Book reviews

Forefoot surgery

B. Valtin, ed. 165 pages, Expansion Scientifique Publications, Paris 1997
ISBN 2-7046-1531-4

This book deals with forefoot surgery in general, but the main topic is hallux valgus surgery. Since the book is written mainly by French authors, the concept of shortening is important. Dr. L. S. Barouk is a great advocate of the scarf and Weil osteotomies.

Scarf osteotomy is a z-shaped osteotomy of the 1st metatarsal, which permits correction of a hallux valgus deformity by lateral shifting and sometimes shortening of the distal and plantar parts of the metatarsal. The osteotomy is fixed with one proximal and one distal screw. Cutting the long axis is essential to avoid breakage of the lateral cortex. The saw blade should be directed inferiorly and laterally. Otherwise, the osteotomy is easy to perform and stable after fixation.

According to Dr. Barouk, this technique is useful for almost any kind of hallux valgus deformity no matter how severe. However, in more than 80% of the cases, this osteotomy is combined with an osteotomy of the proximal phalanx. Since no shortening is desired on "Greek feet" (with a long second toe), a medially based wedge is removed from the base of the proximal phalanx. A simple staple gives sufficient fixation. On "Egyptian feet", however, shortening of the phalanx reduces the phalangeal lever arm and improves the correction. A piece of bone is resected from the diaphysis of the phalanx. This osteotomy is potentially unstable and requires fixation with a specially designed staple ("memory staple").

Any osteotomy of the 1st metatarsal will result in some amount of shortening. This can be partly avoided by directing the saw cuts inferiorly, but Dr. Barouk points out that the scarf osteotomy, in most cases, has to be combined with shortening of all lesser metatarsals. He uses the Weil osteotomy, initially described by L. S. Weil in 1988. The metatarsal heads are shifted proximally. With this technique, the saw cut is made as horizontal as possible to shift the head proximally without lowering or raising it. The osteotomy is fixed with a screw. Postoperatively, after hallux and lesser metatarsal osteotomies, the patient returns to weight bearing in 15–30 days.

The treatments proposed for hallux rigidus are similar to other textbooks. Wedged osteotomies like Watermann and Kessel-Bonney as well as the Keller procedure are discussed; but the very specific French Regnauld's procedure is not mentioned.

Metatarsalgia is discussed in one chapter, and the proposed treatment is, of course, the Weil osteotomy.

The illustrations are all in black and white and most of them are acceptable, but not outstanding.

Nearly all forefoot problems are dealt with in this book, but apart from the scarf and Weil osteotomies, nothing exceptional is offered. The scarf osteotomy has been frequently used in Sweden during the last few years. It is technically more demanding than the chevron osteotomy, but can handle more serious deformities. I think that most foot surgeons should be able to master the scarf osteotomy and this book will bring you Dr. Barouk's solid experience. What could be better than to get it from "the horse's mouth"?

Fredrik Montgomery
Department of Orthopedics, Malmö University Hospital, SE-205 02 Malmö, Sweden

An atlas of surgery of the spine

Howard S An and Lee H Riley III (editors), 382 pages, Martin Dunitz Ltd, London 1998
ISBN 1-85317-218-9

"Go where the pathology is" is a sound principle in most instances in spinal surgery, and good access to the anterior or the posterior aspect of the spinal column is necessary. From occiput to pelvis, the spine is located centrally in the body close to most of the vital organs and to the major vessels, and the surgical approach to the spine is an essential part of the continuous training of the spinal surgeon. This calls for good textbooks and atlases focusing on anatomy and surgical techniques.

Nearly all 21 contributors to this first edition of *An atlas of surgery of the spine* are internationally well-known and respected spinal surgeons, mainly from the U.S. Without major omissions, the book covers patient-positioning, surgical procedures on the entire spine and the sacrum, including the surgical treatment of intradural lesions. The chapters generally consist of about 50% text and 50% illustrations, both black and white and in color. Altogether, there are more than 500 illustrations of which more than 150 are in color. The text covers anatomy, surgical techniques, conclusion, and bibliography. Indications for surgery are given in tables. Compared to major general textbooks about the spine, there is much less text but the number of illustrations is about the same.

The illustrations are instructive, simple and easy to understand. As is often the case with illustrations of surgical techniques, not least in the hand-outs from the manufacturers of spinal implants, they make it look easier than in real life.

The quality of the different chapters varies. For example, the chapters on 'microsurgery for lumbar disc disease' and 'posterior atlantoaxial arthrodesis' cover the different techniques beautifully, although the detail to decorticate the posterior surface of C1 and C2 before placing the bone graft is forgotten both in the text and the illustrations in the latter chapter.

Some sections are very detailed (for example, 'translaminar facet joint screw fixation') but others are superficial (for example, 'anterior exposures of the cervicothoracic junction', which perhaps is the most difficult exposure in spinal surgery, or the 18 pages covering percutaneous techniques and minimally invasive procedures in the thoracic and lumbar spine).

Some figures are misleading. Figures 14.2 B to E on the important subject of lumbar pedicle screw instrumentation show destruction of the articular surface of the facet joint as part of the procedure, which is inconsistent with the recommended techniques and with Figures 14.2 A, F, G, and I. The position of the patient in lateral decubitus position in Figure 1.3 is not stable, as stated in the text.

In conclusion, the present atlas is not sufficient by itself for spinal surgeons in their training and daily operative planning. It may, however, be a good choice as an atlas on the spine in the ward or in the out-patient clinic when giving information to the patient.

Karsten Thomsen
Section of Spine Surgery, Department of Orthopaedic Surgery, Odense University Hospital, Sdr. Boulevard 29, DK-5000 Odense, Denmark

Surgery of the elbow—practical and scientific aspects

David Stanley and Neville R. M. Kay (editors), 416 pages, Arnold, U.K. 1998
ISBN 0 340 59805 0

In their new book on elbow surgery, Drs. Stanley and Kay have edited the contributions of 35 authors, all internationally well-respected orthopedic surgeons, and specialists in their fields. The comprehensive text thoroughly covers the wide spectrum of elbow pathologies in adult and pediatric elbows from embryology through sports injuries and tumors around the elbow joint. Each chapter includes whenever possible the authors' preferred treatment option which, of course, is of great value for the less experienced reader. The references in many of the contributions, although updated, are quite sparse and should be extended considerably in the next edition.

The complexity of the anatomy and mechanics of the elbow joint are well described by de Boer and Amis, but I miss a description of the stabilizers of the elbow joint, especially the ligamentous parts, since we encounter ever more instability problems of the elbow now.

The trauma part of the book is well written and covers all types of fractures and dislocations of the joint. The advantages of more extensile procedures to the elbow joint, and also the improvements in the implants for internal fixation of fractures, and early mobilization, are pointed out by various authors. However, recommendations for precise preoperative planning, including 3-D CT, and especially in children MRI, should have been included.

Chronic elbow instability is said to be rare by Carr and Rymaszewski in their chapter, and this probably is correct concerning recurrent dislocations. In recent years, however, increasing attention has been paid to posterolateral instability of the joint, and several papers have been published on its treatment and diagnosis. Therefore it would have been interesting to know the author's preferred treatment of this condition. The editors should be congratulated on this excellent book that will be of great value to orthopedic surgeons in training, but it should also be studied by the general orthopedic surgeon, who wants an update on the surgical problems of the elbow he has to handle in his daily practice.

Jens O. Søjbjerg
Department of Orthopedics E, University Hospital of Århus, DK-8000 Århus C, Denmark