



A safe pair of hands?

After an extensive review of current RCSEd activity, the **Patient Safety Group** sets out how the College influences patient safety within the wider healthcare system

The rapid response to the COVID-19 pandemic emphasised the complex nature of patient safety. It highlighted the interconnectivity between patients, staff, policy, infrastructure, providers, equipment and the wider population, while

demonstrating how research and an evolving knowledge base influence safety in real time. A human factors view of patient safety aims to integrate these complexities from patient to government. The Chartered Institute of Ergonomics and Human Factors set out its key human factors

“The College works to facilitate development of surgeons and dentists at every career stage”

principles in a recent White Paper on health and social care. It emphasised the importance of a systems-focused and design-led approach targeted at improving both system performance and the wellbeing of patients and staff. This holistic view of safety has been adopted by the RCSEd through its Patient Safety Group (PSG).

The PSG has undertaken an extensive review of RCSEd activity to better understand how the College influences patient safety within the wider healthcare system. The review used the System Engineering Initiative for Patient Safety (SEIPS) Model (see below), which provides a framework to consider interconnected components of the healthcare system: people, organisation, technology and tools, tasks and environment, as well as considering how these work to influence care and other processes to effect outcomes.

The Chairs of the 35 Faculties, committees and departments within the RCSEd were contacted for information on their patient safety activity. Committee and Faculty minutes over the last 18 months were

then interrogated using the SEIPS inventory and common strands of activity identified. The results will be used to develop an interactive map outlining patient safety activity on the RCSEd website.

PEOPLE: PATIENTS AND STAFF

PATIENTS

Healthcare literacy is essential for an individual to access, understand and use information to maintain good health. The Heritage and Museums Committee promote this through engagement, with our museums hosting school group activities and holding public lectures on healthcare. The RCSEd is regularly consulted by the Government and other agencies on issues of health promotion. The Lay Advisory Committee acts to highlight areas of public concern and offer advice on all College activity.

SURGEONS/DENTISTS

The College works to facilitate development of surgeons and dentists at every stage of their careers. The growing network of 45 Regional Surgical Advisers keeps our community informed of

opportunities at the College. The RCSEd inspires future generations through a range of activities, including careers fairs, skills competitions, courses and medical student elective grant support.

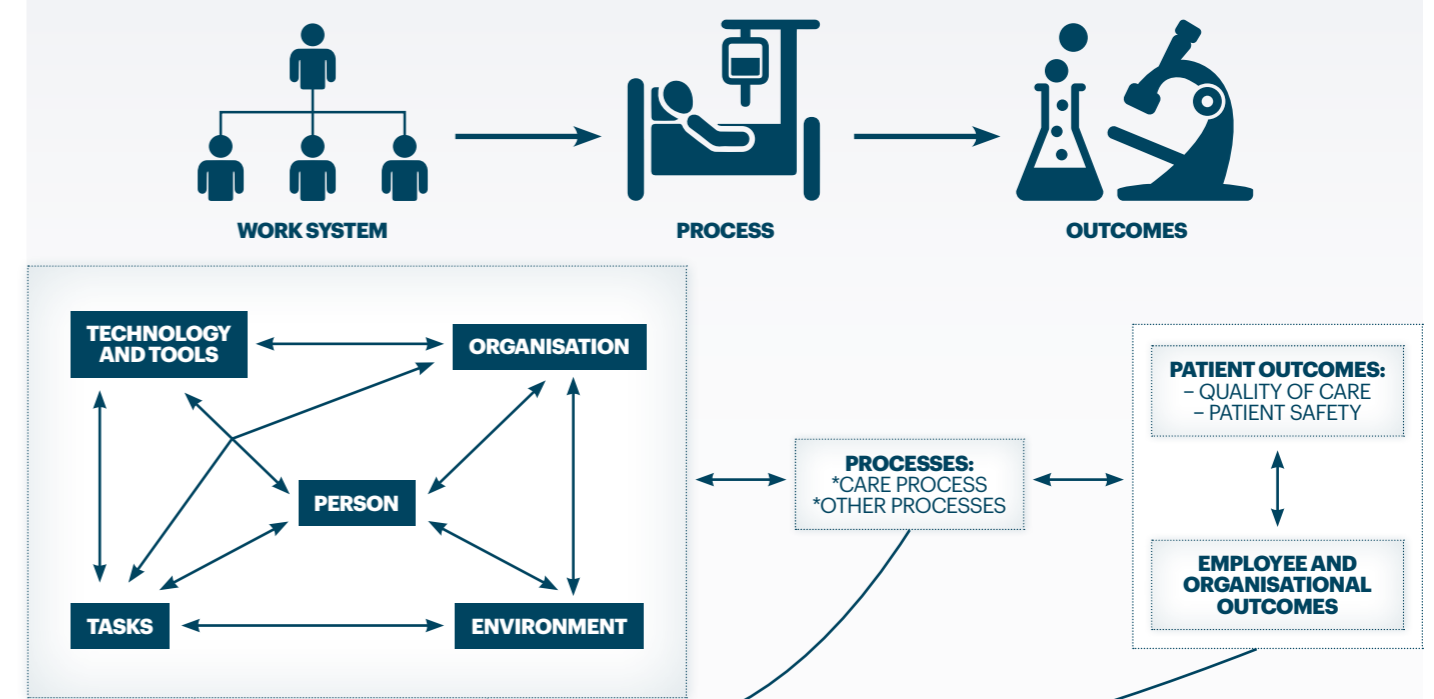
Our Trainees' Committee and Younger Fellows' Club represent the interests of these groups, offering support through regular meetings, activities and an annual residential.

Myriad courses, online resources, webinar library and the Edinburgh Surgery Online suite of e-learning programmes all help guide surgeons through training. There is also opportunity for financial support for research and development of skills in placements overseas.

OTHER HEALTH PROFESSIONALS

Through its Faculties, the RCSEd supports members of the wider healthcare team: paramedics through the Faculty of Pre-Hospital Care, dental hygienists through the Faculty of Dental Surgery and surgical care practitioners/surgical first assistants through the Faculty of Perioperative care (FPC). The FPC provides education and training, helps set standards for non-medical practitioners in surgery, and supports ongoing professional recognition of this key workforce. ▶

SEIPS MODEL OF WORK SYSTEM AND PATIENT SAFETY



ORGANISATION

TRAINING AND EXAMS

The RCSEd integrates with the Joint Committee on Surgical Training to ensure the depth and quality of training across all specialties. Innovative courses, such as the Core Surgical Bootcamp for early year trainees, provide training to improve technical and non-technical skills across multiple areas of surgical practice. Other courses align to specific specialties, anatomical regions or techniques. The College's webinar series, meanwhile, delivers evidence-based updates from experts on a range of subjects.

The College developed its Faculty of Surgical Trainers to promote and enhance the professional role of the surgical trainer. It produced the first ever set of Standards for Surgical Trainers and works to increase the profile and recognition of evidence-based surgical education.

The College works through the Joint Committee on Intercollegiate Examinations to develop and ensure appropriate benchmarking and validity of surgical examinations, which is integral to the promotion of patient safety. In addition, it holds exams in dentistry, pre-hospital care, sports and exercise medicine, and retrieval medicine.

The International Postgraduate Deanery works to develop and deliver local training opportunities for Fellows and Members across the world. The Deanery recruits international medical graduates to UK Fellowship posts. The College acts as trainee sponsor with the General Medical Council (GMC) and quality assures this training.

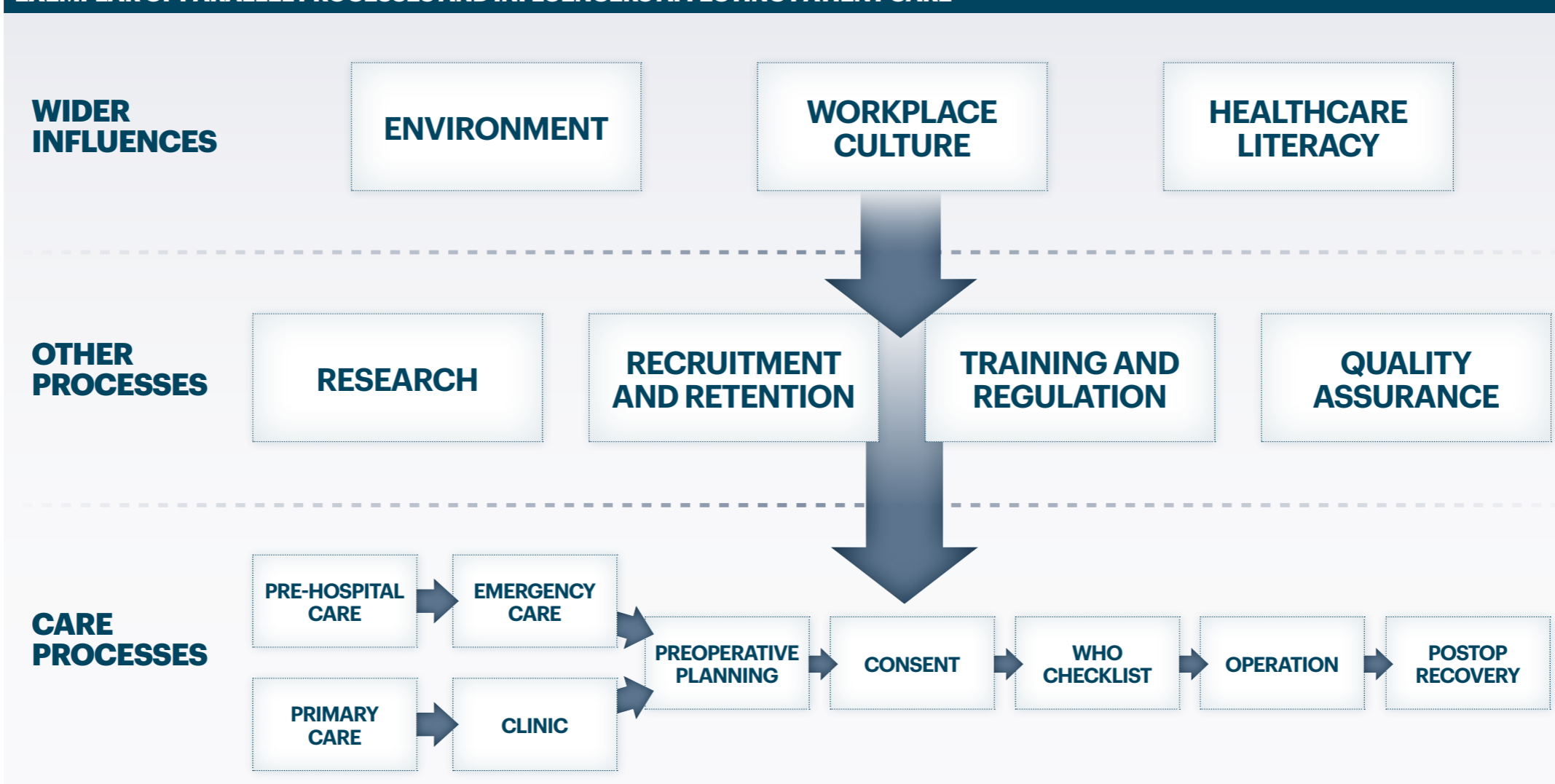
QUALITY ASSURANCE

Maintaining high professional standards is a core pillar of College business. The RCSEd works to quality assure surgical care provision at every level. Examiners undergo careful selection, extensive training, a period observing an experienced examiner and complete a probation period before being admitted.

Similarly, examinations have regular robust psychometric analyses

“Examinations have regular psychometric analyses to ensure the highest standards”

EXEMPLAR OF PARALLEL PROCESSES AND INFLUENCERS AFFECTING PATIENT CARE



to ensure the highest possible standards. On top of this, annual education strategy meetings review the current education and examination portfolio against governing standards. Our success in these areas has attracted invitation to quality assure education and examinations internationally.

The College provides external advisers for consultant appointments. It is consulted regularly on issues of quality assurance and revalidation by government, medical regulators, the Care Quality Commission (CQC) and other stakeholders. It also undertakes regular training programme and service inspection visits.

TEAMS

The RCSEd embraces a multi-disciplinary team approach to delivery of care, recognising teamworking skills as an essential pillar of safe, effective care. It promotes effective leadership, communication and teamworking skills through its suite of non-technical skills courses.

The NOTSS taxonomy is embedded in surgical curricula worldwide; the College holds face-to-face masterclasses, and has developed the web resources 'NOTSS in a box' and 'NOTSS for trainees'. The PiNTS and DeNTS courses have also been adapted to meet the needs of perioperative practitioners and dental practitioners respectively.

The FPC conference in 2019, 'Reshaping the surgical team: The

integration of the non-medical practitioner in surgery', signalled the College's intent and vision for the future of surgery, while the Trainee's Committee has endorsed non-medical practitioners as part of the surgical team in training.

WORKPLACE CULTURE

The College continues to lead the way in promoting a diverse and inclusive workforce. It provides guidance on subject matters such as less-than-full-time training, pregnancy in surgery and returning to work.

The Let's Remove It campaign tackles bullying and undermining behaviour. Furthermore, the Anti-Bullying Alliance was formed to establish recommendations and implement interventions across the NHS.

The Healthcare Policy Group has consulted on whistleblowing legislation to ensure healthcare workers know how and when to raise concerns, and that these are addressed appropriately.

GOVERNMENT POLICY ENGAGEMENT

Through a dedicated healthcare policy team there is a close working relationship with key political and policy stakeholders to inform UK healthcare policy. Consultation responses are regularly produced to government, the CQC, the GMC and other agencies, ranging from organisation of trauma networks to

“The RCSEd promotes effective leadership, communication and teamworking skills”

regulation to integration of primary/secondary care, as well as strategic planning of elective and emergency surgery during the COVID-19 pandemic.

TECHNOLOGY AND TOOLS

The RCSEd continues to invest in new training technology, and develop webinars, online resources and courses. The 3D Definitive Human Project, a virtual reality anatomical resource, is being developed with Glasgow College of Art.

Collaboration with industry partners enables the College to ensure training in newer technologies is available to Members and Fellows. The College has embraced the use of simulation in training, recently accrediting the Dundee Institute for Healthcare Simulation. Further, the Younger Fellows Committee holds workshops on ergonomics and use of energy devices within theatre.

TASKS

The College influences task performance in the workplace, with courses designed to instil safe, competent performance across all aspects of practice. Meanwhile, the Faculty of Pre-Hospital Care produces evidence-based consensus statements on the management of pre-hospital conditions.

Aligned to task performance is the understanding of human performance limitation, particularly the impact of stress, fatigue, hunger and rudeness. Individual/team strategies to minimise the impact of these elements are explored through the suite of non-technical skill resources while the College collaborates with partners including the Royal College of Anaesthetists, the GMC and government to help address these issues.

ENVIRONMENT

Environmental influences on safety can be considered across different levels. At a macro level the 2018 opening of an international office in Kuala Lumpur, Malaysia, reflects the College's global outlook.

The Global Surgery Foundation works to tackle inequalities in surgical

care on a global scale by working in partnership with local agencies to build sustainable surgical capacity in communities suffering from a chronic shortage. The Foundation has ongoing projects in Ethiopia, Rwanda, Malawi and Haiti. Similarly, the Faculty of Pre-Hospital Care has helped establish pre-hospital care systems in several countries including Nepal, Sri Lanka and China.

The Faculty of Remote and Rural Healthcare facilitates shared learning between groups in different isolated, resource-limited locations, from island communities in Southeast Asia to oil rigs in the North Sea.

At a meso level the RCSEd report on 'Improving the Surgical Environment for Safe Surgical Care' made recommendations regarding local team structures, rota design and rest facilities. The 'Trainees' Committee has carried out a survey on out-of-hours working. This has formed the basis of online resources to improve trainee wellbeing.

Techniques to control the micro-environment feature in ergonomics workshops and are highlighted in non-technical skills training with techniques to minimise distractions and optimise conditions during critical phases of work.

PROCESSES

Care processes can be considered in isolation (consent, outpatient clinic, operative surgery) or linked to care pathways, each influenced in series or by other parallel processes.

Many of the College's activities focus on specific processes in the care pathway. The Informed Consent: Sharing the Decision course was developed in response to the inadequacies exposed by the Montgomery case and aims to develop skills and knowledge to implement best practice in sharing complex decisions. The Ward Round Toolkit online resource develops non-technical skills and a consistent approach to practice. The PSG is researching the implementation of Duty of Candour legislation.

'Best care' evolves as research identifies new medicines, techniques and methods. The College supports a



strong research agenda encompassing basic science and translational and clinical research through its grants programme. It has awarded over £7m over the past 20 years.

OUTCOMES

The College remains deeply engaged with initiatives to monitor and improve patient outcomes and safety. It works with the Scottish National Morbidity and Mortality programme, hosting its annual workshop to promote team-based quality reviews. It also works with Confidential Reporting System in Surgery), an independent charity that collects data on adverse events and disseminates lessons learned. Further, the College is represented on the National Confidential Enquiry into Patient Outcome and Death.

The RCSEd's principal role is in the delivery and maintenance of training. Outcomes relating to courses undertaken, conferences attended, and examinations taken and passed are all process measures in the delivery of safe patient care.

Staff wellbeing is an essential outcome to the human factors approach to patient safety: it feeds back to many of the essential determinants of the system: recruitment and retention, workplace culture and task performance. This is a key area of work within the College and links to projects around fatigue, bullying and harassment, and improving the working environment.

Sri Lankans benefit from pre-hospital care systems established by the Global Surgery Foundation

Further reading

CHIEHF White Paper. bit.ly/CHIEHF-white-paper
Carayon P, Schoofs Hundt A, Karsh BT, Gurses AP, Alvarado CJ, Smith M, Flatley Brennan P. Work system design for patient safety: the SEIPS model. *Qual Saf Health Care*. 2006 Dec; 15(Suppl 1): i50-i58.

The College also has contributed to the GMC Advisory Group on the Wellbeing of the Medical Profession.

The RCSEd continues to build and spread its patient safety resources. Mr Simon Paterson-Brown, previous Chair of the RCSEd Patient Safety Board, collaborated with NHS Education for Scotland to develop its online Human Factors resource, which launched in September 2019.

An online master's degree in patient safety and clinical human factors was launched as part of Edinburgh Surgery Online in 2018. Patient safety prizes are included in College conferences; the PSG regularly contributes to international meetings on safety, quality and improvement.

CONCLUSION

The SEIPS Patient Safety Review has reaffirmed the College's strategic vision to work towards the best possible outcomes for patients worldwide. It has helped to delineate the many influences it has on healthcare systems and mechanisms at its disposal to effect change.

Patient safety in the 21st century requires a strategic approach across multiple levels, working on immediate checks, balances and training, medium-term standard setting and quality assurance, and longer-term research, environment and population culture change. The COVID-19 pandemic has demonstrated the College's ability to adapt quickly to deliver services, guidelines, advice and political influence to address urgent safety issues. It is well placed to address its vision of improved patient outcomes for all.

“The College remains deeply engaged with initiatives to improve patient outcomes”