

A diagram of a cell showing the nucleus and nucleolus. The nucleus is a large, oval-shaped structure with a wavy, irregular boundary. Inside the nucleus is a smaller, denser, spherical structure called the nucleolus. A label '1' points to the nucleolus, and a label '2' points to the nucleus. The cell is shown in cross-section, with a wavy, irregular boundary representing the cell membrane.

The diagram illustrates the structure of a peripheral nerve. On the left, a cross-section of the nerve is shown, with a wavy line representing the epineurium. Inside, a bundle of nerve fibers is depicted, with a single fiber highlighted. The fiber consists of an axon (1) surrounded by a myelin sheath (2). The axon is shown as a long, thin, cylindrical structure. The myelin sheath is composed of multiple segments (3) separated by gaps (4). The gaps are labeled as the nodes of Ranvier. The myelin sheath is formed by Schwann cells (5) which are shown as elongated, spindle-shaped cells. The axon terminates in a branching structure (6) that enters a nerve terminal. The entire nerve is shown in a cross-section, with the axon bundle surrounded by the epineurium.

4

5

3

1

2