

## **Backache**

Professor Wen-Jer Chen

More than 80 percent of adults have experienced of back pain, and it is the most common cause of disability in people younger than 45 years old. The differential diagnosis of back pain include poor posture, trauma, degeneration, inflammation, infection, osteoporosis, bone tumors, neurogenic tumors, visceral lesions, pelvic pathologies, vascular diseases, or psychological factors. The pathology of the spine will present as not only backache, but also sciatica, motor weakness, muscle atrophy, incontinence and even paralysis.

Establishing a definitive diagnosis is the cornerstone for the treatment of back pain. Most back pain can be relieved by rest. However, in situations associated with infection and tumor, rest along cannot improve the symptoms, and the pain might be even more severe at night. Fever may accompany back pain in patients with spine infection. Morning stiffness is common in ankylosing conditions. Sciatica and claudication are the hallmarks of lumbar disk herniation and spinal stenosis, respectively.

The diagnosis of back pain relies on detailed history taking, a well-performed physical examination, and an adequate work-up. The diagnosis cannot be made solely on the basis of image study. Some patients with severe backache may have relatively good spine films. In patients with deformed lumbar spine, symptoms may be caused by cervical or thoracic spine. Therefore, clinical presentations are often more important than imaging reports alone.

People with back pain should not receive massage, chiropractic treatment, or surgery without a definite diagnosis. Most back pain and sciatica can be relieved by utilizing conservative treatment. Surgical intervention is only required in patients in which conservative treatment has failed, neurologic deficits exist, or in cases of unstable vertebrae. By establishing an accurate diagnosis, applying appropriate indications, and performing delicate surgery, a good prognosis for related spine surgery for back pain can be obtained.