

The Spinal Cord



A brief history of spinal cord injuries in the UK.

Rehabilitation as we know it today really began during the second world war when an escaping German Jewish Doctor Ludvig Guttman established the first spinal injuries centre at Stoke Mandeville in Aylesbury. He was a great believer in sports and activities being the key to getting people motivated after injury. His pioneering work formed the basis of how we treat a spinal cord injury, even today.

Originally when someone sustained an injury to their neck or back they would be placed in traction for up to 4 months at a time. Now days people are operated on shortly after they arrive at the hospital to stabilise the spine and get the person into a wheelchair ready to start rehabilitation. This cuts down problems with pressure sores, bladder and bowel complications.

There are 10 spinal units in England and Wales but unfortunately not everybody with a spinal cord injury will be treated in one of those. A lot of injuries will be treated in major trauma centres up and down the country. Unfortunately those people won't get the specialist rehabilitation that they need, which often leads to complications in the future.

Information taken from the Spinal
Injuries Association

Prevalence of spinal cord injury

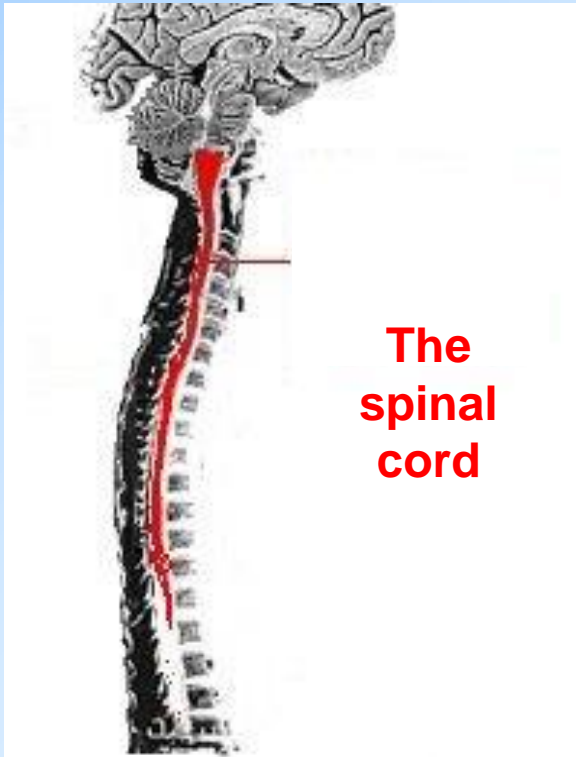
40,000 people in UK with a spinal cord injury.

1000 new cases admitted for treatment in year 2019.

In the mid 80's the average age of someone breaking their back or neck was 18-22 with 90% of those being male. 2018 the average age was 48-52 with the split being roughly 50/50 male/female, the biggest changes have been in the reduction of road traffic accidents. What we now find is we are getting people aged 60-70 are sustaining injuries through falls. What that means is rehabilitation needs are very different. With youngsters it is about getting them back to a level where they can tackle life to their full potential, the elderly basically want to return home to enjoy their later years.

Information gained from SIA

What is the spinal cord?



**The
spinal
cord**

The spinal cord is like a great telephone communications system and is made of nerves which carry messages between the brain and all other parts of the body.

The Anatomy and Physiology of the Spine

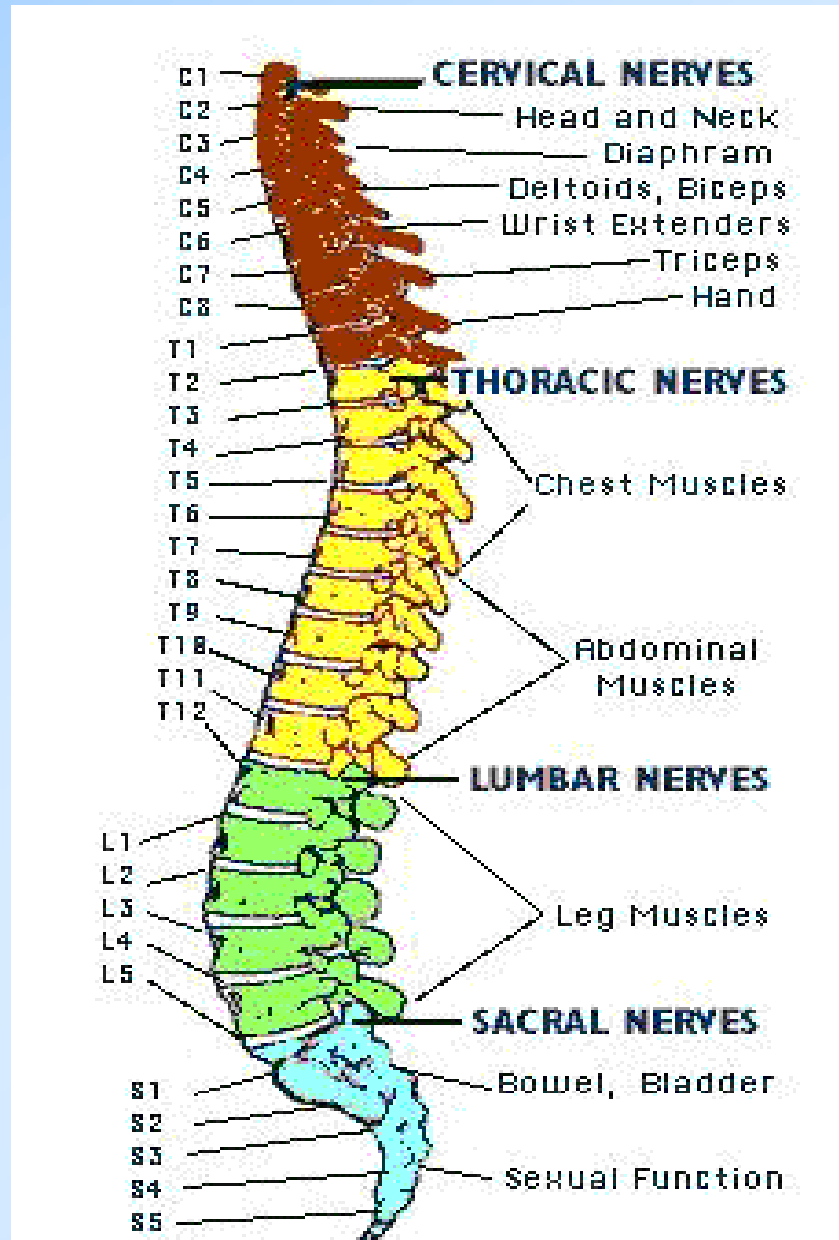


Image gained from
www.whyfiles.org

The spine is composed of 33 individual and fused vertebrae sharing certain common characteristics and grouped according to site and function.

There are: 7 cervical

12 thoracic

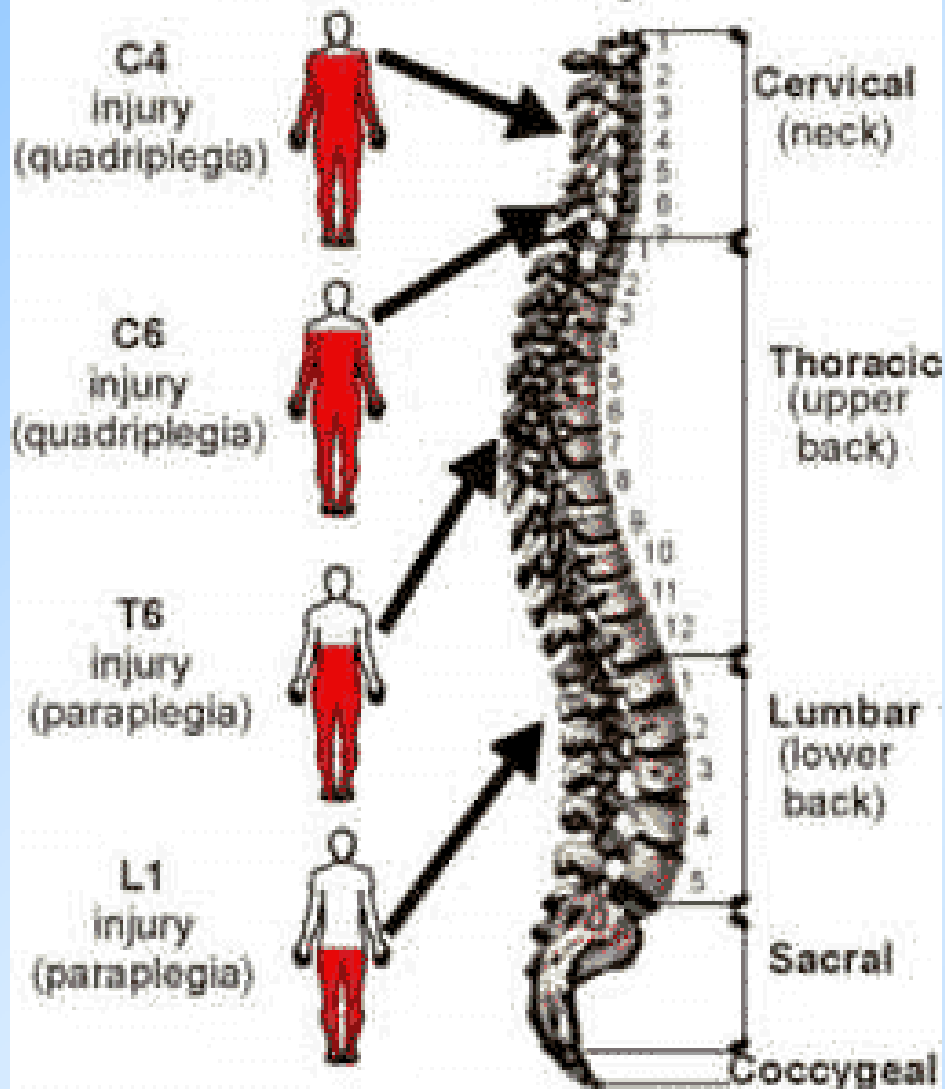
5 lumbar

5 sacrum

4 coccyx

vertebrae.

Levels of Injury and Extent of Paralysis



Paraplegia

Tetraplegia/ quadriplegia

UMN- Upper Motor Neurone.

LMN- Lower Motor Neurone.

Conus and Cauda Equina Injuries

QUESTIONS

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