Methods: Diagnostic Horizon Scan Reports

Topic Selection and Prioritisation:

We use several methods to identify diagnostic technologies relevant to primary care, including monthly literature searches, regular meetings with diagnostics industry representatives and interaction with clinicians. In the selection of topics, we apply the prioritisation criteria listed in Table 1 below, as outlined in our publication available at http://www.ncbi.nlm.nih.gov/pmc/articles/PMC2881057/ (Plüddemann et al. BMC Health Serv Res. **2010**; 10:109). Prioritisation is decided by a panel vote. The panel consists of at least two GPs, a Pathology Commissioner, a Researcher with experience in Diagnostics, a Health Economist and an Information Specialist.

Search Strategy for Horizon Scan Reports:

We perform systematic searches of Medline, Embase, Medion, Cochrane Library, TRIP and NHS Evidence, using tailored search strategies for each topic and limiting to English language publications. For Guidelines, we search NICE, SIGN and the relevant professional bodies. We search for supplementary information on manufacturer / trade web-sites and through web search engines.

Critical Appraisal and Review:

When assessing publications for inclusion in reports, we use critical appraisal tools developed by the Centre for Evidence Based Medicine, which are available at: http://www.cebm.net/index.aspx?o=1157. Reports are reviewed and edited by at least two GPs and a Pathology Commissioner, and Health Economics sections are written by a Health Economist.

Table 1. Criteria for the Prioritisation of Diagnostic Technologies

	Does the technology meet the criterion?		
High Priority	**Yes**	**No**	**Unsure**
1. The potential that the technology will have an impact on **morbidity and/or mortality** of the disease or target condition.			
2. The new technology **reduces the number of people falsely diagnosed** with the disease or target condition.			
3. Improved diagnostic precision using the technology would lead to **improvement(s) in the delivery of treatment** (e.g. shorter time to initiating treatment, reduction in morbidity or mortality).			
4. The new technology improves the ability to **rule out** the disease or target condition.			
5. The disease or **target condition** to which the diagnostic technology will be applied can be **clearly defined.**			
6. There is evidence of test accuracy in the **setting** in which the new diagnostic technology will be applied.			
7. The new technology would **enhance diagnostic efficiency** or be more **cost effective** than the current diagnostic approach.			
Intermediate Priority			
1. The **prevalence or incidence** of the disease or target condition.			
2. The accuracy of the **current diagnostic approach** for the disease or target condition is problematic.			
3. There is **variation** in treatment or patient outcomes resulting from current diagnostic variability.			
4. The current diagnostic pathway for the disease or target condition could be improved by obtaining information in a **less risky fashion** or in a manner more acceptable to patients.			
5. The **safety profile** of the new technology has been established.			
6. The technology improves the ability to **rule in** the disease or target condition.			
7. The new technology has a **clearly defined role** in the diagnostic pathway, e.g. replacing an existing test, as a triage tool, or after the diagnostic pathway as an add-on test.			
8. The relevance of the disease or target condition to current **regional or national health policies and/or priorities.**			
9. It would be **feasible to change** current practice to incorporate this technology (e.g. additional training, infrastructure, or quality control).			