Teamwork in the 21st century

Rapid advances in bio-technology and a burgeoning knowledge base are transforming the practice of medicine. The skills and knowledge needed to deliver complex patient care are such that they can no longer reside in one individual, but are shared among multidisciplinary teams. Bringing teams together to function smoothly and efficiently, with good communication and a sense of common purpose is a crucial aspect of patient safety; a strong team spirit can also greatly enhance health professionals' job satisfaction.

How, though, does one transform yesterday's autocratic hierarchy into the kind of dynamic, egalitarian team demanded by today's healthcare environment? The following article is based on a talk that **Martin Elliott**, Professor of Cardiothoracic Surgery at the Great Ormond Street Hospital for Children, gave to newly appointed consultants last year. He outlines the elements of good team building and describes how he and his colleagues successfully incorporated techniques employed by Formula 1 teams. We found it inspiring, and hope you do too.

INTRODUCTION

You have – at last – become a consultant. You have anticipated this moment for years, perhaps since school, and certainly since becoming a specialist registrar (SpR). But is it going to be what you expected? Do you really know what is expected of you? Or how to behave? Many things have changed in recent years, and the conditions in which you will work and the expectations of others are different now from when you started your training. A simple list of some of the pressures affecting me shows what you might be in for:

- working time directives;
- less skilled junior staff;
- higher public expectations;
- risk-aversion;
- complexity of organisations; and
- changing patterns of work.

Whether you like it or not, things will change around you, and you must adapt if you want to succeed.

TEAMWORK

You probably expected a degree of independence as a consultant, and you will certainly have some. But you will, in almost every circumstance, be working in a team. Jonny Wilkinson may have kicked that glorious drop-goal to win the Rugby World Cup, but his team had to get him into the position to be able to do so. Good teamwork is not a glib concept anymore, but vital to the appropriate delivery of care, and vital to your happiness. In my own field of paediatric cardiac surgery, we have seen mortality fall from 100% in 1950 to 2% or so now, largely through the development of specialist teams. When those teams fail, the consequences are dire, as we all saw with the Bristol fiasco[1]. I am proud to be in a unit where teamworking is respected, and where professional boundaries are constantly questioned.

Hospitals are complex structures, and the interrelationships you have to deal with are many and varied, especially in a large hospital (see Figure 1). It is easy to become bogged down dealing with all these people, when your primary concern should be to patients and their families. Recently, as Figure 1 indicates, NHS organisations have devoted so much energy to the junior doctor that one has sometimes felt that the patient comes second best. As a consultant, you have to balance these pressures and be aware of your primary responsibility. It's usually the best bit anyway!

There is an evidence base, much of it from the military, which argues that teamwork is important in high-stress environments. Military psychologists have learnt how to get the best out of their teams, and for them that means survival, so they are worth listening to. They define a team as: 'two or more people working with a common goal with specific role assignment and a significant degree of interdependence. They take decisions in the context of a larger task, and can work successfully under conditions of high workload and pressure.'[2]

I can't think of a better way of describing a successful team in medical practice.

The navy has also described the basic characteristics of

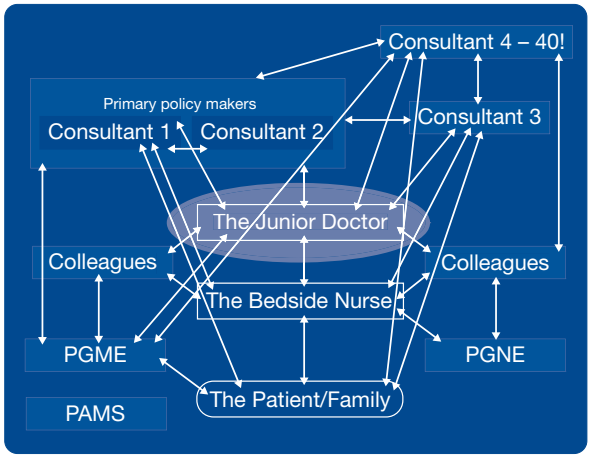

Figure 1: The complexity of interrelationships in hospitals.

successful teamwork, and this too is a helpful list:
- communication;
- adaptability;
- cooperation;
- acceptance of suggestions or criticism;
- giving suggestions or criticisms;
- commitment to common goal; and
- team spirit

Of particular note are the commitment to a common goal and the ability both to give and receive criticism. Hardly a classic surgical skill! If you can function well according to these teamwork dimensions, you will succeed as a consultant.

Successful teamwork will require thought, effort and planning on your part. Traditional teams in the NHS have been built along 'party' lines reflecting professional groups – for example, cardiac teams, radiology services, theatres and so on. The problem with this approach is that it can easily degenerate into turf wars, with group being set against group, particularly over budgetary issues.

In my experience, teams are much more effective when they are project-based and have clear, limited goals. They don't need to be led by you; it is a big mistake to become doctor-centric in your thinking. Leadership of a small team can be used as a reward, and often the people you work with blossom when given a bit of space to think and make changes.

Teams can be used to solve problems (for example, improving the effectiveness of ward rounds, installing an information system) or to manage groups of patients, as, for example, do the Transplant Team and the Tracheal Team in my unit. In each case they are truly multidisciplinary, and very effective.

The Tracheal Team[3] at Great Ormond Street (GOS) was born out of specific needs:

1. To challenge conventional thinking that these patients were 'not worth treating'; and
2. To provide excellent multi-disciplinary services to them.

In three years we have grown to become the largest such team in the world – with some of the best results – and we have halved the cost to the NHS by effective teamwork.

This has been manifest by an aggressive approach to cross-skilling, by which I mean teaching members of other disciplines within the team skills that, formerly, were considered the property of only one group. We have, for example, trained radiographers to perform fibreoptic bronchoscopy and surgeons to use interventional radiology techniques for stent insertion. This has reduced waiting times for procedures and provided a rapid response service for families.

Each member of the team is valued – and respected – as equally important. You do not need to 'own' skills. Being part of a successful team is far more satisfying than being the only one who can do something. And it gives you a better quality of life!

Once again, the military have provided evidence[4] of the benefits of cross-skilling or overlap of skills; they have also pointed out the failings of a steeply hierarchical approach to leadership. It doesn't pay, in the end, to bully or dominate others. Being respectful, listening and sharing action towards a common goal will always be more effective. Remember that mutual criticism is an important and necessary part of successful teamwork. There is a short mantra I use to remind me of this in the context of clinical governance. It can be applied to one patient, many patients, processes or policies. It is this:

'analyse, review, discuss, challenge, refine and correct; make the team responsible, not the individual.'

LEARNING FROM OTHERS

Within the NHS

Learning does not stop with appointment as a consultant. We all think we know that, but the creeping paranoia of consultancy and the exposed decision-making we all face can cause some to retire into a shell and pretend they know it all. They can't!

It is vital to open yourself up to learning, and to seek it out. In surgery, many of us are drawn to compare ourselves with musicians. We have to perform a complex physical task – in public – accurately, reliably and reproducibly. The task for both disciplines comprises a complex mix of practical and intellectual skills and the ability to respond rapidly to change. The consultant surgeon is often left – even early in his/her career – exposed and unsupported, and training is often seen as, or thought to be, complete. However, no successful musician would go through his/her career without a teacher; a teacher of his/her own choosing. How I wish this were the case for surgeons. There is no tradition of this; more one of outright macho competition.

Mentoring

Your generation may be luckier than mine. The need for some support as a consultant has at least been recognised, and the way that need is being met takes its root from such Greek mythology. Ulysses was keen to get the best education for his son, Telemachus. He introduced him to Mentor, who was instructed to accelerate his learning and

The Tracheal Team at GOSH. Back row, from left: Dr Nick Pigott, Mr Benjamin Hartley, Dr Derek Roebuck, Professor Martin Elliott, Dr Ergin Kocyildirim. Front row: Ms Catherine Dunne, Ms Clare McLaren, Dr Quen Mok, Ms Savi Uppal. Team members missing from the picture are Dr Colin Wallis and Ms Clair Noctor.

to transfer knowledge, experience and wisdom. This was, perforce a close relationship and sets the scene for the modern concept of mentoring.

Mentoring is supposed to be a constructive and developmental process in which those who are more senior and competent support the less experienced in an organisation. To me, that has a slightly patronising ring to it, and I prefer to consider it an extension of teamwork – more of a partnership, like a personal music teacher to the musician. There are many benefits for the new consultant in having a mentor, namely:

- getting information and advice;
- locating one's own role;
- understanding the NHS/Trust;
- supporting reflective practice;
- revealing development needs;
- accessing a role model; and
- acquiring personal support.

Like the musician, you must insist on your choice of mentor, and remember that you are in the driving seat. The mentor is there, primarily, for you. Everything you talk about is confidential, and you can talk about anything. But remember to keep it professional. It is a good idea to meet in a work environment (at least to start with) to ensure that you remain focused. You should feel free to say what you want, and you have the right to expect a sensible response. The mentor should know what is expected of him/her, and should have received some training in the role.

Outside the NHS

Don't limit your learning to the NHS. Other organisations can teach you a lot, as we have discovered at GOS. A few years ago my colleague Marc de Leval did a brilliant piece of work[3] looking at the influence of human factors in the outcome of a major neonatal cardiac operation, the arterial switch. Psychologists observed every arterial switch done in the UK over a two-year period and observed, amongst other things, that the highest-risk phase of the procedure was the journey from the operating room (OR) to the intensive care unit (ICU).

This was the time when the baby was disturbed from its physical space after several hours in the OR, at a time when it was most haemodynamically unstable; at the same time, the exhausted surgical team – replete with several hours' knowledge of the patient's pathophysiology – wants to leave as soon as possible and has to hand over to an ICU team, fresh but relatively ignorant of the workings of that particular patient. Yet the process itself is relatively mechanical, reproducible and well known, so why does it not work?

After watching a 5.8 second pitstop during a Formula 1 race, we immediately observed similarities and asked ourselves, 'if they can do it, why can't we?'. So we decided to approach McLaren and, subsequently, Ferrari; both teams have been very helpful to us in resolving these issues. They showed us many things about our processes and procedures that were inherently unreliable and potentially unsafe.

By applying the methods the Formula 1 teams use to analyse and review pitstops and all the tasks that they contain or that precede them, we have altered our process and are already seeing improvements in the way patients are transferred. We have learnt the value of predictive discussion, respect for all team members, simplicity, focus on a common goal and, most of all, rehearsal to familiarity. The effectiveness of these regimes speaks for itself in the successes of the Ferrari team, and it is noteworthy that Michael Schumacher, when winning – great driver though he is – always goes to the side of the track first to thank his pit crew and engineers. He can see the need for good teamwork.

SUMMARY

The start of consultant life is scary but exciting. You will be good, popular and effective if you remember that you are a member of teams and devote yourself to building appropriate relationships. Those teams will not be set in stone, and will evolve with you. New ones will form, old ones regress. Learn to respect, trust, support and stretch others.

Keep learning, and seek support from others. Choose and keep a mentor or teacher. Speak to them about your problems and let them help you.

Remember, you are there for the patients. Don't let too much of the peripheral stuff get in the way of that. Treat them with the respect and time you would expect for yourself. Always seek new and better ways of doing things, but share the task of delivery and implementation. You can't do everything yourself, and you must work to build successful teams. Remember: the whole is more than the sum of its parts.

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