Health and Sport Committee  
Scottish Parliament  
(by email to healthandsport@parliament.scot)

Members of the Scottish Parliament Health and Sport Committee

TECHNOLOGY AND INNOVATION IN THE NHS – CALL FOR VIEWS ON E-HEALTH

The SLA is the trade body for Scotland’s life sciences sector, and we are glad to respond on behalf of our members to the Committee’s call for views on this important topic. The views set out in this letter and its Annex reflect the position of our many Scottish member companies active in developing and seeking to provide e-health as well as other types of innovative solutions to meet NHS needs.

The Scottish life sciences sector in general is vibrant, growing at around 6% per annum and employing around 37,000 people, mostly in high value jobs. It is very diverse, covering medical devices, diagnostic tests, contract research, pharmaceuticals, e-health and consumer health. The sector is global in its outlook, exemplified by an Edinburgh software company which supplies the billing software for a quarter of all US hospitals.

The SLA works closely with NHSScotland on behalf of our 140 members, for the most part through the Health Innovation Partnership (HIP), a Scottish Government scheme which we help to deliver for the Health and Social Care Directorate under a pro bono contract. Over the past 4 years, the HIP has initiated partnerships between almost 200 companies with a presence in Scotland, and over 1,000 clinical and allied NHSScotland staff. There are some real economic success stories emerging from its work (although few as yet in the e-health field). The good relationships established through the HIP between Scottish life sciences companies and NHSScotland clinicians and other experts is a USP for this key sector of the Scottish economy, is highly valued by our members, and is the object of much interest from elsewhere. Through the HIP, small companies can get an NHS customer view on an initial idea, help with development and testing of the product or service in an NHS environment, and then help with procurement. The HIP includes several e-health projects; a fact sheet is at http://www.healthinnovationpartnership.com/150331.pdf.

We are glad that Ministers and senior NHS officials recognise the role which the NHS can play as a driver of economic growth in Scotland. Much good progress has been made, including by the NHS Scottish Health Technology Group which assesses non-medicine technologies. However, there are three issues which still act as a drag on sales to NHSScotland by indigenous digital health companies:-

- Barriers to procurement of modern e-health systems by NHSScotland, for example the e-Red Book personal child health record developed by Sitekit, a company based on Skye. The company is selling this very successfully through its London office to Health Trusts south of the border, but not in Scotland, despite clinician support for it here.

- The fact that much NHS procurement is “silenced” in Boards. This leads to situations where, even if a Board does buy an e-health system from a Scottish company, there is no assurance that other Boards will do so, despite the advantages of a uniform
There is an urgent need to implement a “once for Scotland” procurement process for e-health and other products and services.

- We believe that meaningful patient centred care needs much better patient access to their health data. Scotland has always had great health data, which e-health companies could use to provide patients with information about their health. E-health companies could also use such data to support better NHS healthcare solutions, but even anonymised data is very seldom, if ever, made available to them by the NHS.

We have discussed these issues with Ministers, and also with Paul Gray, whose understanding of e-health and interest in the NHS / business relationships established through the HIP is valued by us. But there is a lot of progress to be made. We believe that failure to address the barriers outlined above could mean that there will not be an e-health industry left in Scotland in 5-10 years’ time, as our indigenous companies will go to where the market is.

I attach as an Annex our answers to your Committee’s questions, which expand on the points made in this letter. We would be glad to discuss our views with the Committee if that would be helpful.
TECHNOLOGY AND INNOVATION IN THE NHS – CALL FOR VIEWS ON E-HEALTH

Q1. What do you consider have been the main successes of the existing Scottish Government's eHealth and telecare/telehealth strategies and why?

Few spring to mind from the point of view of the indigenous e-health sector. An exception is the successful use by the Scottish Government of the Small Business Research Initiative (SBRI) to help small companies to bid for NHS contracts for innovative products and services. A few Scottish e-health companies have been successful in gaining preliminary contracts under this scheme.

Q2. What do you consider have been the main failures of the existing Scottish Government's eHealth and telecare/telehealth strategies and why?

- Barriers to procurement of modern e-health systems by NHSScotland, for example the e-Red Book personal child health record developed by Sitekit, a company based on Skye. The company is selling this very successfully through its London office to Health Trusts south of the border, but not in Scotland, despite clinician support for it here. These barriers are often caused by Board IT procurement rules, or big NHS IT system supplier compatibility issues which Scottish digital health SMEs struggle, often unsuccessfully, to overcome.

- The fact that much NHS procurement is “silenced” in Boards. This leads to situations where, even if one Board does buy a Scottish e-health system, there is no assurance that the rest of them will do so, despite the advantages of a uniform approach to data processing, management and use. We see a strong need to get “adoption and spread” systems set up and working, by implementing a “once for Scotland” procurement process for e-health and other systems.

- We believe that meaningful patient centred care needs much better patient access to their health data. Scotland has always had great health data, which e-health companies know how to use to provide patients with appropriate information about their data. E-health companies could also use such records to provide better NHS healthcare solutions, but even anonymised data is very seldom, if ever, made available to them by the NHS.

Q3. How well does the Scottish Government’s draft Digital Health and Social Care Vision 2017-2022 address the future requirements of the NHS and social care sector?

The plan is well written and fit for purpose. It says:-

*Digital technology is key to transforming health and social care services so that care can become more person-centred. Empowering people to more actively manage their own health means changing and investing in new technologies and services, by, for example enabling everyone in Scotland to have online access to a summary of their Electronic Patient Record. The time is right to develop a fresh, broad vision of how health and social care service processes in Scotland should be further transformed making better use of digital technology*. 
and data. There is an opportunity to bring together all IT, digital services, tele-health and tele-care, business and clinical intelligence, predictive analytics, digital innovation and data use interests in health and social care.

This will be taken forward through:
• a review led by international experts of our approach to digital health, use of data and intelligence, to be completed in 2017, which will support the development of world-leading, digitally-enabled health and social care services; and
• a new Digital Health and Social Care Strategy for Scotland, to be published in 2017, that will support a digitally-active population, a digitally-enabled workforce, health and social care integration, whole-system intelligence and sustainable care delivery.

If these words were to be put into action, progress could be made. But past and present reviews and strategies are not action (more on that subject in response to Q5).

Q4 Do you think there are any significant omissions in the Scottish Government’s draft Digital Health and Social Care vision 2017-2022.

No. The plan is fit for purpose; the difficulty is in actually bringing together “all IT, digital services, tele-health and tele-care, business and clinical intelligence, predictive analytics, digital innovation and data use interests in health and social care”. We do not underestimate the challenge of doing this across the board, as opposed to implementing sporadic pilot schemes, but we believe that were it to be addressed, significant operational savings could be made by the NHS.

Q5 What key opportunities exist for the use of technology in health and social care over the next 10 years?

The Digital Health and Social Care vision 2017-2022 sets out the opportunities arising from better e-health systems very cogently. Digital technology has transformed many other industry sectors, enabling them to be more efficient and flexible. This in turn has empowered customers and created major cost savings and economic benefits for these sectors. But this shift towards digital empowerment of ‘customers’ (in the context of this document, patients and carers) has still not happened at scale in health and social care. Indeed, from the Scottish e-health business perspective, Scotland appears to be falling behind, rather than leading as is often claimed.

We would argue that Scotland needs firmer leadership at every level to ensure that previously agreed policy (e.g. on the Health and Wealth Agenda) is actually implemented within the health and social care sector. After years of publishing of strategy documents and consultations, actual progress appears to be minimal.

At both UK and Scottish Government levels, we lack a cohesive strategy to enable small companies to scale up to become businesses capable of competing on the world stage. While we are fairly good at providing early-stage support for business innovation, and have some success in turning this innovation into successful small businesses, we are very poor at building businesses of scale that are still in business in five years, far less competing internationally and exporting. The opportunity for Scotland’s e-health industry lies not only in the procurement and use of technology by the NHS and social care, but in the consequent development of a market for these products and services. Our members tell us that it is
extremely difficult to export without a ‘home market’ reference customer which can provide a pilot site and clinical evidence of efficacy.

Another important opportunity would arise from using the combination of e-health and diagnostic expertise within the Scottish life sciences sector through widespread introduction of remote monitoring of patients, e.g. the blood sugar levels of diabetes patients. This would use NHS and company systems to better monitor patient health and intervene when needed, rather than at the point of a health crisis. Scotland's life sciences sector has considerable strengths in diagnostic testing. Health innovation and economic growth would be promoted by introducing routine use of point of care testing (at home or at a GP clinic) to speed diagnosis and treatment across a diagnosis-led NHS, with Scottish companies well able to supply many of the tests needed.

While we do have one or two success stories, Scotland needs many more of them if we are to have a sustainable e-health sector. If Government wants its home-grown companies to contribute strongly to economic growth, it needs to back them with effective policy and financial support. With a genuine public/private 'Team-Scotland' partnership, we believe that we can build a sustainable e-health sector here in Scotland, selling to the UK and beyond, and offering highly-skilled employment opportunities for Scotland's best and brightest IT graduates and experts. But if our innovation policies are not effectively implemented, or keep changing, the e-health sector is at risk of not surviving in Scotland.

Q6 What actions are needed to improve the accessibility and sharing of the electronic patient record?

From a technical perspective, our members’ views are that an electronic patient record (EPR) can only be successful using Open International Standards, e.g. the Fast Healthcare Interoperability Resources Specification, which is the path that NHS England has taken. From a sustainability perspective, there needs be a way to open up the data and functionality through Open APIs (open data standards) to allow individuals and companies to access population personal health data and functionality, always with the citizen’s explicit consent. It is paramount that citizens and innovative SMEs are part of the on-going EPR discussion. To drive accessibility and sharing of any EPR, there must be mass-market use making a real difference to the efficacy of healthcare systems, rather than development of more sophisticated consumer devices, e.g. the Fitbit, that only cater for the affluent “worried well”. This means solving the problem of how to get health data into the hands of patients and informal carers to release their potential for self-care. We accept that this will not be achieved overnight; rather it will require a sustained and coordinated effort.

We see a useful role for SLA members working together through our Digital Health Special Interest Group to fulfil the industry coordination role for facilitating the national adoption of open clinical and technology data standards. We believe that this is the key to unlocking the economic development of a high growth company sector in Scotland.

Q7 What are the barriers to innovation in health and social care?

Barriers to uptake of e-health innovation per se have already been addressed above in answer to Question 2.

The main factors affecting more general adoption of innovation across the NHS include the need for associated service redesign, risk sharing, Board “siliosisation”, and how to finance
investments yielding long term savings. These are being gradually addresses through the work initiated by the Health Innovation Partnership. This is a proven mechanism, having initiated partnerships between almost 200 companies (nearly all with a presence in Scotland) and over 1,000 clinical and allied NHSScotland staff over the past 4 years. There are some real economic success stories emerging from the work of the HIP, but unfortunately, few as yet in the e-health field.

We would be glad to expand further on our views.