Expanding role of minor surgery in primary care

Training, funding and allotting time are issues which need to be addressed for GPs doing minor surgery, writes Derek Gallagher

There is an increasing realisation that minor surgical procedures can be carried out in primary care. The increase in performance of such procedures has been driven by long hospital waiting lists, increased GP skill levels and also patient confidence in having these procedures performed by their GPs. It is now recognised that many surgical procedures can be appropriately performed in a general practitioner setting.

Historically, the GP was responsible for attending to many minor surgical procedures in the community. However, as these procedures moved to the referral hospital, the level of competence and confidence in performing such procedures in primary care began to decline. Nowadays, however, many GPs are performing these procedures with increasing frequency, regularity and success. With this in mind, I conducted a survey to assess the role for such procedures in primary care and in particular in the midlands region.

Method

A postal survey was distributed to 72 GPs in the midlands. A series of questions were asked to assess the current number of GPs who perform such procedures, their skill level and previous training obtained. They were also gauged on satisfaction levels with medical card payments for such procedures and their satisfaction with the service provided by their local hospital in the provision of minor surgery. They were also assessed on whether such procedures would be limited by time constraints and asked if they felt there was a role for such procedures in primary care. The results were as follows:

- Sixty-five of the 72 GPs replied (90.2%). Of the 65, fifty performed at least one minor surgical procedure (76.9%)
- Sixty-three (96.8%) felt there was a role for such procedures in general practice
- In addition, 46 (70.7%) felt there was not sufficient training at present to perform such procedures
- Sixty-three (98.4%) felt that the medical card scheme funding was inadequate to perform such procedures in primary care
- Forty-seven (72.3%) felt the service provided by their district hospital was satisfactory
- Fifty-two (80%) felt that providing such a service would be limited by time constraints
- Thirty-eight (58.5%) had attended a training course to perform such procedures.

The surgery

Before embarking on any procedures it is imperative that the practice is adequately laid out to perform such procedures. The NHS in the UK laid clear guidelines for minor surgery in primary care in 2001. The purpose of these guidelines was to provide information to enable staff to carry out minor surgery in an environment that will minimise the risk of infection and ensure safe working practices. The following are some of the preparations required:

Location and equipment

It is very important to have adequate lighting, appropriate equipment and sufficient uninterrupted time for successful minor surgery. It is imperative to have sterile instruments and gloves. As ever, sterile technique is essential.

Basic minor surgery sets

A basic set contains a scalpel, several sizes of blades (e.g., size 11 and 15): toothed forceps; needle-holders; fine scissors; artery forceps; skin hook and curette.

Additional equipment required: skin preparation liquid (e.g., chlorhexidine; local anaesthetic (e.g., lignocaine 1%); suitable sized needles and syringes, sterile towels, swabs, sterile specimen pots, suture materials and dressing for the wound. For joint injection, ensure you have steroid and local anaesthetic drawn up and suitably-sized needles available before starting.

Anaesthesia

Local anaesthesia: 0.5%-2% lignocaine, xylocaine and procaine are the most commonly used preparations. Adrenaline (1:200, 000) may be added to local anaesthetic to decrease bleeding and prolong anaesthesia but do not use adrenaline in areas supplied by end arteries (fingers, toes, penis, ear, nose). The safe maximum dose of local anaesthetic in adults is 20ml in 1% solution (less in elderly and children) as overdoses may cause seizures or cardiac arrhythmias. The administration of local anaesthetic is not without certain risks and one must be aware of these and also be proficient in administrating the anaesthetic.

Complications

During the procedure itself, certain complications may arise. The GP should be competent in managing such intra-operative complications. Although they rarely occur, they include the following:

- Fainting incidence can be reduced by having the patient lie down during the procedure. If syncope does occur, put the patient in a head-down position. You may need to insert an airway if breathing is at all compromised. The patient should soon recover so that the procedure can be quickly finished. If bradycardia does not resolve, consider giving atropine
- Significant bleeding or haemorrhage is not normally a dif-
Difficulty in minor surgery but if it does occur the normal haemostatic measures are usually effective; eg. apply firm pressure with a dressing for two minutes and raise the affected areas above the heart. If this fails, introduce a little of the adrenaline-containing anaesthetic or a haemostatic agent (aluminium chloride or ferric sulphate) into the wound. Physical methods include squeezing bleeding points with fine forceps and ligaturing small blood vessels with absorbable sutures.

**Dressing the wound**

Small wounds generally just need a plaster and more extensive areas should be covered with an absorbent, non-adherent dressing held in place with a micropore tape or a bandage depending on the site. OpSite spray is a convenient alternative in difficult areas.

**Aftercare**

Patients should be told to rest the affected area and raise any leg involved. Arms can be placed in a sling and fingers or toes immobilised by strapping together with the adjacent digit. Sutures are removed at between five and 12 days depending on the site, with the hands and feet requiring the longest interval. This gives an opportunity to also inspect the wound for any problems, such as infection or failure to heal.

**Procedures undertaken by GPs**

There has been a huge variation in the range of procedures undertaken at practice level. Many practices have provided cryotherapy, curettage and cauteryisation only, while still referring other minor surgery into the secondary sector.

The survey then investigated which procedures were carried out frequently in their practices. Table 1 outlines the range of procedures carried out.

The viewpoint of the GP was also very important, and an overwhelming 96.8% (63) felt that there was a role to perform these procedures in primary care. This evidence is strongly supportive of the role of minor surgery in general practice. Taking this into consideration we must now further investigate the barriers to implementing this service. What modifications can be made to improve it? What changes can be implemented to make it more attractive to doing so?

**Increasing skill levels**

HSE CEO Prof Brendan Drumm has recently addressed the need to bridge the gap between secondary and primary care. He sees an increased role for the GP in the care of chronic conditions in the community, be it diabetes or...
One of the most profound outcomes from the study was the number dissatisfied with medical card scheme payments for performing minor surgical procedures. The survey showed overwhelmingly that GPs are not satisfied with the medical card funding for performing such minor surgery. A convincing 98.4% felt the payments were inappropriate to cover materials, skills and time utilised. A mere 1.6% felt the payments were appropriate for the procedure performed. Both VHI and Bupa continue to encourage GPs throughout Ireland to undertake more of their own minor operations. This continues in the tradition of many of the rural GP colleagues who performed their own minor surgery in the earlier days of medicine. There followed a period where many patients were unnecessarily referred to hospitals for simple surgical procedures such as abscess incision or removal of skin lesions. During this period, many GPs lost their skills, and surgical consultants mainly taught minor surgery to surgical residents in training or A&E staff.

A large study performed in Kent on performing 500 minor operations found that GPs can provide an efficient, cost-effective minor surgery service, which is popular with patients and referring colleagues. In general practice, training is imperative; no treatment should be given without the requisite training. It was an interesting finding from the survey in Kent that almost 71% of GPs felt the current training was insufficient. This is a finding that would need to be looked at closely. Given the frequency with which these procedures are performed it would indeed be vital to increase the training. Although the ICGP currently offers a minor surgery training course, it is optional.

A study performed in Inverness, Scotland and published in the Royal College of Surgeons in 1997, assessed the adequacy of training in minor surgery in general practice. The study examined the training and confidence levels in 144 practitioners. It concluded that while most GPs receive some training in minor surgery, there is a perceived need for improved training. They also found that the use of a skin simulator may allow both the teaching and assessment of surgical competence for GPs who undertake minor surgery.

A further study conducted in Navan, Co Meath in 1999 found that with the introduction of a skills programme on minor surgical workload in general practice, the procedures performed doubled in four years. In the surveyed population, the referred minor procedures fell from 22% to 1.4%. The study concluded that surgical workload and repertoire is increased among participants in a minor surgical skills programme within a period of four years.

The above evidence outlines clearly the importance of adequate training and also the increase in minor surgical procedures following such training.

The modern GP provides a large array of services to their patients. Many can find themselves providing care under severe time pressures. It is of little benefit having the knowledge, resources and skill level to perform such procedures if you simply can’t find the time to do so. Many GPs already find their service limited by time. This was evident in the survey, which showed that almost 80% of GPs felt providing such a service would be limited by time constraints.

**Focus points for minor surgery**

- Medical service card payments should be consistent with materials, skill level, time spent and subsequent services employed in the provision of such a service
- GPs wishing to be involved in such procedures should have access to comprehensive training
- The training undertaken should be standardised at a national and regional level
- Each GP needs to realise the limitations of minor surgery in a general practice setting
- The procedures performed should be audited and peer review be encouraged
- The workload of adjoining laboratories should not be excessively loaded with inappropriate specimens
- The proper facilities should be in place in each practice when performing minor surgical procedures
- Time management and allotment is vital in undertaking such procedures

It is vital for the modern day GP to endeavour to run on time. Minor surgery can not always be allocated specific time duration. Procedures can result in complications, turn out to be more difficult or extensive than expected. This can lead to appointments running late, much to the dismay of both patient and doctor alike.

The GPs surveyed showed that a large majority (72.3%) were satisfied with the minor surgical service of their local hospital. This is testament to the high standard of service provided by the hospitals in the midlands area. Of some concern is the fact that of the GPs questioned, 27.7% were not satisfied. Of further interest but beyond the remit of this survey would be to investigate and address the reasons for this dissatisfaction. Is it the time delay, level of service, or other relevant factors? Some patients feel uncomfortable attending the hospital for non-urgent treatment. They may be more amenable to attending their GP for certain minor operative problems.

The GPs were asked as to whether they had attended a structured training programme to perform minor surgical procedures. The results indicated that 58.2% had actually attended a training course and the remaining 41.8% had not done so. It is well recognised that formal training is a major asset in providing such a service, enabling one to have a structured approach and perform such procedures confidentially.

In the ICGP, there is a structured two-day course to provide demonstration in surgical principles and techniques. This course is aimed at increasing the level of confidence among GPs in minor surgery.

In conclusion, a large majority of practitioners in the midland areas are currently involved in providing minor surgical procedures. Factors which need to be reassessed include training, funding and also allotting time to perform such procedures. The role of local hospitals in this area is well regarded by practitioners; however, an overwhelming majority still felt that there was a role for such procedures in primary care.

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References on request