Nurses were very proud for me. 'something is called, the nominal-aphasia kicks day.'
forget the names of instruments I use every 'If I’m concentrating really hard on a task, I’ll correct name from his memory store. This is fully occupied, so he can not access the surgical task, the surgeon’s working memory due to the concentration required for the required the diathermy and realises that, this nurse selects the words carefully. The to make a point or express her opinion, that The first statement indicates, when attempting in my hand already. 'A surgeon said to me, “can I have the buzzy thing?” I handed him the diathermy, which was 'I wouldn’t contradict him (the surgeon), I’d try and couch it in slightly more diplomatic terms.” 'A surgeon said to me, “can I have the buzzy thing?” I handed him the diathermy, which was in my hand already.'

The first statement indicates, when attempting to make a point or express her opinion, that this nurse selects the words carefully. The nurses in the second example had anticipated a situation and knew that the surgeon required the diathermy and realised that, due to the concentration required for the surgical task, the surgeon’s working memory was fully occupied, so he could not access the correct name from his memory store. This appeared to be a fairly typical occurrence and was confirmed later in the study with two consultant surgeons who independently said: ‘If I’m concentrating really hard on a task, I’ll forget the names of instruments I use every day.’
‘I sometimes have blanks about what something is called, the nominal-aphasia kicks in but she knows what I need and has it there for me.’

What cognitive and teamwork skills does a scrub/instrument nurse need to assist a surgeon effectively and safely? Equally, how does a surgeon’s behaviour affect the nurse’s task performance and how do these expectations match? Little research has been done on this topic but operative surgery requires a group of people with a variety of skills to work together effectively to deliver patient care. In addition to their technical expertise, all members of an operating theatre team, including the nurses, will utilise a range of non-technical skills. These are the cognitive and social skills that complement technical skills to achieve safe and efficient practice in safety-critical occupations. For instance, communication, leadership, teamwork, stress management, and situational awareness. This is a relatively new area of research for healthcare based on a well developed approach from the aviation industry.

Following air accident investigations in the 1970s, it was acknowledged that, despite technical expertise and reliable systems, the behaviour of pilot and crew contributed to accidents. This led to the development of crew resource management (CRM) programmes to train and assess flight crew members in non-technical skills to ensure that, in addition to their technical expertise, they maintain the necessary teamwork, cognitive and communication skills to meet aviation industry requirements. The effectiveness of CRM training can be evaluated by observing and rating individuals’ performance during task execution to establish whether training has resulted in knowledge transfer and improved skill execution. To increase the reliability and objectivity of these observations, behavioural rating tools have been developed by identifying the non-technical skills relevant to the task domain and devising a rating system to assess them. A recommended tool for rating airline pilots’ behaviour called NOTECHS was developed by European pilots and psychologists (including a team from the University of Aberdeen). Two surveys of these non-technical skills for anaesthetists (ANTS) and surgeons (NOTSS) were later developed. The NOTSS behavioural rating system is currently being tested for use in professional surgical training in a number of studies, including work funded by the RCSEd. The new project to identify the non-technical skills of the scrub nurse was funded by NHS Education Scotland (who funded part of the surgical project) and begun in 2007 with a literature review. It was found that very few nursing studies had systematically examined the cognitive or teamwork skills required by scrub nurses during operations. Although some communication skills were described for scrub nurses, these were mainly with reference to the whole theatre team. Studies were also identified which highlighted nurses experiencing difficulties in speaking up and voicing concerns to the surgeons they were working with. Some attitude surveys of theatre staff have reported nurses expressing dissatisfaction with communication in the operating theatre. A new research project on non-technical skills for scrub nurses is revealing how surgeons and nurses work together in practice, writes Lucy Mitchell.