
<td>% of Variance</td>
<td>Cumulative</td>
</tr>
<tr>
<td>1</td>
<td>3.441</td>
<td>34.415</td>
<td>34.415</td>
</tr>
<tr>
<td>3</td>
<td>1.221</td>
<td>12.208</td>
<td>60.923</td>
</tr>
<tr>
<td>4</td>
<td>.898</td>
<td>8.979</td>
<td>69.902</td>
</tr>
<tr>
<td>5</td>
<td>.731</td>
<td>7.314</td>
<td>77.216</td>
</tr>
<tr>
<td>6</td>
<td>.590</td>
<td>5.900</td>
<td>83.116</td>
</tr>
<tr>
<td>7</td>
<td>.509</td>
<td>5.092</td>
<td>88.208</td>
</tr>
<tr>
<td>8</td>
<td>.464</td>
<td>4.642</td>
<td>92.849</td>
</tr>
<tr>
<td>9</td>
<td>.407</td>
<td>4.066</td>
<td>96.915</td>
</tr>
<tr>
<td>10</td>
<td>.309</td>
<td>3.085</td>
<td>100.000</td>
</tr>
</tbody>
</table>

Extraction Method: Principal Component Analysis.

![Scree Plot](image)
Appendix C – The Component matrix

<table>
<thead>
<tr>
<th>Component</th>
<th>Component Matrix&lt;sup&gt;a&lt;/sup&gt;</th>
<th>Component</th>
<th>Component</th>
<th>Component</th>
</tr>
</thead>
<tbody>
<tr>
<td>1</td>
<td></td>
<td>2</td>
<td>3</td>
<td></td>
</tr>
<tr>
<td>I could navigate my way through the WebApp course easily</td>
<td>0.465</td>
<td>0.775</td>
<td>0.068</td>
<td></td>
</tr>
<tr>
<td>I could find my way through the information easily</td>
<td>0.588</td>
<td>0.625</td>
<td>0.142</td>
<td></td>
</tr>
<tr>
<td>The WebApp has changed my perception of the fashion industry</td>
<td>0.636</td>
<td>0.248</td>
<td>0.451</td>
<td></td>
</tr>
<tr>
<td>The opening clip set the WebApp into context</td>
<td>0.441</td>
<td>0.175</td>
<td>0.379</td>
<td></td>
</tr>
<tr>
<td>I have a clearer understanding of the fashion industry and the variety it offers</td>
<td>0.692</td>
<td>0.158</td>
<td>0.077</td>
<td></td>
</tr>
<tr>
<td>I have a clearer understanding of what is involved within the academic university system</td>
<td>0.633</td>
<td>0.244</td>
<td>0.364</td>
<td></td>
</tr>
<tr>
<td>I understand what might be expected when entering higher education</td>
<td>0.445</td>
<td>0.185</td>
<td>0.669</td>
<td></td>
</tr>
<tr>
<td>The WebApp has given me a good understanding overall</td>
<td>0.663</td>
<td>0.085</td>
<td>0.247</td>
<td></td>
</tr>
<tr>
<td>The WebApp has helped with my decision-making / planning</td>
<td>0.686</td>
<td>0.370</td>
<td>0.087</td>
<td></td>
</tr>
<tr>
<td>The WebApp would have made it easier for me to decide on which course to apply to if I had seen it at the start of my journey</td>
<td>0.535</td>
<td>0.288</td>
<td>0.441</td>
<td></td>
</tr>
</tbody>
</table>

Extraction Method: Principal Component Analysis.

a. 3 components extracted.