

## Plymouth City Deal – Manufacturing and Marine Challenge

**Applicant:** Plymouth Manufacturers' Group

**Geographic coverage:** Plymouth and, with agreement, other neighbouring areas

**Contact name:** Steve Gerry

Ambassador Recruitment, training and deployment			
Activity – Include comments on the potential for collaboration	Timing	Output	Cost <sup>1</sup>
This element of the programme has been removed as recommended			

Marketing and Promotion			
Activity – Include comments on the potential for collaboration	Timing	Output	Cost
<p>1. <b>Project preparations</b> – Kick start the initiative with sufficient publicity to raise public (and schools) awareness and to announce what will be forthcoming.</p> <p><b>Possible partners:</b></p> <ul style="list-style-type: none"> <li>All partners involved in the final project.</li> </ul> <p>All other marketing &amp; promotion is to be shared across the Peninsula.</p>	Spring 2015	Circa 20 secondary schools engaged (plus any additional schools that open over the programme period).	Publicity costs – An event to bring various parties and people together. Allow £500 for launch event. Cost £500*

<sup>1</sup> Many of the costs quoted are scalable up or down.

<b>Resources for Schools – Purchase, Deployment, Sharing</b>			
Activity – Include comments on the potential for collaboration	Timing	Output	Cost
<p>2. With a vision of wanting to create a culture of creativity amongst our young people, schools desperately require new hardware. Having consulted the Deputy Principal at UTC Devonport, it is clear that 3D printers are viewed as the most desirable items – see <a href="#">here</a>. They best operate with an iPad and Autodesk's free 3D apps (123D make &amp; 123D Design) to produce drawings.</p> <p>We would envisage buying between 2-4 3D printers (depending on model selected) and use them as an incentive for school's to participate in this planned programme of events. We would allow schools to borrow the equipment during the period of the programme and then draw lots (amongst those that have participated) at the end of it to see who keeps the printers and associated equipment for the longer term.</p>	Spring 2015	A shared resource offered to all schools. Just two printers moving termly between schools over two years would directly benefit 6 schools and could be used by 1,000 year 7 & 8 pupils (conservative estimate).	2-4 x 3D printers and iPad minis Cost £6,900.  Cost £6,900*
<b>CPD/ Training / Work Experience for Teachers</b>			
Activity - Include comments on the potential for collaboration	Timing	Output	Cost
<p>3. <i>'Work Experience for teachers'</i> - Second teachers to short term (week long) placements within PMG member firms for them to learn/understand what manufacturing in Plymouth is all about in the modern era. Select those that are best placed to influence Years 7-9. Not necessarily those that already hold positive views about the sector. Possibly targeting Careers Advisers and/or DT teachers. One of the aims will be to tackle the gender imbalance.</p> <p>Preparations:</p> <ul style="list-style-type: none"> <li>• Promotion of the initiative and recruitment of (1) teachers and (2) firms willing to host.</li> <li>• A significant amount of planning will need to go into each teacher's placement including briefing/debriefing meetings with the host.</li> <li>• Provision of an overview of the sector from a careers perspective both nationally and locally.</li> <li>• Possible consideration given to organising multi-site visits.</li> </ul> <p>Possible partners:</p> <ul style="list-style-type: none"> <li>• Plymouth Learning Trust</li> <li>• STEM Plymouth</li> </ul> <p>This initiative may be linked to the twinning schools initiative below (6). This should have real lasting merit in that – if it works as intended and they have a good experience – the individuals concerned will have long term a positive outlook on manufacturing/engineering as a career choice for their pupils over many years.</p> <p>We will aim to learn lessons from The Design and Technology Association's <i>Skills Gap Programme</i> - a structured programme, linking schools with industry, to enhance Design and Technology teachers' technical skills and knowledge to deliver an exciting, relevant and up-to-date curriculum. The bidding party has already spoken to both Renishaw and DATA who are behind this programme. See <a href="http://www.skillsgapprogramme.org.uk/about">http://www.skillsgapprogramme.org.uk/about</a></p>	Rolling programme commencing Spring 2015	Up to 16 teachers given a week's work experience at up to 16 different modern factories. The spin-off benefit to pupils both present and future will be potentially enormous. We view this as being the most transformative element of the programme. We intend evaluating the views of each of the 16 teachers before and after their 'experience'. Only from this can we begin to measure the likely impact of this measure.	Funding used to cover the cost of supply teachers – say £165 per day. £825 for a week's secondment. Aim to second say 16 teachers. A significant amount of planning time will be required to match teachers with manufacturers and to plan a week's work experience. The cost for doing this will form part of the share of planning/administrative overhead. This rightly assumes that PMG members will give up their time without charge. Plus promotional and travel costs. Cost £13,500*

<b>Making Work Experience work for Small Business</b>			
Activity - Include comments on the potential for collaboration	Timing	Output	Cost
4. We aren't looking to directly participate in this activity ourselves but we would be happy to collaborate and to implement what others find to be successful.	n/a	n/a	Cost £ zero.
<b>Local Events &amp; Employer/School twinning activity</b>			
Activity - Include comments on the potential for collaboration	Timing	Output	Cost
<p>5. Open days for pupils to visit manufacturing sites – tied in with BIS '<i>See inside manufacturing</i>' (SIM) initiative. <a href="http://discuss.bis.gov.uk/seeinsidemanufacturing/">http://discuss.bis.gov.uk/seeinsidemanufacturing/</a> Plymouth has only had minimal exposure to the BIS '<i>See inside manufacturing</i>' initiative when Plessey invited 40 Year 8 students from Tavistock College last year to visit with their teachers. They were given a talk by engineers, apprentices and a tour of the fab kitted out in cleanroom suits which they thought was great fun.</p> <p><b>Preparations:</b></p> <ul style="list-style-type: none"> <li>• Liaison with BIS and local firms to identify who are prepared to participate and when.</li> <li>• Local promotion with the schools concerned via traditional and social media.</li> </ul> <p><b>Possible partners:</b></p> <ul style="list-style-type: none"> <li>• STEM Plymouth</li> <li>• BIS</li> <li>• PLT</li> <li>• Devon EBP</li> <li>• 1,000 Club</li> </ul>	<p>Summer 2015 and Summer 2016</p>	<p>Tbc but we would intend to target year 8 pupils in circa 20 schools. Potentially, this element of the programme could give access to 500 year 8 pupils for each of the two years of operation. That is 1,000 pupils in total.</p>	<p>BIS can provide guidance materials and branding to aid promotion of SIM – presumably free of charge. As with all projects there will be a share of the planning/ administrative overhead to recruit firms willing to participate, engage with BIS etc.</p> <p>Cost: £ zero. Although it should be read in conjunction with item 6 below.</p>
<p>6. Kick-start an initiative to twin every willing secondary school with a '<i>manufacturing partner</i>'. The two needn't necessarily work with each other exclusively but will be able to count on each other for support.</p> <p><b>Preparations:</b></p> <ul style="list-style-type: none"> <li>• Promotional materials – explaining what the benefits are likely to be for both parties.</li> <li>• Some planning as to who might go with whom.</li> <li>• Persuasion of parties.</li> <li>• Possible links to ideas above.</li> </ul> <p><b>Possible partners:</b></p> <ul style="list-style-type: none"> <li>• STEM Plymouth</li> <li>• PLT</li> <li>• Devon EBP</li> <li>• 1,000 Club</li> </ul> <p>This has potential to trigger a long-term sustainable relationship between schools and manufacturers.</p>	<p>Rolling programme commencing Spring 2015</p>	<p>Up to 20 secondary schools formally partnered with 20 manufacturing companies. Also see outputs in 5 above.</p>	<p>Initial time spent identifying which schools want to get involved; suitable manufacturing partners and then time spent bringing the two together. Cover costs of school transport £4,150 Promotional material £750 Cost £4,900*</p>

<p>7. The PMG is planning to hold an Apprenticeship trade fair for manufacturer employers in March to promote apprenticeships as a career choice in Plymouth. Member firms looking to recruit apprentices during 2015/16 will exhibit at Plymouth Guildhall. Access to the Challenge Fund will help cover the costs of raising young people awareness and that of their parents plus and any literature on the day. This will be linked to item 3 above.</p> <p>Preparations:</p> <ul style="list-style-type: none"> <li>• Form a PMG working group to plan the event</li> <li>• Talk to NAS/SFA</li> <li>• PLT/Plymouth schools</li> <li>• Identify which PMG members (and non-members) are looking to recruit apprentices in 2015.</li> <li>• Use social media networks and advertising – Facebook and LinkedIn</li> <li>• Augment PMG website</li> <li>• Promote on Citybus; Big Screen in Plymouth Piazza</li> <li>• PR in the local press &amp; media</li> </ul> <p>Possible partners:</p> <ul style="list-style-type: none"> <li>• STEM Plymouth</li> <li>• Devon EBP</li> <li>• NAS/SFA</li> <li>• DWP JCP</li> </ul> <p>Once the PMG has held the initial event we will be able to evaluate its worth and assuming it adds value, it could be replicated in future years.</p>	<p>Preparations underway. Event March 2015. Possibly repeated 2016 but un-costed.</p>	<p>20 manufacturers in the City who are looking to recruit apprentices this year and/or next are expected to participate. All year 11-13 students will be targeted with promotional material. We would hope for at least 250 prospective apprentices and/or their parents attending the event which is due to last 6 hours.</p>	<p>PCC have offered the Guildhall as an in-kind contribution; likewise the PMG members will attend and exhibit without charge. The only costs will be local promotion: £2,500 video shorts to drive interest in the Manufacturing Apprenticeship Fair via social media. £500 Facebook ad campaign in the run-up to the event. £1,500 for an augmented PMG website. £1,000 for event organisation &amp; management. Approx 80% of this expenditure will equally benefit next year's event without any additional cost. Cost £5,500*</p>
<p>8. <i>'Women into STEM Plymouth'</i> is a new group that are conducting specific activities to tackle the gender imbalance/ stereotyping – see <a href="http://www.yourlife.org.uk/">http://www.yourlife.org.uk/</a></p> <p>The group intends working with schools/FE and HE sectors to promote female take-up of STEM subjects. It also wants to firmly establish its own social network of individual members and their firms. Challenge funding would help to establish the group (which has only met twice); accelerate its progress and assist with:</p> <ul style="list-style-type: none"> <li>• Help to fund keynote speakers</li> <li>• Help fund events - venues are mostly free, but catering costs need to be covered.</li> <li>• Devise a simple website</li> <li>• Help offset schools transport costs</li> </ul> <p><b>Preparations:</b></p> <ul style="list-style-type: none"> <li>• Planning meetings by <i>'Women into STEM Plymouth'</i></li> <li>• Identify a calendar year of events for members; schools and other educational institutions in 2015.</li> </ul> <p><b>Possible partners:</b></p> <ul style="list-style-type: none"> <li>• PLT/Plymouth schools</li> <li>• Devon EBP</li> <li>• City College Plymouth</li> <li>• Plymouth University</li> </ul>	<p>Spring 2015 on-going</p>	<p>After two events, the existing network consists of between 60-70 STEM qualified professionals/ technicians. We would expect this to double over twelve months and to significantly increase the number of female STEM Ambassadors. The group would look to directly engage with 500 girls across six or more schools.</p>	<p>Event costs £1,500 Website £1,000 Cover costs of school transport £1,000</p> <p>Cost £3,500*</p>

<b>Award Schemes</b>			
Activity - Include comments on the potential for collaboration	Timing	Output	Cost
9. We aren't looking to directly participate in this activity ourselves but we would be happy to collaborate and to implement what others find to be successful.	n/a	n/a	Cost £ zero.
<b>Other activity not covered above</b>			
Activity - Include comments on the potential for collaboration	Timing	Output	Cost

**\* In addition to the above:**

A project management fee for PMG management and administration costs.

Equal to 15% of the amount funded – e.g. £5,200 of a project totalling £34,800 making £40,000 in total.